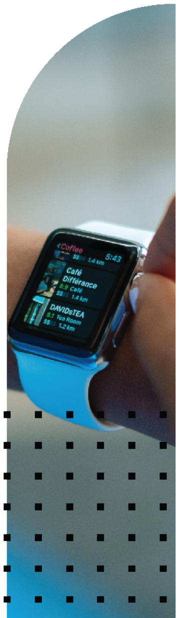
FORTINET

Dataset Reference

FortiAnalyzer 7.0.4



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FortiAnalyzer 7.0.4 Dataset Reference
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Introduction

This document provides information about the various types of FortiAnalyzer datasets.

Understanding datasets and macros

FortiAnalyzer datasets are collections of log messages from monitored devices.

Charts in FortiAnalyzer are generated based on the datasets. To create a chart, you can use the predefined datasets, or you can create your own custom datasets by querying the log messages in the SQL database on the FortiAnalyzer unit. Both predefined and custom datasets can be cloned, but only custom datasets can be deleted. You can also view the SQL query for a dataset, and test the query against specific devices or log arrays.

You can create custom reports that contain macros that are created based on predefined and custom datasets. Macros are used to dynamically display the device log data as text in a report. They can be embedded within a text field of a paragraph in a report layout in XML format. Macros display a single value, such as a user name, highest session count, or highest bandwidth, and so on.

For more information about how to create datasets, charts, and macros, see the FortiAnalyzer *Administration Guide*.

Dataset Reference List

The following tables list the datasets included with FortiAnalyzer. The tables contain the name, SQL query syntax, and log category for each dataset.

Dataset Name	Description	Log Category
Traffic-Bandwidth-Summary-Day-Of-Month	Traffic bandwidth timeline	traffic

```
select
  $flex_timescale(timestamp) as hodex,
  sum(traffic_out) as traffic_out,
  sum(traffic_in) as traffic_in
from
  ###(select timestamp, sum(bandwidth) as bandwidth, sum(traffic_out) as traffic_out, sum
(traffic_in) as traffic_in from ###base(/*tag:rpt_base_t_bndwdth_sess*/select $flex_
timestamp as timestamp, dvid, srcip, dstip, epid, euid, coalesce(nullifna(`user`), nullifna
(`unauthuser`), ipstr(`srcip`)) as user_src, service, count(*) as sessions, sum(coalesce
(sentdelta, sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as bandwidth, sum(coalesce
(sentdelta, sentbyte, 0)) as traffic_out, sum(coalesce(rcvddelta, rcvdbyte, 0)) as traffic_
in from $log-traffic where $filter and (logflag&(1|32)>0) group by timestamp, dvid, srcip,
dstip, epid, euid, user_src, service /*SkipSTART*/order by timestamp desc/*SkipEND*/)base###
base_query group by timestamp order by bandwidth desc)### t where $filter-drilldown group by
hodex having sum(traffic_out+traffic_in)>0 order by hodex
```

Dataset Name	Description	Log Category
Session-Summary-Day-Of-Month	Number of session timeline	traffic

```
select
  $flex_timescale(timestamp) as hodex,
  sum(sessions) as sessions
from
  ###(select timestamp, sum(sessions) as sessions from ###base(/*tag:rpt_base_t_bndwdth_
sess*/select $flex_timestamp as timestamp, dvid, srcip, dstip, epid, euid, coalesce(nullifna
(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src, service, count(*) as
sessions, sum(coalesce(sentdelta, sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as
bandwidth, sum(coalesce(sentdelta, sentbyte, 0)) as traffic_out, sum(coalesce(rcvddelta,
rcvdbyte, 0)) as traffic_in from $log-traffic where $filter and (logflag&(1|32)>0) group by
timestamp, dvid, srcip, dstip, epid, euid, user_src, service /*SkipSTART*/order by timestamp
desc/*SkipEND*/)base### base_query group by timestamp order by sessions desc)### t where
$filter-drilldown group by hodex order by hodex
```

Dataset Name	Description	Log Category
Top-Users-By-Bandwidth	Bandwidth application top users by bandwidth usage	traffic

```
select
  user_src,
  sum(bandwidth) as bandwidth,
  sum(traffic_in) as traffic_in,
  sum(traffic_out) as traffic_out,
  sum(sessions) as sessions
from
  ###(select user_src, sum(traffic_in) as traffic_in, sum(traffic_out) as traffic_out, sum
(bandwidth) as bandwidth, sum(sessions) as sessions from ###base(/*tag:rpt_base_t_top_
app*/select dvid, srcip, dstip, epid, euid, coalesce(nullifna(`user`), nullifna
(`unauthuser`), ipstr(`srcip`)) as user_src, appid, app, appcat, apprisk, hostname, sum
(coalesce(rcvddelta, rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as
traffic_out, sum(coalesce(sentdelta, sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as
bandwidth, count(*) as sessions from $log-traffic where $filter and (logflag&(1|32)>0) and
nullifna(app) is not null group by dvid, srcip, dstip, epid, euid, user_src, appid, app,
appcat, apprisk, hostname order by sessions desc)base### t group by user_src order by
sessions desc, bandwidth desc)### t group by user_src having sum(bandwidth)>0 order by
bandwidth desc
```

Dataset Name	Description	Log Category
Top-App-By-Bandwidth	Top applications by bandwidth usage	traffic

```
select
  app_group_name(app) as app_group,
  sum(bandwidth) as bandwidth,
  sum(traffic_in) as traffic_in,
  sum(traffic_out) as traffic_out,
  sum(sessions) as sessions
from
  ###(select appid, app, appcat, apprisk, sum(traffic_in) as traffic_in, sum(traffic_out) as
traffic_out, sum(bandwidth) as bandwidth, sum(sessions) as sessions from ###base(/*tag:rpt_
base_t_top_app*/select dvid, srcip, dstip, epid, euid, coalesce(nullifna(`user`), nullifna
(`unauthuser`), ipstr(`srcip`)) as user_src, appid, app, appcat, apprisk, hostname, sum
(coalesce(rcvddelta, rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as
traffic_out, sum(coalesce(sentdelta, sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as
bandwidth, count(*) as sessions from $log-traffic where $filter and (logflag&(1|32)>0) and
nullifna(app) is not null group by dvid, srcip, dstip, epid, euid, user_src, appid, app,
appcat, apprisk, hostname order by sessions desc)base### t group by appid, app, appcat,
apprisk /*SkipSTART*/order by sessions desc, bandwidth desc/*SkipEND*/)### t group by app_
group having sum(bandwidth)>0 order by bandwidth desc
```

Dataset Name	Description	Log Category
Top-User-Source-By-Sessions	Top user source by session count	traffic

```
select
  user_src,
  sum(sessions) as sessions
from
  ###(select coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src,
count(*) as sessions from $log where $filter and (logflag&1>0) group by user_src order by
sessions desc)### t group by user_src order by sessions desc
```

Dataset Name	Description	Log Category
Top-App-By-Sessions	Top applications by session count	traffic

```
select
  app_group,
  sum(sessions) as sessions
from
  ###(select app_group_name(app) as app_group, appcat, service, sum(coalesce(sentdelta,
sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as bandwidth, sum(coalesce(rcvddelta,
rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as traffic_out, count(*)
as sessions from $log where $filter and (logflag&(1|32)>0) and nullifna(app) is not null
group by app_group, appcat, service order by bandwidth desc)### t group by app_group order
by sessions desc
```

Dataset Name	Description	Log Category
Top-Destination-Addresses-By-Sessions	Top destinations by session count	traffic

```
select
  coalesce(
    nullifna(
      root_domain(hostname)
    ),
    ipstr(dstip)
  ) as domain,
  count(*) as sessions
from
  $log
where
  $filter
  and (
    logflag&1>0
  )
group by
  domain
order by
  sessions desc
```

Dataset Name	Description	Log Category
Top-Destination-Addresses-By-Bandwidth	Top destinations by bandwidth usage	traffic

```
select
  coalesce(
    nullifna(
      root_domain(hostname)
    ),
    ipstr(dstip)
  ) as domain,
  sum(
    coalesce(sentbyte, 0)+ coalesce(rcvdbyte, 0)
  ) as bandwidth,
  sum(
    coalesce(rcvdbyte, 0)
  ) as traffic_in,
  sum(
    coalesce(sentbyte, 0)
  ) as traffic_out
from
```

```
  $log
where
  $filter
  and (
    logflag&1>0
  )
  and coalesce(
    nullifna(
      root_domain(hostname)
    ),
    ipstr(`dstip`)
  ) is not null
group by
  domain
having
  sum(
    coalesce(sentbyte, 0)+ coalesce(rcvdbyte, 0)
  )> 0
order by
  bandwidth desc
```

Dataset Name	Description	Log Category
DHCP-Summary-By-Port	Event top dhcp summary	event

```
drop
  table if exists rpt_tmptbl_1;
drop
  table if exists rpt_tmptbl_2;
drop
  table if exists rpt_tmptbl_3; create temporary table rpt_tmptbl_1 as
select
  devintf,
  mac
from
  ###(select concat(interface, '.', devid) as devintf, mac from $log where $last3day_period
$filter and logid_to_int(logid) = 26001 and dhcp_msg = 'Ack' group by devintf, mac)### t
group by devintf, mac; create temporary table rpt_tmptbl_2 as select devintf, mac from ###
(select concat(interface, '.', devid) as devintf, mac from $log where $filter and logid_to_
int(logid) = 26001 and dhcp_msg = 'Ack' group by devintf, mac)### t group by devintf, mac;
create temporary table rpt_tmptbl_3 as select distinct on (1) devintf, cast(used*100.0/total
as decimal(18,2)) as percent_of_allocated_ip from ###(select distinct on (devintf) concat
(interface, '.', devid) as devintf, used, total, itime from $log where $filter and logid_to_
int(logid)=26003 and total>0 /*SkipSTART*/order by devintf, itime desc/*SkipEND*/)### t
order by devintf, itime desc; select t1.devintf as interface, percent_of_allocated_ip, new_
cli_count from rpt_tmptbl_3 t1 inner join (select devintf, count(mac) as new_cli_count from
rpt_tmptbl_2 where not exists (select 1 from rpt_tmptbl_1 where rpt_tmptbl_2.mac=rpt_tmptbl_
1.mac) group by devintf) t2 on t1.devintf=t2.devintf order by interface, percent_of_
allocated_ip desc
```

Dataset Name	Description	Log Category
Top-Wifi-Client-By-Bandwidth	Traffic top WiFi client by bandwidth usage	traffic

```
select
  user_src,
  srcssid,
  devtype_new,
  hostname_mac,
  sum(bandwidth) as bandwidth
from
  (
    select
      user_src,
      srcssid,
      get_devtype(srcswversion, osname, devtype) as devtype_new,
      hostname_mac,
      sum(bandwidth) as bandwidth
    from
      ###(select coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_
src, ap, srcintf, srcssid, srcssid as ssid, srcmac, srcmac as stamac, coalesce(nullifna
(`srcname`), `srcmac`) as hostname_mac, max(srcswversion) as srcswversion, max(osname) as
osname, max(osversion) as osversion, max(devtype) as devtype, sum(coalesce(sentbyte,
0)+coalesce(rcvdbyte, 0)) as bandwidth, count(*) as subtotal from $log-traffic where $filter
and (logflag&1>0) and (srcssid is not null or dstssid is not null) group by user_src, ap,
srcintf, srcssid, srcmac, hostname_mac /*SkipSTART*/order by bandwidth desc, subtotal
desc/*SkipEND*/)### t group by user_src, srcssid, devtype_new, hostname_mac having sum
(bandwidth)>0 union all select user_src, ssid as srcssid, null as devtype_new, stamac as
hostname_mac, sum(bandwidth) as bandwidth from ###(select $flex_timestamp as timestamp,
stamac, stamac as srcmac, ap, ssid, ssid as srcssid, user_src, sum(coalesce(sentdelta, 0))
as sentdelta, sum(coalesce(rcvddelta, 0)) as rcvddelta, sum(coalesce(sentdelta, 0)+coalesce
(rcvddelta, 0)) as bandwidth from (select itime, stamac, ap, ssid, coalesce(`user`, ipstr
(`srcip`)) as user_src, sentbyte-lag(coalesce(sentbyte, 0)) over (partition by stamac order
by itime) as sentdelta, rcvdbyte-lag(coalesce(rcvdbyte, 0)) over (partition by stamac order
by itime) as rcvddelta from $log-event where $filter and subtype='wireless' and stamac is
not null and ssid is not null and action in ('sta-wl-bridge-traffic-stats', 'reassoc-req',
'assoc-req')) as t group by timestamp, stamac, ap, ssid, user_src /*SkipSTART*/order by
bandwidth desc/*SkipEND*/)### t where user_src is not null group by user_src, ssid, devtype_
new, stamac having sum(bandwidth)>0) t group by user_src, srcssid, devtype_new, hostname_mac
order by bandwidth desc
```

Dataset Name	Description	Log Category
Traffic-History-By-Active-User	Traffic history by active user	traffic

```
select
  $flex_timescale(timestamp) as hodex,
  count(
    distinct(user_src)
  ) as total_user
from
  ###(select timestamp, user_src, sum(sessions) as sessions from ###base(/*tag:rpt_base_t_
bndwdth_sess*/select $flex_timestamp as timestamp, dvid, srcip, dstip, epid, euid, coalesce
(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src, service, count(*) as
sessions, sum(coalesce(sentdelta, sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as
bandwidth, sum(coalesce(sentdelta, sentbyte, 0)) as traffic_out, sum(coalesce(rcvddelta,
rcvdbyte, 0)) as traffic_in from $log-traffic where $filter and (logflag&(1|32)>0) group by
timestamp, dvid, srcip, dstip, epid, euid, user_src, service /*SkipSTART*/order by timestamp
desc/*SkipEND*/)base### base_query group by timestamp, user_src order by sessions desc)### t
where $filter-drilldown group by hodex order by hodex
```

Dataset Name	Description	Log Category
Top-Allowed-Websites-By-Requests	UTM top allowed web sites by request	traffic

```
select
  hostname,
  catdesc,
  count(*) as requests
from
  $log
where
  $filter
  and (
    logflag&1>0
  )
  and utmevent in (
    & #039;webfilter', 'banned-word', 'web-content', 'command-block', 'script-filter') and
hostname is not null and (utmaction not in ('block', 'blocked') or action!='deny') group by
hostname, catdesc order by requests desc
```

Dataset Name	Description	Log Category
Top-50-Websites-By-Bandwidth	Webfilter top allowed web sites by bandwidth usage	webfilter

```
select
  domain,
  string_agg(
    distinct catdesc,
    & #039;, ') as agg_catdesc, sum(bandwidth) as bandwidth, sum(traffic_in) as traffic_in,
sum(traffic_out) as traffic_out from ###(select coalesce(nullifna(hostname), ipstr(`dstip`))
as domain, catdesc, sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0)) as bandwidth, sum
(coalesce(rcvdbyte, 0)) as traffic_in, sum(coalesce(sentbyte, 0)) as traffic_out from $log-
traffic where $filter and (logflag&1>0) and utmaction!='blocked' and (countweb>0 or ((logver
is null or logver<502000000) and (hostname is not null or utmevent in ('webfilter', 'banned-
word', 'web-content', 'command-block', 'script-filter')))) group by domain, catdesc having
sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0))>0 /*SkipSTART*/order by bandwidth
desc/*SkipEND*/)### t group by domain, catdesc order by bandwidth desc
```

Dataset Name	Description	Log Category
Top-Blocked-Websites	UTM top blocked web sites by request	traffic

```
select
  hostname,
  count(*) as requests
from
  $log
where
  $filter
  and (
    logflag&1>0
  )
  and utmevent in (
    & #039;webfilter', 'banned-word', 'web-content', 'command-block', 'script-filter') and
hostname is not null and (utmaction in ('block', 'blocked') or action='deny') group by
hostname order by requests desc
```

Dataset Name	Description	Log Category
Top-Web-Users-By-Request	UTM top web users by request	traffic

```
select
  user_src,
  devtype_new,
  srcname,
  sum(requests) as requests
from
  ###(select coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src,
get_devtype(srcswversion, osname, devtype) as devtype_new, srcname, action, utmaction, sum
(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0)) as bandwidth, sum(coalesce(rcvdbyte, 0)) as
traffic_in, sum(coalesce(sentbyte, 0)) as traffic_out, count(*) as requests from $log where
$filter and (logflag&1>0) and utmevent in ('webfilter', 'banned-word', 'web-content',
'command-block', 'script-filter') group by user_src, devtype_new, srcname, action, utmaction
order by requests desc)### t group by user_src, devtype_new, srcname order by requests desc
```

Dataset Name	Description	Log Category
Top-Allowed-WebSites-By-Bandwidth	UTM top allowed websites by bandwidth usage	traffic

```
select
  appid,
  hostname,
  catdesc,
  sum(
    coalesce(sentbyte, 0)+ coalesce(rcvdbyte, 0)
  ) as bandwidth,
  sum(
    coalesce(rcvdbyte, 0)
  ) as traffic_in,
  sum(
    coalesce(sentbyte, 0)
  ) as traffic_out
from
  $log
where
  $filter
  and (
    logflag&1>0
  )
  and utmevent in (
    & #039;webfilter', 'banned-word', 'web-content', 'command-block', 'script-filter') and
hostname is not null group by appid, hostname, catdesc having sum(coalesce(sentbyte,
0)+coalesce(rcvdbyte, 0))>0 order by bandwidth desc
```

Dataset Name	Description	Log Category
Top-Blocked-Web-Users	UTM top blocked web users	traffic

```
select
  user_src,
  devtype_new,
  srcname,
  sum(requests) as requests
```

```
from
  ###(select coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src,
get_devtype(srcswversion, osname, devtype) as devtype_new, srcname, action, utmaction, sum
(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0)) as bandwidth, sum(coalesce(rcvdbyte, 0)) as
traffic_in, sum(coalesce(sentbyte, 0)) as traffic_out, count(*) as requests from $log where
$filter and (logflag&1>0) and utmevent in ('webfilter', 'banned-word', 'web-content',
'command-block', 'script-filter') group by user_src, devtype_new, srcname, action, utmaction
order by requests desc)### t where (utmaction in ('block', 'blocked') or action='deny')
group by user_src, devtype_new, srcname order by requests desc
```

Dataset Name	Description	Log Category
Top-20-Web-Users-By-Bandwidth	Webfilter top web users by bandwidth usage	webfilter

```
select
  coalesce(
    f_user,
    euname,
    ipstr(`srcip`)
  ) as user_src,
  coalesce(
    epname,
    ipstr(`srcip`)
  ) as ep_src,
  sum(bandwidth) as bandwidth,
  sum(traffic_in) as traffic_in,
  sum(traffic_out) as traffic_out
from
  (
    select
      dvid,
      f_user,
      srcip,
      ep_id,
      eu_id,
      sum(bandwidth) as bandwidth,
      sum(traffic_in) as traffic_in,
      sum(traffic_out) as traffic_out
    from
      ###(select dvid, coalesce(nullifna(`user`), nullifna(`unauthuser`)) as f_user, srcip,
(case when epid<1024 then null else epid end) as ep_id, (case when euid<1024 then null else
euid end) as eu_id, sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0)) as bandwidth, sum
(coalesce(rcvdbyte, 0)) as traffic_in, sum(coalesce(sentbyte, 0)) as traffic_out from $log-
traffic where $filter and (logflag&1>0) and (countweb>0 or ((logver is null or
logver<502000000) and (hostname is not null or utmevent in ('webfilter', 'banned-word',
'web-content', 'command-block', 'script-filter')))) group by dvid, f_user, srcip, ep_id, eu_
id having sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0))>0 /*SkipSTART*/order by bandwidth
desc/*SkipEND*/)### t group by dvid, f_user, srcip, ep_id, eu_id order by bandwidth desc) t1
left join (select epid, euid, srcmac as epmac, dvid from $ADOM_EPEU_DEVMAP dm inner join
devtable dt ON dm.devid=dt.devid and dm.vd=dt.vd) t2 on t1.ep_id=t2.epid and t1.eu_
id=t2.euid and t1.dvid=t2.dvid left join $ADOM_ENDPOINT t3 on t1.ep_id=t3.epid and
t2.epmac=t3.mac left join $ADOM_ENDUSER t4 on t1.eu_id=t4.euid group by user_src, ep_src
order by bandwidth desc
```

Dataset Name	Description	Log Category
Top-Web-Users-By-Bandwidth	UTM top web users by bandwidth usage	traffic

```
select
  user_src,
  devtype_new,
  srcname,
  sum(bandwidth) as bandwidth,
  sum(traffic_in) as traffic_in,
  sum(traffic_out) as traffic_out
from
  ###(select coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src,
get_devtype(srcswversion, osname, devtype) as devtype_new, srcname, action, utmaction, sum
(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0)) as bandwidth, sum(coalesce(rcvdbyte, 0)) as
traffic_in, sum(coalesce(sentbyte, 0)) as traffic_out, count(*) as requests from $log where
$filter and (logflag&1>0) and utmevent in ('webfilter', 'banned-word', 'web-content',
'command-block', 'script-filter') group by user_src, devtype_new, srcname, action, utmaction
order by requests desc)### t group by user_src, devtype_new, srcname having sum(bandwidth)>0
order by bandwidth desc
```

Dataset Name	Description	Log Category
Top-Video-Streaming-Websites-By-Bandwidth	UTM top video streaming websites by bandwidth usage	traffic

```
select
  appid,
  hostname,
  sum(
    coalesce(sentbyte, 0)+ coalesce(rcvdbyte, 0)
  ) as bandwidth,
  sum(
    coalesce(rcvdbyte, 0)
  ) as traffic_in,
  sum(
    coalesce(sentbyte, 0)
  ) as traffic_out
from
  $log
where
  $filter
  and (
    logflag&1>0
  )
  and catdesc in (
    & #039;Streaming Media and Download') group by appid, hostname having sum(coalesce
(sentbyte, 0)+coalesce(rcvdbyte, 0))>0 order by bandwidth desc
```

Dataset Name	Description	Log Category
Top-Email-Senders-By-Count	Default top email senders by count	traffic

```
select
  user_src,
  sum(requests) as requests
from
  ###(select coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src,
service, count(*) as requests from $log where $filter and (logflag&1>0) group by user_src,
service order by requests desc)### t where service in ('smtp', 'SMTP', '25/tcp', '587/tcp',
'smtps', 'SMTPS', '465/tcp') group by user_src order by requests desc
```

Dataset Name	Description	Log Category
Top-Email-Receivers-By-Count	Default email top receivers by count	traffic

```
select
  user_src,
  sum(requests) as requests
from
  ###(select coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src,
service, count(*) as requests from $log where $filter and (logflag&1>0) group by user_src,
service order by requests desc)### t where service in ('pop3', 'POP3', '110/tcp', 'imap',
'IMAP', '143/tcp', 'imaps', 'IMAPS', '993/tcp', 'pop3s', 'POP3S', '995/tcp') group by user_
src order by requests desc
```

Dataset Name	Description	Log Category
Top-Email-Senders-By-Bandwidth	Default email top senders by bandwidth usage	traffic

```
select
  coalesce(
    nullifna(`user`),
    nullifna(`unauthuser`),
    ipstr(`srcip`)
  ) as user_src,
  sum(
    coalesce(sentbyte, 0)+ coalesce(rcvdbyte, 0)
  ) as bandwidth
from
  $log
where
  $filter
  and (
    logflag&1>0
  )
  and service in (
    & #039;smtp', 'SMTP', '25/tcp', '587/tcp', 'smtps', 'SMTPS', '465/tcp') group by user_
src having sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0))>0 order by bandwidth desc
```

Dataset Name	Description	Log Category
Top-Email-Receivers-By-Bandwidth	Default email top receivers by bandwidth usage	traffic

```
select
  coalesce(
    nullifna(`user`),
    nullifna(`unauthuser`),
    ipstr(`srcip`)
  ) as user_src,
  sum(
    coalesce(sentbyte, 0)+ coalesce(rcvdbyte, 0)
  ) as bandwidth
from
  $log
```

```
where
  $filter
  and (
    logflag&1>0
  )
  and service in (
    & #039;pop3', 'POP3', '110/tcp', 'imap', 'IMAP', '143/tcp', 'imaps', 'IMAPS', '993/tcp',
'pop3s', 'POP3S', '995/tcp') group by user_src having sum(coalesce(sentbyte, 0)+coalesce
(rcvdbyte, 0))>0 order by bandwidth desc
```

Dataset Name	Description	Log Category
Top-Malware-By-Name	UTM top virus	virus

```
select
  virus,
  max(virusid_s) as virusid,
  (
    case when virus like & #039;Riskware%' then 'Spyware' when virus like 'Adware%' then
'Adware' else 'Virus' end) as malware_type, sum(totalnum) as totalnum from ###(select virus,
virusid_to_str(virusid, eventtype) as virusid_s, count(*) as totalnum from $log where
$filter and (eventtype is null or logver>=502000000) and nullifna(virus) is not null group
by virus, virusid_s /*SkipSTART*/order by totalnum desc/*SkipEND*/)### t group by virus,
malware_type order by totalnum desc
```

Dataset Name	Description	Log Category
Top-Virus-By-Name	UTM top virus	virus

```
select
  virus,
  max(virusid_s) as virusid,
  (
    case when virus like & #039;Riskware%' then 'Spyware' when virus like 'Adware%' then
'Adware' else 'Virus' end) as malware_type, sum(totalnum) as totalnum from ###(select virus,
virusid_to_str(virusid, eventtype) as virusid_s, count(*) as totalnum from $log where
$filter and (eventtype is null or logver>=502000000) and nullifna(virus) is not null group
by virus, virusid_s /*SkipSTART*/order by totalnum desc/*SkipEND*/)### t group by virus,
malware_type order by totalnum desc
```

Dataset Name	Description	Log Category
Top-Virus-Victim	UTM top virus user	virus

```
select
  user_src,
  sum(totalnum) as totalnum
from
  ###(select coalesce(nullifna(`user`), ipstr(`srcip`)) as user_src, eventtype, logver,
virus, count(*) as totalnum from $log where $filter group by user_src, eventtype, logver,
virus /*SkipSTART*/order by totalnum desc/*SkipEND*/)### t where (eventtype is null or
logver>=502000000) and nullifna(virus) is not null group by user_src order by totalnum desc
```

Dataset Name	Description	Log Category
Top-Attack-Source	UTM top attack source	attack

```
select
  user_src,
  sum(totalnum) as totalnum
from
  ###(select coalesce(nullifna(`user`), ipstr(`srcip`)) as user_src, eventtype, logver,
count(*) as totalnum from $log where $filter group by user_src, eventtype, logver
/*SkipSTART*/order by totalnum desc/*SkipEND*/)### t group by user_src order by totalnum
desc
```

Dataset Name	Description	Log Category
Top-Attack-Victim	UTM top attack dest	attack

```
select
  victim,
  count(*) as totalnum
from
  (
    select
      (
        CASE WHEN direction =& #039;incoming' THEN srcip ELSE dstip END) as victim from $log
where $filter) t where victim is not null group by victim order by totalnum desc
```

Dataset Name	Description	Log Category
Top-Static-IPSEC-Tunnels-By-Bandwidth	Top static IPsec tunnels by bandwidth usage	event

```
select
  vpn_name,
  sum(bandwidth) as bandwidth,
  sum(traffic_in) as traffic_in,
  sum(traffic_out) as traffic_out
from
  (
    select
      devid,
      vd,
      remip,
      tunnelid,
      vpn_name,
      (
        case when min(s_time)= max(e_time) then max(max_traffic_in) else max(max_traffic_
in)- min(min_traffic_in) end
      ) as traffic_in,
      (
        case when min(s_time)= max(e_time) then max(max_traffic_out) else max(max_traffic_
out)- min(min_traffic_out) end
      ) as traffic_out,
      (
        case when min(s_time)= max(e_time) then max(max_traffic_in)+ max(max_traffic_out)
else max(max_traffic_in)- min(min_traffic_in)+ max(max_traffic_out)- min(min_traffic_out)
end
      ) as bandwidth
    from
      ###(select devid, vd, remip, vpn_trim(vpntunnel) as vpn_name, tunnelid, tunnelip, max
(coalesce(sentbyte, 0)) as max_traffic_out, max(coalesce(rcvdbyte, 0)) as max_traffic_in,
max(coalesce(rcvdbyte, 0)+coalesce(sentbyte, 0)) as max_traffic, min(coalesce(sentbyte, 0))
as min_traffic_out, min(coalesce(rcvdbyte, 0)) as min_traffic_in, min(coalesce(dtime, 0)) as
s_time, max(coalesce(dtime, 0)) as e_time from $log where $filter and subtype='vpn' and
tunneltype like 'ipsec%' and nullifna(vpntunnel) is not null  and action in ('tunnel-stats',
'tunnel-down') and tunnelid is not null group by devid, vd, remip, vpn_name, tunnelid,
tunnelip order by max_traffic desc)### t where (tunnelip is null or tunnelip='0.0.0.0')
group by devid, vd, remip, vpn_name, tunnelid) tt group by vpn_name having sum(traffic_
in+traffic_out)>0 order by bandwidth desc
```

Dataset Name	Description	Log Category
Top-SSL-VPN-Tunnel-Users-By-Bandwidth	Top SSL VPN tunnel users by bandwidth usage	event

```
select
  user_src,
  remip as remote_ip,
  from_dtime(
    min(s_time)
  ) as start_time,
  sum(bandwidth) as bandwidth,
  sum(traffic_in) as traffic_in,
  sum(traffic_out) as traffic_out
from
  (
    select
      devid,
      vd,
      remip,
      user_src,
      tunnelid,
      min(s_time) as s_time,
      max(e_time) as e_time,
      (
        case when min(s_time)= max(e_time) then max(max_traffic_in)+ max(max_traffic_out)
else max(max_traffic_in)- min(min_traffic_in)+ max(max_traffic_out)- min(min_traffic_out)
end
      ) as bandwidth,
      (
        case when min(s_time)= max(e_time) then max(max_traffic_in) else max(max_traffic_
in)- min(min_traffic_in) end
      ) as traffic_in,
      (
        case when min(s_time)= max(e_time) then max(max_traffic_out) else max(max_traffic_
out)- min(min_traffic_out) end
      ) as traffic_out
    from
      ###(select devid, vd, remip, coalesce(nullifna(`user`), ipstr(`remip`)) as user_src,
tunnelid, tunneltype, max(coalesce(duration,0)) as max_duration, min(coalesce(duration,0))
as min_duration, min(coalesce(dtime, 0)) as s_time, max(coalesce(dtime, 0)) as e_time, min
(coalesce(sentbyte, 0)) as min_traffic_out, min(coalesce(rcvdbyte, 0)) as min_traffic_in,
max(coalesce(sentbyte, 0)) as max_traffic_out, max(coalesce(rcvdbyte, 0)) as max_traffic_in,
max(coalesce(rcvdbyte, 0)+coalesce(sentbyte, 0)) as max_traffic from $log where $filter and
subtype='vpn' and tunneltype like 'ssl%' and action in ('tunnel-stats', 'tunnel-down',
'tunnel-up') and coalesce(nullifna(`user`), ipstr(`remip`)) is not null and tunnelid is not
null group by devid, vd, user_src, remip, tunnelid, tunneltype order by max_traffic desc)###
t where tunneltype='ssl-tunnel' group by devid, vd, user_src, remip, tunnelid) tt where
bandwidth>0 group by user_src, remote_ip order by bandwidth desc
```

Dataset Name	Description	Log Category
Top-Dial-Up-IPSEC-Tunnels-By-Bandwidth	Top dial up IPsec tunnels by bandwidth usage	event

```
select
  vpn_name,
  sum(bandwidth) as bandwidth,
  sum(traffic_in) as traffic_in,
  sum(traffic_out) as traffic_out
from
  (
    select
      devid,
      vd,
      tunnelid,
      remip,
      vpn_name,
      (
        case when min(s_time)= max(e_time) then max(max_traffic_in) else max(max_traffic_
in)- min(min_traffic_in) end
      ) as traffic_in,
      (
        case when min(s_time)= max(e_time) then max(max_traffic_out) else max(max_traffic_
out)- min(min_traffic_out) end
      ) as traffic_out,
      (
        case when min(s_time)= max(e_time) then max(max_traffic_in)+ max(max_traffic_out)
else max(max_traffic_in)- min(min_traffic_in)+ max(max_traffic_out)- min(min_traffic_out)
end
      ) as bandwidth
    from
      ###(select devid, vd, remip, vpn_trim(vpntunnel) as vpn_name, tunnelid, tunnelip, max
(coalesce(sentbyte, 0)) as max_traffic_out, max(coalesce(rcvdbyte, 0)) as max_traffic_in,
max(coalesce(rcvdbyte, 0)+coalesce(sentbyte, 0)) as max_traffic, min(coalesce(sentbyte, 0))
as min_traffic_out, min(coalesce(rcvdbyte, 0)) as min_traffic_in, min(coalesce(dtime, 0)) as
s_time, max(coalesce(dtime, 0)) as e_time from $log where $filter and subtype='vpn' and
tunneltype like 'ipsec%' and nullifna(vpntunnel) is not null and action in ('tunnel-stats',
'tunnel-down') and tunnelid is not null group by devid, vd, remip, vpn_name, tunnelid,
tunnelip order by max_traffic desc)### t where not (tunnelip is null or tunnelip='0.0.0.0')
group by devid, vd, remip, vpn_name, tunnelid) tt group by vpn_name having sum(traffic_
out+traffic_in)>0 order by bandwidth desc
```

Dataset Name	Description	Log Category
Top-Dial-Up-IPSEC-Users-By-Bandwidth	Top dial up IPsec users by bandwidth usage	event

```
select
  coalesce(
    xauthuser_agg,
    user_agg,
    ipstr(`remip`)
  ) as user_src,
  remip,
  from_dtime(
    min(s_time)
  ) as start_time,
  sum(bandwidth) as bandwidth,
  sum(traffic_in) as traffic_in,
  sum(traffic_out) as traffic_out
from
  (
    select
      devid,
      vd,
      string_agg(
        distinct xauthuser_agg,
        & #039; ') as xauthuser_agg, string_agg(distinct user_agg, ' ') as user_agg, remip,
tunnelid, min(s_time) as s_time, max(e_time) as e_time, (case when min(s_time)=max(e_time)
then max(max_traffic_in)+max(max_traffic_out) else max(max_traffic_in)-min(min_traffic_
in)+max(max_traffic_out)-min(min_traffic_out) end) as bandwidth, (case when min(s_time)=max
(e_time) then max(max_traffic_in) else max(max_traffic_in)-min(min_traffic_in) end) as
traffic_in, (case when min(s_time)=max(e_time) then max(max_traffic_out) else max(max_
traffic_out)-min(min_traffic_out) end) as traffic_out from ###(select devid, vd, remip,
nullifna(`xauthuser`) as xauthuser_agg, nullifna(`user`) as user_agg, tunnelid, min(coalesce
(dtime, 0)) as s_time, max(coalesce(dtime, 0)) as e_time, max(coalesce(duration,0)) as max_
duration, min(coalesce(duration,0)) as min_duration, min(coalesce(sentbyte, 0)) as min_
traffic_out, min(coalesce(rcvdbyte, 0)) as min_traffic_in, max(coalesce(sentbyte, 0)) as
max_traffic_out, max(coalesce(rcvdbyte, 0)) as max_traffic_in, max(coalesce(rcvdbyte,
0)+coalesce(sentbyte, 0)) as max_traffic from $log where $filter and subtype='vpn' and
tunneltype like 'ipsec%' and not (tunnelip is null or tunnelip='0.0.0.0') and  action in
('tunnel-stats', 'tunnel-down', 'tunnel-up') and tunnelid is not null and tunnelid!=0 group
by devid, vd, remip, xauthuser_agg, user_agg, tunnelid order by max_traffic desc)### t group
by devid, vd, remip, tunnelid) tt where bandwidth>0 group by user_src, remip order by
bandwidth desc
```

Dataset Name	Description	Log Category
Top-Dial-Up-IPSEC-Users-By-Duration	Top dial up IPsec users by duration	event

```
select
  coalesce(
    xauthuser_agg,
    user_agg,
    ipstr(`remip`)
  ) as user_src,
  from_dtime(
    min(s_time)
  ) as start_time,
  sum(duration) as duration,
  sum(bandwidth) as bandwidth,
  sum(traffic_in) as traffic_in,
  sum(traffic_out) as traffic_out
from
  (
    select
```

```
      devid,
      vd,
      remip,
      string_agg(
        distinct xauthuser_agg,
        & #039; ') as xauthuser_agg, string_agg(distinct user_agg, ' ') as user_agg,
tunnelid, min(s_time) as s_time, max(e_time) as e_time, (case when min(s_time)=max(e_time)
then max(max_duration) else max(max_duration)-min(min_duration) end) as duration, (case when
min(s_time)=max(e_time) then max(max_traffic_in)+max(max_traffic_out) else  max(max_traffic_
in)-min(min_traffic_in)+max(max_traffic_out)-min(min_traffic_out) end) as bandwidth, (case
when min(s_time)=max(e_time) then max(max_traffic_in) else max(max_traffic_in)-min(min_
traffic_in) end) as traffic_in, (case when min(s_time)=max(e_time) then max(max_traffic_out)
else max(max_traffic_out)-min(min_traffic_out) end) as traffic_out from ###(select devid,
vd, remip, nullifna(`xauthuser`) as xauthuser_agg, nullifna(`user`) as user_agg, tunnelid,
min(coalesce(dtime, 0)) as s_time, max(coalesce(dtime, 0)) as e_time, max(coalesce
(duration,0)) as max_duration, min(coalesce(duration,0)) as min_duration, min(coalesce
(sentbyte, 0)) as min_traffic_out, min(coalesce(rcvdbyte, 0)) as min_traffic_in, max
(coalesce(sentbyte, 0)) as max_traffic_out, max(coalesce(rcvdbyte, 0)) as max_traffic_in,
max(coalesce(rcvdbyte, 0)+coalesce(sentbyte, 0)) as max_traffic from $log where $filter and
subtype='vpn' and tunneltype like 'ipsec%' and not (tunnelip is null or tunnelip='0.0.0.0')
and  action in ('tunnel-stats', 'tunnel-down', 'tunnel-up') and tunnelid is not null and
tunnelid!=0 group by devid, vd, remip, xauthuser_agg, user_agg, tunnelid order by max_
traffic desc)### t group by devid, vd, remip, tunnelid) tt where bandwidth>0 group by user_
src order by duration desc
```

Dataset Name	Description	Log Category
Top-SSL-VPN-Web-Mode-Users-By-Bandwidth	Top SSL VPN web mode users by bandwidth usage	event

```
select
  user_src,
  remip as remote_ip,
  from_dtime(
    min(s_time)
  ) as start_time,
  sum(bandwidth) as bandwidth,
  sum(traffic_in) as traffic_in,
  sum(traffic_out) as traffic_out
from
  (
    select
      devid,
      vd,
      user_src,
      remip,
      tunnelid,
      min(s_time) as s_time,
      max(e_time) as e_time,
      (
        case when min(s_time)= max(e_time) then max(max_traffic_in)+ max(max_traffic_out)
else max(max_traffic_in)- min(min_traffic_in)+ max(max_traffic_out)- min(min_traffic_out)
end
      ) as bandwidth,
      (
        case when min(s_time)= max(e_time) then max(max_traffic_in) else max(max_traffic_
in)- min(min_traffic_in) end
      ) as traffic_in,
      (
        case when min(s_time)= max(e_time) then max(max_traffic_out) else max(max_traffic_
out)- min(min_traffic_out) end
      ) as traffic_out
    from
      ###(select devid, vd, remip, coalesce(nullifna(`user`), ipstr(`remip`)) as user_src,
tunnelid, tunneltype, max(coalesce(duration,0)) as max_duration, min(coalesce(duration,0))
as min_duration, min(coalesce(dtime, 0)) as s_time, max(coalesce(dtime, 0)) as e_time, min
(coalesce(sentbyte, 0)) as min_traffic_out, min(coalesce(rcvdbyte, 0)) as min_traffic_in,
max(coalesce(sentbyte, 0)) as max_traffic_out, max(coalesce(rcvdbyte, 0)) as max_traffic_in,
max(coalesce(rcvdbyte, 0)+coalesce(sentbyte, 0)) as max_traffic from $log where $filter and
subtype='vpn' and tunneltype like 'ssl%' and action in ('tunnel-stats', 'tunnel-down',
'tunnel-up') and coalesce(nullifna(`user`), ipstr(`remip`)) is not null and tunnelid is not
null group by devid, vd, user_src, remip, tunnelid, tunneltype order by max_traffic desc)###
t group by devid, vd, user_src, remip, tunnelid) tt where bandwidth>0 group by user_src,
remote_ip order by bandwidth desc
```

Dataset Name	Description	Log Category
Top-SSL-VPN-Web-Mode-Users-By-Duration	Top SSL VPN web mode users by duration	event

```
select
  user_src,
  remip as remote_ip,
  from_dtime(
    min(s_time)
  ) as start_time,
  sum(duration) as duration
from
  (
    select
      devid,
      vd,
      user_src,
      remip,
      tunnelid,
      min(s_time) as s_time,
      (
        case when min(s_time)= max(e_time) then max(max_duration) else max(max_duration)-
min(min_duration) end
      ) as duration
    from
      ###(select devid, vd, remip, coalesce(nullifna(`user`), ipstr(`remip`)) as user_src,
tunnelid, tunneltype, max(coalesce(duration,0)) as max_duration, min(coalesce(duration,0))
as min_duration, min(coalesce(dtime, 0)) as s_time, max(coalesce(dtime, 0)) as e_time, min
(coalesce(sentbyte, 0)) as min_traffic_out, min(coalesce(rcvdbyte, 0)) as min_traffic_in,
max(coalesce(sentbyte, 0)) as max_traffic_out, max(coalesce(rcvdbyte, 0)) as max_traffic_in,
max(coalesce(rcvdbyte, 0)+coalesce(sentbyte, 0)) as max_traffic from $log where $filter and
subtype='vpn' and tunneltype like 'ssl%' and action in ('tunnel-stats', 'tunnel-down',
'tunnel-up') and coalesce(nullifna(`user`), ipstr(`remip`)) is not null and tunnelid is not
null group by devid, vd, user_src, remip, tunnelid, tunneltype order by max_traffic desc)###
t where tunneltype='ssl-web' group by devid, vd, user_src, remip, tunnelid) tt group by
user_src, remote_ip order by duration desc
```

Dataset Name	Description	Log Category
Top-SSL-VPN-Users-By-Duration	Top SSL VPN users by duration	event

```
select
  user_src,
  tunneltype,
  sum(duration) as duration,
  sum(bandwidth) as bandwidth,
  sum(traffic_in) as traffic_in,
  sum(traffic_out) as traffic_out
from
  (
    select
      devid,
      vd,
      remip,
      user_src,
      tunneltype,
      tunnelid,
      (
        case when min(s_time)= max(e_time) then max(max_duration) else max(max_duration)-
min(min_duration) end
      ) as duration,
      (
        case when min(s_time)= max(e_time) then max(max_traffic_in) else max(max_traffic_
in)- min(min_traffic_in) end
      ) as traffic_in,
      (
        case when min(s_time)= max(e_time) then max(max_traffic_out) else max(max_traffic_
out)- min(min_traffic_out) end
      ) as traffic_out,
      (
        case when min(s_time)= max(e_time) then max(max_traffic_in)+ max(max_traffic_out)
else max(max_traffic_in)- min(min_traffic_in)+ max(max_traffic_out)- min(min_traffic_out)
end
      ) as bandwidth
    from
      ###(select devid, vd, remip, coalesce(nullifna(`user`), ipstr(`remip`)) as user_src,
tunnelid, tunneltype, max(coalesce(duration,0)) as max_duration, min(coalesce(duration,0))
as min_duration, min(coalesce(dtime, 0)) as s_time, max(coalesce(dtime, 0)) as e_time, min
(coalesce(sentbyte, 0)) as min_traffic_out, min(coalesce(rcvdbyte, 0)) as min_traffic_in,
max(coalesce(sentbyte, 0)) as max_traffic_out, max(coalesce(rcvdbyte, 0)) as max_traffic_in,
max(coalesce(rcvdbyte, 0)+coalesce(sentbyte, 0)) as max_traffic from $log where $filter and
subtype='vpn' and tunneltype like 'ssl%' and action in ('tunnel-stats', 'tunnel-down',
'tunnel-up') and coalesce(nullifna(`user`), ipstr(`remip`)) is not null and tunnelid is not
null group by devid, vd, user_src, remip, tunnelid, tunneltype order by max_traffic desc)###
t group by devid, vd, remip, user_src, tunnelid, tunneltype) tt where bandwidth>0 group by
user_src, tunneltype order by duration desc
```

Dataset Name	Description	Log Category
vpn-Top-Dial-Up-VPN-Users-By-Duration	Top dial up VPN users by duration	event

```
select
  coalesce(
    xauthuser_agg,
    user_agg,
    ipstr(`remip`)
  ) as user_src,
  t_type as tunneltype,
  from_dtime(
    min(s_time)
  ) as start_time,
  sum(duration) as duration,
  sum(bandwidth) as bandwidth,
  sum(traffic_in) as traffic_in,
  sum(traffic_out) as traffic_out
from
  (
    select
      devid,
      vd,
      remip,
      string_agg(
        distinct xauthuser_agg,
        & #039; ') as xauthuser_agg, string_agg(distinct user_agg, ' ') as user_agg, t_type,
tunnelid, min(s_time) as s_time, max(e_time) as e_time, (case when min(s_time)=max(e_time)
then max(max_duration) else max(max_duration)-min(min_duration) end) as duration, (case when
min(s_time)=max(e_time) then max(max_traffic_in)+max(max_traffic_out) else  max(max_traffic_
in)-min(min_traffic_in)+max(max_traffic_out)-min(min_traffic_out) end) as bandwidth, (case
when min(s_time)=max(e_time) then max(max_traffic_in) else max(max_traffic_in)-min(min_
traffic_in) end) as traffic_in, (case when min(s_time)=max(e_time) then max(max_traffic_out)
else max(max_traffic_out)-min(min_traffic_out) end) as traffic_out from ###(select devid,
vd, remip, nullifna(`xauthuser`) as xauthuser_agg, nullifna(`user`) as user_agg, (case when
tunneltype like 'ipsec%' then 'ipsec' else tunneltype end) as t_type, tunnelid, tunnelip,
min(coalesce(dtime, 0)) as s_time, max(coalesce(dtime, 0)) as e_time, max(coalesce
(duration,0)) as max_duration, min(coalesce(duration,0)) as min_duration, min(coalesce
(sentbyte, 0)) as min_traffic_out, min(coalesce(rcvdbyte, 0)) as min_traffic_in, max
(coalesce(sentbyte, 0)) as max_traffic_out, max(coalesce(rcvdbyte, 0)) as max_traffic_in,
max(coalesce(rcvdbyte, 0)+coalesce(sentbyte, 0)) as max_traffic, sum((case when
action='tunnel-up' then 1 else 0 end)) as tunnelup from $log where $filter and subtype='vpn'
and (tunneltype like 'ipsec%' or tunneltype like 'ssl%') and action in ('tunnel-up',
'tunnel-stats', 'tunnel-down') and tunnelid is not null and tunnelid!=0 group by xauthuser_
agg, user_agg, devid, vd, remip, t_type, tunnelid, tunnelip order by max_traffic desc)### t
where (t_type like 'ssl%' or (t_type like 'ipsec%' and not (tunnelip is null or
tunnelip='0.0.0.0'))) group by devid, vd, remip, t_type, tunnelid) tt where bandwidth>0
group by user_src, tunneltype order by duration desc
```

Dataset Name	Description	Log Category
vpn-User-Login-history	VPN user login history	event

```
select
  $flex_timescale(timestamp) as hodex,
  sum(tunnelup) as total_num
from
  (
    select
      timestamp,
      devid,
      vd,
      remip,
      tunnelid,
      max(tunnelup) as tunnelup,
      max(traffic_in) as traffic_in,
      max(traffic_out) as traffic_out
    from
      ###(select $flex_timestamp as timestamp, devid, vd, remip, tunnelid, max((case when
action='tunnel-up' then 1 else 0 end)) as tunnelup, max(coalesce(sentbyte, 0)) as traffic_
out, max(coalesce(rcvdbyte, 0)) as traffic_in from $log where $filter and subtype='vpn' and
(tunneltype like 'ipsec%' or tunneltype like 'ssl%') and action in ('tunnel-up', 'tunnel-
stats', 'tunnel-down') and tunnelid is not null group by timestamp, devid, vd, remip,
tunnelid /*SkipSTART*/order by timestamp desc/*SkipEND*/)### t group by timestamp, devid,
vd, remip, tunnelid having max(tunnelup) > 0 and max(traffic_in)+max(traffic_out)>0) t group
by hodex order by total_num desc
```

Dataset Name	Description	Log Category
vpn-Failed-Login-Atempts	VPN failed logins	event

```
select
  f_user,
  tunneltype,
  sum(total_num) as total_num
from
  ###(select coalesce(nullifna(`xauthuser`), `user`) as f_user, tunneltype, count(*) as
total_num from $log where $filter and subtype='vpn' and (tunneltype='ipsec' or left
(tunneltype, 3)='ssl') and action in ('ssl-login-fail', 'ipsec-login-fail') and coalesce
(nullifna(`xauthuser`), nullifna(`user`)) is not null group by f_user, tunneltype)### t
group by f_user, tunneltype order by total_num desc
```

Dataset Name	Description	Log Category
vpn-Authenticated-Logins	VPN authenticated logins	event

```
select
  coalesce(
    xauthuser_agg,
    user_agg,
    ipstr(`remip`)
  ) as f_user,
  t_type as tunneltype,
  from_dtime(
    min(s_time)
  ) as start_time,
  sum(total_num) as total_num,
  sum(duration) as duration
from
  (
    select
      string_agg(
        distinct xauthuser_agg,
        & #039; ') as xauthuser_agg, string_agg(distinct user_agg, ' ') as user_agg, t_type,
devid, vd, remip, tunnelid, min(s_time) as s_time, max(e_time) as e_time, (case when min(s_
time)=max(e_time) then max(max_duration) else max(max_duration)-min(min_duration) end) as
duration, (case when min(s_time)=max(e_time) then max(max_traffic_in)+max(max_traffic_out)
else  max(max_traffic_in)-min(min_traffic_in)+max(max_traffic_out)-min(min_traffic_out) end)
as bandwidth, (case when min(s_time)=max(e_time) then max(max_traffic_in) else max(max_
traffic_in)-min(min_traffic_in) end) as traffic_in, (case when min(s_time)=max(e_time) then
max(max_traffic_out) else max(max_traffic_out)-min(min_traffic_out) end) as traffic_out, sum
(tunnelup) as total_num from ###(select devid, vd, remip, nullifna(`xauthuser`) as
xauthuser_agg, nullifna(`user`) as user_agg, (case when tunneltype like 'ipsec%' then
'ipsec' else tunneltype end) as t_type, tunnelid, tunnelip,  min(coalesce(dtime, 0)) as s_
time, max(coalesce(dtime, 0)) as e_time, max(coalesce(duration,0)) as max_duration, min
(coalesce(duration,0)) as min_duration, min(coalesce(sentbyte, 0)) as min_traffic_out, min
(coalesce(rcvdbyte, 0)) as min_traffic_in, max(coalesce(sentbyte, 0)) as max_traffic_out,
max(coalesce(rcvdbyte, 0)) as max_traffic_in, max(coalesce(rcvdbyte, 0)+coalesce(sentbyte,
0)) as max_traffic, sum((case when action='tunnel-up' then 1 else 0 end)) as tunnelup from
$log where $filter and subtype='vpn' and (tunneltype like 'ipsec%' or tunneltype like
'ssl%') and action in ('tunnel-up', 'tunnel-stats', 'tunnel-down') and tunnelid is not null
and tunnelid!=0 group by xauthuser_agg, user_agg, devid, vd, remip, t_type, tunnelid,
tunnelip order by max_traffic desc)### t group by t_type, devid, vd, remip, tunnelid having
max(tunnelup) > 0) tt where bandwidth>0 group by f_user, tunneltype order by total_num desc
```

Dataset Name	Description	Log Category
vpn-Traffic-Usage-Trend-VPN-Summary	VPN traffic usage trend	event

```
select
  hodex,
  sum(ssl_traffic_bandwidth) as ssl_bandwidth,
  sum(ipsec_traffic_bandwidth) as ipsec_bandwidth
from
  (
    select
      $flex_timescale(timestamp) as hodex,
      devid,
      vd,
      remip,
      tunnelid,
      (
        case when t_type like & #039;ssl%' then (case when min(s_time)=max(e_time) then max
(max_traffic_in)+max(max_traffic_out) else max(max_traffic_in)-min(min_traffic_in)+max(max_
traffic_out)-min(min_traffic_out) end)  else 0 end) as ssl_traffic_bandwidth, (case when t_
type like 'ipsec%' then (case when min(s_time)=max(e_time) then max(max_traffic_in)+max(max_
traffic_out) else max(max_traffic_in)-min(min_traffic_in)+max(max_traffic_out)-min(min_
traffic_out) end)  else 0 end) as ipsec_traffic_bandwidth, min(s_time) as s_time, max(e_
time) as e_time from ###(select $flex_timestamp as timestamp, devid, vd, remip, tunnelid,
(case when tunneltype like 'ipsec%' then 'ipsec' else tunneltype end) as t_type, (case when
action='tunnel-up' then 1 else 0 end) as tunnelup, max(coalesce(sentbyte, 0)) as max_
traffic_out, max(coalesce(rcvdbyte, 0)) as max_traffic_in, min(coalesce(sentbyte, 0)) as
min_traffic_out, min(coalesce(rcvdbyte, 0)) as min_traffic_in, min(coalesce(dtime, 0)) as s_
time, max(coalesce(dtime, 0)) as e_time from $log where $filter and subtype='vpn' and
(tunneltype like 'ipsec%' or tunneltype like 'ssl%') and action in ('tunnel-up','tunnel-
stats', 'tunnel-down') and tunnelid is not null and tunnelid!=0 group by timestamp, devid,
vd, remip, t_type, tunnelid, action /*SkipSTART*/order by timestamp desc/*SkipEND*/)### t
group by hodex, devid, t_type, vd, remip, tunnelid) tt group by hodex order by hodex
```

Dataset Name	Description	Log Category
Top-S2S-IPSEC-Tunnels-By-Bandwidth-and-Availability	Top S2S IPsec tunnels by bandwidth usage and avail	event

```
select
  vpntunnel,
  tunneltype,
  sum(traffic_out) as traffic_out,
  sum(traffic_in) as traffic_in,
  sum(bandwidth) as bandwidth,
  sum(uptime) as uptime
from
  (
    select
      vpntunnel,
      tunneltype,
      tunnelid,
      devid,
      vd,
      sum(sent_end - sent_beg) as traffic_out,
      sum(rcvd_end - rcvd_beg) as traffic_in,
      sum(
        sent_end - sent_beg + rcvd_end - rcvd_beg
      ) as bandwidth,
      sum(duration_end - duration_beg) as uptime
    from
      ###(select tunnelid, tunneltype, vpntunnel, devid, vd, min(coalesce(sentbyte, 0)) as
sent_beg, max(coalesce(sentbyte, 0)) as sent_end, min(coalesce(rcvdbyte, 0)) as rcvd_beg,
max(coalesce(rcvdbyte, 0)) as rcvd_end, min(coalesce(duration, 0)) as duration_beg, max
(coalesce(duration, 0)) as duration_end from $log where $filter and subtype='vpn' and
action='tunnel-stats' and tunneltype like 'ipsec%' and (tunnelip is null or
tunnelip='0.0.0.0') and nullifna(`user`) is null and tunnelid is not null and tunnelid!=0
group by tunnelid, tunneltype, vpntunnel, devid, vd /*SkipSTART*/order by
tunnelid/*SkipEND*/)### t group by vpntunnel, tunneltype, tunnelid, devid, vd order by
bandwidth desc) t where bandwidth>0 group by vpntunnel, tunneltype order by bandwidth desc
```

Dataset Name	Description	Log Category
Top-Dialup-IPSEC-By-Bandwidth-and-Availability	Top dialup IPsec users by bandwidth usage and avail	event

```
select
  user_src,
  remip,
  sum(traffic_out) as traffic_out,
  sum(traffic_in) as traffic_in,
  sum(bandwidth) as bandwidth,
  sum(uptime) as uptime
from
  (
    select
      user_src,
      remip,
      tunnelid,
      devid,
      vd,
      sum(sent_end - sent_beg) as traffic_out,
      sum(rcvd_end - rcvd_beg) as traffic_in,
      sum(
        sent_end - sent_beg + rcvd_end - rcvd_beg
      ) as bandwidth,
      sum(duration_end - duration_beg) as uptime
    from
      ###(select tunnelid, coalesce(nullifna(`xauthuser`), nullifna(`user`), ipstr(`remip`))
as user_src, remip, devid, vd, min(coalesce(sentbyte, 0)) as sent_beg, max(coalesce
(sentbyte, 0)) as sent_end, min(coalesce(rcvdbyte, 0)) as rcvd_beg, max(coalesce(rcvdbyte,
0)) as rcvd_end, min(coalesce(duration, 0)) as duration_beg, max(coalesce(duration, 0)) as
duration_end from $log where $filter and subtype='vpn' and action='tunnel-stats' and
tunneltype like 'ipsec%' and not (tunnelip is null or tunnelip='0.0.0.0') and tunnelid is
not null and tunnelid!=0 group by tunnelid, user_src, remip, devid, vd /*SkipSTART*/order by
tunnelid/*SkipEND*/)### t group by user_src, remip, tunnelid, devid, vd order by bandwidth
desc) t where bandwidth>0 group by user_src, remip order by bandwidth desc
```

Dataset Name	Description	Log Category
Top-SSL-Tunnel-Mode-By-Bandwidth-and-Availability	Top SSL tunnel users by bandwidth usage and avail	event

```
select
  user_src,
  remote_ip,
  sum(traffic_out) as traffic_out,
  sum(traffic_in) as traffic_in,
  sum(bandwidth) as bandwidth,
  sum(uptime) as uptime
from
  (
    select
      user_src,
      remip as remote_ip,
      tunnelid,
      devid,
      vd,
      sum(sent_end - sent_beg) as traffic_out,
      sum(rcvd_end - rcvd_beg) as traffic_in,
      sum(
        sent_end - sent_beg + rcvd_end - rcvd_beg
      ) as bandwidth,
      sum(duration_end - duration_beg) as uptime
    from
      ###(select tunnelid, tunneltype, coalesce(nullifna(`user`), ipstr(`remip`)) as user_
src, remip, devid, vd, min(coalesce(sentbyte, 0)) as sent_beg, max(coalesce(sentbyte, 0)) as
sent_end, min(coalesce(rcvdbyte, 0)) as rcvd_beg, max(coalesce(rcvdbyte, 0)) as rcvd_end,
min(coalesce(duration, 0)) as duration_beg, max(coalesce(duration, 0)) as duration_end from
$log where $filter and subtype='vpn' and action='tunnel-stats' and coalesce(nullifna
(`user`), ipstr(`remip`)) is not null and tunnelid is not null group by tunnelid,
tunneltype, user_src, remip, devid, vd /*SkipSTART*/order by tunnelid/*SkipEND*/)### t where
tunneltype in ('ssl-tunnel', 'ssl') group by user_src, remote_ip, tunnelid, devid, vd order
by bandwidth desc) t where bandwidth>0 group by user_src, remote_ip order by bandwidth desc
```

Dataset Name	Description	Log Category
Top-SSL-Web-Mode-By-Bandwidth-and-Availability	Top SSL web users by bandwidth usage and avail	event

```
select
  user_src,
  remote_ip,
  sum(traffic_out) as traffic_out,
  sum(traffic_in) as traffic_in,
  sum(bandwidth) as bandwidth,
  sum(uptime) as uptime
from
  (
    select
      user_src,
      remip as remote_ip,
      tunnelid,
      devid,
      vd,
      sum(sent_end - sent_beg) as traffic_out,
      sum(rcvd_end - rcvd_beg) as traffic_in,
      sum(
        sent_end - sent_beg + rcvd_end - rcvd_beg
      ) as bandwidth,
      sum(duration_end - duration_beg) as uptime
    from
      ###(select tunnelid, tunneltype, coalesce(nullifna(`user`), ipstr(`remip`)) as user_
src, remip, devid, vd, min(coalesce(sentbyte, 0)) as sent_beg, max(coalesce(sentbyte, 0)) as
sent_end, min(coalesce(rcvdbyte, 0)) as rcvd_beg, max(coalesce(rcvdbyte, 0)) as rcvd_end,
min(coalesce(duration, 0)) as duration_beg, max(coalesce(duration, 0)) as duration_end from
$log where $filter and subtype='vpn' and action='tunnel-stats' and coalesce(nullifna
(`user`), ipstr(`remip`)) is not null and tunnelid is not null group by tunnelid,
tunneltype, user_src, remip, devid, vd /*SkipSTART*/order by tunnelid/*SkipEND*/)### t where
tunneltype='ssl-web' group by user_src, remote_ip, tunnelid, devid, vd having sum(sent_end-
sent_beg+rcvd_end-rcvd_beg)>0 order by bandwidth desc) t where bandwidth>0 group by user_
src, remote_ip order by bandwidth desc
```

Dataset Name	Description	Log Category
Admin-Login-Summary	Event admin login summary	event

```
select
  f_user,
  ui,
  sum(login) as total_num,
  sum(login_duration) as total_duration,
  sum(config_change) as total_change
from
  (
    select
      `user` as f_user,
      ui,
      (
        case when logid_to_int(logid)= 32001 then 1 else 0 end
      ) as login,
      (
        case when logid_to_int(logid)= 32003 then duration else 0 end
      ) as login_duration,
      (
        case when logid_to_int(logid)= 32003
        and state is not null then 1 else 0 end
      ) as config_change
    from
      $log
    where
      $filter
      and nullifna(`user`) is not null
      and logid_to_int(logid) in (32001, 32003)
  ) t
group by
  f_user,
  ui
having
  sum(login)+ sum(config_change)> 0
order by
  total_num desc
```

Dataset Name	Description	Log Category
Admin-Login-Summary-By-Date	Event admin login summary by date	event

```
select
  $flex_timescale(timestamp) as dom,
  sum(total_num) as total_num,
  sum(total_change) as total_change
from
  ###(select timestamp, sum(login) as total_num, sum(config_change) as total_change from
(select $flex_timestamp as timestamp, (case when logid_to_int(logid)=32001 then 1 else 0
end) as login, (case when logid_to_int(logid)=32003 and state is not null then 1 else 0 end)
as config_change from $log where $filter and logid_to_int(logid) in (32001, 32003)) t group
by timestamp having sum(login)+sum(config_change)>0 /*SkipSTART*/order by timestamp
desc/*SkipEND*/)### t group by dom order by dom
```

Dataset Name	Description	Log Category
Admin-Failed-Login-Summary	Event admin failed login summary	event

```
select
  `user` as f_user,
  ui,
  count(status) as total_failed
from
  $log
where
  $filter
  and nullifna(`user`) is not null
  and logid_to_int(logid) = 32002
group by
  ui,
  f_user
```

```
order by
  total_failed desc
```

Dataset Name	Description	Log Category
System-Summary-By-Severity	Event system summary by severity	event

```
select
  severity_tmp as severity,
  sum(count) as total_num
from
  ###(select coalesce(nullifna(logdesc), msg) as msg_desc, (case when level in ('critical',
'alert', 'emergency') then 'Critical' when level='error' then 'High' when level='warning'
then 'Medium' when level='notice' then 'Low' else 'Info' end) as severity_tmp, count(*) as
count from $log where $filter and subtype='system' group by msg_desc, severity_tmp
/*SkipSTART*/order by count desc/*SkipEND*/)### t group by severity order by total_num desc
```

Dataset Name	Description	Log Category
System-Summary-By-Date	Event system summary by date	event

```
select
  $flex_timescale(timestamp) as dom,
  sum(critical) as critical,
  sum(high) as high,
  sum(medium) as medium
from
  ###(select $flex_timestamp as timestamp, sum(case when level in ('critical', 'alert',
'emergency') then 1 else 0 end) as critical, sum(case when level = 'error' then 1 else 0
end) as high, sum(case when level = 'warning' then 1 else 0 end) as medium from $log where
$filter and subtype='system' group by timestamp /*SkipSTART*/order by timestamp
desc/*SkipEND*/)### t group by dom order by dom
```

Dataset Name	Description	Log Category
Important-System-Summary-By-Date	Event system summary by date	event

```
select
  $flex_timescale(timestamp) as dom,
  sum(critical) as critical,
  sum(high) as high,
  sum(medium) as medium
from
  ###(select $flex_timestamp as timestamp, sum(case when level in ('critical', 'alert',
'emergency') then 1 else 0 end) as critical, sum(case when level = 'error' then 1 else 0
end) as high, sum(case when level = 'warning' then 1 else 0 end) as medium from $log where
$filter and subtype='system' group by timestamp /*SkipSTART*/order by timestamp
desc/*SkipEND*/)### t group by dom order by dom
```

Dataset Name	Description	Log Category
System-Critical-Severity-Events	Event system critical severity events	event

```
select
  msg_desc as msg,
  severity_tmp as severity,
  sum(count) as counts
from
  ###(select coalesce(nullifna(logdesc), msg) as msg_desc, (case when level in ('critical',
'alert', 'emergency') then 'Critical' when level='error' then 'High' when level='warning'
then 'Medium' when level='notice' then 'Low' else 'Info' end) as severity_tmp, count(*) as
count from $log where $filter and subtype='system' group by msg_desc, severity_tmp
/*SkipSTART*/order by count desc/*SkipEND*/)### t where severity_tmp='Critical' group by
msg, severity_tmp order by counts desc
```

Dataset Name	Description	Log Category
System-High-Severity-Events	Event system high severity events	event

```
select
  msg_desc as msg,
  severity_tmp as severity,
  sum(count) as counts
from
  ###(select coalesce(nullifna(logdesc), msg) as msg_desc, (case when level in ('critical',
'alert', 'emergency') then 'Critical' when level='error' then 'High' when level='warning'
then 'Medium' when level='notice' then 'Low' else 'Info' end) as severity_tmp, count(*) as
count from $log where $filter and subtype='system' group by msg_desc, severity_tmp
/*SkipSTART*/order by count desc/*SkipEND*/)### t where severity_tmp='High' group by msg,
severity_tmp order by counts desc
```

Dataset Name	Description	Log Category
System-Medium-Severity-Events	Event system medium severity events	event

```
select
  msg_desc as msg,
  severity_tmp as severity,
  sum(count) as counts
from
  ###(select coalesce(nullifna(logdesc), msg) as msg_desc, (case when level in ('critical',
'alert', 'emergency') then 'Critical' when level='error' then 'High' when level='warning'
then 'Medium' when level='notice' then 'Low' else 'Info' end) as severity_tmp, count(*) as
count from $log where $filter and subtype='system' group by msg_desc, severity_tmp
/*SkipSTART*/order by count desc/*SkipEND*/)### t where severity_tmp='Medium' group by msg,
severity_tmp order by counts desc
```

Dataset Name	Description	Log Category
utm-drilldown-Top-Traffic-Summary	UTM drilldown traffic summary	traffic

```
select
  srcip,
  srcname
from
  ###(select coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src,
srcip, srcname, sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0)) as bandwidth from $log
where $filter and (logflag&1>0) group by user_src, srcip, srcname order by bandwidth
desc)### t where $filter-drilldown group by srcip, srcname
```

Dataset Name	Description	Log Category
utm-drilldown-Top-User-Destination	UTM drilldown top user destination	traffic

```
select
  appid,
  app,
  dstip,
  sum(sessions) as sessions,
  sum(bandwidth) as bandwidth
from
  ###(select coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src,
appid, app, dstip, count(*) as sessions, sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0)) as
bandwidth from $log where $filter and (logflag&1>0) and dstip is not null and nullifna(app)
is not null group by user_src, appid, app, dstip having sum(coalesce(sentbyte, 0)+coalesce
(rcvdbyte, 0))>0 order by bandwidth desc)### t where $filter-drilldown group by appid, app,
dstip order by bandwidth desc
```

Dataset Name	Description	Log Category
utm-drilldown-Email-Senders-Summary	UTM drilldown email senders summary	traffic

```
select
  sum(requests) as requests,
  sum(bandwidth) as bandwidth
from
  ###(select coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src,
sender, count(*) as requests, sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0)) as bandwidth
from $log where $filter and (logflag&1>0) and service in ('smtp', 'SMTP', '25/tcp',
'587/tcp', 'smtps', 'SMTPS', '465/tcp') group by user_src, sender order by requests desc)###
t where $filter-drilldown
```

Dataset Name	Description	Log Category
utm-drilldown-Email-Receivers-Summary	UTM drilldown email receivers summary	traffic

```
select
  sum(requests) as requests,
  sum(bandwidth) as bandwidth
from
  ###(select coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src,
recipient, count(*) as requests, sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0)) as
bandwidth from $log where $filter and (logflag&1>0) and recipient is not null and service in
('pop3', 'POP3', '110/tcp', 'imap', 'IMAP', '143/tcp', 'imaps', 'IMAPS', '993/tcp', 'pop3s',
'POP3S', '995/tcp') group by user_src, recipient order by requests desc)### t where $filter-
drilldown
```

Dataset Name	Description	Log Category
utm-drilldown-Top-Email-Recipients-By-Bandwidth	UTM drilldown top email recipients	traffic

```
select
  recipient,
  sum(bandwidth) as bandwidth
from
  ###(select coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src,
recipient, count(*) as requests, sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0)) as
bandwidth from $log where $filter and (logflag&1>0) and recipient is not null and service in
('pop3', 'POP3', '110/tcp', 'imap', 'IMAP', '143/tcp', 'imaps', 'IMAPS', '993/tcp', 'pop3s',
'POP3S', '995/tcp') group by user_src, recipient order by requests desc)### t where $filter-
drilldown group by recipient having sum(bandwidth)>0 order by bandwidth desc
```

Dataset Name	Description	Log Category
utm-drilldown-Top-Email-Senders-By-Bandwidth	UTM drilldown top email senders	traffic

```
select
  sender,
  sum(bandwidth) as bandwidth
from
  ###(select coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src,
sender, count(*) as requests, sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0)) as bandwidth
from $log where $filter and (logflag&1>0) and service in ('smtp', 'SMTP', '25/tcp',
'587/tcp', 'smtps', 'SMTPS', '465/tcp') group by user_src, sender order by requests desc)###
t where $filter-drilldown and sender is not null group by sender having sum(bandwidth)>0
order by bandwidth desc
```

Dataset Name	Description	Log Category
utm-drilldown-Top-Allowed-Websites-By-Bandwidth	UTM drilldown top allowed web sites by bandwidth	traffic

```
select
  appid,
  hostname,
  sum(bandwidth) as bandwidth
from
  ###(select coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src,
appid, hostname, (case when utmaction in ('block', 'blocked') then 1 else 0 end) as blocked,
sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0)) as bandwidth from $log-traffic where
$filter and (logflag&1>0) and (countweb>0 or ((logver is null or logver<502000000) and
(hostname is not null or utmevent in ('webfilter', 'banned-word', 'web-content', 'command-
block', 'script-filter')))) and hostname is not null group by user_src, appid, hostname,
blocked order by bandwidth desc)### t where $filter-drilldown and blocked=0 group by appid,
hostname order by bandwidth desc
```

Dataset Name	Description	Log Category
utm-drilldown-Top-Blocked-Websites-By-Request	UTM drilldown top blocked web sites by request	webfilter

```
select
  appid,
  hostname,
  sum(requests) as requests
from
```

```
  ###(select coalesce(nullifna(`user`), ipstr(`srcip`)) as user_src, 0 as appid, hostname,
(case when action='blocked' then 1 else 0 end) as blocked, count(*) as requests from $log
where $filter and (eventtype is null or logver>=502000000) and hostname is not null group by
user_src, appid, hostname, blocked order by requests desc)### t where $filter-drilldown and
blocked=1 group by appid, hostname order by requests desc
```

Dataset Name	Description	Log Category
utm-drilldown-Top-Virus-By-Name	UTM drilldown top virus	virus

```
select
  virus,
  sum(totalnum) as totalnum
from
  ###(select coalesce(nullifna(`user`), ipstr(`srcip`)) as user_src, virus, count(*) as
totalnum from $log where $filter and (eventtype is null or logver>=502000000) and nullifna
(virus) is not null group by user_src, virus order by totalnum desc)### t where $filter-
drilldown group by virus order by totalnum desc
```

Dataset Name	Description	Log Category
utm-drilldown-Top-Attacks	UTM drilldown top attacks by name	attack

```
select
  attack,
  sum(attack_count) as attack_count
from
  ###(select coalesce(nullifna(`user`), ipstr(`srcip`)) as user_src, attack, count(*) as
attack_count from $log where $filter and nullifna(attack) is not null group by user_src,
attack order by attack_count desc)### t where $filter-drilldown group by attack order by
attack_count desc
```

Dataset Name	Description	Log Category
utm-drilldown-Top-Vulnerability	UTM drilldown top vulnerability by name	netscan

```
select
  vuln,
  sum(totalnum) as totalnum
from
  ###(select coalesce(nullifna(`user`), ipstr(`srcip`)) as user_src, vuln, count(*) as
totalnum from $log where $filter and action='vuln-detection' and vuln is not null group by
user_src, vuln order by totalnum desc)### t where $filter-drilldown group by vuln order by
totalnum desc
```

Dataset Name	Description	Log Category
utm-drilldown-Top-App-By-Bandwidth	UTM drilldown top applications by bandwidth usage	traffic

```
select
  appid,
  app,
  sum(bandwidth) as bandwidth
from
  ###(select user_src, appid, app, appcat, apprisk, sum(bandwidth) as bandwidth, sum
(sessions) as sessions from ###base(/*tag:rpt_base_t_top_app*/select dvid, srcip, dstip,
epid, euid, coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src,
appid, app, appcat, apprisk, hostname, sum(coalesce(rcvddelta, rcvdbyte, 0)) as traffic_in,
sum(coalesce(sentdelta, sentbyte, 0)) as traffic_out, sum(coalesce(sentdelta, sentbyte,
0)+coalesce(rcvddelta, rcvdbyte, 0)) as bandwidth, count(*) as sessions from $log-traffic
where $filter and (logflag&(1|32)>0) and nullifna(app) is not null group by dvid, srcip,
dstip, epid, euid, user_src, appid, app, appcat, apprisk, hostname order by sessions
desc)base### t group by user_src, appid, app, appcat, apprisk /*SkipSTART*/order by sessions
desc, bandwidth desc/*SkipEND*/)### t where $filter-drilldown group by appid, app having sum
(bandwidth)>0 order by bandwidth desc
```

Dataset Name	Description	Log Category
utm-drilldown-Top-App-By-Sessions	UTM drilldown top applications by session count	traffic

```
select
  appid,
  app,
  sum(sessions) as sessions
from
  ###(select user_src, appid, app, appcat, apprisk, sum(bandwidth) as bandwidth, sum
(sessions) as sessions from ###base(/*tag:rpt_base_t_top_app*/select dvid, srcip, dstip,
epid, euid, coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src,
appid, app, appcat, apprisk, hostname, sum(coalesce(rcvddelta, rcvdbyte, 0)) as traffic_in,
sum(coalesce(sentdelta, sentbyte, 0)) as traffic_out, sum(coalesce(sentdelta, sentbyte,
0)+coalesce(rcvddelta, rcvdbyte, 0)) as bandwidth, count(*) as sessions from $log-traffic
where $filter and (logflag&(1|32)>0) and nullifna(app) is not null group by dvid, srcip,
dstip, epid, euid, user_src, appid, app, appcat, apprisk, hostname order by sessions
desc)base### t group by user_src, appid, app, appcat, apprisk /*SkipSTART*/order by sessions
desc, bandwidth desc/*SkipEND*/)### t where $filter-drilldown group by appid, app order by
sessions desc
```

Dataset Name	Description	Log Category
Top5-Users-By-Bandwidth	UTM drilldown top users by bandwidth usage	traffic

```
select
  coalesce(
    nullifna(`user`),
    nullifna(`unauthuser`),
    ipstr(`srcip`)
  ) as dldn_user,
  count(*) as session,
  sum(
    coalesce(sentbyte, 0)+ coalesce(rcvdbyte, 0)
  ) as bandwidth,
  sum(
    coalesce(sentbyte, 0)
  ) as traffic_out,
  sum(
    coalesce(rcvdbyte, 0)
  ) as traffic_in
from
  $log
where
  $filter
  and (
    logflag&1>0
  )
group by
  dldn_user
having
  sum(
    coalesce(sentbyte, 0)+ coalesce(rcvdbyte, 0)
  )> 0
order by
  bandwidth desc
```

Dataset Name	Description	Log Category
bandwidth-app-Top-App-By-Bandwidth-Sessions	Top applications by bandwidth usage	traffic

```
select
  app_group_name(app) as app_group,
  sum(bandwidth) as bandwidth,
  sum(traffic_in) as traffic_in,
  sum(traffic_out) as traffic_out,
  sum(sessions) as sessions
from
  ###(select appid, app, appcat, apprisk, sum(traffic_in) as traffic_in, sum(traffic_out) as
traffic_out, sum(bandwidth) as bandwidth, sum(sessions) as sessions from ###base(/*tag:rpt_
base_t_top_app*/select dvid, srcip, dstip, epid, euid, coalesce(nullifna(`user`), nullifna
(`unauthuser`), ipstr(`srcip`)) as user_src, appid, app, appcat, apprisk, hostname, sum
(coalesce(rcvddelta, rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as
traffic_out, sum(coalesce(sentdelta, sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as
bandwidth, count(*) as sessions from $log-traffic where $filter and (logflag&(1|32)>0) and
nullifna(app) is not null group by dvid, srcip, dstip, epid, euid, user_src, appid, app,
appcat, apprisk, hostname order by sessions desc)base### t group by appid, app, appcat,
apprisk /*SkipSTART*/order by sessions desc, bandwidth desc/*SkipEND*/)### t group by app_
group having sum(bandwidth)>0 order by bandwidth desc
```

Dataset Name	Description	Log Category
bandwidth-app-Category-By-Bandwidth	Application risk application usage by category	traffic

```
select
  appcat,
  sum(bandwidth) as bandwidth
from
  ###(select appid, app, appcat, apprisk, sum(traffic_in) as traffic_in, sum(traffic_out) as
traffic_out, sum(bandwidth) as bandwidth, sum(sessions) as sessions from ###base(/*tag:rpt_
base_t_top_app*/select dvid, srcip, dstip, epid, euid, coalesce(nullifna(`user`), nullifna
(`unauthuser`), ipstr(`srcip`)) as user_src, appid, app, appcat, apprisk, hostname, sum
(coalesce(rcvddelta, rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as
traffic_out, sum(coalesce(sentdelta, sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as
bandwidth, count(*) as sessions from $log-traffic where $filter and (logflag&(1|32)>0) and
nullifna(app) is not null group by dvid, srcip, dstip, epid, euid, user_src, appid, app,
appcat, apprisk, hostname order by sessions desc)base### t group by appid, app, appcat,
apprisk /*SkipSTART*/order by sessions desc, bandwidth desc/*SkipEND*/)### t where $filter-
drilldown and nullifna(appcat) is not null group by appcat having sum(bandwidth)>0 order by
bandwidth desc
```

Dataset Name	Description	Log Category
bandwidth-app-Top-Users-By-Bandwidth-Sessions	Bandwidth application top users by bandwidth usage	traffic

```
select
  user_src,
  sum(bandwidth) as bandwidth,
  sum(traffic_in) as traffic_in,
  sum(traffic_out) as traffic_out,
  sum(sessions) as sessions
from
  ###(select user_src, sum(traffic_in) as traffic_in, sum(traffic_out) as traffic_out, sum
(bandwidth) as bandwidth, sum(sessions) as sessions from ###base(/*tag:rpt_base_t_top_
app*/select dvid, srcip, dstip, epid, euid, coalesce(nullifna(`user`), nullifna
(`unauthuser`), ipstr(`srcip`)) as user_src, appid, app, appcat, apprisk, hostname, sum
(coalesce(rcvddelta, rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as
traffic_out, sum(coalesce(sentdelta, sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as
bandwidth, count(*) as sessions from $log-traffic where $filter and (logflag&(1|32)>0) and
nullifna(app) is not null group by dvid, srcip, dstip, epid, euid, user_src, appid, app,
appcat, apprisk, hostname order by sessions desc)base### t group by user_src order by
sessions desc, bandwidth desc)### t group by user_src having sum(bandwidth)>0 order by
bandwidth desc
```

Dataset Name	Description	Log Category
bandwidth-app-Traffic-By-Active-User-Number	Bandwidth application traffic by active user number	traffic

```
select
  $flex_timescale(timestamp) as hodex,
  count(
    distinct(user_src)
  ) as total_user
from
  ###(select $flex_timestamp as timestamp, coalesce(nullifna(`user`), nullifna
(`unauthuser`), ipstr(`srcip`)) as user_src from $log where $filter and (logflag&(1|32)>0)
group by timestamp, user_src order by timestamp desc)### t group by hodex order by hodex
```

Dataset Name	Description	Log Category
bandwidth-app-Top-Dest-By-Bandwidth-Sessions	Bandwidth application top dest by bandwidth usage sessions	traffic

```
select
  coalesce(
    nullifna(
      root_domain(hostname)
    ),
    ipstr(`dstip`)
  ) as domain,
  sum(traffic_in) as traffic_in,
  sum(traffic_out) as traffic_out,
  sum(bandwidth) as bandwidth,
  sum(sessions) as sessions
```

```
from
  ###(select hostname, dstip, sum(traffic_in) as traffic_in, sum(traffic_out) as traffic_
out, sum(bandwidth) as bandwidth, sum(sessions) as sessions from ###base(/*tag:rpt_base_t_
top_app*/select dvid, srcip, dstip, epid, euid, coalesce(nullifna(`user`), nullifna
(`unauthuser`), ipstr(`srcip`)) as user_src, appid, app, appcat, apprisk, hostname, sum
(coalesce(rcvddelta, rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as
traffic_out, sum(coalesce(sentdelta, sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as
bandwidth, count(*) as sessions from $log-traffic where $filter and (logflag&(1|32)>0) and
nullifna(app) is not null group by dvid, srcip, dstip, epid, euid, user_src, appid, app,
appcat, apprisk, hostname order by sessions desc)base### t group by hostname, dstip order by
sessions desc, bandwidth desc)### t group by domain order by bandwidth desc
```

Dataset Name	Description	Log Category
bandwidth-app-Top-Policies-By-Bandwidth-Sessions	Top policies by bandwidth and sessions	traffic

```
select
  coalesce(
    pol.name,
    cast(policyid as text)
  ) as polid,
  sum(bandwidth) as bandwidth,
  sum(traffic_in) as traffic_in,
  sum(traffic_out) as traffic_out,
  sum(sessions) as sessions
from
  ###(select policyid, poluuid, sum(coalesce(rcvdbyte, 0) + coalesce(sentbyte, 0)) as
bandwidth, sum(coalesce(rcvdbyte, 0)) as traffic_in, sum(coalesce(sentbyte, 0)) as traffic_
out, count(*) as sessions from $log where $filter and (logflag&1>0) group by policyid,
poluuid order by bandwidth desc)### t1 left join $ADOMTBL_PLHD_POLINFO pol on
t1.poluuid=pol.uuid group by polid order by bandwidth desc
```

Dataset Name	Description	Log Category
bandwidth-app-Traffic-Statistics	Bandwidth application traffic statistics	traffic

```
drop
  table if exists rpt_tmptbl_1; create temporary table rpt_tmptbl_1(
    total_sessions varchar(255),
    total_bandwidth varchar(255),
    ave_session varchar(255),
    ave_bandwidth varchar(255),
    active_date varchar(255),
    total_users varchar(255),
    total_app varchar(255),
    total_dest varchar(255)
  ); insert into rpt_tmptbl_1 (
    total_sessions, total_bandwidth,
    ave_session, ave_bandwidth
  )
select
  format_numeric_no_decimal(
    sum(sessions)
  ) as total_sessions,
  bandwidth_unit(
    sum(bandwidth)
  ) as total_bandwidth,
  format_numeric_no_decimal(
    cast(
      sum(sessions)/ $days_num as decimal(18, 0)
    )
  ) as ave_session,
  bandwidth_unit(
    cast(
      sum(bandwidth)/ $days_num as decimal(18, 0)
    )
  ) as ave_bandwidth
from
  ###(select appid, app, appcat, apprisk, sum(traffic_in) as traffic_in, sum(traffic_out) as
traffic_out, sum(bandwidth) as bandwidth, sum(sessions) as sessions from ###base(/*tag:rpt_
base_t_top_app*/select dvid, srcip, dstip, epid, euid, coalesce(nullifna(`user`), nullifna
(`unauthuser`), ipstr(`srcip`)) as user_src, appid, app, appcat, apprisk, hostname, sum
(coalesce(rcvddelta, rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as
traffic_out, sum(coalesce(sentdelta, sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as
bandwidth, count(*) as sessions from $log-traffic where $filter and (logflag&(1|32)>0) and
nullifna(app) is not null group by dvid, srcip, dstip, epid, euid, user_src, appid, app,
appcat, apprisk, hostname order by sessions desc)base### t group by appid, app, appcat,
apprisk /*SkipSTART*/order by sessions desc, bandwidth desc/*SkipEND*/)### t; update rpt_
tmptbl_1 set active_date=t1.dom from (select dom, sum(sessions) as sessions from ###(select
$DAY_OF_MONTH as dom, count(*) as sessions from $log where $filter and (logflag&(1|32)>0)
group by dom order by sessions desc)### t group by dom order by sessions desc limit 1) as
t1; update rpt_tmptbl_1 set total_users=t2.totalnum from (select format_numeric_no_decimal
(count(distinct(user_src))) as totalnum from ###(select user_src, sum(sessions) as count
from ###base(/*tag:rpt_base_t_top_app*/select dvid, srcip, dstip, epid, euid, coalesce
(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src, appid, app, appcat,
apprisk, hostname, sum(coalesce(rcvddelta, rcvdbyte, 0)) as traffic_in, sum(coalesce
(sentdelta, sentbyte, 0)) as traffic_out, sum(coalesce(sentdelta, sentbyte, 0)+coalesce
(rcvddelta, rcvdbyte, 0)) as bandwidth, count(*) as sessions from $log-traffic where $filter
and (logflag&(1|32)>0) and nullifna(app) is not null group by dvid, srcip, dstip, epid,
euid, user_src, appid, app, appcat, apprisk, hostname order by sessions desc)base### t group
by user_src order by count desc)### t) as t2; update rpt_tmptbl_1 set total_app=t3.totalnum
from (select format_numeric_no_decimal(count(distinct(app_grp))) as totalnum from ###(select
app_group_name(app) as app_grp, sum(sessions) as count from ###base(/*tag:rpt_base_t_top_
app*/select dvid, srcip, dstip, epid, euid, coalesce(nullifna(`user`), nullifna
(`unauthuser`), ipstr(`srcip`)) as user_src, appid, app, appcat, apprisk, hostname, sum
(coalesce(rcvddelta, rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as
traffic_out, sum(coalesce(sentdelta, sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as
bandwidth, count(*) as sessions from $log-traffic where $filter and (logflag&(1|32)>0) and
nullifna(app) is not null group by dvid, srcip, dstip, epid, euid, user_src, appid, app,
appcat, apprisk, hostname order by sessions desc)base### t group by app_grp order by count
desc)### t) as t3; update rpt_tmptbl_1 set total_dest=t4.totalnum from (select format_
numeric_no_decimal(count(distinct(dstip))) as totalnum from ###(select dstip, sum(sessions)
as count from ###base(/*tag:rpt_base_t_top_app*/select dvid, srcip, dstip, epid, euid,
coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src, appid, app,
appcat, apprisk, hostname, sum(coalesce(rcvddelta, rcvdbyte, 0)) as traffic_in, sum(coalesce
(sentdelta, sentbyte, 0)) as traffic_out, sum(coalesce(sentdelta, sentbyte, 0)+coalesce
(rcvddelta, rcvdbyte, 0)) as bandwidth, count(*) as sessions from $log-traffic where $filter
and (logflag&(1|32)>0) and nullifna(app) is not null group by dvid, srcip, dstip, epid,
euid, user_src, appid, app, appcat, apprisk, hostname order by sessions desc)base### t where
dstip is not null group by dstip order by count desc)### t ) as t4; select 'Total Sessions'
as summary, total_sessions as stats from rpt_tmptbl_1 union all select 'Total Bytes
```

```
Transferred' as summary, total_bandwidth as stats from rpt_tmptbl_1 union all select 'Most
Active Date By Sessions' as summary, active_date as stats from rpt_tmptbl_1 union all select
'Total Users' as summary, total_users as stats from rpt_tmptbl_1 union all select 'Total
Applications' as summary, total_app as stats from rpt_tmptbl_1 union all select 'Total
Destinations' as summary, total_dest as stats from rpt_tmptbl_1 union all select 'Average
Sessions Per Day' as summary, ave_session as stats from rpt_tmptbl_1 union all select
'Average Bytes Per Day' as summary, ave_bandwidth as stats from rpt_tmptbl_1
```

Dataset Name	Description	Log Category
Score-Summary-For-All-Users-Devices	Reputation score summary for all users devices	traffic

```
select
  $flex_timescale(timestamp) as hodex,
  sum(scores) as scores
from
  ###(select $flex_timestamp as timestamp, sum(crscore%65536) as scores, count(*) as
totalnum from $log where $filter and (logflag&1>0) and crscore is not null group by
timestamp having sum(crscore%65536)>0 order by timestamp desc)### t group by hodex order by
hodex
```

Dataset Name	Description	Log Category
Number-Of-Incidents-For-All-Users-Devices	Reputation number of incidents for all users devices	traffic

```
select
  $flex_timescale(timestamp) as hodex,
  sum(scores) as scores,
  sum(totalnum) as totalnum
from
  ###(select $flex_timestamp as timestamp, sum(crscore%65536) as scores, count(*) as
totalnum from $log where $filter and (logflag&1>0) and crscore is not null group by
timestamp having sum(crscore%65536)>0 order by timestamp desc)### t group by hodex order by
hodex
```

Dataset Name	Description	Log Category
Top-Users-By-Reputation-Scores	Reputation top users by scores	traffic

```
select
  coalesce(
    nullifna(`user`),
    nullifna(`unauthuser`),
    ipstr(`srcip`)
  ) as user_src,
  sum(crscore % 65536) as scores
from
  $log
where
  $filter
  and (
    logflag&1>0
  )
  and crscore is not null
```

```
group by
  user_src
having
  sum(crscore % 65536)> 0
order by
  scores desc
```

Dataset Name	Description	Log Category
Top-Devices-By-Reputation-Scores	Reputation top devices by scores	traffic

```
select
  max(
    get_devtype(srcswversion, osname, devtype)
  ) as devtype_new,
  coalesce(
    nullifna(`srcname`),
    nullifna(`srcmac`),
    ipstr(`srcip`)
  ) as dev_src,
  sum(crscore % 65536) as scores
from
  $log
where
  $filter
  and (
    logflag&1>0
  )
  and crscore is not null
group by
  dev_src
having
  sum(crscore % 65536)> 0
order by
  scores desc
```

Dataset Name	Description	Log Category
Top-Users-With-Increased-Scores	Reputation top users with increased scores	traffic

```
drop
  table if exists rpt_tmptbl_1;
drop
  table if exists rpt_tmptbl_2; create temporary table rpt_tmptbl_1 as
select
  f_user,
  sum(sum_rp_score) as sum_rp_score
from
  ###(select coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as f_user,
sum(crscore%65536) as sum_rp_score from $log where $pre_period $filter and (logflag&1>0) and
crscore is not null group by f_user having sum(crscore%65536)>0 order by sum_rp_score
desc)### t group by f_user; create temporary table rpt_tmptbl_2 as select f_user, sum(sum_
rp_score) as sum_rp_score from ###(select coalesce(nullifna(`user`), nullifna(`unauthuser`),
ipstr(`srcip`)) as f_user, sum(crscore%65536) as sum_rp_score from $log where $filter and
(logflag&1>0) and crscore is not null group by f_user having sum(crscore%65536)>0 order by
sum_rp_score desc)### t group by f_user; select t1.f_user, sum(t1.sum_rp_score) as t1_sum_
```

```
score, sum(t2.sum_rp_score) as t2_sum_score, (sum(t2.sum_rp_score)-sum(t1.sum_rp_score)) as
delta from rpt_tmptbl_1 as t1 inner join rpt_tmptbl_2 as t2 on t1.f_user=t2.f_user where
t2.sum_rp_score > t1.sum_rp_score group by t1.f_user order by delta desc
```

Dataset Name	Description	Log Category
Top-Devices-With-Increased-Scores	Reputation top devices with increased scores	traffic

```
drop
  table if exists rpt_tmptbl_1;
drop
  table if exists rpt_tmptbl_2; create temporary table rpt_tmptbl_1 as
select
  f_device,
  devtype_new,
  sum(sum_rp_score) as sum_rp_score
from
  ###(select coalesce(nullifna(`srcname`),nullifna(`srcmac`), ipstr(`srcip`)) as f_device,
get_devtype(srcswversion, osname, devtype) as devtype_new, sum(crscore%65536) as sum_rp_
score from $log where $pre_period $filter and (logflag&1>0) and crscore is not null group by
f_device, devtype_new having sum(crscore%65536)>0 order by sum_rp_score desc)### t group by
f_device, devtype_new; create temporary table rpt_tmptbl_2 as select f_device, devtype_new,
sum(sum_rp_score) as sum_rp_score from ###(select coalesce(nullifna(`srcname`),nullifna
(`srcmac`), ipstr(`srcip`)) as f_device, get_devtype(srcswversion, osname, devtype) as
devtype_new, sum(crscore%65536) as sum_rp_score from $log where $filter and (logflag&1>0)
and crscore is not null group by f_device, devtype_new having sum(crscore%65536)>0 order by
sum_rp_score desc)### t group by f_device, devtype_new; select t1.f_device, t1.devtype_new ,
sum(t1.sum_rp_score) as t1_sum_score, sum(t2.sum_rp_score) as t2_sum_score, (sum(t2.sum_rp_
score)-sum(t1.sum_rp_score)) as delta from rpt_tmptbl_1 as t1 inner join rpt_tmptbl_2 as t2
on t1.f_device=t2.f_device and t1.devtype_new=t2.devtype_new where t2.sum_rp_score > t1.sum_
rp_score group by t1.f_device, t1.devtype_new order by delta desc
```

Dataset Name	Description	Log Category
Attacks-By-Severity	Threat attacks by severity	attack

```
select
  (
    case when severity =& #039;critical' then 'Critical' when severity='high' then 'High'
when severity='medium' then 'Medium' when severity='low' then 'Low' when severity='info'
then 'Info' end) as severity, count(*) as totalnum from $log where $filter group by severity
order by totalnum desc
```

Dataset Name	Description	Log Category
Top-Attacks-Detected	Threat top attacks detected	attack

```
select
  attack,
  attackid,
  cve,
  severity,
  sum(attack_count) as attack_count
from
  ###(select attack, attackid, t1.severity, cve, (case when t1.severity = 'critical' then 1
when t1.severity = 'high' then 2 when t1.severity = 'medium'  then 3 when t1.severity =
'low' then 4 else 5 end) as severity_level, count(*) as attack_count from $log t1 left join
(select name, cve, vuln_type from ips_mdata) t2 on t1.attack=t2.name where $filter and
nullifna(attack) is not null group by attack, attackid, t1.severity, severity_level, cve
/*SkipSTART*/order by severity_level, attack_count desc/*SkipEND*/)### t group by attack,
attackid, severity, severity_level, cve order by severity_level, attack_count desc
```

Dataset Name	Description	Log Category
Top-Attacks-Blocked	Threat top attacks blocked	attack

```
select
  attack,
  count(*) as attack_count
from
  $log
where
  $filter
  and nullifna(attack) is not null
  and action not in (
    & #039;detected', 'pass_session') group  by attack order by attack_count desc
```

Dataset Name	Description	Log Category
Top-Virus-Source	Threat top virus source	virus

```
select
  source,
  hostname,
  sum(totalnum) as totalnum
from
  ###(select source, ipstr(`victim`) as hostname, sum(totalnum) as totalnum from ( select
(CASE WHEN direction='incoming' THEN dstip ELSE srcip END) as source, (CASE WHEN
direction='incoming' THEN srcip ELSE dstip END) as victim, count(*) as totalnum from $log
where $filter and (eventtype is null or logver>=502000000) and nullifna(virus) is not null
group by source, victim ) t group by source, hostname /*SkipSTART*/order by totalnum
desc/*SkipEND*/)### t group by source, hostname order by totalnum desc
```

Dataset Name	Description	Log Category
Intrusion-in-Last-7-Days	Threat intrusion timeline	attack

```
select
  $flex_timescale(timestamp) as hodex,
  sum(totalnum) as totalnum
from
  ###(select $flex_timestamp as timestamp, count(*) as totalnum from $log where $filter
group by timestamp /*SkipSTART*/order by timestamp desc/*SkipEND*/)### t group by hodex
order by hodex
```

Dataset Name	Description	Log Category
Virus-Time-Line	Threat virus timeline	virus

```
select
  $flex_datetime(timestamp) as hodex,
  sum(totalnum) as totalnum
```

```
from
  ###(select $flex_timestamp as timestamp, count(*) as totalnum from $log where $filter and
(eventtype is null or logver>=502000000) and nullifna(virus) is not null group by timestamp
/*SkipSTART*/order by timestamp desc/*SkipEND*/)### t group by hodex order by hodex
```

Dataset Name	Description	Log Category
Top-Spyware-Victims	Threat top spyware victims	virus

```
select
  user_src,
  sum(totalnum) as totalnum
from
  ###(select coalesce(nullifna(`user`), ipstr(`srcip`)) as user_src, virus, count(*) as
totalnum from $log where $filter group by user_src, virus /*SkipSTART*/order by totalnum
desc/*SkipEND*/)### t where  virus like 'Riskware%' group by user_src order by totalnum desc
```

Dataset Name	Description	Log Category
Top-Spyware-by-Name	Threat top spyware by name	virus

```
select
  virus,
  max(virusid_s) as virusid,
  sum(totalnum) as totalnum
from
  ###(select filename, analyticscksum, service, fsaverdict, dtype, coalesce(nullifna
(`user`), ipstr(`srcip`)) as user_src, virus, virusid_to_str(virusid, eventtype) as virusid_
s, count(*) as totalnum from $log where $filter group by filename, analyticscksum, service,
fsaverdict, dtype, user_src, virus, virusid_s /*SkipSTART*/order by totalnum
desc/*SkipEND*/)### t where virus like 'Riskware%' group by virus order by totalnum desc
```

Dataset Name	Description	Log Category
Top-Spyware-Source	Threat top spyware source	traffic

```
select
  srcip,
  hostname,
  sum(totalnum) as totalnum
from
  ###(select srcip, hostname, virus, count(*) as totalnum from $log where $filter and
(logflag&1>0) group by srcip, hostname, virus order by totalnum desc)### t where virus like
'Riskware%' group by srcip, hostname order by totalnum desc
```

Dataset Name	Description	Log Category
Spyware-Time-Line	Threat spyware timeline	virus

```
select
  $flex_timescale(timestamp) as hodex,
  sum(totalnum) as totalnum
from
  ###(select $flex_timestamp as timestamp, virus, count(*) as totalnum from $log where
$filter group by timestamp, virus /*SkipSTART*/order by timestamp desc/*SkipEND*/)### t
where virus like 'Riskware%' group by hodex order by hodex
```

Dataset Name	Description	Log Category
Top-Adware-Victims	Threat top adware victims	virus

```
select
  user_src,
  sum(totalnum) as totalnum
from
  ###(select coalesce(nullifna(`user`), ipstr(`srcip`)) as user_src, virus, count(*) as
totalnum from $log where $filter group by user_src, virus /*SkipSTART*/order by totalnum
desc/*SkipEND*/)### t where virus like 'Adware%' group by user_src order by totalnum desc
```

Dataset Name	Description	Log Category
Top-Adware-by-Name	Threat top adware by name	virus

```
select
  virus,
  max(virusid_s) as virusid,
  sum(totalnum) as totalnum
from
  ###(select filename, analyticscksum, service, fsaverdict, dtype, coalesce(nullifna
(`user`), ipstr(`srcip`)) as user_src, virus, virusid_to_str(virusid, eventtype) as virusid_
s, count(*) as totalnum from $log where $filter group by filename, analyticscksum, service,
fsaverdict, dtype, user_src, virus, virusid_s /*SkipSTART*/order by totalnum
desc/*SkipEND*/)### t where virus like 'Adware%' group by virus order by totalnum desc
```

Dataset Name	Description	Log Category
Top-Adware-Source	Threat top adware source	traffic

```
select
  srcip,
  hostname,
  sum(totalnum) as totalnum
from
  ###(select srcip, hostname, virus, count(*) as totalnum from $log where $filter and
(logflag&1>0) group by srcip, hostname, virus order by totalnum desc)### t where virus like
'Adware%' group by srcip, hostname order by totalnum desc
```

Dataset Name	Description	Log Category
Adware-Time-Line	Threat adware timeline	virus

```
select
  $flex_timescale(timestamp) as hodex,
  sum(totalnum) as totalnum
from
  ###(select $flex_timestamp as timestamp, virus, count(*) as totalnum from $log where
$filter group by timestamp, virus /*SkipSTART*/order by timestamp desc/*SkipEND*/)### t
where virus like 'Adware%' group by hodex order by hodex
```

Dataset Name	Description	Log Category
Intrusions-Timeline-By-Severity	Threat intrusions timeline by severity	attack

```
select
  $flex_timescale(timestamp) as timescale,
  sum(critical) as critical,
  sum(high) as high,
  sum(medium) as medium,
  sum(low) as low,
  sum(info) as info
from
  ###(select $flex_timestamp as timestamp, sum(case when severity = 'critical' then 1 else 0
end) as critical, sum(case when severity = 'high' then 1 else 0 end) as high, sum(case when
severity = 'medium' then 1 else 0 end) as medium, sum(case when severity in ('notice',
'low') then 1 else 0 end) as low, sum(case when severity = 'info' or severity = 'debug' then
1 else 0 end) as info from $log where $filter group by timestamp /*SkipSTART*/order by
timestamp desc/*SkipEND*/)### t group by timescale order by timescale
```

Dataset Name	Description	Log Category
Important-Intrusions-Timeline-By-Severity	Threat intrusions timeline by severity	attack

```
select
  $flex_timescale(timestamp) as timescale,
  sum(critical) as critical,
  sum(high) as high,
  sum(medium) as medium,
  sum(low) as low,
  sum(info) as info
from
  ###(select $flex_timestamp as timestamp, sum(case when severity = 'critical' then 1 else 0
end) as critical, sum(case when severity = 'high' then 1 else 0 end) as high, sum(case when
severity = 'medium' then 1 else 0 end) as medium, sum(case when severity in ('notice',
'low') then 1 else 0 end) as low, sum(case when severity = 'info' or severity = 'debug' then
1 else 0 end) as info from $log where $filter group by timestamp /*SkipSTART*/order by
timestamp desc/*SkipEND*/)### t group by timescale order by timescale
```

Dataset Name	Description	Log Category
Top-Intrusions-By-Types	Threat top intrusions by types	attack

```
select
  vuln_type,
  count(*) as totalnum
from
  $log t1
  left join (
    select
      name,
      cve,
      vuln_type
    from
      ips_mdata
  ) t2 on t1.attack = t2.name
where
  $filter
  and vuln_type is not null
group by
```

```
  vuln_type
order by
  totalnum desc
```

Dataset Name	Description	Log Category
Critical-Severity-Intrusions	Threat critical severity intrusions	attack

```
select
  attack,
  attackid,
  cve,
  vuln_type,
  count(*) as totalnum
from
  $log t1
  left join (
    select
      name,
      cve,
      vuln_type
    from
      ips_mdata
  ) t2 on t1.attack = t2.name
where
  $filter
  and t1.severity = & #039;critical' and nullifna(attack) is not null group by attack,
attackid, cve, vuln_type order by totalnum desc
```

Dataset Name	Description	Log Category
High-Severity-Intrusions	Threat high severity intrusions	attack

```
select
  attack,
  attackid,
  vuln_type,
  cve,
  count(*) as totalnum
from
  $log t1
  left join (
    select
      name,
      cve,
      vuln_type
    from
      ips_mdata
  ) t2 on t1.attack = t2.name
where
  $filter
  and t1.severity =& #039;high' and nullifna(attack) is not null group by attack, attackid,
vuln_type, cve order by totalnum desc
```

Dataset Name	Description	Log Category
Medium-Severity-Intrusions	Threat medium severity intrusions	attack

```
select
  attack,
  vuln_type,
  cve,
  count(*) as totalnum
from
  $log t1
  left join (
    select
      name,
      cve,
      vuln_type
    from
      ips_mdata
  ) t2 on t1.attack = t2.name
where
  $filter
  and t1.severity =& #039;medium' and nullifna(attack) is not null group by attack, vuln_
type, cve order by totalnum desc
```

Dataset Name	Description	Log Category
Top-Intrusion-Victims	Threat top intrusion victims	attack

```
select
  victim,
  sum(cri_num) as critical,
  sum(high_num) as high,
  sum(med_num) as medium,
  sum(cri_num + high_num + med_num) as totalnum
from
  ###(select (CASE WHEN direction='incoming' THEN srcip ELSE dstip END) as victim, sum((case
when severity='critical' then 1 else 0 end)) as cri_num, sum(case when severity='high' then
1 else 0 end) as high_num, sum(case when severity='medium' then 1 else 0 end) as med_num
from $log where $filter and severity in ('critical', 'high', 'medium') group by victim)### t
group by victim order by totalnum desc
```

Dataset Name	Description	Log Category
Top-Intrusion-Sources	Threat top intrusion sources	attack

```
select
  source,
  sum(cri_num) as critical,
  sum(high_num) as high,
  sum(med_num) as medium,
  sum(cri_num + high_num + med_num) as totalnum
from
  ###(select (CASE WHEN direction='incoming' THEN dstip ELSE srcip END) as source, sum(case
when severity='critical' then 1 else 0 end) as cri_num, sum(case when severity='high' then 1
else 0 end) as high_num, sum(case when severity='medium' then 1 else 0 end) as med_num from
$log where $filter and severity in ('critical', 'high', 'medium') group by source)### t
group by source order by totalnum desc
```

Dataset Name	Description	Log Category
Top-Blocked-Intrusions	Threat top blocked intrusions	attack

```
select
  attack,
  attackid,
  (
    case when severity =& #039;critical' then 'Critical' when severity='high' then 'High'
when severity='medium' then 'Medium' when severity='low' then 'Low' when severity='info'
then 'Info' end) as severity_name, sum(totalnum) as totalnum, vuln_type, (case when
severity='critical' then 0 when severity='high' then 1 when severity='medium' then 2 when
severity='low' then 3 when severity='info' then 4 else 5 end) as severity_number from ###
(select attack, attackid, t1.severity, count(*) as totalnum, vuln_type, action from $log t1
left join (select name, cve, vuln_type from ips_mdata) t2 on t1.attack=t2.name where $filter
and nullifna(attack) is not null group by attack, attackid, t1.severity, vuln_type, action
order by totalnum desc)### t where action not in ('detected', 'pass_session') group by
attack, attackid, severity, vuln_type order by severity_number, totalnum desc
```

Dataset Name	Description	Log Category
Top-Monitored-Intrusions	Threat top monitored intrusions	attack

```
select
  attack,
  attackid,
  (
    case when severity =& #039;critical' then 'Critical' when severity='high' then 'High'
when severity='medium' then 'Medium' when severity='low' then 'Low' when severity='info'
then 'Info' end) as severity_name, sum(totalnum) as totalnum, vuln_type, (case when
severity='critical' then 0 when severity='high' then 1 when severity='medium' then 2 when
severity='low' then 3 when severity='info' then 4 else 5 end) as severity_number from ###
(select attack, attackid, t1.severity, count(*) as totalnum, vuln_type, action from $log t1
left join (select name, cve, vuln_type from ips_mdata) t2 on t1.attack=t2.name where $filter
and nullifna(attack) is not null group by attack, attackid, t1.severity, vuln_type, action
order by totalnum desc)### t where action in ('detected', 'pass_session') group by attack,
attackid, severity, vuln_type order by severity_number, totalnum desc
```

Dataset Name	Description	Log Category
Attacks-Over-HTTP-HTTPs	Threat attacks over HTTP HTTPs	attack

```
select
  attack,
  attackid,
  (
    case when severity =& #039;critical' then 'Critical' when  severity='high' then 'High'
when severity='medium' then 'Medium' when severity='low' then 'Low' when severity='info'
then 'Info' end) as severity, count(*) as totalnum, (case when severity='critical' then 0
when severity='high' then 1 when severity='medium' then 2 when severity='low' then 3 when
severity='info' then 4 else 5 end) as severity_number from $log where $filter and severity
in ('critical', 'high', 'medium') and upper(service) in ('HTTP', 'HTTPS') group by attack,
attackid, severity, severity_number order by severity_number, totalnum desc
```

Dataset Name	Description	Log Category
default-AP-Detection-Summary-by-Status-OffWire	Default access point detection summary by status off-wire	event

```
select
  (
    case apstatus when 1 then & #039;rogue' when 2 then 'accepted' when 3 then 'suppressed'
else 'others' end) as ap_full_status, count(*) as totalnum from (select apstatus, bssid,
ssid from ###(select apstatus, bssid, ssid, onwire, count(*) as subtotal from $log where
$filter and apstatus is not null and apstatus!=0 and bssid is not null and logid_to_int
(logid) in (43527, 43521, 43525, 43563, 43564, 43565, 43566, 43569, 43570, 43571, 43582,
43583, 43584, 43585) group by apstatus, bssid, ssid, onwire order by subtotal desc)### t
where onwire='no' group by apstatus, bssid, ssid) t group by ap_full_status order by
totalnum desc
```

Dataset Name	Description	Log Category
default-AP-Detection-Summary-by-Status-OffWire_table	Default access point detection summary by status off-wire	event

```
select
  (
    case apstatus when 1 then & #039;rogue' when 2 then 'accepted' when 3 then 'suppressed'
else 'others' end) as ap_full_status, count(*) as totalnum from (select apstatus, bssid,
ssid from ###(select apstatus, bssid, ssid, onwire, count(*) as subtotal from $log where
$filter and apstatus is not null and apstatus!=0 and bssid is not null and logid_to_int
(logid) in (43527, 43521, 43525, 43563, 43564, 43565, 43566, 43569, 43570, 43571, 43582,
43583, 43584, 43585) group by apstatus, bssid, ssid, onwire order by subtotal desc)### t
where onwire='no' group by apstatus, bssid, ssid) t group by ap_full_status order by
totalnum desc
```

Dataset Name	Description	Log Category
default-AP-Detection-Summary-by-Status-OnWire	Default access point detection summary by status on-wire	event

```
select
  (
    case apstatus when 1 then & #039;rogue' when 2 then 'accepted' when 3 then 'suppressed'
else 'others' end) as ap_full_status, count(*) as totalnum from (select apstatus, bssid,
ssid from ###(select apstatus, bssid, ssid, onwire, count(*) as subtotal from $log where
$filter and apstatus is not null and apstatus!=0 and bssid is not null and logid_to_int
(logid) in (43527, 43521, 43525, 43563, 43564, 43565, 43566, 43569, 43570, 43571, 43582,
43583, 43584, 43585) group by apstatus, bssid, ssid, onwire order by subtotal desc)### t
where onwire='yes' group by apstatus, bssid, ssid) t group by ap_full_status order by
totalnum desc
```

Dataset Name	Description	Log Category
default-AP-Detection-Summary-by-Status-OnWire_table	Default access point detection summary by status on-wire	event

```
select
  (
    case apstatus when 1 then & #039;rogue' when 2 then 'accepted' when 3 then 'suppressed'
else 'others' end) as ap_full_status, count(*) as totalnum from (select apstatus, bssid,
ssid from ###(select apstatus, bssid, ssid, onwire, count(*) as subtotal from $log where
$filter and apstatus is not null and apstatus!=0 and bssid is not null and logid_to_int
(logid) in (43527, 43521, 43525, 43563, 43564, 43565, 43566, 43569, 43570, 43571, 43582,
43583, 43584, 43585) group by apstatus, bssid, ssid, onwire order by subtotal desc)### t
where onwire='yes' group by apstatus, bssid, ssid) t group by ap_full_status order by
totalnum desc
```

Dataset Name	Description	Log Category
default-Managed-AP-Summary	Default managed access point summary	event

```
select
  (
    case when (
      action like & #039;%join%' and logid_to_int(logid) in (43522, 43551)) then
'Authorized' else 'Unauthorized' end) as ap_status, count(*) as totalnum from $log where
$filter and logid_to_int(logid) in (43522, 43551) group by ap_status order by totalnum desc
```

Dataset Name	Description	Log Category
default-Managed-AP-Summary_table	Default managed access point summary	event

```
select
  (
    case when (
      action like & #039;%join%' and logid_to_int(logid) in (43522, 43551)) then
'Authorized' else 'Unauthorized' end) as ap_status, count(*) as totalnum from $log where
$filter and logid_to_int(logid) in (43522, 43551) group by ap_status order by totalnum desc
```

Dataset Name	Description	Log Category
default-Unclassified-AP-Summary	Default unclassified access point summary	event

```
select
  (
    case onwire when & #039;no' then 'off-wire' when 'yes' then 'on-wire' else 'others' end)
as ap_status, count(*) as totalnum from ###(select onwire, ssid, bssid, count(*) as subtotal
from $log where $filter and apstatus=0 and bssid is not null and logid_to_int(logid) in
(43521, 43525, 43527, 43563, 43564, 43565, 43566, 43569, 43570, 43571, 43582, 43583, 43584,
43585) group by onwire, ssid, bssid order by subtotal desc)### t group by ap_status order by
totalnum desc
```

Dataset Name	Description	Log Category
default-Unclassified-AP-Summary_table	Default unclassified access point summary	event

```
select
  (
    case onwire when & #039;no' then 'off-wire' when 'yes' then 'on-wire' else 'others' end)
as ap_status, count(*) as totalnum from ###(select onwire, ssid, bssid, count(*) as subtotal
from $log where $filter and apstatus=0 and bssid is not null and logid_to_int(logid) in
(43521, 43525, 43527, 43563, 43564, 43565, 43566, 43569, 43570, 43571, 43582, 43583, 43584,
43585) group by onwire, ssid, bssid order by subtotal desc)### t group by ap_status order by
totalnum desc
```

Dataset Name	Description	Log Category
default-selected-AP-Details-OffWire	Default selected access point details off-wire	event

```
select
  (
    case apstatus when 0 then & #039;unclassified' when 1 then 'rogue' when 2 then
'accepted' when 3 then 'suppressed' else 'others' end) as ap_full_status, devid, vd, ssid,
bssid, manuf, rssi, channel, radioband, from_dtime(min(first_seen)) as first_seen, from_
dtime(max(last_seen)) as last_seen, detectionmethod, itime, onwire as on_wire from ###
(select apstatus, devid, vd, ssid, bssid, manuf, rssi, channel, radioband, min(dtime) as
first_seen, max(dtime) as last_seen, detectionmethod, itime, onwire from $log where $filter
and apstatus is not null and bssid is not null and logid_to_int(logid) in (43521, 43563,
43564, 43565, 43566, 43569, 43570, 43571) group by apstatus, devid, vd, ssid, bssid, manuf,
rssi, channel, radioband, detectionmethod, itime, onwire order by itime desc)### t where
onwire='no' group by ap_full_status, devid, vd, ssid, bssid, manuf, rssi, channel,
radioband, detectionmethod, itime, onwire, apstatus order by itime desc
```

Dataset Name	Description	Log Category
default-selected-AP-Details-OnWire	Default selected access point details on-wire	event

```
select
  (
    case apstatus when 0 then & #039;unclassified' when 1 then 'rogue' when 2 then
'accepted' when 3 then 'suppressed' else 'others' end) as ap_full_status, devid, vd, ssid,
bssid, manuf, rssi, channel, radioband, from_dtime(min(first_seen)) as first_seen, from_
dtime(max(last_seen)) as last_seen, detectionmethod, itime, onwire as on_wire from ###
(select apstatus, devid, vd, ssid, bssid, manuf, rssi, channel, radioband, min(dtime) as
first_seen, max(dtime) as last_seen, detectionmethod, itime, onwire from $log where $filter
and apstatus is not null and bssid is not null and logid_to_int(logid) in (43521, 43563,
43564, 43565, 43566, 43569, 43570, 43571) group by apstatus, devid, vd, ssid, bssid, manuf,
rssi, channel, radioband, detectionmethod, itime, onwire order by itime desc)### t where
onwire='yes' group by ap_full_status, devid, vd, ssid, bssid, manuf, rssi, channel,
radioband, detectionmethod, itime, onwire, apstatus order by itime desc
```

Dataset Name	Description	Log Category
event-Wireless-Client-Details	Event wireless client details	event

```
drop
  table if exists rpt_tmptbl_1; create temporary table rpt_tmptbl_1 as
select
  ip,
  lmac,
  sn,
  ssid,
  channel,
  radioband,
  min(first) as first,
  max(last) as last
from
  ###(select ip, lower(mac) as lmac, sn, ssid, channel, radioband, min(dtime) as first, max
(dtime) as last from $log-event where $filter and ip is not null and mac is not null and sn
is not null and ssid is not null group by ip, lmac, sn, ssid, channel, radioband order by
ip)### t group by ip, lmac, sn, ssid, channel, radioband; select user_src, ip, lmac, sn,
ssid, channel, radioband, from_dtime(first) as first_seen, from_dtime(last) as last_seen,
cast(volume as decimal(18,2)) as bandwidth from (select * from rpt_tmptbl_1 inner join
(select user_src, srcip, sum(volume) as volume from ###(select coalesce(nullifna(`user`),
nullifna(`unauthuser`), ipstr(`srcip`)) as user_src, srcip, sum(coalesce(sentbyte,
0)+coalesce(rcvdbyte, 0)) as volume from $log-traffic where $filter-time and (logflag&1>0)
and srcip is not null group by user_src, srcip having sum(coalesce(sentbyte, 0)+coalesce
(rcvdbyte, 0))>0 order by volume desc)### t group by user_src, srcip order by user_src,
srcip) t on rpt_tmptbl_1.ip = t.srcip) t order by volume desc
```

Dataset Name	Description	Log Category
event-Wireless-Accepted-Offwire	Event wireless accepted off-wire	event

```
select
  & #039;accepted' as ap_full_status, devid, vd, ssid, bssid, manuf, channel, radioband,
from_dtime(max(last_seen)) as last_seen, detectionmethod, snclosest, 'no' as on_wire from
###(select devid, vd, ssid, bssid, manuf, channel, radioband, detectionmethod, snclosest,
onwire, logid, apstatus, max(dtime) as last_seen from $log where $filter and bssid is not
null and logid_to_int(logid) in (43521, 43525, 43563, 43564, 43565, 43566, 43569, 43570,
43571) group by devid, vd, ssid, bssid, manuf, channel, radioband, detectionmethod,
snclosest, onwire, logid, apstatus order by last_seen desc)### t where apstatus=2 and
onwire='no' group by devid, vd, ssid, bssid, manuf, channel, radioband, detectionmethod,
snclosest order by last_seen desc
```

Dataset Name	Description	Log Category
event-Wireless-Accepted-Onwire	Event wireless accepted on-wire	event

```
select
  & #039;accepted' as ap_full_status, devid, vd, ssid, bssid, manuf, channel, radioband,
from_dtime(max(last_seen)) as last_seen, detectionmethod, snclosest, 'yes' as on_wire from
###(select devid, vd, ssid, bssid, manuf, channel, radioband, detectionmethod, snclosest,
onwire, apstatus, max(dtime) as last_seen from $log where $filter and bssid is not null and
logid_to_int(logid) in (43521, 43525, 43563, 43564, 43565, 43566, 43569, 43570, 43571) group
by devid, vd, ssid, bssid, manuf, channel, radioband, detectionmethod, snclosest, onwire,
apstatus order by last_seen desc)### t where apstatus=2 and onwire='yes' group by devid, vd,
ssid, bssid, manuf, channel, radioband, detectionmethod, snclosest order by last_seen desc
```

Dataset Name	Description	Log Category
event-Wireless-Rogue-Offwire	Event wireless rogue off-wire	event

```
select
  & #039;rogue' as ap_full_status, devid, vd, ssid, bssid, manuf, channel, radioband, from_
dtime(max(last_seen)) as last_seen, detectionmethod, snclosest, 'no' as on_wire from ###
(select devid, vd, ssid, bssid, manuf, channel, radioband, detectionmethod, snclosest,
onwire, logid, apstatus, max(dtime) as last_seen from $log where $filter and bssid is not
null and logid_to_int(logid) in (43521, 43525, 43563, 43564, 43565, 43566, 43569, 43570,
43571) group by devid, vd, ssid, bssid, manuf, channel, radioband, detectionmethod,
snclosest, onwire, logid, apstatus order by last_seen desc)### t where apstatus=1 and
onwire='no' group by devid, vd, ssid, bssid, manuf, channel, radioband, detectionmethod,
snclosest order by last_seen desc
```

Dataset Name	Description	Log Category
event-Wireless-Rogue-Onwire	Event wireless rogue on-wire	event

```
select
  & #039;rogue' as ap_full_status, devid, vd, ssid, bssid, manuf, channel, radioband, from_
dtime(max(last_seen)) as last_seen, detectionmethod, snclosest, 'yes' as on_wire from ###
```

```
(select devid, vd, ssid, bssid, manuf, channel, radioband, detectionmethod, snclosest,
onwire, apstatus, max(dtime) as last_seen from $log where $filter and bssid is not null and
logid_to_int(logid) in (43521, 43525, 43563, 43564, 43565, 43566, 43569, 43570, 43571) group
by devid, vd, ssid, bssid, manuf, channel, radioband, detectionmethod, snclosest, onwire,
apstatus order by last_seen desc)### t where apstatus=1 and onwire='yes' group by devid, vd,
ssid, bssid, manuf, channel, radioband, detectionmethod, snclosest order by last_seen desc
```

Dataset Name	Description	Log Category
event-Wireless-Suppressed-Offwire	Event wireless suppressed off-wire	event

```
select
  & #039;suppressed' as ap_full_status, devid, vd, ssid, bssid, manuf, channel, radioband,
from_dtime(max(last_seen)) as last_seen, detectionmethod, snclosest, 'no' as on_wire from
###(select devid, vd, ssid, bssid, manuf, channel, radioband, detectionmethod, snclosest,
onwire, logid, apstatus, max(dtime) as last_seen from $log where $filter and bssid is not
null and logid_to_int(logid) in (43521, 43525, 43563, 43564, 43565, 43566, 43569, 43570,
43571) group by devid, vd, ssid, bssid, manuf, channel, radioband, detectionmethod,
snclosest, onwire, logid, apstatus order by last_seen desc)### t where apstatus=3 and
onwire='no' group by devid, vd, ssid, bssid, manuf, channel, radioband, detectionmethod,
snclosest order by last_seen desc
```

Dataset Name	Description	Log Category
event-Wireless-Suppressed-Onwire	Event wireless suppressed on-wire	event

```
select
  & #039;suppressed' as ap_full_status, devid, vd, ssid, bssid, manuf, channel, radioband,
from_dtime(max(last_seen)) as last_seen, detectionmethod, snclosest, 'yes' as on_wire from
###(select devid, vd, ssid, bssid, manuf, channel, radioband, detectionmethod, snclosest,
onwire, apstatus, max(dtime) as last_seen from $log where $filter and bssid is not null and
logid_to_int(logid) in (43521, 43525, 43563, 43564, 43565, 43566, 43569, 43570, 43571) group
by devid, vd, ssid, bssid, manuf, channel, radioband, detectionmethod, snclosest, onwire,
apstatus order by last_seen desc)### t where apstatus=3 and onwire='yes' group by devid, vd,
ssid, bssid, manuf, channel, radioband, detectionmethod, snclosest order by last_seen desc
```

Dataset Name	Description	Log Category
event-Wireless-Unclassified-Offwire	Event wireless unclassified off-wire	event

```
select
  & #039;unclassified' as ap_full_status, devid, vd, ssid, bssid, manuf, channel, radioband,
from_dtime(max(last_seen)) as last_seen, detectionmethod, snclosest, 'no' as on_wire from
###(select devid, vd, ssid, bssid, manuf, channel, radioband, detectionmethod, snclosest,
onwire, logid, apstatus, max(dtime) as last_seen from $log where $filter and bssid is not
null and logid_to_int(logid) in (43521, 43525, 43563, 43564, 43565, 43566, 43569, 43570,
43571) group by devid, vd, ssid, bssid, manuf, channel, radioband, detectionmethod,
snclosest, onwire, logid, apstatus order by last_seen desc)### t where apstatus=0 and
onwire='no' group by devid, vd, ssid, bssid, manuf, channel, radioband, detectionmethod,
snclosest order by last_seen desc
```

Dataset Name	Description	Log Category
event-Wireless-Unclassified-Onwire	Event wireless unclassified on-wire	event

```
select
  & #039;unclassified' as ap_full_status, devid, vd, ssid, bssid, manuf, channel, radioband,
from_dtime(max(last_seen)) as last_seen, detectionmethod, snclosest, 'yes' as on_wire from
###(select devid, vd, ssid, bssid, manuf, channel, radioband, detectionmethod, snclosest,
onwire, apstatus, max(dtime) as last_seen from $log where $filter and bssid is not null and
logid_to_int(logid) in (43521, 43525, 43563, 43564, 43565, 43566, 43569, 43570, 43571) group
by devid, vd, ssid, bssid, manuf, channel, radioband, detectionmethod, snclosest, onwire,
apstatus order by last_seen desc)### t where apstatus=0 and onwire='yes' group by devid, vd,
ssid, bssid, manuf, channel, radioband, detectionmethod, snclosest order by last_seen desc
```

Dataset Name	Description	Log Category
default-Top-IPSEC-Vpn-Dial-Up-User-By-Bandwidth	Default top IPsec VPN dial up user by bandwidth usage	event

```
select
  coalesce(
    xauthuser_agg,
    user_agg,
    ipstr(`remip`)
  ) as user_src,
  from_dtime(
    min(s_time)
  ) as start_time,
  sum(bandwidth) as bandwidth,
  sum(traffic_in) as traffic_in,
  sum(traffic_out) as traffic_out
from
  (
    select
      devid,
      vd,
      string_agg(
        distinct xauthuser_agg,
        & #039; ') as xauthuser_agg, string_agg(distinct user_agg, ' ') as user_agg, remip,
tunnelid, min(s_time) as s_time, max(e_time) as e_time, (case when min(s_time)=max(e_time)
then max(max_traffic_in)+max(max_traffic_out) else max(max_traffic_in)-min(min_traffic_
in)+max(max_traffic_out)-min(min_traffic_out) end) as bandwidth, (case when min(s_time)=max
(e_time) then max(max_traffic_in) else max(max_traffic_in)-min(min_traffic_in) end) as
traffic_in, (case when min(s_time)=max(e_time) then max(max_traffic_out) else max(max_
traffic_out)-min(min_traffic_out) end) as traffic_out from ###(select devid, vd, remip,
nullifna(`xauthuser`) as xauthuser_agg, nullifna(`user`) as user_agg, tunnelid, min(coalesce
(dtime, 0)) as s_time, max(coalesce(dtime, 0)) as e_time, max(coalesce(duration,0)) as max_
duration, min(coalesce(duration,0)) as min_duration, min(coalesce(sentbyte, 0)) as min_
traffic_out, min(coalesce(rcvdbyte, 0)) as min_traffic_in, max(coalesce(sentbyte, 0)) as
max_traffic_out, max(coalesce(rcvdbyte, 0)) as max_traffic_in, max(coalesce(rcvdbyte,
0)+coalesce(sentbyte, 0)) as max_traffic from $log where $filter and subtype='vpn' and
tunneltype like 'ipsec%' and not (tunnelip is null or tunnelip='0.0.0.0') and  action in
('tunnel-stats', 'tunnel-down', 'tunnel-up') and tunnelid is not null and tunnelid!=0 group
by devid, vd, remip, xauthuser_agg, user_agg, tunnelid order by max_traffic desc)### t group
by devid, vd, remip, tunnelid) tt group by user_src having sum(bandwidth)>0 order by
bandwidth desc
```

Dataset Name	Description	Log Category
default-Top-Sources-Of-SSL-VPN-Tunnels-By-Bandwidth	Default top sources of SSL VPN tunnels by bandwidth usage	event

```
select
  remip as remote_ip,
  sum(bandwidth) as bandwidth
from
  (
    select
      devid,
      vd,
      remip,
      tunnelid,
      (
        case when min(s_time)= max(e_time) then max(max_traffic_in) else max(max_traffic_
in)- min(min_traffic_in) end
      ) as traffic_in,
      (
        case when min(s_time)= max(e_time) then max(max_traffic_out) else max(max_traffic_
out)- min(min_traffic_out) end
      ) as traffic_out,
      (
        case when min(s_time)= max(e_time) then max(max_traffic_in)+ max(max_traffic_out)
else max(max_traffic_in)- min(min_traffic_in)+ max(max_traffic_out)- min(min_traffic_out)
end
      ) as bandwidth
    from
      ###(select $flex_timestamp as timestamp, devid, vd, remip, tunnelid, (case when
tunneltype like 'ipsec%' then 'ipsec' else tunneltype end) as t_type, (case when
action='tunnel-up' then 1 else 0 end) as tunnelup, max(coalesce(sentbyte, 0)) as max_
traffic_out, max(coalesce(rcvdbyte, 0)) as max_traffic_in, min(coalesce(sentbyte, 0)) as
min_traffic_out, min(coalesce(rcvdbyte, 0)) as min_traffic_in, min(coalesce(dtime, 0)) as s_
time, max(coalesce(dtime, 0)) as e_time from $log where $filter and subtype='vpn' and
(tunneltype like 'ipsec%' or tunneltype like 'ssl%') and action in ('tunnel-up','tunnel-
stats', 'tunnel-down') and tunnelid is not null and tunnelid!=0 group by timestamp, devid,
vd, remip, t_type, tunnelid, action /*SkipSTART*/order by timestamp desc/*SkipEND*/)### t
where t_type like 'ssl%' group by devid, vd, remip, tunnelid) tt group by remote_ip having
sum(traffic_in+traffic_out)>0 order by bandwidth desc
```

Dataset Name	Description	Log Category
webfilter-Web-Activity-Summary-By-Requests	Webfilter web activity summary by requests	webfilter

```
select
  $flex_timescale(timestamp) as hodex,
  sum(allowed_request) as allowed_request,
  sum(blocked_request) as blocked_request
from
  ###(select $flex_timestamp as timestamp, sum(case when action!='blocked' then 1 else 0
end) as allowed_request, sum(case when action='blocked' then 1 else 0 end) as blocked_
request from $log where $filter and (eventtype is null or logver>=502000000) group by
timestamp /*SkipSTART*/order by timestamp desc/*SkipEND*/)### t group by hodex order by
hodex
```

Dataset Name	Description	Log Category
traffic-Browsing-Time-Summary	Traffic browsing time summary	traffic

```
select
  $flex_timescale(timestamp) as hodex,
  cast(
    ebtr_value(
      ebtr_agg_flat(browsetime),
      null,
      $timespan
    )/ 60.0 as decimal(18, 2)
  ) as browsetime
from
  ###(select $flex_timestamp as timestamp, ebtr_agg_flat($browse_time) as browsetime from
$log where $filter and (logflag&1>0) and $browse_time is not null group by timestamp
/*SkipSTART*/order by timestamp desc/*SkipEND*/)### t group by hodex order by hodex
```

Dataset Name	Description	Log Category
webfilter-Top-Web-Users-By-Blocked-Requests	Webfilter top web users by blocked requests	webfilter

```
select
  coalesce(
    f_user,
    euname,
    ipstr(`srcip`)
  ) as user_src,
  coalesce(
    epname,
    ipstr(`srcip`)
  ) as ep_src,
  sum(requests) as requests
from
  (
    select
      dvid,
      f_user,
      srcip,
      ep_id,
      eu_id,
      sum(requests) as requests
    from
      ###(select dvid, coalesce(nullifna(`user`), nullifna(`unauthuser`)) as f_user, srcip,
(case when epid<1024 then null else epid end) as ep_id, (case when euid<1024 then null else
euid end) as eu_id, action, count(*) as requests from $log where $filter and coalesce
(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) is not null group by dvid, f_
user, srcip, ep_id, eu_id, action /*SkipSTART*/order by requests desc/*SkipEND*/)### t where
action='blocked' group by dvid, f_user, srcip, ep_id, eu_id order by requests desc) t1 left
join (select epid, euid, srcmac as epmac, dvid from $ADOM_EPEU_DEVMAP dm inner join devtable
dt ON dm.devid=dt.devid and dm.vd=dt.vd) t2 on t1.ep_id=t2.epid and t1.eu_id=t2.euid and
t1.dvid=t2.dvid left join $ADOM_ENDPOINT t3 on t1.ep_id=t3.epid and t2.epmac=t3.mac left
join $ADOM_ENDUSER t4 on t1.eu_id=t4.euid group by user_src, ep_src order by requests desc
```

Dataset Name	Description	Log Category
webfilter-Top-Web-Users-By-Allowed-Requests	Webfilter top web users by allowed requests	webfilter

```
select
  coalesce(
    f_user,
    euname,
    ipstr(`srcip`)
  ) as user_src,
  coalesce(
    epname,
    ipstr(`srcip`)
  ) as ep_src,
  sum(requests) as requests
from
  (
    select
      dvid,
      f_user,
      srcip,
      ep_id,
      eu_id,
      sum(requests) as requests
    from
      ###(select dvid, coalesce(nullifna(`user`), nullifna(`unauthuser`)) as f_user, srcip,
(case when epid<1024 then null else epid end) as ep_id, (case when euid<1024 then null else
euid end) as eu_id, action, count(*) as requests from $log where $filter and coalesce
(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) is not null group by dvid, f_
user, srcip, ep_id, eu_id, action /*SkipSTART*/order by requests desc/*SkipEND*/)### t where
action!='blocked' group by dvid, f_user, srcip, ep_id, eu_id order by requests desc) t1 left
join (select epid, euid, srcmac as epmac, dvid from $ADOM_EPEU_DEVMAP dm inner join devtable
dt ON dm.devid=dt.devid and dm.vd=dt.vd) t2 on t1.ep_id=t2.epid and t1.eu_id=t2.euid and
t1.dvid=t2.dvid left join $ADOM_ENDPOINT t3 on t1.ep_id=t3.epid and t2.epmac=t3.mac left
join $ADOM_ENDUSER t4 on t1.eu_id=t4.euid group by user_src, ep_src order by requests desc
```

Dataset Name	Description	Log Category
traffic-Top-Web-Users-By-Browsing-Time	Traffic top web users by browsing time	traffic

```
select
  user_src,
  ebtr_value(
    ebtr_agg_flat(browsetime),
    null,
    $timespan
  ) as browsetime,
  sum(bandwidth) as bandwidth,
  sum(traffic_in) as traffic_in,
  sum(traffic_out) as traffic_out
from
  ###(select user_src, ebtr_agg_flat(browsetime) as browsetime, sum(bandwidth) as bandwidth,
sum(traffic_in) as traffic_in, sum(traffic_out) as traffic_out from (select coalesce
(nullifna(`user`), ipstr(`srcip`)) as user_src, ebtr_agg_flat($browse_time) as browsetime,
sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0)) as bandwidth, sum(coalesce(rcvdbyte, 0)) as
traffic_in, sum(coalesce(sentbyte, 0)) as traffic_out from $log where $filter and $browse_
time is not null group by user_src) t group by user_src /*SkipSTART*/order by ebtr_value
(ebtr_agg_flat(browsetime), null, null) desc/*SkipEND*/)### t group by user_src order by
browsetime desc
```

Dataset Name	Description	Log Category
webfilter-Top-Blocked-Web-Sites-By-Requests	Webfilter top blocked web sites by requests	webfilter

```
select
  domain,
  catdesc,
  sum(requests) as requests
from
  ###(select hostname as domain, catdesc, action, count(*) as requests from $log where
$filter and (eventtype is null or logver>=502000000) and hostname is not null and catdesc is
not null group by domain, catdesc, action /*SkipSTART*/order by requests desc/*SkipEND*/)###
t where action='blocked' group by domain, catdesc order by requests desc
```

Dataset Name	Description	Log Category
webfilter-Top-Allowed-Web-Sites-By-Requests	Webfilter top allowed web sites by requests	webfilter

```
select
  domain,
  string_agg(
    distinct catdesc,
    & #039;, ') as agg_catdesc, sum(requests) as requests from ###(select hostname as
domain, catdesc, action, count(*) as requests from $log where $filter and (eventtype is null
or logver>=502000000) and hostname is not null and catdesc is not null group by domain,
catdesc, action /*SkipSTART*/order by requests desc/*SkipEND*/)### t where action!='blocked'
group by domain order by requests desc
```

Dataset Name	Description	Log Category
webfilter-Top-Video-Streaming-Websites-By-Bandwidth	Webfilter top video streaming websites by bandwidth usage	webfilter

```
select
  domain,
  sum(bandwidth) as bandwidth,
  sum(traffic_in) as traffic_in,
  sum(traffic_out) as traffic_out
from
  ###(select coalesce(nullifna(root_domain(hostname)), 'other') as domain, sum(coalesce
(sentbyte, 0)+coalesce(rcvdbyte, 0)) as bandwidth, sum(coalesce(rcvdbyte, 0)) as traffic_in,
sum(coalesce(sentbyte, 0)) as traffic_out from $log-traffic where $filter and (logflag&1>0)
and (countweb>0 or ((logver is null or logver<502000000) and (hostname is not null or
utmevent in ('webfilter', 'banned-word', 'web-content', 'command-block', 'script-filter'))))
and catdesc in ('Streaming Media and Download') group by domain having sum(coalesce
(sentbyte, 0)+coalesce(rcvdbyte, 0))>0 /*SkipSTART*/order by bandwidth desc/*SkipEND*/)### t
group by domain order by bandwidth desc
```

Dataset Name	Description	Log Category
webfilter-Top-Blocked-Web-Categories	Webfilter top blocked web categories	webfilter

```
select
  catdesc,
  sum(requests) as requests
from
  ###(select catdesc, action, count(*) as requests from $log-webfilter where $filter and
(eventtype is null or logver>=502000000) and catdesc is not null group by catdesc, action
/*SkipSTART*/order by requests desc/*SkipEND*/)### t where action='blocked' group by catdesc
order by requests desc
```

Dataset Name	Description	Log Category
webfilter-Top-Allowed-Web-Categories	Webfilter top allowed web categories	webfilter

```
select
  catdesc,
  sum(requests) as requests
from
  ###(select catdesc, action, count(*) as requests from $log-webfilter where $filter and
(eventtype is null or logver>=502000000) and catdesc is not null group by catdesc, action
/*SkipSTART*/order by requests desc/*SkipEND*/)### t where action!='blocked' group by
catdesc order by requests desc
```

Dataset Name	Description	Log Category
traffic-Top-50-Sites-By-Browsing-Time	Traffic top sites by browsing time	traffic

```
select
  hostname,
  string_agg(
    distinct catdesc,
    & #039;, ') as agg_catdesc, ebtr_value(ebtr_agg_flat(browsetime), null, $timespan) as
browsetime, sum(bandwidth) as bandwidth, sum(traffic_in) as traffic_in, sum(traffic_out) as
traffic_out from ###(select hostname, catdesc, ebtr_agg_flat(browsetime) as browsetime, sum
(bandwidth) as bandwidth, sum(traffic_in) as traffic_in, sum(traffic_out) as traffic_out
from (select hostname, catdesc, ebtr_agg_flat($browse_time) as browsetime, sum(coalesce
(sentbyte, 0)+coalesce(rcvdbyte, 0)) as bandwidth, sum(coalesce(rcvdbyte, 0)) as traffic_in,
sum(coalesce(sentbyte, 0)) as traffic_out from $log where $filter and (logflag&1>0) and
hostname is not null and $browse_time is not null group by hostname, catdesc) t group by
hostname, catdesc /*SkipSTART*/order by ebtr_value(ebtr_agg_flat(browsetime), null, null)
desc/*SkipEND*/)### t group by hostname order by browsetime desc
```

Dataset Name	Description	Log Category
traffic-Top-10-Categories-By-Browsing-Time	Traffic top category by browsing time	traffic

```
select
  catdesc,
  ebtr_value(
    ebtr_agg_flat(browsetime),
    null,
    $timespan
  ) as browsetime,
  sum(bandwidth) as bandwidth
from
  ###(select catdesc, ebtr_agg_flat(browsetime) as browsetime, sum(bandwidth) as bandwidth
from (select catdesc, ebtr_agg_flat($browse_time) as browsetime, sum(coalesce(sentbyte,
0)+coalesce(rcvdbyte, 0)) as bandwidth from $log where $filter and (logflag&1>0) and catdesc
is not null and $browse_time is not null group by catdesc) t group by catdesc
/*SkipSTART*/order by ebtr_value(ebtr_agg_flat(browsetime), null, null) desc/*SkipEND*/)###
t group by catdesc order by browsetime desc
```

Dataset Name	Description	Log Category
traffic-Top-Destination-Countries-By-Browsing-Time	Traffic top destination countries by browsing time	traffic

```
select
  dstcountry,
  ebtr_value(
    ebtr_agg_flat(browsetime),
    null,
    $timespan
  ) as browsetime,
  sum(bandwidth) as bandwidth,
  sum(traffic_in) as traffic_in,
  sum(traffic_out) as traffic_out
from
  ###(select dstcountry, ebtr_agg_flat(browsetime) as browsetime, sum(bandwidth) as
bandwidth, sum(traffic_in) as traffic_in, sum(traffic_out) as traffic_out from (select
dstcountry, ebtr_agg_flat($browse_time) as browsetime, sum(coalesce(sentbyte, 0)+coalesce
(rcvdbyte, 0)) as bandwidth, sum(coalesce(rcvdbyte, 0)) as traffic_in, sum(coalesce
(sentbyte, 0)) as traffic_out from $log where $filter and (logflag&1>0) and $browse_time is
not null group by dstcountry) t group by dstcountry /*SkipSTART*/order by ebtr_value(ebtr_
agg_flat(browsetime), null, null) desc/*SkipEND*/)### t group by dstcountry order by
browsetime desc
```

Dataset Name	Description	Log Category
webfilter-Top-Search-Phrases	Webfilter top search phrases	webfilter

```
select
  keyword,
  count(*) as requests
from
  $log
where
  $filter
  and keyword is not null
group by
  keyword
order by
  requests desc
```

Dataset Name	Description	Log Category
Top-10-Users-Browsing-Time	Estimated browsing time	traffic

```
select
  coalesce(
    f_user,
    euname,
    ipstr(`srcip`)
  ) as user_src,
  coalesce(
    epname,
    ipstr(`srcip`)
  ) as ep_src,
  ebtr_value(
    ebtr_agg_flat(browsetime),
    null,
    $timespan
  ) as browsetime
from
  (
    select
      dvid,
      f_user,
      srcip,
      ep_id,
      eu_id,
      ebtr_agg_flat(browsetime) as browsetime
    from
      ###(select dvid, f_user, srcip, ep_id, eu_id, ebtr_agg_flat(browsetime) as browsetime
from (select dvid, coalesce(nullifna(`user`), nullifna(`unauthuser`)) as f_user, srcip,
(case when epid<1024 then null else epid end) as ep_id, (case when euid<1024 then null else
euid end) as eu_id, ebtr_agg_flat($browse_time) as browsetime from $log where $filter and
(logflag&1>0) and $browse_time is not null group by dvid, f_user, srcip, ep_id, eu_id) t
group by dvid, f_user, srcip, ep_id, eu_id order by ebtr_value(ebtr_agg_flat(browsetime),
null, null) desc)### t group by dvid, f_user, srcip, ep_id, eu_id order by ebtr_value(ebtr_
agg_flat(browsetime), null, null) desc) t1 left join (select epid, euid, srcmac as epmac,
dvid from $ADOM_EPEU_DEVMAP dm inner join devtable dt ON dm.devid=dt.devid and dm.vd=dt.vd)
t2 on t1.ep_id=t2.epid and t1.eu_id=t2.euid and t1.dvid=t2.dvid left join $ADOM_ENDPOINT t3
on t1.ep_id=t3.epid and t2.epmac=t3.mac left join $ADOM_ENDUSER t4 on t1.eu_id=t4.euid group
by user_src, ep_src order by browsetime desc
```

Dataset Name	Description	Log Category
Estimated-Browsing-Time	Estimated browsing time	traffic

```
select
  coalesce(
    f_user,
    euname,
    ipstr(`srcip`)
  ) as user_src,
  coalesce(
    epname,
    ipstr(`srcip`)
  ) as ep_src,
  ebtr_value(
    ebtr_agg_flat(browsetime),
    null,
    $timespan
  ) as browsetime
from
  (
    select
      dvid,
      f_user,
      srcip,
      ep_id,
      eu_id,
      ebtr_agg_flat(browsetime) as browsetime
    from
      ###(select dvid, f_user, srcip, ep_id, eu_id, ebtr_agg_flat(browsetime) as browsetime
from (select dvid, coalesce(nullifna(`user`), nullifna(`unauthuser`)) as f_user, srcip,
(case when epid<1024 then null else epid end) as ep_id, (case when euid<1024 then null else
euid end) as eu_id, ebtr_agg_flat($browse_time) as browsetime from $log where $filter and
(logflag&1>0) and $browse_time is not null group by dvid, f_user, srcip, ep_id, eu_id) t
group by dvid, f_user, srcip, ep_id, eu_id order by ebtr_value(ebtr_agg_flat(browsetime),
null, null) desc)### t group by dvid, f_user, srcip, ep_id, eu_id order by ebtr_value(ebtr_
agg_flat(browsetime), null, null) desc) t1 left join (select epid, euid, srcmac as epmac,
dvid from $ADOM_EPEU_DEVMAP dm inner join devtable dt ON dm.devid=dt.devid and dm.vd=dt.vd)
t2 on t1.ep_id=t2.epid and t1.eu_id=t2.euid and t1.dvid=t2.dvid left join $ADOM_ENDPOINT t3
on t1.ep_id=t3.epid and t2.epmac=t3.mac left join $ADOM_ENDUSER t4 on t1.eu_id=t4.euid group
by user_src, ep_src order by browsetime desc
```

Dataset Name	Description	Log Category
wifi-Top-AP-By-Bandwidth	Top access point by bandwidth usage	traffic

```
select
  ap_srcintf,
  sum(bandwidth) as bandwidth
from
  (
    select
      coalesce(ap, srcintf) as ap_srcintf,
      sum(bandwidth) as bandwidth
    from
      ###(select coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_
src, ap, srcintf, srcssid, srcssid as ssid, srcmac, srcmac as stamac, coalesce(nullifna
(`srcname`), `srcmac`) as hostname_mac, max(srcswversion) as srcswversion, max(osname) as
osname, max(osversion) as osversion, max(devtype) as devtype, sum(coalesce(sentbyte,
0)+coalesce(rcvdbyte, 0)) as bandwidth, count(*) as subtotal from $log-traffic where $filter
and (logflag&1>0) and (srcssid is not null or dstssid is not null) group by user_src, ap,
srcintf, srcssid, srcmac, hostname_mac /*SkipSTART*/order by bandwidth desc, subtotal
desc/*SkipEND*/)### t group by ap_srcintf having sum(bandwidth)>0 union all select ap as ap_
srcintf, sum(bandwidth) as bandwidth from ###(select $flex_timestamp as timestamp, stamac,
stamac as srcmac, ap, ssid, ssid as srcssid, user_src, sum(coalesce(sentdelta, 0)) as
sentdelta, sum(coalesce(rcvddelta, 0)) as rcvddelta, sum(coalesce(sentdelta, 0)+coalesce
(rcvddelta, 0)) as bandwidth from (select itime, stamac, ap, ssid, coalesce(`user`, ipstr
(`srcip`)) as user_src, sentbyte-lag(coalesce(sentbyte, 0)) over (partition by stamac order
by itime) as sentdelta, rcvdbyte-lag(coalesce(rcvdbyte, 0)) over (partition by stamac order
by itime) as rcvddelta from $log-event where $filter and subtype='wireless' and stamac is
not null and ssid is not null and action in ('sta-wl-bridge-traffic-stats', 'reassoc-req',
'assoc-req')) as t group by timestamp, stamac, ap, ssid, user_src /*SkipSTART*/order by
bandwidth desc/*SkipEND*/)### t group by ap having sum(bandwidth)>0) t group by ap_srcintf
order by bandwidth desc
```

Dataset Name	Description	Log Category
wifi-Top-AP-By-Client	Top access point by client	traffic

```
select
  ap_srcintf as srcintf,
  count(distinct srcmac) as totalnum
from
  (
    select
      coalesce(ap, srcintf) as ap_srcintf,
      srcmac
    from
      ###(select coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_
src, ap, srcintf, srcssid, srcssid as ssid, srcmac, srcmac as stamac, coalesce(nullifna
(`srcname`), `srcmac`) as hostname_mac, max(srcswversion) as srcswversion, max(osname) as
osname, max(osversion) as osversion, max(devtype) as devtype, sum(coalesce(sentbyte,
0)+coalesce(rcvdbyte, 0)) as bandwidth, count(*) as subtotal from $log-traffic where $filter
and (logflag&1>0) and (srcssid is not null or dstssid is not null) group by user_src, ap,
srcintf, srcssid, srcmac, hostname_mac /*SkipSTART*/order by bandwidth desc, subtotal
desc/*SkipEND*/)### t where srcmac is not null group by ap_srcintf, srcmac union all (select
ap as ap_srcintf, stamac as srcmac from ###(select $flex_timestamp as timestamp, stamac,
stamac as srcmac, ap, ssid, ssid as srcssid, user_src, sum(coalesce(sentdelta, 0)) as
sentdelta, sum(coalesce(rcvddelta, 0)) as rcvddelta, sum(coalesce(sentdelta, 0)+coalesce
(rcvddelta, 0)) as bandwidth from (select itime, stamac, ap, ssid, coalesce(`user`, ipstr
(`srcip`)) as user_src, sentbyte-lag(coalesce(sentbyte, 0)) over (partition by stamac order
by itime) as sentdelta, rcvdbyte-lag(coalesce(rcvdbyte, 0)) over (partition by stamac order
by itime) as rcvddelta from $log-event where $filter and subtype='wireless' and stamac is
not null and ssid is not null and action in ('sta-wl-bridge-traffic-stats', 'reassoc-req',
'assoc-req')) as t group by timestamp, stamac, ap, ssid, user_src /*SkipSTART*/order by
bandwidth desc/*SkipEND*/)### t where stamac is not null group by ap, stamac)) t group by
srcintf order by totalnum desc
```

Dataset Name	Description	Log Category
wifi-Top-SSID-By-Bandwidth	Top SSIDs by bandwidth usage	traffic

```
select
  srcssid,
  sum(bandwidth) as bandwidth
from
  (
    select
      srcssid,
      sum(bandwidth) as bandwidth
    from
      ###(select coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_
src, ap, srcintf, srcssid, srcssid as ssid, srcmac, srcmac as stamac, coalesce(nullifna
(`srcname`), `srcmac`) as hostname_mac, max(srcswversion) as srcswversion, max(osname) as
osname, max(osversion) as osversion, max(devtype) as devtype, sum(coalesce(sentbyte,
0)+coalesce(rcvdbyte, 0)) as bandwidth, count(*) as subtotal from $log-traffic where $filter
and (logflag&1>0) and (srcssid is not null or dstssid is not null) group by user_src, ap,
srcintf, srcssid, srcmac, hostname_mac /*SkipSTART*/order by bandwidth desc, subtotal
desc/*SkipEND*/)### t where srcssid is not null group by srcssid having sum(bandwidth)>0
union all select ssid as srcssid, sum(bandwidth) as bandwidth from ###(select $flex_
timestamp as timestamp, stamac, stamac as srcmac, ap, ssid, ssid as srcssid, user_src, sum
(coalesce(sentdelta, 0)) as sentdelta, sum(coalesce(rcvddelta, 0)) as rcvddelta, sum
(coalesce(sentdelta, 0)+coalesce(rcvddelta, 0)) as bandwidth from (select itime, stamac, ap,
ssid, coalesce(`user`, ipstr(`srcip`)) as user_src, sentbyte-lag(coalesce(sentbyte, 0)) over
(partition by stamac order by itime) as sentdelta, rcvdbyte-lag(coalesce(rcvdbyte, 0)) over
(partition by stamac order by itime) as rcvddelta from $log-event where $filter and
subtype='wireless' and stamac is not null and ssid is not null and action in ('sta-wl-
bridge-traffic-stats', 'reassoc-req', 'assoc-req')) as t group by timestamp, stamac, ap,
ssid, user_src /*SkipSTART*/order by bandwidth desc/*SkipEND*/)### t group by ssid having
sum(bandwidth)>0) t group by srcssid order by bandwidth desc
```

Dataset Name	Description	Log Category
wifi-Top-SSID-By-Client	Top SSIDs by client	traffic

```
select
  srcssid,
  count(distinct srcmac) as totalnum
from
  (
    select
      srcssid,
      srcmac
    from
      ###(select coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_
src, ap, srcintf, srcssid, srcssid as ssid, srcmac, srcmac as stamac, coalesce(nullifna
(`srcname`), `srcmac`) as hostname_mac, max(srcswversion) as srcswversion, max(osname) as
osname, max(osversion) as osversion, max(devtype) as devtype, sum(coalesce(sentbyte,
0)+coalesce(rcvdbyte, 0)) as bandwidth, count(*) as subtotal from $log-traffic where $filter
and (logflag&1>0) and (srcssid is not null or dstssid is not null) group by user_src, ap,
srcintf, srcssid, srcmac, hostname_mac /*SkipSTART*/order by bandwidth desc, subtotal
desc/*SkipEND*/)### t where srcmac is not null group by srcssid, srcmac union all select
ssid as srcssid, stamac as srcmac from ###(select $flex_timestamp as timestamp, stamac,
stamac as srcmac, ap, ssid, ssid as srcssid, user_src, sum(coalesce(sentdelta, 0)) as
sentdelta, sum(coalesce(rcvddelta, 0)) as rcvddelta, sum(coalesce(sentdelta, 0)+coalesce
(rcvddelta, 0)) as bandwidth from (select itime, stamac, ap, ssid, coalesce(`user`, ipstr
(`srcip`)) as user_src, sentbyte-lag(coalesce(sentbyte, 0)) over (partition by stamac order
by itime) as sentdelta, rcvdbyte-lag(coalesce(rcvdbyte, 0)) over (partition by stamac order
by itime) as rcvddelta from $log-event where $filter and subtype='wireless' and stamac is
not null and ssid is not null and action in ('sta-wl-bridge-traffic-stats', 'reassoc-req',
'assoc-req')) as t group by timestamp, stamac, ap, ssid, user_src /*SkipSTART*/order by
bandwidth desc/*SkipEND*/)### t where stamac is not null group by ssid, stamac) t where
srcssid is not null group by srcssid order by totalnum desc
```

Dataset Name	Description	Log Category
wifi-Top-App-By-Bandwidth	Top WiFi applications by bandwidth usage	traffic

```
select
  appid,
  app,
  sum(
    coalesce(sentbyte, 0)+ coalesce(rcvdbyte, 0)
  ) as bandwidth
from
  $log
where
```

```
  $filter
  and (
    logflag&1>0
  )
  and (
    srcssid is not null
    or dstssid is not null
  )
  and nullifna(app) is not null
group by
  appid,
  app
having
  sum(
    coalesce(sentbyte, 0)+ coalesce(rcvdbyte, 0)
  )> 0
order by
  bandwidth desc
```

Dataset Name	Description	Log Category
wifi-Top-Client-By-Bandwidth	Top WiFi client by bandwidth usage	traffic

```
select
  client,
  sum(bandwidth) as bandwidth
from
  (
    select
      (
        coalesce(
          hostname_mac,
          & #039;unknown') || ' (' || get_devtype(srcswversion, osname, devtype) || ', ' ||
coalesce(osname, '') || (case when srcswversion is null then '' else ' ' || srcswversion
end) || ')') as client, sum(bandwidth) as bandwidth from ###(select coalesce(nullifna
(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src, ap, srcintf, srcssid, srcssid
as ssid, srcmac, srcmac as stamac, coalesce(nullifna(`srcname`), `srcmac`) as hostname_mac,
max(srcswversion) as srcswversion, max(osname) as osname, max(osversion) as osversion, max
(devtype) as devtype, sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0)) as bandwidth, count
(*) as subtotal from $log-traffic where $filter and (logflag&1>0) and (srcssid is not null
or dstssid is not null) group by user_src, ap, srcintf, srcssid, srcmac, hostname_mac
/*SkipSTART*/order by bandwidth desc, subtotal desc/*SkipEND*/)### t group by client having
sum(bandwidth)>0 union all select (coalesce(stamac, 'unknown')) as client, sum(bandwidth) as
bandwidth from ###(select $flex_timestamp as timestamp, stamac, stamac as srcmac, ap, ssid,
ssid as srcssid, user_src, sum(coalesce(sentdelta, 0)) as sentdelta, sum(coalesce(rcvddelta,
0)) as rcvddelta, sum(coalesce(sentdelta, 0)+coalesce(rcvddelta, 0)) as bandwidth from
(select itime, stamac, ap, ssid, coalesce(`user`, ipstr(`srcip`)) as user_src, sentbyte-lag
(coalesce(sentbyte, 0)) over (partition by stamac order by itime) as sentdelta, rcvdbyte-lag
(coalesce(rcvdbyte, 0)) over (partition by stamac order by itime) as rcvddelta from $log-
event where $filter and subtype='wireless' and stamac is not null and ssid is not null and
action in ('sta-wl-bridge-traffic-stats', 'reassoc-req', 'assoc-req')) as t group by
timestamp, stamac, ap, ssid, user_src /*SkipSTART*/order by bandwidth desc/*SkipEND*/)### t
group by client having sum(bandwidth) > 0) t where client is not null group by client order
by bandwidth desc
```

Dataset Name	Description	Log Category
wifi-Top-OS-By-Bandwidth	Top WiFi os by bandwidth usage	traffic

```
select
  (
    coalesce(
      osname,
      & #039;unknown') || ' ' || coalesce(srcswversion, '')) as os, sum(bandwidth) as
bandwidth from ###(select coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`))
as user_src, ap, srcintf, srcssid, srcssid as ssid, srcmac, srcmac as stamac, coalesce
(nullifna(`srcname`), `srcmac`) as hostname_mac, max(srcswversion) as srcswversion, max
(osname) as osname, max(osversion) as osversion, max(devtype) as devtype, sum(coalesce
(sentbyte, 0)+coalesce(rcvdbyte, 0)) as bandwidth, count(*) as subtotal from $log-traffic
where $filter and (logflag&1>0) and (srcssid is not null or dstssid is not null) group by
user_src, ap, srcintf, srcssid, srcmac, hostname_mac /*SkipSTART*/order by bandwidth desc,
subtotal desc/*SkipEND*/)### t group by os having sum(bandwidth)>0 order by bandwidth desc
```

Dataset Name	Description	Log Category
wifi-Top-OS-By-WiFi-Client	Top WiFi os by WiFi client	traffic

```
select
  (
    coalesce(
      osname,
      & #039;unknown') || ' ' || coalesce(osversion, '')) as os, count(distinct srcmac) as
totalnum from ###(select coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`))
as user_src, ap, srcintf, srcssid, srcssid as ssid, srcmac, srcmac as stamac, coalesce
(nullifna(`srcname`), `srcmac`) as hostname_mac, max(srcswversion) as srcswversion, max
(osname) as osname, max(osversion) as osversion, max(devtype) as devtype, sum(coalesce
(sentbyte, 0)+coalesce(rcvdbyte, 0)) as bandwidth, count(*) as subtotal from $log-traffic
where $filter and (logflag&1>0) and (srcssid is not null or dstssid is not null) group by
user_src, ap, srcintf, srcssid, srcmac, hostname_mac /*SkipSTART*/order by bandwidth desc,
subtotal desc/*SkipEND*/)### t where srcmac is not null group by os order by totalnum desc
```

Dataset Name	Description	Log Category
wifi-Top-Device-By-Bandwidth	Top WiFi device by bandwidth usage	traffic

```
select
  get_devtype(srcswversion, osname, devtype) as devtype_new,
  sum(bandwidth) as bandwidth
from
  ###(select coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src,
ap, srcintf, srcssid, srcssid as ssid, srcmac, srcmac as stamac, coalesce(nullifna
(`srcname`), `srcmac`) as hostname_mac, max(srcswversion) as srcswversion, max(osname) as
osname, max(osversion) as osversion, max(devtype) as devtype, sum(coalesce(sentbyte,
0)+coalesce(rcvdbyte, 0)) as bandwidth, count(*) as subtotal from $log-traffic where $filter
and (logflag&1>0) and (srcssid is not null or dstssid is not null) group by user_src, ap,
srcintf, srcssid, srcmac, hostname_mac /*SkipSTART*/order by bandwidth desc, subtotal
desc/*SkipEND*/)### t where devtype is not null group by devtype_new having sum(bandwidth)>0
order by bandwidth desc
```

Dataset Name	Description	Log Category
wifi-Top-Device-By-Client	Top WiFi device by client	traffic

```
select
  devtype_new,
  count(distinct srcmac) as totalnum
from
  (
    select
      get_devtype(srcswversion, osname, devtype) as devtype_new,
      srcmac
    from
      ###(select coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_
src, ap, srcintf, srcssid, srcssid as ssid, srcmac, srcmac as stamac, coalesce(nullifna
(`srcname`), `srcmac`) as hostname_mac, max(srcswversion) as srcswversion, max(osname) as
osname, max(osversion) as osversion, max(devtype) as devtype, sum(coalesce(sentbyte,
0)+coalesce(rcvdbyte, 0)) as bandwidth, count(*) as subtotal from $log-traffic where $filter
and (logflag&1>0) and (srcssid is not null or dstssid is not null) group by user_src, ap,
srcintf, srcssid, srcmac, hostname_mac /*SkipSTART*/order by bandwidth desc, subtotal
desc/*SkipEND*/)### t where srcmac is not null) t where devtype_new is not null group by
devtype_new order by totalnum desc
```

Dataset Name	Description	Log Category
wifi-Overall-Traffic	WiFi overall traffic	traffic

```
select
  sum(bandwidth) as bandwidth
from
  (
    select
      sum(bandwidth) as bandwidth
    from
      ###(select coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_
src, ap, srcintf, srcssid, srcssid as ssid, srcmac, srcmac as stamac, coalesce(nullifna
(`srcname`), `srcmac`) as hostname_mac, max(srcswversion) as srcswversion, max(osname) as
osname, max(osversion) as osversion, max(devtype) as devtype, sum(coalesce(sentbyte,
0)+coalesce(rcvdbyte, 0)) as bandwidth, count(*) as subtotal from $log-traffic where $filter
and (logflag&1>0) and (srcssid is not null or dstssid is not null) group by user_src, ap,
srcintf, srcssid, srcmac, hostname_mac /*SkipSTART*/order by bandwidth desc, subtotal
desc/*SkipEND*/)### t group by srcssid union all select sum(bandwidth) as bandwidth from ###
(select $flex_timestamp as timestamp, stamac, stamac as srcmac, ap, ssid, ssid as srcssid,
user_src, sum(coalesce(sentdelta, 0)) as sentdelta, sum(coalesce(rcvddelta, 0)) as
rcvddelta, sum(coalesce(sentdelta, 0)+coalesce(rcvddelta, 0)) as bandwidth from (select
itime, stamac, ap, ssid, coalesce(`user`, ipstr(`srcip`)) as user_src, sentbyte-lag(coalesce
(sentbyte, 0)) over (partition by stamac order by itime) as sentdelta, rcvdbyte-lag(coalesce
(rcvdbyte, 0)) over (partition by stamac order by itime) as rcvddelta from $log-event where
$filter and subtype='wireless' and stamac is not null and ssid is not null and action in
('sta-wl-bridge-traffic-stats', 'reassoc-req', 'assoc-req')) as t group by timestamp,
stamac, ap, ssid, user_src /*SkipSTART*/order by bandwidth desc/*SkipEND*/)### t) t
```

Dataset Name	Description	Log Category
wifi-Num-Distinct-Client	WiFi num distinct client	traffic

```
select
  count(distinct srcmac) as totalnum
from
  (
    select
      srcmac
    from
      ###(select coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_
src, ap, srcintf, srcssid, srcssid as ssid, srcmac, srcmac as stamac, coalesce(nullifna
(`srcname`), `srcmac`) as hostname_mac, max(srcswversion) as srcswversion, max(osname) as
osname, max(osversion) as osversion, max(devtype) as devtype, sum(coalesce(sentbyte,
0)+coalesce(rcvdbyte, 0)) as bandwidth, count(*) as subtotal from $log-traffic where $filter
and (logflag&1>0) and (srcssid is not null or dstssid is not null) group by user_src, ap,
srcintf, srcssid, srcmac, hostname_mac /*SkipSTART*/order by bandwidth desc, subtotal
desc/*SkipEND*/)### t where srcmac is not null group by srcmac union all select stamac as
srcmac from ###(select $flex_timestamp as timestamp, stamac, stamac as srcmac, ap, ssid,
ssid as srcssid, user_src, sum(coalesce(sentdelta, 0)) as sentdelta, sum(coalesce(rcvddelta,
0)) as rcvddelta, sum(coalesce(sentdelta, 0)+coalesce(rcvddelta, 0)) as bandwidth from
(select itime, stamac, ap, ssid, coalesce(`user`, ipstr(`srcip`)) as user_src, sentbyte-lag
(coalesce(sentbyte, 0)) over (partition by stamac order by itime) as sentdelta, rcvdbyte-lag
(coalesce(rcvdbyte, 0)) over (partition by stamac order by itime) as rcvddelta from $log-
event where $filter and subtype='wireless' and stamac is not null and ssid is not null and
action in ('sta-wl-bridge-traffic-stats', 'reassoc-req', 'assoc-req')) as t group by
timestamp, stamac, ap, ssid, user_src /*SkipSTART*/order by bandwidth desc/*SkipEND*/)### t
where stamac is not null group by stamac) t
```

Dataset Name	Description	Log Category
Top30-Subnets-by-Bandwidth-and-Sessions	Top subnets by application bandwidth	traffic

```
select
  ip_subnet(`srcip`) as subnet,
  sum(
    coalesce(sentbyte, 0)+ coalesce(rcvdbyte, 0)
  ) as bandwidth,
  sum(
    coalesce(rcvdbyte, 0)
  ) as traffic_in,
  sum(
    coalesce(sentbyte, 0)
  ) as traffic_out,
  count(*) as sessions
from
  $log
where
  $filter
  and (
    logflag&1>0
  )
group by
  subnet
having
  sum(
    coalesce(sentbyte, 0)+ coalesce(rcvdbyte, 0)
  )> 0
```

```
order by
  bandwidth desc
```

Dataset Name	Description	Log Category
Top30-Subnets-by-Application-Bandwidth	Top applications by bandwidth	traffic

```
select
  ip_subnet(`srcip`) as subnet,
  app_group_name(app) as app_group,
  sum(
    coalesce(sentbyte, 0)+ coalesce(rcvdbyte, 0)
  ) as bandwidth
from
  $log
where
  $filter
  and (
    logflag&1>0
  )
  and nullifna(app) is not null
group by
  subnet,
  app_group
having
  sum(
    coalesce(sentbyte, 0)+ coalesce(rcvdbyte, 0)
  )> 0
order by
  bandwidth desc
```

Dataset Name	Description	Log Category
Top30-Subnets-by-Application-Sessions	Top applications by sessions	traffic

```
select
  ip_subnet(`srcip`) as subnet,
  app_group_name(app) as app_group,
  count(*) as sessions
from
  $log
where
  $filter
  and (
    logflag&1>0
  )
  and nullifna(app) is not null
group by
  subnet,
  app_group
order by
  sessions desc
```

Dataset Name	Description	Log Category
Top30-Subnets-by-Website-Bandwidth	Top websites and web category by bandwidth	traffic

```
select
  subnet,
  website,
  sum(bandwidth) as bandwidth
from
  ###(select ip_subnet(`srcip`) as subnet, hostname as website, sum(coalesce(sentbyte,
0)+coalesce(rcvdbyte, 0)) as bandwidth from $log-traffic where $filter and hostname is not
null and (logflag&1>0) and (countweb>0 or ((logver is null or logver<502000000) and
(hostname is not null or utmevent in ('webfilter', 'banned-word', 'web-content', 'command-
block', 'script-filter')))) group by subnet, website order by bandwidth desc)### t group by
subnet, website order by bandwidth desc
```

Dataset Name	Description	Log Category
Top30-Subnets-by-Website-Hits	Top websites and web category by sessions	webfilter

```
select
  subnet,
  website,
  sum(hits) as hits
from
  ###(select ip_subnet(`srcip`) as subnet, hostname as website, count(*) as hits from $log
where $filter and hostname is not null and (eventtype is null or logver>=502000000) group by
subnet, website order by hits desc)### t group by subnet, website order by hits desc
```

Dataset Name	Description	Log Category
Top30-Subnets-with-Top10-User-by-Bandwidth	Top users by bandwidth	traffic

```
select
  ip_subnet(`srcip`) as subnet,
  coalesce(
    nullifna(`user`),
    nullifna(`unauthuser`),
    ipstr(`srcip`)
  ) as user_src,
  sum(
    coalesce(sentbyte, 0)+ coalesce(rcvdbyte, 0)
  ) as bandwidth
from
  $log
where
  $filter
  and (
    logflag&1>0
  )
  and srcip is not null
group by
  subnet,
  user_src
having
```

```
  sum(
    coalesce(sentbyte, 0)+ coalesce(rcvdbyte, 0)
  )> 0
order by
  bandwidth desc
```

Dataset Name	Description	Log Category
Top30-Subnets-with-Top10-User-by-Sessions	Top users by sessions	traffic

```
select
  ip_subnet(`srcip`) as subnet,
  coalesce(
    nullifna(`user`),
    nullifna(`unauthuser`),
    ipstr(`srcip`)
  ) as user_src,
  count(*) as sessions
from
  $log
where
  $filter
  and (
    logflag&1>0
  )
group by
  subnet,
  user_src
order by
  sessions desc
```

Dataset Name	Description	Log Category
app-Top-20-Category-and-Applications-by-Bandwidth	Top category and applications by bandwidth usage	traffic

```
select
  appcat,
  app,
  sum(
    coalesce(sentbyte, 0)+ coalesce(rcvdbyte, 0)
  ) as bandwidth
from
  $log
where
  $filter
  and (
    logflag&1>0
  )
group by
  appcat,
  app
having
  sum(
    coalesce(sentbyte, 0)+ coalesce(rcvdbyte, 0)
  )> 0
order by
  bandwidth desc
```

Dataset Name	Description	Log Category
app-Top-20-Category-and-Applications-by-Session	Top category and applications by session	traffic

```
select
  appcat,
  app,
  count(*) as sessions
from
  $log
where
  $filter
  and (
    logflag&1>0
  )
group by
  appcat,
  app
order by
  sessions desc
```

Dataset Name	Description	Log Category
app-Top-500-Allowed-Applications-by-Bandwidth	Top allowed applications by bandwidth usage	traffic

```
select
  from_itime(itime) as timestamp,
  coalesce(
    nullifna(`user`),
    nullifna(`unauthuser`),
    ipstr(`srcip`)
  ) as user_src,
  appcat,
  app,
  coalesce(
    root_domain(hostname),
    ipstr(dstip)
  ) as destination,
  sum(
    coalesce(`sentbyte`, 0)+ coalesce(`rcvdbyte`, 0)
  ) as bandwidth
from
  $log
where
  $filter
  and (
    logflag&1>0
  )
  and action in (
    & #039;accept', 'close', 'timeout') group by timestamp, user_src, appcat, app,
destination order by bandwidth desc
```

Dataset Name	Description	Log Category
app-Top-500-Blocked-Applications-by-Session	Top blocked applications by session	traffic

```
select
  coalesce(
    nullifna(`user`),
    nullifna(`unauthuser`),
    ipstr(`srcip`)
  ) as user_src,
  appcat,
  app,
  count(*) as sessions
from
  $log
where
  $filter
  and (
    logflag&1>0
  )
  and action in (
    & #039;deny', 'blocked', 'reset', 'dropped') group by user_src, appcat, app order by
sessions desc
```

Dataset Name	Description	Log Category
web-Detailed-Website-Browsing-Log	Web detailed website browsing log	traffic

```
select
  from_dtime(dtime) as timestamp,
  catdesc,
  hostname as website,
  status,
  sum(bandwidth) as bandwidth
from
  ###(select dtime, catdesc, hostname, cast(utmaction as text) as status, sum(coalesce
(sentbyte, 0)+coalesce(rcvdbyte, 0)) as bandwidth from $log-traffic where $filter and
hostname is not null and (logflag&1>0) and (countweb>0 or ((logver is null or
logver<502000000) and (hostname is not null or utmevent in ('webfilter', 'banned-word',
'web-content', 'command-block', 'script-filter')))) group by dtime, catdesc, hostname,
utmaction order by dtime desc)### t group by dtime, catdesc, website, status order by dtime
desc
```

Dataset Name	Description	Log Category
web-Hourly-Category-and-Website-Hits-Action	Web hourly category and website hits action	webfilter

```
select
  hod,
  website,
  sum(hits) as hits
```

```
from
  ###(select $hour_of_day as hod, (hostname || ' (' || coalesce(`catdesc`, 'Unknown') ||
')') as website , count(*) as hits from $log where $filter and hostname is not null and
(eventtype is null or logver>=502000000) group by hod, website order by hod, hits desc)### t
group by hod, website order by hod, hits desc
```

Dataset Name	Description	Log Category
web-Top-20-Category-and-Websites-by-Bandwidth	Web top category and websites by bandwidth usage	traffic

```
select
  website,
  catdesc,
  sum(bandwidth) as bandwidth
from
  ###(select hostname as website, catdesc, sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0))
as bandwidth from $log-traffic where $filter and hostname is not null and (logflag&1>0) and
(countweb>0 or ((logver is null or logver<502000000) and (hostname is not null or utmevent
in ('webfilter', 'banned-word', 'web-content', 'command-block', 'script-filter')))) group by
website, catdesc order by bandwidth desc)### t group by website, catdesc order by bandwidth
desc
```

Dataset Name	Description	Log Category
web-Top-20-Category-and-Websites-by-Session	Web top category and websites by session	webfilter

```
select
  website,
  catdesc,
  sum(sessions) as hits
from
  ###(select hostname as website, catdesc, count(*) as sessions from $log where $filter and
hostname is not null and (eventtype is null or logver>=502000000) group by hostname, catdesc
order by sessions desc)### t group by website, catdesc order by hits desc
```

Dataset Name	Description	Log Category
web-Top-500-Website-Sessions-by-Bandwidth	Web top website sessions by bandwidth usage	traffic

```
select
  from_dtime(dtime) as timestamp,
  user_src,
  website,
  catdesc,
  cast(
    sum(dura)/ 60 as decimal(18, 2)
  ) as dura,
  sum(bandwidth) as bandwidth
from
  ###(select dtime, coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as
user_src, hostname as website, catdesc, sum(coalesce(duration, 0)) as dura, sum(coalesce
(sentbyte, 0)+coalesce(rcvdbyte, 0)) as bandwidth from $log where $filter and hostname is
not null and (logflag&1>0) and action in ('accept','close','timeout') group by dtime, user_
src, website, catdesc having sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0))>0 order by
bandwidth desc)### t group by dtime, user_src, website, catdesc order by bandwidth desc
```

Dataset Name	Description	Log Category
web-Top-500-User-Visted-Websites-by-Bandwidth	Web top user visted websites by bandwidth usage	traffic

```
select
  website,
  catdesc,
  sum(bandwidth) as bandwidth
from
  ###(select hostname as website, catdesc, sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0))
as bandwidth from $log-traffic where $filter and hostname is not null and (logflag&1>0) and
(countweb>0 or ((logver is null or logver<502000000) and (hostname is not null or utmevent
in ('webfilter', 'banned-word', 'web-content', 'command-block', 'script-filter')))) group by
hostname, catdesc having sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0))>0 order by
bandwidth desc)### t group by website, catdesc order by bandwidth desc
```

Dataset Name	Description	Log Category
web-Top-500-User-Visted-Websites-by-Session	Web top user visted websites by session	webfilter

```
select
  website,
  catdesc,
  sum(sessions) as sessions
from
  ###(select hostname as website, catdesc, count(*) as sessions from $log where $filter and
hostname is not null and (eventtype is null or logver>=502000000) group by hostname, catdesc
order by sessions desc)### t group by website, catdesc order by sessions desc
```

Dataset Name	Description	Log Category
fct-Installed-Feature-Summary	Installed Feature Summary	fct-event

```
select
  subtype,
  count(distinct fctuid) as totalnum
from
  ###(select uid as fctuid, regexp_replace(os, '\\(build.*', '') as os_short, fctver,
subtype, fgtserial, max(case when msg like 'Compliance rules%applied' then 1 else 0 end) as
compliance_flag from $log where $filter and subtype != 'admin' group by uid, os_short,
fctver, subtype, fgtserial order by compliance_flag desc)### t where subtype is not null
group by subtype order by totalnum desc
```

Dataset Name	Description	Log Category
fct-Device-by-Operating-System	Device by OS	fct-event

```
select
  os_short as os,
  count(distinct fctuid) as totalnum
from
```

```
  ###(select uid as fctuid, regexp_replace(os, '\\(build.*', '') as os_short, fctver,
subtype, fgtserial, max(case when msg like 'Compliance rules%applied' then 1 else 0 end) as
compliance_flag from $log where $filter and subtype != 'admin' group by uid, os_short,
fctver, subtype, fgtserial order by compliance_flag desc)### t where os_short is not null
group by os order by totalnum desc
```

Dataset Name	Description	Log Category
fct-Installed-FortiClient-Version	FortiClient Version	fct-event

```
select
  fctver as fctver_short,
  count(distinct fctuid) as totalnum
from
  ###(select uid as fctuid, regexp_replace(os, '\\(build.*', '') as os_short, fctver,
subtype, fgtserial, max(case when msg like 'Compliance rules%applied' then 1 else 0 end) as
compliance_flag from $log where $filter and subtype != 'admin' group by uid, os_short,
fctver, subtype, fgtserial order by compliance_flag desc)### t where fctver is not null
group by fctver order by totalnum desc
```

Dataset Name	Description	Log Category
fct-Endpoint-Profile-Deployment	Endpoint Profile Deployment	fct-event

```
select
  profile,
  count(distinct fctuid) as totalnum
from
  ###(select uid as fctuid, coalesce(nullifna(usingpolicy), 'No Profile') as profile from
$log where $filter group by uid, profile)### t group by profile order by totalnum desc
```

Dataset Name	Description	Log Category
fct-Client-Summary	Client Summary	fct-event

```
select
  hostname,
  deviceip,
  os_short as os,
  profile,
  fctver,
  from_itime(
    max(itime)
  ) as last_seen
from
  ###(select hostname, deviceip, regexp_replace(os, '\\(build.*', '') as os_short, nullifna
(usingpolicy) as profile, fctver, max(itime) as itime from $log where $filter and os is not
null group by hostname, deviceip, os_short, profile, fctver order by itime desc)### t group
by hostname, deviceip, os, profile, fctver order by last_seen desc
```

Dataset Name	Description	Log Category
fct-Total-Threats-Found	Total Threats Found	fct-traffic

```
select
  utmevent_s as utmevent,
  count(distinct threat) as totalnum
from
  ###(select coalesce(nullifna(lower(utmevent)), 'unknown') as utmevent_s, threat from $log
where $filter and threat is not null and utmaction='blocked' group by utmevent_s, threat)###
t group by utmevent order by totalnum desc
```

Dataset Name	Description	Log Category
fct-Top10-AV-Threats-Detected	Top AV Threats Detected	fct-traffic

```
select
  threat,
  sum(totalnum) as totalnum
from
  (
    (
      select
        threat,
        sum(totalnum) as totalnum
      from
        ###(select threat, count(*) as totalnum from $log-fct-traffic where $filter and
threat is not null and lower(utmevent)='antivirus' group by threat order by totalnum
desc)### t group by threat) union all (select threat, sum(totalnum) as totalnum from ###
(select virus as threat, count(*) as totalnum from $log-fct-event where $filter and virus is
not null group by threat order by totalnum desc)### t group by threat)) t group by threat
order by totalnum desc
```

Dataset Name	Description	Log Category
fct-Top10-Infected-Devices-with-Botnet	Top Infected Devices with Botnet	fct-traffic

```
select
  hostname,
  count(*) as totalnum
from
  $log
where
  $filter
  and hostname is not null
  and lower(utmevent) in (
    & #039;webfilter', 'appfirewall') and lower(threat) like '%botnet%' group by hostname
order by totalnum desc
```

Dataset Name	Description	Log Category
fct-Top10-Infected-Devices-with-Virus-Malware	Top Infected Devices with Virus Malware	fct-traffic

```
select
  hostname,
  sum(totalnum) as totalnum
from
  (
    (
      select
```

```
        hostname,
        sum(totalnum) as totalnum
      from
        ###(select hostname, count(*) as totalnum from $log-fct-traffic where $filter and
hostname is not null and lower(utmevent) in ('antivirus', 'antimalware') group by hostname
order by totalnum desc)### t group by hostname) union all (select hostname, sum(totalnum) as
totalnum from ###(select hostname, count(*) as totalnum from $log-fct-event where $filter
and hostname is not null and virus is not null group by hostname order by totalnum desc)###
t group by hostname)) t group by hostname order by totalnum desc
```

Dataset Name	Description	Log Category
fct-All-Antivirus-Antimalware-Detections	All Antivirus and Antimalware Detections	fct-traffic

```
select
  threat,
  hostname,
  hostuser,
  utmaction,
  from_dtime(
    max(dtime)
  ) as last_seen
from
  (
    (
      select
        threat,
        hostname,
        hostuser,
        utmaction,
        max(dtime) as dtime
      from
        ###(select threat, hostname, coalesce(nullifna(`user`), 'Unknown') as hostuser,
utmaction, max(dtime) as dtime from $log-fct-traffic where $filter and lower(utmevent) in
('antivirus', 'antimalware') group by threat, hostname, hostuser, utmaction order by
threat)### t group by threat, hostname, hostuser, utmaction) union all (select threat,
hostname, hostuser, utmaction, max(dtime) as dtime from ###(select virus as threat,
hostname, coalesce(nullifna(`user`), 'Unknown') as hostuser, action as utmaction, max(dtime)
as dtime from $log-fct-event where $filter and (logflag is null or logflag&8=0) and virus is
not null group by threat, hostname, hostuser, utmaction order by threat)### t group by
threat, hostname, hostuser, utmaction)) t group by threat, hostname, hostuser, utmaction
order by threat
```

Dataset Name	Description	Log Category
fct-Web-Filter-Violations	Web Filter Violations	fct-traffic

```
select
  hostuser,
  hostname,
  string_agg(
    distinct remotename,
    & #039;,') as remotename, utmaction, sum(total) as totalnum, from_dtime(max(dtime)) as
last_seen from ###(select remotename, hostname, coalesce(nullifna(`user`), 'Unknown') as
hostuser, utmaction, count(*) as total, max(dtime) as dtime from $log where $filter and
lower(utmevent)='webfilter' and utmaction='blocked' group by remotename, hostname, hostuser,
utmaction order by total desc)### t group by hostuser, hostname, utmaction order by totalnum
desc
```

Dataset Name	Description	Log Category
fct-Application-Firewall	Application Firewall	fct-traffic

```
select
  threat,
  hostname,
  hostuser,
  utmaction,
  from_dtime(
    max(dtime)
  ) as last_seen
from
  ###(select threat, hostname, coalesce(nullifna(`user`), 'Unknown') as hostuser, utmaction,
max(dtime) as dtime from $log where $filter and lower(utmevent)='appfirewall' and
utmaction='blocked' group by threat, hostname, hostuser, utmaction order by dtime desc)###
t1 left join app_mdata t2 on t1.threat=t2.name group by threat, risk, hostname, hostuser,
utmaction order by risk desc
```

Dataset Name	Description	Log Category
fct-Errors-and-Alerts	Errors and Alerts	fct-event

```
select
  msg,
  hostname,
  hostuser,
  from_dtime(
    max(dtime)
  ) as last_seen
from
  ###(select msg, hostname, coalesce(nullifna(`user`), 'Unknown') as hostuser, max(dtime) as
dtime from $log where $filter and level in ('error', 'alert') group by msg, hostname,
hostuser order by dtime desc)### t group by msg, hostname, hostuser order by last_seen desc
```

Dataset Name	Description	Log Category
fct-Threats-by-Top-Devices	Threats by Top Devices	fct-traffic

```
select
  hostname,
  count(*) as totalnum
from
  $log
where
  $filter
  and hostname is not null
  and utmevent is not null
  and utmaction =& #039;blocked' group by hostname order by totalnum desc
```

Dataset Name	Description	Log Category
fct-vuln-Device-Vulnerabilities	Vulnerabilities Detected by User/Device	fct-netscan

```
select
  vulnseverity,
  (
    CASE vulnseverity WHEN & #039;Critical' THEN 5 WHEN 'High' THEN 4 WHEN 'Medium' THEN 3
WHEN 'Info' THEN 2 WHEN 'Low' THEN 1 ELSE 0 END) as severity_number, count(distinct
vulnname) as vuln_num from ###(select vulnseverity, devid, vulnname from $log where $filter
and nullifna(vulnseverity) is not null and nullifna(vulnname) is not null group by
vulnseverity, vulnname, devid)### t group by vulnseverity order by severity_number desc
```

Dataset Name	Description	Log Category
fct-vuln-Category-Type-Vulnerabilities	Vulnerabilities Detected by Category Type	fct-netscan

```
select
  vulncat,
  count(distinct vulnname) as totalnum
from
  ###(select vulncat, vulnname from $log where $filter and nullifna(vulncat) is not null and
nullifna(vulnname) is not null group by vulncat, vulnname)### t group by vulncat order by
totalnum desc
```

Dataset Name	Description	Log Category
fct-vuln-Vulnerabilities-by-OS	Forticlient Vulnerabilities by OS	fct-netscan

```
select
  os,
  count(distinct vulnname) as totalnum
from
  ###(select os, vulnname from $log where $filter and nullifna(os) is not null and nullifna
(vulnname) is not null group by os, vulnname)### t group by os order by totalnum desc
```

Dataset Name	Description	Log Category
fct-vuln-Vulnerabilities-by-Risk-Level	Number Vulnerability by Device and Risk Level	fct-netscan

```
select
  vulnseverity,
  (
    case when vulnseverity =& #039;Critical' then 5 when vulnseverity='High' then 4 when
vulnseverity='Medium' then 3 when vulnseverity='Low' then 2 when vulnseverity='Info' then 1
else 0 end) as severity_number, count(distinct vulnname) as vuln_num, count(distinct devid)
as dev_num from ###(select vulnseverity, devid, vulnname from $log where $filter and
nullifna(vulnseverity) is not null and nullifna(vulnname) is not null group by vulnseverity,
vulnname, devid)### t where nullifna(devid) is not null group by vulnseverity order by dev_
num desc, severity_number desc
```

Dataset Name	Description	Log Category
fct-vuln-Device-by-Risk-Level	Number Vulnerability by Device and Risk Level	fct-netscan

```
select
  vulnseverity,
  (
    case when vulnseverity =& #039;Critical' then 5 when vulnseverity='High' then 4 when
vulnseverity='Medium' then 3 when vulnseverity='Low' then 2 when vulnseverity='Info' then 1
else 0 end) as severity_number, count(distinct vulnname) as vuln_num, count(distinct devid)
as dev_num from ###(select vulnseverity, devid, vulnname from $log where $filter and
nullifna(vulnseverity) is not null and nullifna(vulnname) is not null group by vulnseverity,
vulnname, devid)### t where nullifna(devid) is not null group by vulnseverity order by dev_
num desc, severity_number desc
```

Dataset Name	Description	Log Category
fct-vuln-Vulnerability-Trend	Vulnerability Trend	fct-netscan

```
select
  $flex_timescale(timestamp) as hodex,
  count(distinct vulnname) as total_num
from
  ###(select $flex_timestamp as timestamp, vulnname from $log where $filter and nullifna
(vulnname) is not null group by timestamp, vulnname order by timestamp desc)### t group by
hodex order by hodex
```

Dataset Name	Description	Log Category
fct-vuln-Details-by-Risk-Level-Device	Vulnerability Details for Each Risk Level by Device	fct-netscan

```
select
  hostname,
  os,
  vulnseverity,
  count(distinct vulnname) as vuln_num,
  count(distinct products) as products,
  count(distinct cve_id) as cve_count
from
  ###(select hostname, os, vulnname, vulnseverity, vulnid from $log where $filter and
vulnname is not null and vulnseverity is not null and hostname is not null group by
hostname, os, vulnname, vulnseverity, vulnid)### t1 left join fct_mdata t2 on
t1.vulnid=t2.vid::int group by hostname, os, vulnseverity order by vuln_num desc, hostname
```

Dataset Name	Description	Log Category
fct-vuln-Details-by-Device-User	Vulnerability Details by Device User	fct-netscan

```
select
  hostname,
  (
    & #039;<div>' || vulnname || '</div>') as vulnname, vulnseverity, vulncat, string_agg
(distinct products, ',') as products, string_agg(distinct cve_id, ',') as cve_list, ('<a
href=' || String_agg(DISTINCT vendor_link, ',') || '>Remediation Info</a>') as vendor_link
from ###(select hostname, vulnname, vulnseverity, vulncat, vulnid from $log where $filter
and vulnname is not null and hostname is not null group by hostname, vulnname, vulnseverity,
vulncat, vulnid)### t1 inner join fct_mdata t2 on t1.vulnid=t2.vid::int group by hostname,
vulnname, vulnseverity, vulncat order by hostname
```

Dataset Name	Description	Log Category
fct-vuln-Remediation-by-Device	Remediate The Vulnerability Found on Device	fct-netscan

```
select
  hostname,
  (
    & #039;<div>' || vulnname || '</div>') as vulnname, vulnseverity, string_agg(distinct
vendor_link, ',') as vendor_link from ###(select hostname, vulnname, vulnseverity, vulnid
from $log where $filter and vulnname is not null and hostname is not null group by hostname,
vulnname, vulnseverity, vulnid)### t1 inner join fct_mdata t2 on t1.vulnid=t2.vid::int group
by hostname, vulnname, vulnseverity order by vulnseverity, hostname
```

Dataset Name	Description	Log Category
fct-vuln-Remediation-by-Vulnerability	Remediation by Vulnerability	fct-netscan

```
select
  (
    & #039;<b>' || vulnname || '</b><br/><br/>' || 'Description<br/><div style=word-
break:normal>' || description || '</div><br/><br/>' || 'Affected Products<br/>' || products
|| '<br/><br/>' || 'Impact<br/>' || impact || '<br/><br/>' || 'Recommended Actions<br/>' ||
vendor_link || '<br/><br/><br/>') as remediation from ###(select devid, vulnname,
vulnseverity, (case vulnseverity when 'low' then 1 when 'info' then 2 when 'medium' then 3
when 'high' then 4 when 'critical' then 5 else 0 end) as severity_level, vulnid from $log
where $filter and vulnname is not null group by devid, vulnname, vulnseverity, severity_
level, vulnid order by severity_level)### t1 inner join fct_mdata t2 on
t1.vulnid=t2.vid::int group by remediation order by remediation
```

Dataset Name	Description	Log Category
fct-vuln-Top-30-Targeted-High-Risk-Vulnerabilities	Top 30 Targeted High Risk Vulnerabilities	fct-netscan

```
select
  t3.cve_id,
  score,
  string_agg(
    distinct products,
    & #039;,') as products, ('<a href=' || String_agg(vendor_link, ',') || '>Mitigation
Infomation</a>') as vendor_link from ###(select vulnid from $log where $filter group by
vulnid)### t1 inner join fct_mdata t2 on t2.vid=t1.vulnid::text inner join fct_cve_score t3
on strpos(t2.cve_id, t3.cve_id) > 0 group by t3.cve_id, score order by score desc, t3.cve_id
```

Dataset Name	Description	Log Category
fct-Endpoints-by-FortiGate	Endpoints by FortiGate	fct-event

```
select
  fgtserial,
  count(distinct fctuid) as totalnum
from
  ###(select uid as fctuid, regexp_replace(os, '\\(build.*', '') as os_short, fctver,
subtype, fgtserial, max(case when msg like 'Compliance rules%applied' then 1 else 0 end) as
compliance_flag from $log where $filter and subtype != 'admin' group by uid, os_short,
fctver, subtype, fgtserial order by compliance_flag desc)### t where fgtserial is not null
group by fgtserial order by totalnum desc
```

Dataset Name	Description	Log Category
fct-Top-Malware-Detections	Top Infected Devices with Malware	fct-traffic

```
select
  hostname,
  fctuid,
  sum(totalnum) as totalnum
from
  (
    (
      select
        hostname,
        fctuid,
        sum(totalnum) as totalnum
      from
        ###(select threat, hostname, coalesce(nullifna(`user`), 'Unknown') as hostuser,
utmaction, max(dtime) as dtime, uid as fctuid, count(*) as totalnum from $log-fct-traffic
where $filter and lower(utmevent) in ('antivirus', 'antimalware') group by threat, hostname,
hostuser, utmaction, uid order by threat)### t group by hostname, fctuid) union all (select
hostname, fctuid, sum(totalnum) as totalnum from ###(select virus as threat, hostname,
coalesce(nullifna(`user`), 'Unknown') as hostuser, action as utmaction, max(dtime) as dtime,
uid as fctuid, count(*) as totalnum from $log-fct-event where $filter and (logflag is null
or logflag&8=0) and virus is not null group by threat, hostname, hostuser, utmaction, uid
order by threat)### t group by hostname, fctuid)) t group by hostname, fctuid order by
totalnum desc
```

Dataset Name	Description	Log Category
fct-Top10-Malware-Detections	Top 10 Infected Devices with Malware	fct-traffic

```
select
  threat,
  hostname,
  hostuser,
  utmaction,
  fctuid,
  sum(totalnum) as totalnum
from
  (
    (
      select
        threat,
        hostname,
        hostuser,
        utmaction,
        fctuid,
        sum(totalnum) as totalnum
      from
        ###(select threat, hostname, coalesce(nullifna(`user`), 'Unknown') as hostuser,
utmaction, max(dtime) as dtime, uid as fctuid, count(*) as totalnum from $log-fct-traffic
where $filter and lower(utmevent) in ('antivirus', 'antimalware') group by threat, hostname,
hostuser, utmaction, uid order by threat)### t group by threat, hostname, hostuser,
utmaction, fctuid) union all (select threat, hostname, hostuser, utmaction, fctuid, sum
(totalnum) as totalnum from ###(select virus as threat, hostname, coalesce(nullifna(`user`),
'Unknown') as hostuser, action as utmaction, max(dtime) as dtime, uid as fctuid, count(*) as
totalnum from $log-fct-event where $filter and (logflag is null or logflag&8=0) and virus is
not null group by threat, hostname, hostuser, utmaction, uid order by threat)### t group by
threat, hostname, hostuser, utmaction, fctuid)) t where utmaction != 'pass' group by threat,
hostname, hostuser, utmaction, fctuid order by totalnum desc
```

Dataset Name	Description	Log Category
fct-Devices-with-Botnet	Infected Devices with Botnet	fct-traffic

```
select
  threat,
  hostname,
  coalesce(
    nullifna(`user`),
    & #039;Unknown') as hostuser, utmaction, uid as fctuid, count(*) as totalnum from $log
where $filter and hostname is not null and lower(utmevent) in ('webfilter', 'appfirewall')
and lower(threat) like '%botnet%' group by threat, hostname, hostuser, utmaction, fctuid
order by totalnum desc
```

Dataset Name	Description	Log Category
fct-vuln-Vulnerability-by-Hostname	Vulnerability Details for Each Risk Level by Device	fct-netscan

```
select
  hostname,
  os,
  vulnseverity,
  count(distinct vulnname) as vuln_num,
  count(distinct products) as products,
  count(distinct cve_id) as cve_count
from
  ###(select hostname, os, vulnname, vulnseverity, vulnid from $log where $filter and
vulnname is not null and vulnseverity is not null and hostname is not null group by
hostname, os, vulnname, vulnseverity, vulnid)### t1 left join fct_mdata t2 on
t1.vulnid=t2.vid::int group by hostname, os, vulnseverity order by vuln_num desc, hostname
```

Dataset Name	Description	Log Category
fct-Users-With-Web-Violations	Web Filter Violations	fct-traffic

```
select
  hostuser,
  hostname,
  string_agg(
    distinct remotename,
    & #039;,') as remotename, utmaction, sum(total) as totalnum, from_dtime(max(dtime)) as
last_seen from ###(select remotename, hostname, coalesce(nullifna(`user`), 'Unknown') as
hostuser, utmaction, count(*) as total, max(dtime) as dtime from $log where $filter and
lower(utmevent)='webfilter' and utmaction='blocked' group by remotename, hostname, hostuser,
utmaction order by total desc)### t group by hostuser, hostname, utmaction order by totalnum
desc
```

Dataset Name	Description	Log Category
fct-Compliance-by-FortiGate	FortiClinet Compliance by FortiGate Enforcing	fct-event

```
select
  fgtserial,
  count(distinct fctuid) as totalnum
from
  (
    select
      fgtserial,
      fctuid,
      max(compliance_flag) as compliance_flag
    from
      ###(select uid as fctuid, regexp_replace(os, '\\(build.*', '') as os_short, fctver,
subtype, fgtserial, max(case when msg like 'Compliance rules%applied' then 1 else 0 end) as
compliance_flag from $log where $filter and subtype != 'admin' group by uid, os_short,
fctver, subtype, fgtserial order by compliance_flag desc)### tt group by fgtserial, fctuid)
t where compliance_flag = 1 group by fgtserial order by totalnum desc
```

Dataset Name	Description	Log Category
fct-Compliance-Status	Number of FortiClinets by Compliance Status	fct-event

```
select
  (
    case compliance_flag when 1 then & #039;Compliant' else 'Non-Compliant' end) as
compliance, count(distinct fctuid) as totalnum from (select fctuid, max(compliance_flag) as
compliance_flag from ###(select uid as fctuid, regexp_replace(os, '\\(build.*', '') as os_
short, fctver, subtype, fgtserial, max(case when msg like 'Compliance rules%applied' then 1
else 0 end) as compliance_flag from $log where $filter and subtype != 'admin' group by uid,
os_short, fctver, subtype, fgtserial order by compliance_flag desc)### tt group by fctuid) t
group by compliance order by totalnum desc
```

Dataset Name	Description	Log Category
fct-Non-Compliant-Endpoints	Non-compliant Endpoints	fct-event

```
select
  t1.fgtserial,
  t3.srcintf,
  t2.epname as hostname,
  t2.mac,
  & #039;Non-Compliant' as status from (select fgtserial, fctuid, max(compliance_flag) as
compliance_flag from ###(select uid as fctuid, regexp_replace(os, '\\(build.*', '') as os_
short, fctver, subtype, fgtserial, max(case when msg like 'Compliance rules%applied' then 1
else 0 end) as compliance_flag from $log where $filter and subtype != 'admin' group by uid,
os_short, fctver, subtype, fgtserial order by compliance_flag desc)### tt group by
fgtserial, fctuid) t1 left join $ADOM_ENDPOINT t2 on t1.fctuid = t2.fctuid left join $ADOM_
EPEU_DEVMAP t3 on t2.epid = t3.epid where compliance_flag = 0 group by t1.fctuid,
t1.fgtserial, t3.srcintf, t2.epname, t2.mac
```

Dataset Name	Description	Log Category
fct-Traffic-Web-Hits	Web Traffic Trend	fct-traffic

```
select
  $flex_timescale(timestamp) as hodex,
  sum(requests) as requests
from
  ###(select $flex_timestamp as timestamp, count(*) as requests from $log where $filter and
lower(utmevent)='webfilter' group by timestamp order by timestamp desc)### t group by hodex
order by hodex
```

Dataset Name	Description	Log Category
fct-Traffic-Top-Allowed-Web-Cat	Top Visited Web Categories	fct-traffic

```
select
  category,
  sum(requests) as requests
from
  ###(select fct_webcat(threat) as category, remotename as website, direction, utmaction,
count(*) as requests from $log where $filter and threat is not null and lower
(utmevent)='webfilter' group by category, website, direction, utmaction order by requests
desc)### t where direction='outbound' and utmaction='passthrough' group by category order by
requests desc
```

Dataset Name	Description	Log Category
fct-Traffic-Top-Allowed-Website	Top Visited Websites	fct-traffic

```
select
  website,
  string_agg(
    distinct category,
    & #039;, ') as agg_category, sum(requests) as requests from ###(select fct_webcat
(threat) as category, remotename as website, direction, utmaction, count(*) as requests from
$log where $filter and threat is not null and lower(utmevent)='webfilter' group by category,
website, direction, utmaction order by requests desc)### t where direction='outbound' and
utmaction='passthrough' and website is not null group by website order by requests desc
```

Dataset Name	Description	Log Category
fct-Traffic-Top-Category-By-Website-Session	Top Web Categories by Website Session	fct-traffic

```
select
  category,
  website,
  sum(requests) as requests
from
  ###(select fct_webcat(threat) as category, remotename as website, direction, utmaction,
count(*) as requests from $log where $filter and threat is not null and lower
(utmevent)='webfilter' group by category, website, direction, utmaction order by requests
desc)### t where nullifna(category) is not null group by category, website order by requests
desc
```

Dataset Name	Description	Log Category
fct-Traffic-Top-Web-Users-By-Website	Top Web Users by Website	fct-traffic

```
select
  coalesce(
    nullifna(`user`),
    ipstr(`srcip`)
  ) as user_src,
  remotename as website,
  count(*) as requests
from
  $log
where
  $filter
  and direction =& #039;outbound' and remotename is not null and utmaction='passthrough' and
lower(utmevent)='webfilter' group by user_src, website order by requests desc
```

Dataset Name	Description	Log Category
os-Detect-OS-Count	Detected operation system count	traffic

```
select
  (
    coalesce(
      osname,
      & #039;Unknown')) as os, count(*) as totalnum from $log where $filter and
(logflag&1>0) group by os order by totalnum desc
```

Dataset Name	Description	Log Category
drilldown-Top-App-By-Sessions-Table	Drilldown top applications by session count	traffic

```
select
  appid,
  app,
  sum(sessions) as sessions
from
  ###(select appid, app, coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`))
as user_src, dstip, srcintf, dstintf, policyid, count(*) as sessions, sum(coalesce(sentbyte,
0)+coalesce(rcvdbyte, 0)) as bandwidth from $log where $filter-exclude-var and (logflag&1>0)
group by appid, app, user_src, dstip, srcintf, dstintf, policyid order by sessions desc)###
t where $filter-drilldown and nullifna(app) is not null group by appid, app order by
sessions desc
```

Dataset Name	Description	Log Category
drilldown-Top-App-By-Sessions-Bar	Drilldown top applications by session count	traffic

```
select
  appid,
  app,
  sum(sessions) as sessions
from
  ###(select appid, app, coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`))
as user_src, dstip, srcintf, dstintf, policyid, count(*) as sessions, sum(coalesce(sentbyte,
0)+coalesce(rcvdbyte, 0)) as bandwidth from $log where $filter-exclude-var and (logflag&1>0)
group by appid, app, user_src, dstip, srcintf, dstintf, policyid order by sessions desc)###
t where $filter-drilldown and nullifna(app) is not null group by appid, app order by
sessions desc
```

Dataset Name	Description	Log Category
drilldown-Top-App-By-Bandwidth-Table	Drilldown top applications by bandwidth usage	traffic

```
select
  appid,
  app,
  sum(bandwidth) as bandwidth
from
  ###(select appid, app, coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`))
as user_src, dstip, srcintf, dstintf, policyid, count(*) as sessions, sum(coalesce(sentbyte,
0)+coalesce(rcvdbyte, 0)) as bandwidth from $log where $filter-exclude-var and (logflag&1>0)
group by appid, app, user_src, dstip, srcintf, dstintf, policyid order by sessions desc)###
t where $filter-drilldown and nullifna(app) is not null group by appid, app having sum
(bandwidth)>0 order by bandwidth desc
```

Dataset Name	Description	Log Category
drilldown-Top-App-By-Bandwidth-Bar	Drilldown top applications by bandwidth usage	traffic

```
select
  appid,
  app,
  sum(bandwidth) as bandwidth
from
  ###(select appid, app, coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`))
as user_src, dstip, srcintf, dstintf, policyid, count(*) as sessions, sum(coalesce(sentbyte,
0)+coalesce(rcvdbyte, 0)) as bandwidth from $log where $filter-exclude-var and (logflag&1>0)
group by appid, app, user_src, dstip, srcintf, dstintf, policyid order by sessions desc)###
t where $filter-drilldown and nullifna(app) is not null group by appid, app having sum
(bandwidth)>0 order by bandwidth desc
```

Dataset Name	Description	Log Category
drilldown-Top-Destination-By-Sessions-Table	Drilldown top destination by session count	traffic

```
select
  dstip,
  sum(sessions) as sessions
from
  ###(select appid, app, coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`))
as user_src, dstip, srcintf, dstintf, policyid, count(*) as sessions, sum(coalesce(sentbyte,
0)+coalesce(rcvdbyte, 0)) as bandwidth from $log where $filter-exclude-var and (logflag&1>0)
group by appid, app, user_src, dstip, srcintf, dstintf, policyid order by sessions desc)###
t where $filter-drilldown and dstip is not null group by dstip order by sessions desc
```

Dataset Name	Description	Log Category
drilldown-Top-Destination-By-Bandwidth-Table	Drilldown top destination by bandwidth usage	traffic

```
select
  dstip,
  sum(bandwidth) as bandwidth
from
  ###(select appid, app, coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`))
as user_src, dstip, srcintf, dstintf, policyid, count(*) as sessions, sum(coalesce(sentbyte,
0)+coalesce(rcvdbyte, 0)) as bandwidth from $log where $filter-exclude-var and (logflag&1>0)
group by appid, app, user_src, dstip, srcintf, dstintf, policyid order by sessions desc)###
t where $filter-drilldown and dstip is not null group by dstip having sum(bandwidth)>0 order
by bandwidth desc
```

Dataset Name	Description	Log Category
drilldown-Top-User-By-Sessions-Table	Drilldown top user by session count	traffic

```
select
  user_src,
  sum(sessions) as sessions
from
  ###(select appid, app, coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`))
as user_src, dstip, srcintf, dstintf, policyid, count(*) as sessions, sum(coalesce(sentbyte,
0)+coalesce(rcvdbyte, 0)) as bandwidth from $log where $filter-exclude-var and (logflag&1>0)
group by appid, app, user_src, dstip, srcintf, dstintf, policyid order by sessions desc)###
t where $filter-drilldown and user_src is not null group by user_src order by sessions desc
```

Dataset Name	Description	Log Category
drilldown-Top-User-By-Sessions-Bar	Drilldown top user by session count	traffic

```
select
  user_src,
  sum(sessions) as sessions
from
  ###(select appid, app, coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`))
as user_src, dstip, srcintf, dstintf, policyid, count(*) as sessions, sum(coalesce(sentbyte,
0)+coalesce(rcvdbyte, 0)) as bandwidth from $log where $filter-exclude-var and (logflag&1>0)
group by appid, app, user_src, dstip, srcintf, dstintf, policyid order by sessions desc)###
t where $filter-drilldown and user_src is not null group by user_src order by sessions desc
```

Dataset Name	Description	Log Category
drilldown-Top-User-By-Bandwidth-Table	Drilldown top user by bandwidth usage	traffic

```
select
  user_src,
  sum(bandwidth) as bandwidth
from
  ###(select appid, app, coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`))
as user_src, dstip, srcintf, dstintf, policyid, count(*) as sessions, sum(coalesce(sentbyte,
0)+coalesce(rcvdbyte, 0)) as bandwidth from $log where $filter-exclude-var and (logflag&1>0)
group by appid, app, user_src, dstip, srcintf, dstintf, policyid order by sessions desc)###
t where $filter-drilldown and user_src is not null group by user_src having sum(bandwidth)>0
order by bandwidth desc
```

Dataset Name	Description	Log Category
drilldown-Top-User-By-Bandwidth-Bar	Drilldown top user by bandwidth usage	traffic

```
select
  user_src,
  sum(bandwidth) as bandwidth
from
  ###(select appid, app, coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`))
as user_src, dstip, srcintf, dstintf, policyid, count(*) as sessions, sum(coalesce(sentbyte,
0)+coalesce(rcvdbyte, 0)) as bandwidth from $log where $filter-exclude-var and (logflag&1>0)
group by appid, app, user_src, dstip, srcintf, dstintf, policyid order by sessions desc)###
t where $filter-drilldown and user_src is not null group by user_src having sum(bandwidth)>0
order by bandwidth desc
```

Dataset Name	Description	Log Category
drilldown-Top-Web-User-By-Visit-Table	Drilldown top web user by visit	traffic

```
select
  user_src,
  sum(requests) as visits
from
  (
    ###(select coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_
src, hostname, count(*) as requests from $log-traffic where $filter-exclude-var and
(logflag&1>0) and utmevent in ('webfilter', 'banned-word', 'web-content', 'command-block',
'script-filter') and hostname is not null group by user_src, hostname order by requests
desc)### union all ###(select coalesce(nullifna(`user`), ipstr(`srcip`)) as user_src,
hostname, count(*) as requests from $log-webfilter where $filter-exclude-var and (eventtype
is null or logver>=502000000) and hostname is not null group by user_src, hostname order by
requests desc)###) t where $filter-drilldown and user_src is not null group by user_src
order by visits desc
```

Dataset Name	Description	Log Category
drilldown-Top-Web-User-By-Visit-Bar	Drilldown top web user by visit	traffic

```
select
  user_src,
  sum(requests) as visits
from
  (
    ###(select coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_
src, hostname, count(*) as requests from $log-traffic where $filter-exclude-var and
(logflag&1>0) and utmevent in ('webfilter', 'banned-word', 'web-content', 'command-block',
'script-filter') and hostname is not null group by user_src, hostname order by requests
desc)### union all ###(select coalesce(nullifna(`user`), ipstr(`srcip`)) as user_src,
hostname, count(*) as requests from $log-webfilter where $filter-exclude-var and (eventtype
is null or logver>=502000000) and hostname is not null group by user_src, hostname order by
requests desc)###) t where $filter-drilldown and user_src is not null group by user_src
order by visits desc
```

Dataset Name	Description	Log Category
drilldown-Top-Website-By-Request-Table	Drilldown top website by request	traffic

```
select
  hostname,
  sum(requests) as visits
from
  (
    ###(select coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_
src, hostname, count(*) as requests from $log-traffic where $filter-exclude-var and
(logflag&1>0) and utmevent in ('webfilter', 'banned-word', 'web-content', 'command-block',
'script-filter') and hostname is not null group by user_src, hostname order by requests
desc)### union all ###(select coalesce(nullifna(`user`), ipstr(`srcip`)) as user_src,
hostname, count(*) as requests from $log-webfilter where $filter-exclude-var and (eventtype
is null or logver>=502000000) and hostname is not null group by user_src, hostname order by
requests desc)###) t where $filter-drilldown and hostname is not null group by hostname
order by visits desc
```

Dataset Name	Description	Log Category
drilldown-Top-Website-By-Request-Bar	Drilldown top website by request	traffic

```
select
  hostname,
  sum(requests) as visits
from
  (
    ###(select coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_
src, hostname, count(*) as requests from $log-traffic where $filter-exclude-var and
(logflag&1>0) and utmevent in ('webfilter', 'banned-word', 'web-content', 'command-block',
'script-filter') and hostname is not null group by user_src, hostname order by requests
desc)### union all ###(select coalesce(nullifna(`user`), ipstr(`srcip`)) as user_src,
hostname, count(*) as requests from $log-webfilter where $filter-exclude-var and (eventtype
is null or logver>=502000000) and hostname is not null group by user_src, hostname order by
requests desc)###) t where $filter-drilldown and hostname is not null group by hostname
order by visits desc
```

Dataset Name	Description	Log Category
drilldown-Top-Email-Sender-By-Volume	Drilldown top email sender by volume	traffic

```
select
  sender,
  sum(bandwidth) as volume
from
  (
    ###(select sender, recipient, count(*) as requests, sum(coalesce(sentbyte, 0)+coalesce
(rcvdbyte, 0)) as bandwidth from $log-traffic where $filter-exclude-var and (logflag&1>0)
and service in ('smtp', 'SMTP', '25/tcp', '587/tcp', 'smtps', 'SMTPS', '465/tcp') and
utmevent in ('general-email-log', 'spamfilter') group by sender, recipient order by requests
desc)### union all ###(select `from` as sender, `to` as recipient, count(*) as requests, sum
(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0)) as bandwidth from $log-emailfilter where
$filter-exclude-var and service in ('smtp', 'SMTP', '25/tcp', '587/tcp', 'smtps', 'SMTPS',
'465/tcp') and eventtype is null group by `from`, `to` order by requests desc)###) t where
$filter-drilldown and sender is not null group by sender having sum(bandwidth)>0 order by
volume desc
```

Dataset Name	Description	Log Category
drilldown-Top-Email-Send-Recipient-By-Volume	Drilldown top email send recipient by volume	traffic

```
select
  recipient,
  sum(bandwidth) as volume
from
  (
    ###(select sender, recipient, count(*) as requests, sum(coalesce(sentbyte, 0)+coalesce
(rcvdbyte, 0)) as bandwidth from $log-traffic where $filter-exclude-var and (logflag&1>0)
and service in ('smtp', 'SMTP', '25/tcp', '587/tcp', 'smtps', 'SMTPS', '465/tcp') and
utmevent in ('general-email-log', 'spamfilter') group by sender, recipient order by requests
desc)### union all ###(select `from` as sender, `to` as recipient, count(*) as requests, sum
(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0)) as bandwidth from $log-emailfilter where
$filter-exclude-var and service in ('smtp', 'SMTP', '25/tcp', '587/tcp', 'smtps', 'SMTPS',
'465/tcp') and eventtype is null group by `from`, `to` order by requests desc)###) t where
$filter-drilldown and recipient is not null group by recipient having sum(bandwidth)>0 order
by volume desc
```

Dataset Name	Description	Log Category
drilldown-Top-Email-Sender-By-Count	Drilldown top email sender by count	traffic

```
select
  sender,
  sum(requests) as requests
from
  (
    ###(select sender, recipient, count(*) as requests, sum(coalesce(sentbyte, 0)+coalesce
(rcvdbyte, 0)) as bandwidth from $log-traffic where $filter-exclude-var and (logflag&1>0)
and service in ('smtp', 'SMTP', '25/tcp', '587/tcp', 'smtps', 'SMTPS', '465/tcp') and
utmevent in ('general-email-log', 'spamfilter') group by sender, recipient order by requests
desc)### union all ###(select `from` as sender, `to` as recipient, count(*) as requests, sum
(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0)) as bandwidth from $log-emailfilter where
$filter-exclude-var and service in ('smtp', 'SMTP', '25/tcp', '587/tcp', 'smtps', 'SMTPS',
'465/tcp') and eventtype is null group by `from`, `to` order by requests desc)###) t where
$filter-drilldown and sender is not null group by sender order by requests desc
```

Dataset Name	Description	Log Category
drilldown-Top-Email-Send-Recipient-By-Count	Drilldown top email send recipient by count	traffic

```
select
  recipient,
  sum(requests) as requests
from
  (
    ###(select sender, recipient, count(*) as requests, sum(coalesce(sentbyte, 0)+coalesce
(rcvdbyte, 0)) as bandwidth from $log-traffic where $filter-exclude-var and (logflag&1>0)
and service in ('smtp', 'SMTP', '25/tcp', '587/tcp', 'smtps', 'SMTPS', '465/tcp') and
utmevent in ('general-email-log', 'spamfilter') group by sender, recipient order by requests
desc)### union all ###(select `from` as sender, `to` as recipient, count(*) as requests, sum
(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0)) as bandwidth from $log-emailfilter where
$filter-exclude-var and service in ('smtp', 'SMTP', '25/tcp', '587/tcp', 'smtps', 'SMTPS',
'465/tcp') and eventtype is null group by `from`, `to` order by requests desc)###) t where
$filter-drilldown and recipient is not null group by recipient order by requests desc
```

Dataset Name	Description	Log Category
drilldown-Top-Email-Recipient-By-Volume	Drilldown top email receiver by volume	traffic

```
select
  recipient,
  sum(bandwidth) as volume
from
  (
    ###(select recipient, sender, count(*) as requests, sum(coalesce(sentbyte, 0)+coalesce
(rcvdbyte, 0)) as bandwidth from $log where $filter-exclude-var and (logflag&1>0) and
service in ('pop3', 'POP3', '110/tcp', 'imap', 'IMAP', '143/tcp', 'imaps', 'IMAPS',
'993/tcp', 'pop3s', 'POP3S', '995/tcp') and utmevent in ('general-email-log', 'spamfilter')
group by recipient, sender order by requests desc)### union all ###(select `to` as
recipient, `from` as sender, count(*) as requests, sum(coalesce(sentbyte, 0)+coalesce
(rcvdbyte, 0)) as bandwidth from $log-emailfilter where $filter-exclude-var and service in
('pop3', 'POP3', '110/tcp', 'imap', 'IMAP', '143/tcp', 'imaps', 'IMAPS', '993/tcp', 'pop3s',
'POP3S', '995/tcp') and eventtype is null group by `to`, `from` order by requests desc)###)
t where $filter-drilldown and recipient is not null group by recipient having sum
(bandwidth)>0 order by volume desc
```

Dataset Name	Description	Log Category
drilldown-Top-Email-Receive-Sender-By-Volume	Drilldown top email receive sender by volume	traffic

```
select
  sender,
  sum(bandwidth) as volume
from
  (
    ###(select recipient, sender, count(*) as requests, sum(coalesce(sentbyte, 0)+coalesce
(rcvdbyte, 0)) as bandwidth from $log where $filter-exclude-var and (logflag&1>0) and
service in ('pop3', 'POP3', '110/tcp', 'imap', 'IMAP', '143/tcp', 'imaps', 'IMAPS',
'993/tcp', 'pop3s', 'POP3S', '995/tcp') and utmevent in ('general-email-log', 'spamfilter')
group by recipient, sender order by requests desc)### union all ###(select `to` as
recipient, `from` as sender, count(*) as requests, sum(coalesce(sentbyte, 0)+coalesce
(rcvdbyte, 0)) as bandwidth from $log-emailfilter where $filter-exclude-var and service in
('pop3', 'POP3', '110/tcp', 'imap', 'IMAP', '143/tcp', 'imaps', 'IMAPS', '993/tcp', 'pop3s',
'POP3S', '995/tcp') and eventtype is null group by `to`, `from` order by requests desc)###)
t where $filter-drilldown and sender is not null group by sender having sum(bandwidth)>0
order by volume desc
```

Dataset Name	Description	Log Category
drilldown-Top-Email-Recipient-By-Count	Drilldown top email receiver by count	traffic

```
select
  recipient,
  sum(requests) as requests
```

```
from
  (
    ###(select recipient, sender, count(*) as requests, sum(coalesce(sentbyte, 0)+coalesce
(rcvdbyte, 0)) as bandwidth from $log where $filter-exclude-var and (logflag&1>0) and
service in ('pop3', 'POP3', '110/tcp', 'imap', 'IMAP', '143/tcp', 'imaps', 'IMAPS',
'993/tcp', 'pop3s', 'POP3S', '995/tcp') and utmevent in ('general-email-log', 'spamfilter')
group by recipient, sender order by requests desc)### union all ###(select `to` as
recipient, `from` as sender, count(*) as requests, sum(coalesce(sentbyte, 0)+coalesce
(rcvdbyte, 0)) as bandwidth from $log-emailfilter where $filter-exclude-var and service in
('pop3', 'POP3', '110/tcp', 'imap', 'IMAP', '143/tcp', 'imaps', 'IMAPS', '993/tcp', 'pop3s',
'POP3S', '995/tcp') and eventtype is null group by `to`, `from` order by requests desc)###)
t where $filter-drilldown and recipient is not null group by recipient order by requests
desc
```

Dataset Name	Description	Log Category
drilldown-Top-Email-Receive-Sender-By-Count	Drilldown top email receive sender by count	traffic

```
select
  sender,
  sum(requests) as requests
from
  (
    ###(select recipient, sender, count(*) as requests, sum(coalesce(sentbyte, 0)+coalesce
(rcvdbyte, 0)) as bandwidth from $log where $filter-exclude-var and (logflag&1>0) and
service in ('pop3', 'POP3', '110/tcp', 'imap', 'IMAP', '143/tcp', 'imaps', 'IMAPS',
'993/tcp', 'pop3s', 'POP3S', '995/tcp') and utmevent in ('general-email-log', 'spamfilter')
group by recipient, sender order by requests desc)### union all ###(select `to` as
recipient, `from` as sender, count(*) as requests, sum(coalesce(sentbyte, 0)+coalesce
(rcvdbyte, 0)) as bandwidth from $log-emailfilter where $filter-exclude-var and service in
('pop3', 'POP3', '110/tcp', 'imap', 'IMAP', '143/tcp', 'imaps', 'IMAPS', '993/tcp', 'pop3s',
'POP3S', '995/tcp') and eventtype is null group by `to`, `from` order by requests desc)###)
t where $filter-drilldown and sender is not null group by sender order by requests desc
```

Dataset Name	Description	Log Category
drilldown-Top-Attack-Destination	Drilldown top attack dest	attack

```
select
  victim,
  sum(totalnum) as totalnum
from
  ###(select (CASE WHEN direction='incoming' THEN dstip ELSE srcip END) as source, (CASE
WHEN direction='incoming' THEN srcip ELSE dstip END) as victim, count(*) as totalnum from
$log where $filter-exclude-var group by source, victim order by totalnum desc)### t where
$filter-drilldown and victim is not null group by victim order by totalnum desc
```

Dataset Name	Description	Log Category
drilldown-Top-Attack-Source	Drilldown top attack source	attack

```
select
  source,
  sum(totalnum) as totalnum
from
```

```
  ###(select (CASE WHEN direction='incoming' THEN dstip ELSE srcip END) as source, (CASE
WHEN direction='incoming' THEN srcip ELSE dstip END) as victim, count(*) as totalnum from
$log where $filter-exclude-var group by source, victim order by totalnum desc)### t where
$filter-drilldown and source is not null group by source order by totalnum desc
```

Dataset Name	Description	Log Category
drilldown-Top-Attack-List	Drilldown top attack list	attack

```
select
  from_itime(itime) as timestamp,
  attack,
  source,
  victim
from
  ###(select itime, attack, (CASE WHEN direction='incoming' THEN dstip ELSE srcip END) as
source, (CASE WHEN direction='incoming' THEN srcip ELSE dstip END) as victim from $log where
$filter-exclude-var order by itime desc)### t where $filter-drilldown order by timestamp
desc
```

Dataset Name	Description	Log Category
drilldown-Top-Virus	UTM top virus	virus

```
select
  virus,
  max(virusid_s) as virusid,
  (
    case when virus like & #039;Riskware%' then 'Spyware' when virus like 'Adware%' then
'Adware' else 'Virus' end) as malware_type, sum(totalnum) as totalnum from ###(select virus,
virusid_to_str(virusid, eventtype) as virusid_s, count(*) as totalnum from $log where
$filter and (eventtype is null or logver>=502000000) and nullifna(virus) is not null group
by virus, virusid_s /*SkipSTART*/order by totalnum desc/*SkipEND*/)### t group by virus,
malware_type order by totalnum desc
```

Dataset Name	Description	Log Category
drilldown-Virus-Detail	Drilldown virus detail	virus

```
select
  from_itime(itime) as timestamp,
  virus,
  user_src,
  victim,
  hostname,
  recipient
from
  ###(select itime, virus, coalesce(nullifna(`user`), ipstr((CASE WHEN direction='incoming'
THEN dstip ELSE srcip END))) as user_src, (CASE WHEN direction='incoming' THEN srcip ELSE
dstip END) as victim, cast(' ' as char) as hostname, cast(' ' as char) as recipient from
$log where $filter and (eventtype is null or logver>=502000000) and nullifna(virus) is not
null order by itime desc)### t where $filter-drilldown order by timestamp desc
```

Dataset Name	Description	Log Category
user-drilldown-Top-Blocked-Web-Sites-By-Requests	User drilldown top blocked web sites by requests	webfilter

```
select
  hostname,
  sum(requests) as requests
from
  ###(select coalesce(nullifna(`user`), ipstr(`srcip`)) as user_src, hostname, action, count
(*) as requests from $log where $filter and hostname is not null group by user_src,
hostname, action order by requests desc)### t where $filter-drilldown and action='blocked'
group by hostname order by requests desc
```

Dataset Name	Description	Log Category
user-drilldown-Top-Allowed-Web-Sites-By-Requests	User drilldown top allowed web sites by requests	webfilter

```
select
  hostname,
  sum(requests) as requests
from
  ###(select coalesce(nullifna(`user`), ipstr(`srcip`)) as user_src, hostname, action, count
(*) as requests from $log where $filter and hostname is not null group by user_src,
hostname, action order by requests desc)### t where $filter-drilldown and action!='blocked'
group by hostname order by requests desc
```

Dataset Name	Description	Log Category
user-drilldown-Top-Blocked-Web-Categories	User drilldown top blocked web categories	webfilter

```
select
  catdesc,
  sum(requests) as requests
from
  ###(select coalesce(nullifna(`user`), ipstr(`srcip`)) as user_src, catdesc, action, count
(*) as requests from $log where $filter and catdesc is not null group by user_src, catdesc,
action order by requests desc)### t where $filter-drilldown and action='blocked' group by
catdesc order by requests desc
```

Dataset Name	Description	Log Category
user-drilldown-Top-Allowed-Web-Categories	User drilldown top allowed web categories	webfilter

```
select
  catdesc,
  sum(requests) as requests
from
  ###(select coalesce(nullifna(`user`), ipstr(`srcip`)) as user_src, catdesc, action, count
(*) as requests from $log where $filter and catdesc is not null group by user_src, catdesc,
action order by requests desc)### t where $filter-drilldown and action!='blocked' group by
catdesc order by requests desc
```

Dataset Name	Description	Log Category
user-drilldown-Top-Attacks	User drilldown top attacks by name	attack

```
select
  attack,
  sum(attack_count) as attack_count
from
  ###(select coalesce(nullifna(`user`), ipstr(`srcip`)) as user_src, attack, (case when
severity in ('critical', 'high') then 1 else 0 end) as high_severity, count(*) as attack_
count from $log where $filter and nullifna(attack) is not null group by user_src, attack,
high_severity order by attack_count desc)### t where $filter-drilldown group by attack order
by attack_count desc
```

Dataset Name	Description	Log Category
user-drilldown-Top-Attacks-High-Severity	User drilldown top attacks high severity	attack

```
select
  attack,
  sum(attack_count) as attack_count
from
  ###(select coalesce(nullifna(`user`), ipstr(`srcip`)) as user_src, attack, (case when
severity in ('critical', 'high') then 1 else 0 end) as high_severity, count(*) as attack_
count from $log where $filter and nullifna(attack) is not null group by user_src, attack,
high_severity order by attack_count desc)### t where $filter-drilldown and high_severity=1
group by attack order by attack_count desc
```

Dataset Name	Description	Log Category
user-drilldown-Top-Virus-By-Name	User drilldown top virus	virus

```
select
  virus,
  max(virusid_s) as virusid,
  sum(totalnum) as totalnum
from
  ###(select coalesce(nullifna(`user`), ipstr(`srcip`)) as user_src, virus, virusid_to_str
(virusid, eventtype) as virusid_s, count(*) as totalnum from $log where $filter and nullifna
(virus) is not null group by user_src, virus, virusid_s order by totalnum desc)### t where
$filter-drilldown group by virus order by totalnum desc
```

Dataset Name	Description	Log Category
user-drilldown-Top-Virus-Receivers-Over-Email	User drilldown top virus receivers over email	virus

```
select
  receiver,
  sum(totalnum) as totalnum
from
  ###(select coalesce(nullifna(`user`), ipstr(`srcip`)) as user_src, `to` as receiver, count
(*) as totalnum from $log where $filter and subtype='infected' and (service in ('smtp',
'SMTP', '25/tcp', '587/tcp', 'smtps', 'SMTPS', '465/tcp') or service in ('pop3', 'POP3',
'110/tcp', 'imap', 'IMAP', '143/tcp', 'imaps', 'IMAPS', '993/tcp', 'pop3s', 'POP3S',
'995/tcp')) and nullifna(virus) is not null group by user_src, receiver order by totalnum
desc)### t where $filter-drilldown group by receiver order by totalnum desc
```

Dataset Name	Description	Log Category
user-drilldown-Count-Spam-Activity-by-Hour-of-Day	User drilldown count spam activity by hour of day	emailfilter

```
select
  $hour_of_day(timestamp) as hourstamp,
  sum(totalnum) as totalnum
from
  ###(select $flex_timestamp as timestamp, coalesce(nullifna(`user`), ipstr(`srcip`)) as
user_src, `from` as mf_sender, `to` as mf_receiver, action, eventtype, count(*) as totalnum
from $log where $filter group by timestamp, user_src, mf_sender, mf_receiver, action,
eventtype /*SkipSTART*/order by timestamp desc/*SkipEND*/)### t where $filter-drilldown and
mf_receiver is not null and action in ('detected', 'blocked') group by hourstamp order by
hourstamp
```

Dataset Name	Description	Log Category
user-drilldown-Top-Spam-Sources	User drilldown top spam sources	emailfilter

```
select
  mf_sender,
  sum(totalnum) as totalnum
from
  ###(select $flex_timestamp as timestamp, coalesce(nullifna(`user`), ipstr(`srcip`)) as
user_src, `from` as mf_sender, `to` as mf_receiver, action, eventtype, count(*) as totalnum
from $log where $filter group by timestamp, user_src, mf_sender, mf_receiver, action,
eventtype /*SkipSTART*/order by timestamp desc/*SkipEND*/)### t where $filter-drilldown and
mf_sender is not null and action in ('detected', 'blocked') group by mf_sender order by
totalnum desc
```

Dataset Name	Description	Log Category
event-Usage-CPU	Event usage CPU	event

```
select
  $hour_of_day(timestamp) as hourstamp,
  cast(
    sum(total_cpu)/ sum(count) as decimal(6, 2)
  ) as cpu_avg_usage
from
  ###(select $flex_timestamp as timestamp, devid, slot, sum(coalesce(trate, 0)) as total_
trate, sum(coalesce(erate, 0)) as total_erate, sum(coalesce(orate, 0)) as total_orate, min
(itime) as first_seen, max(itime) as last_seen, sum(coalesce(mem, 0)) as total_mem, max
(coalesce(mem, 0)) as mem_peak, sum(coalesce(disk, 0)) as total_disk, max(coalesce(disk, 0))
as disk_peak, sum(coalesce(cpu, 0)) as total_cpu, max(coalesce(cpu, 0)) as cpu_peak, max
(coalesce(trate, 0)+coalesce(erate, 0)+coalesce(orate, 0)) as lograte_peak, sum(coalesce
(totalsession, 0)) as totalsession, max(coalesce(totalsession, 0)) as session_peak, sum(cast
(coalesce(split_part(bandwidth, '/', 1), '0') as integer)) as sent, sum(cast(coalesce(split_
part(bandwidth, '/', 2), '0') as integer)) as recv, max(cast(coalesce(split_part(bandwidth,
'/', 1), '0') as integer)+cast(coalesce(split_part(bandwidth, '/', 2), '0') as integer)) as
transmit_peak, sum(coalesce(setuprate, 0)) as cps, max(coalesce(setuprate, 0)) as cps_peak,
count(*) as count from $log where $filter and subtype='system' and action='perf-stats' group
by timestamp, devid, slot order by total_mem desc)### t group by hourstamp order by
hourstamp
```

Dataset Name	Description	Log Category
event-Usage-Memory	Event usage memory	event

```
select
  $hour_of_day(timestamp) as hourstamp,
  cast(
    sum(total_mem)/ sum(count) as decimal(6, 2)
  ) as mem_avg_usage
from
  ###(select $flex_timestamp as timestamp, devid, slot, sum(coalesce(trate, 0)) as total_
trate, sum(coalesce(erate, 0)) as total_erate, sum(coalesce(orate, 0)) as total_orate, min
(itime) as first_seen, max(itime) as last_seen, sum(coalesce(mem, 0)) as total_mem, max
(coalesce(mem, 0)) as mem_peak, sum(coalesce(disk, 0)) as total_disk, max(coalesce(disk, 0))
as disk_peak, sum(coalesce(cpu, 0)) as total_cpu, max(coalesce(cpu, 0)) as cpu_peak, max
(coalesce(trate, 0)+coalesce(erate, 0)+coalesce(orate, 0)) as lograte_peak, sum(coalesce
(totalsession, 0)) as totalsession, max(coalesce(totalsession, 0)) as session_peak, sum(cast
(coalesce(split_part(bandwidth, '/', 1), '0') as integer)) as sent, sum(cast(coalesce(split_
part(bandwidth, '/', 2), '0') as integer)) as recv, max(cast(coalesce(split_part(bandwidth,
'/', 1), '0') as integer)+cast(coalesce(split_part(bandwidth, '/', 2), '0') as integer)) as
transmit_peak, sum(coalesce(setuprate, 0)) as cps, max(coalesce(setuprate, 0)) as cps_peak,
count(*) as count from $log where $filter and subtype='system' and action='perf-stats' group
by timestamp, devid, slot order by total_mem desc)### t group by hourstamp order by
hourstamp
```

Dataset Name	Description	Log Category
event-Usage-Sessions	Event usage sessions	event

```
select
  $hour_of_day(timestamp) as hourstamp,
  cast(
    sum(totalsession)/ sum(count) as decimal(10, 2)
  ) as sess_avg_usage
from
  ###(select $flex_timestamp as timestamp, devid, slot, sum(coalesce(trate, 0)) as total_
trate, sum(coalesce(erate, 0)) as total_erate, sum(coalesce(orate, 0)) as total_orate, min
(itime) as first_seen, max(itime) as last_seen, sum(coalesce(mem, 0)) as total_mem, max
(coalesce(mem, 0)) as mem_peak, sum(coalesce(disk, 0)) as total_disk, max(coalesce(disk, 0))
as disk_peak, sum(coalesce(cpu, 0)) as total_cpu, max(coalesce(cpu, 0)) as cpu_peak, max
(coalesce(trate, 0)+coalesce(erate, 0)+coalesce(orate, 0)) as lograte_peak, sum(coalesce
(totalsession, 0)) as totalsession, max(coalesce(totalsession, 0)) as session_peak, sum(cast
(coalesce(split_part(bandwidth, '/', 1), '0') as integer)) as sent, sum(cast(coalesce(split_
part(bandwidth, '/', 2), '0') as integer)) as recv, max(cast(coalesce(split_part(bandwidth,
'/', 1), '0') as integer)+cast(coalesce(split_part(bandwidth, '/', 2), '0') as integer)) as
transmit_peak, sum(coalesce(setuprate, 0)) as cps, max(coalesce(setuprate, 0)) as cps_peak,
count(*) as count from $log where $filter and subtype='system' and action='perf-stats' group
by timestamp, devid, slot order by total_mem desc)### t group by hourstamp order by
hourstamp
```

Dataset Name	Description	Log Category
event-Usage-CPU-Sessions	Event usage CPU sessions	event

```
select
  $hour_of_day(timestamp) as hourstamp,
  cast(
    sum(totalsession)/ sum(count) as decimal(10, 2)
  ) as sess_avg_usage,
  cast(
    sum(total_cpu)/ sum(count) as decimal(6, 2)
  ) as cpu_avg_usage
from
  ###(select $flex_timestamp as timestamp, devid, slot, sum(coalesce(trate, 0)) as total_
trate, sum(coalesce(erate, 0)) as total_erate, sum(coalesce(orate, 0)) as total_orate, min
(itime) as first_seen, max(itime) as last_seen, sum(coalesce(mem, 0)) as total_mem, max
(coalesce(mem, 0)) as mem_peak, sum(coalesce(disk, 0)) as total_disk, max(coalesce(disk, 0))
as disk_peak, sum(coalesce(cpu, 0)) as total_cpu, max(coalesce(cpu, 0)) as cpu_peak, max
(coalesce(trate, 0)+coalesce(erate, 0)+coalesce(orate, 0)) as lograte_peak, sum(coalesce
(totalsession, 0)) as totalsession, max(coalesce(totalsession, 0)) as session_peak, sum(cast
(coalesce(split_part(bandwidth, '/', 1), '0') as integer)) as sent, sum(cast(coalesce(split_
part(bandwidth, '/', 2), '0') as integer)) as recv, max(cast(coalesce(split_part(bandwidth,
'/', 1), '0') as integer)+cast(coalesce(split_part(bandwidth, '/', 2), '0') as integer)) as
transmit_peak, sum(coalesce(setuprate, 0)) as cps, max(coalesce(setuprate, 0)) as cps_peak,
count(*) as count from $log where $filter and subtype='system' and action='perf-stats' group
by timestamp, devid, slot order by total_mem desc)### t group by hourstamp order by
hourstamp
```

Dataset Name	Description	Log Category
App-Risk-Top-Users-By-Bandwidth	Top users by bandwidth usage	traffic

```
select
  coalesce(
    nullifna(`user`),
    nullifna(`unauthuser`),
    ipstr(`srcip`)
  ) as user_src,
  srcip,
  sum(
    coalesce(sentbyte, 0)+ coalesce(rcvdbyte, 0)
  ) as bandwidth,
  sum(
    coalesce(rcvdbyte, 0)
  ) as traffic_in,
  sum(
    coalesce(sentbyte, 0)
  ) as traffic_out
from
  $log
where
  $filter
  and (
    logflag&1>0
  )
  and srcip is not null
group by
  user_src,
  srcip
having
```

```
  sum(
    coalesce(sentbyte, 0)+ coalesce(rcvdbyte, 0)
  )> 0
order by
  bandwidth desc
```

Dataset Name	Description	Log Category
App-Risk-Top-User-Source-By-Sessions	Application risk top user source by session count	traffic

```
select
  srcip,
  coalesce(
    nullifna(`user`),
    nullifna(`unauthuser`),
    ipstr(`srcip`)
  ) as user_src,
  count(*) as sessions
from
  $log
where
  $filter
  and (
    logflag&1>0
  )
  and srcip is not null
group by
  srcip,
  user_src
order by
  sessions desc
```

Dataset Name	Description	Log Category
App-Risk-Top-Users-By-Reputation-Scores-Bar	Application risk reputation top users by scores	traffic

```
select
  coalesce(
    nullifna(`user`),
    nullifna(`unauthuser`),
    ipstr(`srcip`)
  ) as user_src,
  sum(crscore % 65536) as scores
from
  $log
where
  $filter
  and (
    logflag&1>0
  )
  and crscore is not null
group by
  user_src
having
```

```
  sum(crscore % 65536)> 0
order by
  scores desc
```

Dataset Name	Description	Log Category
App-Risk-Top-Devices-By-Reputation-Scores	Application risk reputation top devices by scores	traffic

```
select
  max(
    get_devtype(srcswversion, osname, devtype)
  ) as devtype_new,
  coalesce(
    nullifna(`srcname`),
    nullifna(`srcmac`),
    ipstr(`srcip`)
  ) as dev_src,
  sum(crscore % 65536) as scores
from
  $log
where
  $filter
  and (
    logflag&1>0
  )
  and crscore is not null
group by
  dev_src
having
  sum(crscore % 65536)> 0
order by
  scores desc
```

Dataset Name	Description	Log Category
App-Risk-Application-Usage-By-Category-With-Pie	Application risk application usage by category	traffic

```
select
  appcat,
  sum(bandwidth) as bandwidth
from
  ###(select appid, app, appcat, apprisk, sum(traffic_in) as traffic_in, sum(traffic_out) as
traffic_out, sum(bandwidth) as bandwidth, sum(sessions) as sessions from ###base(/*tag:rpt_
base_t_top_app*/select dvid, srcip, dstip, epid, euid, coalesce(nullifna(`user`), nullifna
(`unauthuser`), ipstr(`srcip`)) as user_src, appid, app, appcat, apprisk, hostname, sum
(coalesce(rcvddelta, rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as
traffic_out, sum(coalesce(sentdelta, sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as
bandwidth, count(*) as sessions from $log-traffic where $filter and (logflag&(1|32)>0) and
nullifna(app) is not null group by dvid, srcip, dstip, epid, euid, user_src, appid, app,
appcat, apprisk, hostname order by sessions desc)base### t group by appid, app, appcat,
apprisk /*SkipSTART*/order by sessions desc, bandwidth desc/*SkipEND*/)### t where $filter-
drilldown and nullifna(appcat) is not null group by appcat having sum(bandwidth)>0 order by
bandwidth desc
```

Dataset Name	Description	Log Category
App-Risk-App-Usage-by-Category	Application risk application usage by category	traffic

```
select
  appcat,
  sum(bandwidth) as bandwidth
from
  ###(select appid, app, appcat, apprisk, sum(traffic_in) as traffic_in, sum(traffic_out) as
traffic_out, sum(bandwidth) as bandwidth, sum(sessions) as sessions from ###base(/*tag:rpt_
base_t_top_app*/select dvid, srcip, dstip, epid, euid, coalesce(nullifna(`user`), nullifna
(`unauthuser`), ipstr(`srcip`)) as user_src, appid, app, appcat, apprisk, hostname, sum
(coalesce(rcvddelta, rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as
traffic_out, sum(coalesce(sentdelta, sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as
bandwidth, count(*) as sessions from $log-traffic where $filter and (logflag&(1|32)>0) and
nullifna(app) is not null group by dvid, srcip, dstip, epid, euid, user_src, appid, app,
appcat, apprisk, hostname order by sessions desc)base### t group by appid, app, appcat,
apprisk /*SkipSTART*/order by sessions desc, bandwidth desc/*SkipEND*/)### t where $filter-
drilldown and nullifna(appcat) is not null group by appcat having sum(bandwidth)>0 order by
bandwidth desc
```

Dataset Name	Description	Log Category
Top-20-Categories-By-Bandwidth	Webfilter categories by bandwidth usage	webfilter

```
select
  catdesc,
  sum(bandwidth) as bandwidth
from
  ###(select catdesc, sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0)) as bandwidth from
$log-traffic where $filter and (logflag&1>0) and (countweb>0 or ((logver is null or
logver<502000000) and (hostname is not null or utmevent in ('webfilter', 'banned-word',
'web-content', 'command-block', 'script-filter')))) and catdesc is not null group by catdesc
/*SkipSTART*/order by bandwidth desc/*SkipEND*/)### t group by catdesc order by bandwidth
desc
```

Dataset Name	Description	Log Category
App-Risk-Key-Applications-Crossing-The-Network	Application risk application activity	traffic

```
select
  app_group,
  appcat,
  sum(bandwidth) as bandwidth,
  sum(sessions) as num_session
from
  ###(select app_group_name(app) as app_group, appcat, service, sum(coalesce(sentdelta,
sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as bandwidth, sum(coalesce(rcvddelta,
rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as traffic_out, count(*)
as sessions from $log where $filter and (logflag&(1|32)>0) and nullifna(app) is not null
group by app_group, appcat, service order by bandwidth desc)### t group by app_group, appcat
order by bandwidth desc
```

Dataset Name	Description	Log Category
App-Risk-Applications-Running-Over-HTTP	Application risk applications running over HTTP	traffic

```
select
  app_group,
  service,
  sum(sessions) as sessions,
  sum(bandwidth) as bandwidth
from
  ###(select app_group_name(app) as app_group, appcat, service, sum(coalesce(sentdelta,
sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as bandwidth, sum(coalesce(rcvddelta,
rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as traffic_out, count(*)
as sessions from $log where $filter and (logflag&(1|32)>0) and nullifna(app) is not null
group by app_group, appcat, service order by bandwidth desc)### t where service in
('80/tcp', '443/tcp', 'HTTP', 'HTTPS', 'http', 'https') group by app_group, service having
sum(bandwidth)>0 order by bandwidth desc
```

Dataset Name	Description	Log Category
App-Risk-Top-Web-Sites-Visited-By-Network-Users-Pie-Cha	Application risk web browsing summary category	traffic

```
select
  catdesc,
  sum(num_sess) as num_sess,
  sum(bandwidth) as bandwidth
from
  ###(select catdesc, count(*) as num_sess, sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0))
as bandwidth from $log-traffic where $filter and (logflag&1>0) and (countweb>0 or ((logver
is null or logver<502000000) and (hostname is not null or utmevent in ('webfilter', 'banned-
word', 'web-content', 'command-block', 'script-filter')))) and catdesc is not null group by
catdesc order by num_sess desc)### t group by catdesc order by num_sess desc
```

Dataset Name	Description	Log Category
App-Risk-Top-Web-Sites-Visited-By-Network-Users	Application risk web browsing summary category	traffic

```
select
  catdesc,
  sum(num_sess) as num_sess,
  sum(bandwidth) as bandwidth
from
  ###(select catdesc, count(*) as num_sess, sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0))
as bandwidth from $log-traffic where $filter and (logflag&1>0) and (countweb>0 or ((logver
is null or logver<502000000) and (hostname is not null or utmevent in ('webfilter', 'banned-
word', 'web-content', 'command-block', 'script-filter')))) and catdesc is not null group by
catdesc order by num_sess desc)### t group by catdesc order by num_sess desc
```

Dataset Name	Description	Log Category
App-Risk-Web-Browsing-Hostname-Category	Application risk web browsing activity hostname category	webfilter

```
select
  domain,
  catdesc,
  sum(visits) as visits
from
  ###(select coalesce(nullifna(hostname), ipstr(`dstip`)) as domain, catdesc, count(*) as
visits from $log where $filter and (eventtype is null or logver>=502000000) and catdesc is
not null group by domain, catdesc order by visits desc)### t group by domain, catdesc order
by visits desc
```

Dataset Name	Description	Log Category
Top-Destination-Countries-By-Browsing-Time	Traffic top destination countries by browsing time	traffic

```
select
  dstcountry,
  ebtr_value(
    ebtr_agg_flat(browsetime),
    null,
    $timespan
  ) as browsetime,
  sum(bandwidth) as bandwidth,
  sum(traffic_in) as traffic_in,
  sum(traffic_out) as traffic_out
from
  ###(select dstcountry, ebtr_agg_flat(browsetime) as browsetime, sum(bandwidth) as
bandwidth, sum(traffic_in) as traffic_in, sum(traffic_out) as traffic_out from (select
dstcountry, ebtr_agg_flat($browse_time) as browsetime, sum(coalesce(sentbyte, 0)+coalesce
(rcvdbyte, 0)) as bandwidth, sum(coalesce(rcvdbyte, 0)) as traffic_in, sum(coalesce
(sentbyte, 0)) as traffic_out from $log where $filter and (logflag&1>0) and $browse_time is
not null group by dstcountry) t group by dstcountry /*SkipSTART*/order by ebtr_value(ebtr_
agg_flat(browsetime), null, null) desc/*SkipEND*/)### t group by dstcountry order by
browsetime desc
```

Dataset Name	Description	Log Category
App-Risk-Traffic-Top-Hostnames-By-Browsing-Time	Traffic top domains by browsing time	traffic

```
select
  hostname,
  ebtr_value(
    ebtr_agg_flat(browsetime),
    null,
    $timespan
  ) as browsetime,
  sum(bandwidth) as bandwidth,
  sum(traffic_in) as traffic_in,
  sum(traffic_out) as traffic_out
from
  ###(select hostname, ebtr_agg_flat(browsetime) as browsetime, sum(bandwidth) as bandwidth,
sum(traffic_in) as traffic_in, sum(traffic_out) as traffic_out from (select hostname, ebtr_
agg_flat($browse_time) as browsetime, sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0)) as
bandwidth, sum(coalesce(rcvdbyte, 0)) as traffic_in, sum(coalesce(sentbyte, 0)) as traffic_
out from $log where $filter and (logflag&1>0) and hostname is not null and $browse_time is
not null group by hostname) t group by hostname /*SkipSTART*/order by ebtr_value(ebtr_agg_
flat(browsetime), null, null) desc/*SkipEND*/)### t group by hostname order by browsetime
desc
```

Dataset Name	Description	Log Category
App-Risk-Top-Threat-Vectors-Crossing-The-Network	Application risk top threat vectors	attack

```
select
  severity,
  sum(totalnum) as totalnum
from
  ###(select attack, severity, ref, count(*) as totalnum from $log where $filter and
nullifna(attack) is not null group by attack, severity, ref order by totalnum desc)### t
group by severity order by totalnum desc
```

Dataset Name	Description	Log Category
App-Risk-Top-Critical-Threat-Vectors-Crossing-The-Network	Application risk top critical threat vectors	attack

```
select
  attack,
  severity,
  ref,
  sum(totalnum) as totalnum
from
  ###(select attack, severity, ref, count(*) as totalnum from $log where $filter and
nullifna(attack) is not null group by attack, severity, ref order by totalnum desc)### t
where severity='critical' group by attack, severity, ref order by totalnum desc
```

Dataset Name	Description	Log Category
App-Risk-Top-High-Threat-Vectors-Crossing-The-Network	Application risk top high threat vectors	attack

```
select
  attack,
  severity,
  ref,
  sum(totalnum) as totalnum
from
  ###(select attack, severity, ref, count(*) as totalnum from $log where $filter and
nullifna(attack) is not null group by attack, severity, ref order by totalnum desc)### t
where severity='high' group by attack, severity, ref order by totalnum desc
```

Dataset Name	Description	Log Category
App-Risk-Top-Medium-Threat-Vectors-Crossing-The-Network	Application risk top medium threat vectors	attack

```
select
  attack,
  severity,
  ref,
  sum(totalnum) as totalnum
from
  ###(select attack, severity, ref, count(*) as totalnum from $log where $filter and
nullifna(attack) is not null group by attack, severity, ref order by totalnum desc)### t
where severity='medium' group by attack, severity, ref order by totalnum desc
```

Dataset Name	Description	Log Category
App-Risk-Top-Low-Threat-Vectors-Crossing-The-Network	Application risk top low threat vectors	attack

```
select
  attack,
  severity,
  ref,
  sum(totalnum) as totalnum
from
  ###(select attack, severity, ref, count(*) as totalnum from $log where $filter and
nullifna(attack) is not null group by attack, severity, ref order by totalnum desc)### t
where severity='low' group by attack, severity, ref order by totalnum desc
```

Dataset Name	Description	Log Category
App-Risk-Top-Info-Threat-Vectors-Crossing-The-Network	Application risk top info threat vectors	attack

```
select
  attack,
  severity,
  ref,
  sum(totalnum) as totalnum
from
  ###(select attack, severity, ref, count(*) as totalnum from $log where $filter and
nullifna(attack) is not null group by attack, severity, ref order by totalnum desc)### t
where severity='info' group by attack, severity, ref order by totalnum desc
```

Dataset Name	Description	Log Category
App-Risk-Top-Virus-By-Name	UTM top virus	virus

```
select
  virus,
  max(virusid_s) as virusid,
  (
    case when virus like & #039;Riskware%' then 'Spyware' when virus like 'Adware%' then
'Adware' else 'Virus' end) as malware_type, sum(totalnum) as totalnum from ###(select virus,
virusid_to_str(virusid, eventtype) as virusid_s, count(*) as totalnum from $log where
$filter and (eventtype is null or logver>=502000000) and nullifna(virus) is not null group
by virus, virusid_s /*SkipSTART*/order by totalnum desc/*SkipEND*/)### t group by virus,
malware_type order by totalnum desc
```

Dataset Name	Description	Log Category
App-Risk-Top-Virus-Victim	UTM top virus user	virus

```
select
  user_src,
  sum(totalnum) as totalnum
from
  ###(select coalesce(nullifna(`user`), ipstr(`srcip`)) as user_src, eventtype, logver,
virus, count(*) as totalnum from $log where $filter group by user_src, eventtype, logver,
virus /*SkipSTART*/order by totalnum desc/*SkipEND*/)### t where (eventtype is null or
logver>=502000000) and nullifna(virus) is not null group by user_src order by totalnum desc
```

Dataset Name	Description	Log Category
App-Risk-Data-Loss-Prevention-Type-Events	Application risk DLP UTM event	dlp

```
select
  subtype : :text as utmsubtype,
  count(*) as number
from
  ###(select itime, hostname,`from` as sender, `to` as receiver, profile, action, service,
subtype, srcip, dstip, severity, filename, direction, filesize, (case when
severity='critical' then 'Critical Data Exfiltration' else (case when coalesce(nullifna
(`user`), ipstr(`srcip`)) is not null then 'User Associated Data Loss' else NULL end) end)
as data_loss from $log where $filter /*SkipSTART*/order by itime desc/*SkipEND*/)### t where
$filter-drilldown and subtype is not null group by subtype order by number desc
```

Dataset Name	Description	Log Category
App-Risk-Vulnerability-Discovered	Application risk vulnerability discovered	netscan

```
select
  vuln,
  vulnref as ref,
  vulncat,
  severity,
  count(*) as totalnum
from
  $log
where
  $filter
  and vuln is not null
group by
  vuln,
  vulnref,
  vulncat,
  severity
order by
  totalnum desc
```

Dataset Name	Description	Log Category
App-Risk-Malware-Discovered	Application risk virus discovered	virus

```
select
  dom,
  sum(totalnum) as totalnum
from
```

```
  ###(select $DAY_OF_MONTH as dom, count(*) as totalnum from $log where $filter and nullifna
(virus) is not null and (eventtype is null or logver>=502000000) group by dom order by
totalnum desc)### t group by dom order by totalnum desc
```

Dataset Name	Description	Log Category
App-Risk-Breakdown-Of-Risk-Applications	Application risk breakdown of risk applications	traffic

```
select
  unnest(
    string_to_array(
      behavior,
      & #039;,')) as d_behavior, count(*) as number from $log t1 inner join app_mdata t2 on
t1.appid=t2.id where $filter and (logflag&1>0) group by d_behavior order by number desc
```

Dataset Name	Description	Log Category
App-Risk-Number-Of-Applications-By-Risk-Behavior	Application risk number of applications by risk behavior	traffic

```
select
  risk as d_risk,
  unnest(
    string_to_array(
      behavior,
      & #039;,')) as f_behavior, count(*) as number from $log t1 inner join app_mdata t2 on
t1.appid=t2.id where $filter and (logflag&1>0) group by risk, f_behavior order by risk desc,
number desc
```

Dataset Name	Description	Log Category
App-Risk-High-Risk-Application	Application risk high risk application	traffic

```
select
  risk as d_risk,
  behavior as d_behavior,
  t2.id,
  t2.name,
  t2.app_cat,
  t2.technology,
  sum(
    coalesce(sentbyte, 0)+ coalesce(rcvdbyte, 0)
  ) as bandwidth,
  count(*) as sessions
from
  $log t1
  inner join app_mdata t2 on t1.appid = t2.id
where
  $filter
  and (
    logflag&1>0
  )
  and behavior is not null
group by
  t2.id
```

```
order by
  risk desc,
  sessions desc
```

Dataset Name	Description	Log Category
Apprisk-Ctrl-Severe-High-Risk-Application	Severe and high risk applications	traffic

```
select
  appcat,
  count(distinct app) as total_num
from
  ###(select appid, app, appcat, apprisk, sum(bandwidth) as bandwidth, sum(sessions) as
sessions from ###base(/*tag:rpt_base_t_top_app*/select dvid, srcip, dstip, epid, euid,
coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src, appid, app,
appcat, apprisk, hostname, sum(coalesce(rcvddelta, rcvdbyte, 0)) as traffic_in, sum(coalesce
(sentdelta, sentbyte, 0)) as traffic_out, sum(coalesce(sentdelta, sentbyte, 0)+coalesce
(rcvddelta, rcvdbyte, 0)) as bandwidth, count(*) as sessions from $log-traffic where $filter
and (logflag&(1|32)>0) and nullifna(app) is not null group by dvid, srcip, dstip, epid,
euid, user_src, appid, app, appcat, apprisk, hostname order by sessions desc)base### t group
by appid, app, appcat, apprisk /*SkipSTART*/order by sessions desc, bandwidth
desc/*SkipEND*/)### t where $filter-drilldown and nullifna(appcat) is not null and apprisk
in ('critical', 'high') group by appcat order by total_num desc
```

Dataset Name	Description	Log Category
Apprisk-Ctrl-Threats-Prevention	Threat Prevention	app-ctrl

```
select
  threat_name,
  count(distinct threats) as total_num
from
  (
    ###(select cast('Malware & Botnet C&C' as char(32)) as threat_name, app as threats,
count(*) as total_num from $log-app-ctrl where $filter and lower(appcat)='botnet' group by
app order by total_num desc)### union all ###(select cast('Malware & Botnet C&C' as char
(32)) as threat_name, virus as threats, count(*) as total_num from $log-virus where $filter
and nullifna(virus) is not null group by virus order by total_num desc)### union all ###
(select cast('Malicious & Phishing Sites' as char(32)) as threat_name, hostname as threats,
count(*) as total_num from $log-webfilter where $filter and cat in (26, 61) group by
hostname order by total_num desc)### union all ###(select cast('Critical & High Intrusion
Attacks' as char(32)) as threat_name, attack as threats, count(*) as total_num from $log-
attack where $filter and severity in ('critical', 'high') group by attack order by total_num
desc)###) t group by threat_name order by total_num desc
```

Dataset Name	Description	Log Category
Apprisk-Ctrl-Application-Vulnerability	Application vulnerabilities discovered	attack

```
select
  attack,
  attackid,
  vuln_type,
  cve,
  severity_number,
  count(
    distinct (
      CASE WHEN direction =& #039;incoming' THEN srcip ELSE dstip END)) as victims, count
(distinct (CASE WHEN direction='incoming' THEN dstip ELSE srcip END)) as sources, sum
(totalnum) as totalnum from ###(select attack, attackid, (case when severity='critical' then
5 when severity='high' then 4 when severity='medium' then 3 when severity='low' then 2 when
severity='info' then 1 else 0 end) as severity_number, direction, dstip, srcip, count(*) as
totalnum from $log where $filter and nullifna(attack) is not null and severity is not null
group by attack, attackid, severity, direction, dstip, srcip order by totalnum desc)### t1
left join (select name, cve, vuln_type from ips_mdata) t2 on t1.attack=t2.name group by
attack, attackid, vuln_type, severity_number, cve order by severity_number desc, totalnum
desc
```

Dataset Name	Description	Log Category
Apprisk-Ctrl-Breakdown-Of-High-Risk-Application	Severe and high risk applications	traffic

```
select
  appcat,
  count(distinct app) as total_num
from
  ###(select appid, app, appcat, apprisk, sum(bandwidth) as bandwidth, sum(sessions) as
sessions from ###base(/*tag:rpt_base_t_top_app*/select dvid, srcip, dstip, epid, euid,
coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src, appid, app,
appcat, apprisk, hostname, sum(coalesce(rcvddelta, rcvdbyte, 0)) as traffic_in, sum(coalesce
(sentdelta, sentbyte, 0)) as traffic_out, sum(coalesce(sentdelta, sentbyte, 0)+coalesce
(rcvddelta, rcvdbyte, 0)) as bandwidth, count(*) as sessions from $log-traffic where $filter
and (logflag&(1|32)>0) and nullifna(app) is not null group by dvid, srcip, dstip, epid,
euid, user_src, appid, app, appcat, apprisk, hostname order by sessions desc)base### t group
by appid, app, appcat, apprisk /*SkipSTART*/order by sessions desc, bandwidth
desc/*SkipEND*/)### t where $filter-drilldown and nullifna(appcat) is not null and apprisk
in ('critical', 'high') group by appcat order by total_num desc
```

Dataset Name	Description	Log Category
Apprisk-Ctrl-Top-20-High-Risk-Application	Application risk high risk application	traffic

```
select
  risk as d_risk,
  count(distinct user_src) as users,
  id,
  name,
  app_cat,
  technology,
  sum(bandwidth) as bandwidth,
  sum(sessions) as sessions
from
  ###(select app, coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as
user_src, action, utmaction, sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0)) as bandwidth,
count(*) as sessions from $log where $filter and (logflag&1>0) group by app, user_src,
action, utmaction order by bandwidth desc)### t1 inner join app_mdata t2 on t1.app=t2.name
where risk>='4' group by id, name, app_cat, technology, risk order by d_risk desc, sessions
desc
```

Dataset Name	Description	Log Category
Apprisk-Ctrl-High-Risk-Application-Behavioral	Application Behavioral Characteristics	traffic

```
select
  behavior,
  round(
    sum(total_num)* 100 / sum(
      sum(total_num)
    ) over (),
    2
  ) as percentage
from
  (
    ###(select (case when lower(appcat)='botnet' then 'malicious' when lower
(appcat)='remote.access' then 'tunneling' when lower(appcat) in ('storage.backup',
'video/audio') then 'bandwidth-consuming' when lower(appcat)='p2p' then 'peer-to-peer' when
lower(appcat)='proxy' then 'proxy' end) as behavior, sum(sessions) as total_num from ###base
(/*tag:rpt_base_t_top_app*/select dvid, srcip, dstip, epid, euid, coalesce(nullifna(`user`),
nullifna(`unauthuser`), ipstr(`srcip`)) as user_src, appid, app, appcat, apprisk, hostname,
sum(coalesce(rcvddelta, rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0))
as traffic_out, sum(coalesce(sentdelta, sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as
bandwidth, count(*) as sessions from $log-traffic where $filter and (logflag&(1|32)>0) and
nullifna(app) is not null group by dvid, srcip, dstip, epid, euid, user_src, appid, app,
appcat, apprisk, hostname order by sessions desc)base### t where lower(appcat) in ('botnet',
'remote.access', 'storage.backup', 'video/audio', 'p2p', 'proxy') and apprisk in
('critical', 'high') group by appcat order by total_num desc)### union all ###(select
'malicious' as behavior,  count(*) as total_num from $log-attack where $filter and
(logflag&16>0) and severity in ('critical', 'high') group by behavior order by total_num
desc)###) t where $filter-drilldown group by behavior order by percentage desc
```

Dataset Name	Description	Log Category
Apprisk-Ctrl-Key-Application-Crossing-The-Network	Key Application Crossing The Network	traffic

```
select
  risk as d_risk,
  count(distinct user_src) as users,
  id,
  name,
  app_cat,
  technology,
  sum(bandwidth) as bandwidth,
  sum(sessions) as sessions
from
  ###(select app, coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as
user_src, sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0)) as bandwidth, count(*) as
sessions from $log where $filter and (logflag&1>0) group by app, user_src order by bandwidth
desc)### t1 inner join app_mdata t2 on t1.app=t2.name group by id, app, app_cat, technology,
risk order by bandwidth desc
```

Dataset Name	Description	Log Category
Apprisk-Ctrl-Risk-Application-Usage-By-Category-With-Pie	Application risk application usage by category	traffic

```
select
  appcat,
  sum(bandwidth) as bandwidth
from
  ###(select appid, app, appcat, apprisk, sum(traffic_in) as traffic_in, sum(traffic_out) as
traffic_out, sum(bandwidth) as bandwidth, sum(sessions) as sessions from ###base(/*tag:rpt_
base_t_top_app*/select dvid, srcip, dstip, epid, euid, coalesce(nullifna(`user`), nullifna
(`unauthuser`), ipstr(`srcip`)) as user_src, appid, app, appcat, apprisk, hostname, sum
(coalesce(rcvddelta, rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as
traffic_out, sum(coalesce(sentdelta, sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as
bandwidth, count(*) as sessions from $log-traffic where $filter and (logflag&(1|32)>0) and
nullifna(app) is not null group by dvid, srcip, dstip, epid, euid, user_src, appid, app,
appcat, apprisk, hostname order by sessions desc)base### t group by appid, app, appcat,
apprisk /*SkipSTART*/order by sessions desc, bandwidth desc/*SkipEND*/)### t where $filter-
drilldown and nullifna(appcat) is not null group by appcat having sum(bandwidth)>0 order by
bandwidth desc
```

Dataset Name	Description	Log Category
Apprisk-Ctrl-Category-Breakdown-By-Bandwidth	Category breakdown of all applications, sorted by bandwidth	traffic

```
select
  appcat,
  count(distinct app) as app_num,
  count(distinct user_src) as user_num,
  sum(bandwidth) as bandwidth,
  sum(sessions) as num_session
from
  ###(select app, appcat, user_src, sum(bandwidth) as bandwidth, sum(sessions) as sessions
from ###base(/*tag:rpt_base_t_top_app*/select dvid, srcip, dstip, epid, euid, coalesce
(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src, appid, app, appcat,
apprisk, hostname, sum(coalesce(rcvddelta, rcvdbyte, 0)) as traffic_in, sum(coalesce
(sentdelta, sentbyte, 0)) as traffic_out, sum(coalesce(sentdelta, sentbyte, 0)+coalesce
(rcvddelta, rcvdbyte, 0)) as bandwidth, count(*) as sessions from $log-traffic where $filter
and (logflag&(1|32)>0) and nullifna(app) is not null group by dvid, srcip, dstip, epid,
euid, user_src, appid, app, appcat, apprisk, hostname order by sessions desc)base### t where
nullifna(appcat) is not null group by app, appcat, user_src order by bandwidth desc)### t
where $filter-drilldown group by appcat order by bandwidth desc
```

Dataset Name	Description	Log Category
Apprisk-Ctrl-Top-Web-Applications-by-Bandwidth	Top 25 Web Categories by Bandwidtih	traffic

```
select
  risk as d_risk,
  id,
  name,
  technology,
  count(distinct f_user) as user_num,
  sum(bandwidth) as bandwidth,
  sum(num_session) as num_session
from
  ###(select appid, coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as f_
user, sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0)) as bandwidth, count(*) as num_session
from $log where $filter and (logflag&1>0) and nullifna(app) is not null and service in
('80/tcp', '443/tcp', 'HTTP', 'HTTPS', 'http', 'https') group by appid, f_user order by
bandwidth desc)### t1 inner join app_mdata t2 on t1.appid=t2.id group by d_risk, id, name,
technology order by bandwidth desc
```

Dataset Name	Description	Log Category
Apprisk-Ctrl-Top-Web-Categories-Visited	Top 25 Web Categories Visited	traffic

```
select
  catdesc,
  count(distinct f_user) as user_num,
  sum(sessions) as sessions,
  sum(bandwidth) as bandwidth
from
  ###(select catdesc, coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as
f_user, count(*) as sessions, sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0)) as bandwidth
from $log-traffic where $filter and catdesc is not null and (logflag&1>0) and (countweb>0 or
((logver is null or logver<502000000) and (hostname is not null or utmevent in ('webfilter',
'banned-word', 'web-content', 'command-block', 'script-filter')))) group by f_user, catdesc
order by sessions desc)### t group by catdesc order by sessions desc
```

Dataset Name	Description	Log Category
Apprisk-Ctrl-Common-Virus-Botnet-Spyware	Common virus disvocered, the botnet communictions and the spyware/adware	traffic

```
select
  virus_s as virus,
  (
    case when lower(appcat)=& #039;botnet' then 'Botnet C&C' else (case when virus_s like
'Riskware%' then 'Spyware' when virus_s like 'Adware%' then 'Adware' else 'Virus' end) end)
as malware_type, appid, app, count(distinct dstip) as victims, count(distinct srcip) as
source, sum(total_num) as total_num from (###(select app as virus_s, appcat, appid, app,
dstip, srcip, count(*) as total_num from $log-traffic where $filter and (logflag&1>0) and
lower(appcat)='botnet' group by virus_s, appcat, appid, dstip, srcip, app order by total_num
desc)### union all ###(select unnest(string_to_array(virus, ',')) as virus_s, appcat, appid,
app, dstip, srcip, count(*) as total_num from $log-traffic where $filter and (logflag&1>0)
and virus is not null group by virus_s, appcat, appid, dstip, srcip, app order by total_num
desc)### union all ###(select attack as virus_s, 'botnet' as appcat, 0 as appid, attack as
app, dstip, srcip, count(*) as total_num from $log-attack where $filter and (logflag&16>0)
group by virus_s, appcat, appid, dstip, srcip, app order by total_num desc)###) t group by
virus, appid, app, malware_type order by total_num desc
```

Dataset Name	Description	Log Category
Apprisk-Ctrl-Zero-Day-Detected-On-Network	Zero-day malware detected on the network	traffic

```
select
  virus_s,
  appid,
  app,
  count(distinct dstip) as victims,
  count(distinct srcip) as source,
  sum(total_num) as total_num
from
  ###(select unnest(string_to_array(virus, ',')) as virus_s, appid, app, dstip, srcip, count
(*) as total_num from $log where $filter and (logflag&1>0) and virus like
'%PossibleThreat.SB%' group by virus_s, dstip, srcip, appid, app order by total_num desc)###
t where virus_s like '%PossibleThreat.SB%' group by virus_s, appid, app  order by total_num
desc
```

Dataset Name	Description	Log Category
Apprisk-Ctrl-Files-Analyzed-By-FortiCloud-Sandbox	Files analyzed by FortiCloud Sandbox	virus

```
select
  $DAY_OF_MONTH as dom,
  count(*) as total_num
from
  $log
where
  $filter
  and nullifna(filename) is not null
  and logid_to_int(logid)= 9233
group by
  dom
order by
  dom
```

Dataset Name	Description	Log Category
Apprisk-Ctrl-Malicious-Files-Detected-By-FortiCloud-Sandbox	Files detected by FortiCloud Sandbox	virus

```
select
  filename,
  analyticscksum,
  count(distinct victim) as victims,
  count(distinct source) as source
from
  ###(select filename, analyticscksum,(CASE WHEN direction='incoming' THEN dstip ELSE srcip
END) as source, (CASE WHEN direction='incoming' THEN srcip ELSE dstip END) as victim, count
(*) as totalnum from $log where $filter and filename is not null and logid_to_int
(logid)=9233 and analyticscksum is not null group by filename, analyticscksum, source,
victim order by totalnum desc)### t group by filename, analyticscksum order by victims desc,
source desc
```

Dataset Name	Description	Log Category
Apprisk-Ctrl-File-Transferred-By-Application	File transferred by applications on the network	app-ctrl

```
select
  appid,
  app,
  filename,
  cloudaction,
  max(filesize) as filesize
from
  $log
where
  $filter
  and filesize is not null
  and clouduser is not null
  and filename is not null
group by
  cloudaction,
  appid,
  app,
  filename
order by
  filesize desc
```

Dataset Name	Description	Log Category
appctrl-Top-Blocked-SCCP-Callers	Appctrl top blocked SCCP callers	app-ctrl

```
select
  caller,
  sum(totalnum) as totalnum
from
  ###(select srcname as caller, app, count(*) as totalnum from $log where $filter and
srcname is not null and lower(appcat)='voip' and action='block' group by caller, app order
by totalnum desc)### t where app='sccp' group by caller order by totalnum desc
```

Dataset Name	Description	Log Category
appctrl-Top-Blocked-SIP-Callers	Appctrl top blocked SIP callers	app-ctrl

```
select
  caller,
  sum(totalnum) as totalnum
from
  ###(select srcname as caller, app, count(*) as totalnum from $log where $filter and
srcname is not null and lower(appcat)='voip' and action='block' group by caller, app order
by totalnum desc)### t where app='sip' group by caller order by totalnum desc
```

Dataset Name	Description	Log Category
security-Top20-High-Risk-Application-In-Use	High risk application in use	traffic

```
select
  d_risk,
  count(distinct f_user) as users,
  name,
  app_cat,
  technology,
  sum(bandwidth) as bandwidth,
  sum(sessions) as sessions
from
  ###(select risk as d_risk, coalesce(nullifna(t1.`user`), nullifna(t1.`unauthuser`), ipstr
(t1.`srcip`)) as f_user, t2.name, t2.app_cat, t2.technology, sum(coalesce(sentbyte,
0)+coalesce(rcvdbyte, 0)) as bandwidth,  count(*) as sessions from $log t1 inner join app_
mdata t2 on t1.appid=t2.id where $filter and risk>='4' and (logflag&1>0) group by f_user,
t2.name, t2.app_cat, t2.technology, risk)### t group by d_risk, name, app_cat, technology
order by d_risk desc, sessions desc
```

Dataset Name	Description	Log Category
security-High-Risk-Application-By-Category	High risk application by category	traffic

```
select
  app_cat,
  count(distinct app) as total_num
from
  ###(select app_cat, app from $log t1 inner join app_mdata t2 on t1.appid=t2.id where
$filter and risk>='4' and (logflag&1>0) group by app_cat, app)### t group by app_cat order
by total_num desc
```

Dataset Name	Description	Log Category
security-Top10-Application-Categories-By-Bandwidth	Application risk application usage by category	traffic

```
select
  appcat,
  sum(bandwidth) as bandwidth
from
  ###(select appid, app, appcat, apprisk, sum(traffic_in) as traffic_in, sum(traffic_out) as
traffic_out, sum(bandwidth) as bandwidth, sum(sessions) as sessions from ###base(/*tag:rpt_
base_t_top_app*/select dvid, srcip, dstip, epid, euid, coalesce(nullifna(`user`), nullifna
(`unauthuser`), ipstr(`srcip`)) as user_src, appid, app, appcat, apprisk, hostname, sum
(coalesce(rcvddelta, rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as
traffic_out, sum(coalesce(sentdelta, sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as
bandwidth, count(*) as sessions from $log-traffic where $filter and (logflag&(1|32)>0) and
nullifna(app) is not null group by dvid, srcip, dstip, epid, euid, user_src, appid, app,
appcat, apprisk, hostname order by sessions desc)base### t group by appid, app, appcat,
apprisk /*SkipSTART*/order by sessions desc, bandwidth desc/*SkipEND*/)### t where $filter-
drilldown and nullifna(appcat) is not null group by appcat having sum(bandwidth)>0 order by
bandwidth desc
```

Dataset Name	Description	Log Category
Security-Category-Breakdown-By-Bandwidth	Category breakdown of all applications, sorted by bandwidth	traffic

```
select
  appcat,
  count(distinct app) as app_num,
  count(distinct user_src) as user_num,
  sum(bandwidth) as bandwidth,
  sum(sessions) as num_session
```

```
from
  ###(select app, appcat, user_src, sum(bandwidth) as bandwidth, sum(sessions) as sessions
from ###base(/*tag:rpt_base_t_top_app*/select dvid, srcip, dstip, epid, euid, coalesce
(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src, appid, app, appcat,
apprisk, hostname, sum(coalesce(rcvddelta, rcvdbyte, 0)) as traffic_in, sum(coalesce
(sentdelta, sentbyte, 0)) as traffic_out, sum(coalesce(sentdelta, sentbyte, 0)+coalesce
(rcvddelta, rcvdbyte, 0)) as bandwidth, count(*) as sessions from $log-traffic where $filter
and (logflag&(1|32)>0) and nullifna(app) is not null group by dvid, srcip, dstip, epid,
euid, user_src, appid, app, appcat, apprisk, hostname order by sessions desc)base### t where
nullifna(appcat) is not null group by app, appcat, user_src order by bandwidth desc)### t
where $filter-drilldown group by appcat order by bandwidth desc
```

Dataset Name	Description	Log Category
security-Top25-Web-Applications-By-Bandwidth	Top Web Applications by Bandwidtih	traffic

```
select
  d_risk,
  name,
  app_cat,
  technology,
  count(distinct f_user) as users,
  sum(bandwidth) as bandwidth,
  sum(num_session) as sessions
from
  ###(select risk as d_risk, t2.app_cat, t2.name, t2.technology, coalesce(nullifna
(t1.`user`), nullifna(t1.`unauthuser`), ipstr(t1.`srcip`)) as f_user, sum(coalesce(sentbyte,
0)+coalesce(rcvdbyte, 0)) as bandwidth, count(*) as num_session from $log t1 inner join app_
mdata t2 on t1.appid=t2.id where $filter and (logflag&1>0) and nullifna(app) is not null and
service in ('80/tcp', '443/tcp', 'HTTP', 'HTTPS', 'http', 'https') group by risk, t2.app_
cat, t2.name, t2.technology, f_user)### t group by d_risk, name, app_cat, technology order
by bandwidth desc
```

Dataset Name	Description	Log Category
Security-Top25-Web-Categories-Visited	Top 25 Web Categories Visited	traffic

```
select
  catdesc,
  count(distinct f_user) as user_num,
  sum(sessions) as sessions,
  sum(bandwidth) as bandwidth
from
  ###(select catdesc, coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as
f_user, count(*) as sessions, sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0)) as bandwidth
from $log-traffic where $filter and catdesc is not null and (logflag&1>0) and (countweb>0 or
((logver is null or logver<502000000) and (hostname is not null or utmevent in ('webfilter',
'banned-word', 'web-content', 'command-block', 'script-filter')))) group by f_user, catdesc
order by sessions desc)### t group by catdesc order by sessions desc
```

Dataset Name	Description	Log Category
security-Top25-Malware-Virus-Botnet-Spyware	Malware: viruses, Bots, Spyware/Adware	traffic

```
select
  virus_s as virus,
  (
    case when lower(appcat)=& #039;botnet' then 'Botnet C&C' else (case when virus_s like
'Riskware%' then 'Spyware' when virus_s like 'Adware%' then 'Adware' else 'Virus' end) end)
as malware_type, count(distinct dstip) as victims, count(distinct srcip) as source, sum
(total_num) as total_num from (###(select app as virus_s, appcat, dstip, srcip, count(*) as
total_num from $log-traffic where $filter and (logflag&1>0) and lower(appcat)='botnet' group
by virus_s, appcat, dstip, srcip order by total_num desc)### union all ###(select unnest
(string_to_array(virus, ',')) as virus_s, appcat, dstip, srcip, count(*) as total_num from
$log-traffic where $filter and (logflag&1>0) and virus is not null group by virus_s, appcat,
dstip, srcip order by total_num desc)### union all ###(select attack as virus_s, 'null' as
appcat, dstip, srcip, count(*) as total_num from $log-attack where $filter and
(logflag&16>0) group by virus_s, appcat, dstip, srcip order by total_num desc)###) t group
by virus, malware_type order by total_num desc
```

Dataset Name	Description	Log Category
security-Top10-Malware-Virus-Spyware	Malware: viruses, Spyware/Adware	virus

```
select
  virus,
  max(virusid_s) as virusid,
  malware_type,
  count(distinct victim) as victims,
  count(distinct source) as source,
  sum(total_num) as total_num
from
  ###(select virus, virusid_to_str(virusid, eventtype) as virusid_s, (CASE WHEN
direction='incoming' THEN dstip ELSE srcip END) as source, (CASE WHEN direction='incoming'
THEN srcip ELSE dstip END) as victim, (case when virus like 'Riskware%' then 'Spyware' when
virus like 'Adware%' then 'Adware' else 'Virus' end)  as malware_type, count(*) as total_num
from $log where $filter and nullifna(virus) is not null group by virus, virusid_s, source,
victim order by total_num desc)### t group by virus, malware_type order by total_num desc
```

Dataset Name	Description	Log Category
security-Top10-Malware-Botnet	Malware: Botnet	appctrl

```
select
  app,
  appid,
  malware_type,
  count(distinct victim) as victims,
  count(distinct source) as source,
  sum(total_num) as total_num
from
  (
    ###(select app, appid, cast('Botnet C&C' as char(32)) as malware_type,(CASE WHEN
direction='incoming' THEN dstip ELSE srcip END) as source, (CASE WHEN direction='incoming'
THEN srcip ELSE dstip END) as victim, count(*) as total_num from $log-app-ctrl where $filter
and lower(appcat)='botnet' and nullifna(app) is not null group by app, appid, malware_type,
source, victim order by total_num desc)### union all ###(select attack, 0 as appid, cast
('Botnet C&C' as char(32)) as malware_type, (CASE WHEN direction='incoming' THEN dstip ELSE
srcip END) as source, (CASE WHEN direction='incoming' THEN srcip ELSE dstip END) as victim,
count(*) as total_num from $log-attack where $filter and (logflag&16>0) group by attack,
appid, malware_type, source, victim order by total_num desc)###) t group by app, appid,
malware_type order by total_num desc
```

Dataset Name	Description	Log Category
security-Top10-Victims-of-Malware	Victims of Malware	virus

```
select
  coalesce(
    nullifna(`user`),
    nullifna(`unauthuser`),
    ipstr(`srcip`)
  ) as user_src,
  virus as malware,
  count(*) as total_num
from
  $log
where
  $filter
  and virus is not null
group by
  user_src,
  malware
order by
  total_num desc
```

Dataset Name	Description	Log Category
security-Top10-Victims-of-Phishing-Site	Victims of Phishing Site	webfilter

```
select
  coalesce(
    nullifna(`user`),
    nullifna(`unauthuser`),
    ipstr(`srcip`)
  ) as user_src,
  (
    lower(service) || & #039;://' || hostname || url) as phishing_site, count(*) as total_
num from $log where $filter and lower(service) in ('http', 'https') and hostname is not null
and cat in (26, 61) group by user_src, phishing_site order by total_num desc
```

Dataset Name	Description	Log Category
security-Top25-Malicious-Phishing-Sites	Malicious Phishing Site	webfilter

```
select
  phishing_site,
  count(distinct dstip) as victims,
  count(distinct srcip) as source,
  sum(total) as total_num
from
  ###(select (lower(service) || '://' || hostname || url) as phishing_site, dstip, srcip,
count(*) as total from $log where $filter and lower(service) in ('http', 'https') and
hostname is not null and cat in (26, 61) group by phishing_site, dstip, srcip order by total
desc)### t group by phishing_site order by total_num desc
```

Dataset Name	Description	Log Category
security-Application-Vulnerability	Application vulnerabilities discovered	attack

```
select
  attack,
  attackid,
  vuln_type,
  cve,
  severity_number,
  count(
    distinct (
      CASE WHEN direction =& #039;incoming' THEN srcip ELSE dstip END)) as victims, count
(distinct (CASE WHEN direction='incoming' THEN dstip ELSE srcip END)) as sources, sum
(totalnum) as totalnum from ###(select attack, attackid, (case when severity='critical' then
5 when severity='high' then 4 when severity='medium' then 3 when severity='low' then 2 when
severity='info' then 1 else 0 end) as severity_number, direction, dstip, srcip, count(*) as
totalnum from $log where $filter and nullifna(attack) is not null and severity is not null
group by attack, attackid, severity, direction, dstip, srcip order by totalnum desc)### t1
left join (select name, cve, vuln_type from ips_mdata) t2 on t1.attack=t2.name group by
attack, attackid, vuln_type, severity_number, cve order by severity_number desc, totalnum
desc
```

Dataset Name	Description	Log Category
security-Files-Analyzed-By-FortiCloud-Sandbox	Files analyzed by FortiCloud Sandbox	virus

```
select
  $day_of_week as dow,
  count(*) as total_num
from
  $log
where
  $filter
  and nullifna(filename) is not null
  and logid_to_int(logid)= 9233
group by
  dow
order by
  dow
```

Dataset Name	Description	Log Category
Security-Zero-Day-Detected-On-Network	Zero-day malware detected on the network	traffic

```
select
  virus_s,
  app,
  count(distinct dstip) as victims,
  count(distinct srcip) as source,
  sum(total_num) as total_num
```

```
from
  ###(select unnest(string_to_array(virus, ',')) as virus_s, app, dstip, srcip, count(*) as
total_num from $log where $filter and (logflag&1>0) and virus like '%PossibleThreat.SB%'
group by virus_s, dstip, srcip, app)### t group by virus_s, app order by total_num desc
```

Dataset Name	Description	Log Category
security-Data-Loss-Incidents-By-Severity	Data loss incidents summary by severity	dlp

```
select
  initcap(severity : :text) as s_severity,
  count(*) as total_num
from
  ###(select itime, hostname,`from` as sender, `to` as receiver, profile, action, service,
subtype, srcip, dstip, severity, filename, direction, filesize, (case when
severity='critical' then 'Critical Data Exfiltration' else (case when coalesce(nullifna
(`user`), ipstr(`srcip`)) is not null then 'User Associated Data Loss' else NULL end) end)
as data_loss from $log where $filter /*SkipSTART*/order by itime desc/*SkipEND*/)### t where
$filter-drilldown and severity is not null group by s_severity order by total_num desc
```

Dataset Name	Description	Log Category
security-Data-Loss-Files-By-Service	Data Lass Files By Service	dlp

```
select
  filename,
  (
    case direction when & #039;incoming' then 'Download' when 'outgoing' then 'Upload' end)
as action, max(filesize) as filesize, service from  ###(select itime, hostname,`from` as
sender, `to` as receiver, profile, action, service, subtype, srcip, dstip, severity,
filename, direction, filesize, (case when severity='critical' then 'Critical Data
Exfiltration' else (case when coalesce(nullifna(`user`), ipstr(`srcip`)) is not null then
'User Associated Data Loss' else NULL end) end) as data_loss from $log where $filter
/*SkipSTART*/order by itime desc/*SkipEND*/)### t where $filter-drilldown and filesize is
not null group by filename, direction, service order by filesize desc
```

Dataset Name	Description	Log Category
security-Endpoint-Security-Events-Summary	Endpoint Security Events summary	fct-traffic

```
select
  (
    case utmevent when & #039;antivirus' then 'Malware incidents' when 'webfilter' then
'Malicious/phishing websites' when 'appfirewall' then 'Risk applications' when 'dlp' then
'Data loss incidents' when 'netscan' then 'Vulnerability detected' else 'Others' end) as
events, count(*) as total_num from $log where $filter and utmevent is not null group by
events order by total_num desc
```

Dataset Name	Description	Log Category
security-Top-Endpoing-Running-High-Risk-Application	Endpoints Running High Risk Application	fct-traffic

```
select
  coalesce(
    nullifna(`user`),
    ipstr(`srcip`),
    & #039;Unknown') as f_user, coalesce(nullifna(hostname), 'Unknown') as host_name, threat
as app, t2.app_cat as appcat, risk as d_risk from $log t1 inner join app_mdata t2 on
t1.threat=t2.name where $filter and utmevent='appfirewall' and risk>='4' group by f_user,
host_name, t1.threat, t2.app_cat, t2.risk order by risk desc
```

Dataset Name	Description	Log Category
security-Top-Endpoints-Infected-With-Malware	Endpoints Infected With Malware	fct-event

```
select
  coalesce(
    nullifna(`user`),
    ipstr(`deviceip`),
    & #039;Unknown') as f_user, coalesce(nullifna(hostname), 'Unknown') as host_name, virus,
file from $log where $filter and subtype='av' and virus is not null group by f_user, host_
name, virus, file
```

Dataset Name	Description	Log Category
security-Top-Endpoints-With-Web-Violateions	Endpoints With Web Violations	fct-traffic

```
select
  f_user,
  host_name,
  remotename,
  sum(total_num) as total_num
from
  ###(select coalesce(nullifna(`user`), ipstr(`srcip`)) as f_user, coalesce(nullifna
(hostname), 'Unknown') as host_name, remotename, count(*) as total_num from $log where
$filter and utmevent='webfilter' and remotename is not null and utmaction='blocked' group by
f_user, host_name, remotename order by total_num desc)### t group by f_user, host_name,
remotename order by total_num desc
```

Dataset Name	Description	Log Category
security-Top-Endpoints-With-Data-Loss-Incidents	Endpoints With Data Loss Incidents	fct-event

```
select
  f_user,
  host_name,
  msg,
  sum(total_num) as total_num
from
  ###(select coalesce(nullifna(`user`), ipstr(`deviceip`), 'Unknown') as f_user, coalesce
(nullifna(hostname), 'Unknown') as host_name, msg, count(*) as total_num from $log where
$filter and subtype='dlp' group by f_user, host_name, msg order by total_num desc)### t
group by f_user, host_name, msg order by total_num desc
```

Dataset Name	Description	Log Category
content-Count-Total-SCCP-Call-Registrations-by-Hour-of-Day	Content count total SCCP call registrations by hour of day	content

```
select
  hourstamp,
  count(totalnum) as totalnum
from
  ###(select $hour_of_day as hourstamp, proto, kind, status, sum(duration) as sccp_usage,
count(*) as totalnum from $log-content where $filter group by hourstamp, proto, kind, status
order by totalnum desc)### t where proto='sccp' and kind='register' group by hourstamp order
by hourstamp
```

Dataset Name	Description	Log Category
content-Count-Total-SCCP-Calls-Duration-by-Hour-of-Day	Content count total SCCP calls duration by hour of day	content

```
select
  hourstamp,
  sum(sccp_usage) as sccp_usage
from
  ###(select $hour_of_day as hourstamp, proto, kind, status, sum(duration) as sccp_usage,
count(*) as totalnum from $log-content where $filter group by hourstamp, proto, kind, status
order by totalnum desc)### t where proto='sccp' and kind='call-info' and status='end' group
by hourstamp order by hourstamp
```

Dataset Name	Description	Log Category
content-Count-Total-SCCP-Calls-per-Status	Content count total SCCP calls per status	content

```
select
  status,
  count(totalnum) as totalnum
from
  ###(select $hour_of_day as hourstamp, proto, kind, status, sum(duration) as sccp_usage,
count(*) as totalnum from $log-content where $filter group by hourstamp, proto, kind, status
order by totalnum desc)### t where proto='sccp' and kind='call-info' group by status order
by totalnum desc
```

Dataset Name	Description	Log Category
content-Count-Total-SIP-Call-Registrations-by-Hour-of-Day	Content count total SIP call registrations by hour of day	content

```
select
  hourstamp,
  count(totalnum) as totalnum
from
  ###(select $hour_of_day as hourstamp, proto, kind, status, sum(duration) as sccp_usage,
count(*) as totalnum from $log-content where $filter group by hourstamp, proto, kind, status
order by totalnum desc)### t where proto='sip' and kind='register' group by hourstamp order
by hourstamp
```

Dataset Name	Description	Log Category
content-Count-Total-SIP-Calls-per-Status	Content count total SIP calls per status	content

```
select
  status,
  count(totalnum) as totalnum
from
  ###(select $hour_of_day as hourstamp, proto, kind, status, sum(duration) as sccp_usage,
count(*) as totalnum from $log-content where $filter group by hourstamp, proto, kind, status
order by totalnum desc)### t where proto='sip' and kind='call' group by status order by
totalnum desc
```

Dataset Name	Description	Log Category
content-Dist-Total-SIP-Calls-by-Duration	Content dist total SIP calls by duration	content

```
select
  (
    case when duration<60 then & #039;LESS_ONE_MIN' when duration < 600 then 'LESS_TEN_MIN'
when duration < 3600 then 'LESS_ONE_HOUR' when duration >= 3600 then 'MORE_ONE_HOUR' else
'unknown' end) as f_duration, count(*) as totalnum from $log where $filter and proto='sip'
and kind='call' and status='end' group by f_duration order by totalnum desc
```

Dataset Name	Description	Log Category
Botnet-Activity-By-Sources	Botnet activity by sources	traffic

```
select
  app,
  user_src,
  sum(events) as events
from
  (
    (
      select
        app,
        user_src,
        sum(totalnum) as events
      from
        ###(select app, appcat, apprisk, srcip, dstip, coalesce(nullifna(`user`), nullifna
(`unauthuser`), ipstr(`srcip`)) as user_src, count(*) as totalnum from $log-traffic where
$filter and (logflag&1>0) and appcat='Botnet' and nullifna(app) is not null group by app,
appcat, apprisk, srcip, dstip, user_src order by totalnum desc)### t group by app, user_src
order by events desc) union all (select attack, user_src, sum(totalnum) as events from ###
(select attack, coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_
src, $flex_timestamp as timestamp, hostname, severity, crlevel, eventtype, service, dstip,
srcip, count(*) as totalnum from $log-attack where $filter and (logflag&16>0) group by
attack, user_src, timestamp, hostname, severity, crlevel, eventtype, service, dstip, srcip
order by timestamp desc)### t group by attack, user_src order by events desc)) t group by
app, user_src order by events desc
```

Dataset Name	Description	Log Category
Botnet-Infected-Hosts	Botnet infected hosts	traffic

```
select
  user_src,
  devtype_new,
  host_mac,
  sum(events) as events
from
  (
    ###(select coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_
src, get_devtype(srcswversion, osname, devtype) as devtype_new, coalesce(srcname, srcmac) as
host_mac, count(*) as events from $log-traffic where $filter and (logflag&1>0) and
appcat='Botnet' group by user_src, devtype_new, host_mac order by events desc)### union all
###(select coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src,
'Unknown' as devtype_new, hostname as host_mac, count(*) as events from $log-attack where
$filter and (logflag&16>0) group by user_src, devtype_new, host_mac order by events
desc)###) t group by user_src, devtype_new, host_mac order by events desc
```

Dataset Name	Description	Log Category
Detected-Botnet	Detected botnet	traffic

```
select
  app,
  sum(events) as events
from
  (
    (
      select
        app,
        sum(totalnum) as events
      from
        ###(select app, appcat, apprisk, srcip, dstip, coalesce(nullifna(`user`), nullifna
(`unauthuser`), ipstr(`srcip`)) as user_src, count(*) as totalnum from $log-traffic where
$filter and (logflag&1>0) and appcat='Botnet' and nullifna(app) is not null group by app,
appcat, apprisk, srcip, dstip, user_src order by totalnum desc)### t group by app order by
events desc) union all (select attack, sum(totalnum) as events from ###(select attack,
coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src, $flex_
timestamp as timestamp, hostname, severity, crlevel, eventtype, service, dstip, srcip, count
(*) as totalnum from $log-attack where $filter and (logflag&16>0) group by attack, user_src,
timestamp, hostname, severity, crlevel, eventtype, service, dstip, srcip order by timestamp
desc)### t group by attack order by events desc)) t group by app order by events desc
```

Dataset Name	Description	Log Category
Botnet-Sources	Botnet sources	traffic

```
select
  dstip,
  domain,
  sum(events) as events
from
  (
    (
      select
        dstip,
        domain,
        sum(events) as events
      from
        ###(select dstip, root_domain(hostname) as domain, count(*) as events from $log-
traffic where $filter and (logflag&1>0) and appcat='Botnet' and dstip is not null group by
dstip, domain order by events desc)### t group by dstip, domain) union all (select dstip,
root_domain(hostname) as domain, sum(totalnum) as events from ###(select attack, coalesce
(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src, $flex_timestamp as
timestamp, hostname, severity, crlevel, eventtype, service, dstip, srcip, count(*) as
totalnum from $log-attack where $filter and (logflag&16>0) group by attack, user_src,
timestamp, hostname, severity, crlevel, eventtype, service, dstip, srcip order by timestamp
desc)### t group by dstip, domain)) t group by dstip, domain order by events desc
```

Dataset Name	Description	Log Category
Botnet-Victims	Botnet victims	traffic

```
select
  user_src,
  sum(events) as events
from
  (
    (
      select
        user_src,
        sum(totalnum) as events
      from
        ###(select app, appcat, apprisk, srcip, dstip, coalesce(nullifna(`user`), nullifna
(`unauthuser`), ipstr(`srcip`)) as user_src, count(*) as totalnum from $log-traffic where
$filter and (logflag&1>0) and appcat='Botnet' and nullifna(app) is not null group by app,
appcat, apprisk, srcip, dstip, user_src order by totalnum desc)### t group by user_src)
union all (select user_src, sum(totalnum) as events from ###(select attack, coalesce
(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src, $flex_timestamp as
timestamp, hostname, severity, crlevel, eventtype, service, dstip, srcip, count(*) as
totalnum from $log-attack where $filter and (logflag&16>0) group by attack, user_src,
timestamp, hostname, severity, crlevel, eventtype, service, dstip, srcip order by timestamp
desc)### t group by user_src)) t group by user_src order by events desc
```

Dataset Name	Description	Log Category
Botnet-Timeline	Botnet timeline	traffic

```
select
  $flex_datetime(timestamp) as hodex,
  sum(events) as events
from
  (
    ###(select $flex_timestamp as timestamp, count(*) as events from $log-traffic where
$filter and (logflag&1>0) and appcat='Botnet' group by timestamp order by timestamp desc)###
union all ###(select $flex_timestamp as timestamp, count(*) as events from $log-dns where
$filter and (botnetdomain is not null or botnetip is not null) group by timestamp order by
timestamp)### union all ###(select $flex_timestamp as timestamp, count(*) as events from
$log-attack where $filter and (logflag&16>0) group by timestamp order by timestamp)###) t
group by hodex order by hodex
```

Dataset Name	Description	Log Category
Application-Session-History	Application session history	traffic

```
select
  $flex_timescale(timestamp) as hodex,
  sum(counter) as counter
from
  ###(select $flex_timestamp as timestamp, count(*) as counter from $log where $filter and
(logflag&1>0) group by timestamp order by timestamp desc)### t group by hodex order by hodex
```

Dataset Name	Description	Log Category
Application-Usage-List	Detailed application usage	traffic

```
select
  appid,
  app,
  appcat,
  (
    case when (
      utmaction in (
        & #039;block', 'blocked') or action='deny') then 'Blocked' else 'Allowed' end) as
custaction, sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0)) as bandwidth,count(*) as num_
session from $log where $filter and (logflag&1>0) and nullifna(app) is not null and policyid
!= 0 group by appid,app, appcat,custaction order by bandwidth desc
```

Dataset Name	Description	Log Category
PCI-DSS-Compliance-Summary	PCI DSS Compliance Summary	event

```
select
  status,
  num_reason as requirements,
  cast(
    num_reason * 100.0 /(
      sum(num_reason) over()
    ) as decimal(18, 2)
  ) as percent
from
  (
    select
      (
        case when fail_count>0 then & #039;Non-Compliant' else 'Compliant' end) as status,
count(distinct reason) as num_reason from (select ftnt_pci_id, (sum(fail_count) over
(partition by ftnt_pci_id)) as fail_count, reason from ###(select ftnt_pci_id, (case when
result='fail' then 1 else 0 end) as fail_count, reason from $log t1 inner join pci_dss_mdata
t2 on t1.reason=t2.ftnt_id where $filter and subtype='compliance-check' group by ftnt_pci_
id, result, reason)### t) t group by status) t order by status
```

Dataset Name	Description	Log Category
PCI-DSS-Non-Compliant-Requirements-By-Severity	PCI DSS Non-Compliant Requirements by Severity	event

```
with query as (
  select
    *
  from
    (
      select
        ftnt_pci_id,
        severity,
        (
          sum(fail_count) over (partition by ftnt_pci_id)
        ) as fail_count,
        reason
      from
        ###(select ftnt_pci_id, t2.severity, (case when result='fail' then 1 else 0 end) as
fail_count, reason from $log t1 inner join pci_dss_mdata t2 on t1.reason=t2.ftnt_id where
$filter and subtype='compliance-check' group by ftnt_pci_id, t2.severity, result, reason
order by fail_count desc)### t) t where fail_count>0) select t.severity, count(distinct
t.reason) as requirements from (select distinct on (1) reason, severity from query order by
reason, (case lower(severity) when 'high' then 4 when 'critical' then 3 when 'medium' then 2
when 'low' then 1 else 0 end) desc) t group by t.severity order by requirements desc
```

Dataset Name	Description	Log Category
PCI-DSS-Compliant-Requirements-By-Severity	PCI DSS Compliant Requirements by Severity	event

```
with query as (
  select
    *
  from
    (
      select
        ftnt_pci_id,
        severity,
        (
          sum(fail_count) over (partition by ftnt_pci_id)
        ) as fail_count,
        reason
      from
        ###(select ftnt_pci_id, t2.severity, (case when result='fail' then 1 else 0 end) as
fail_count, reason from $log t1 inner join pci_dss_mdata t2 on t1.reason=t2.ftnt_id where
$filter and subtype='compliance-check' group by ftnt_pci_id, t2.severity, result, reason
order by fail_count desc)### t) t where fail_count=0) select t.severity, count(distinct
t.reason) as requirements from (select distinct on (1) reason, severity from query order by
reason, (case lower(severity) when 'high' then 4 when 'critical' then 3 when 'medium' then 2
when 'low' then 1 else 0 end) desc) t group by t.severity order by requirements desc
```

Dataset Name	Description	Log Category
PCI-DSS-Fortinet-Security-Best-Practice-Summary	PCI DSS Fortinet Security Best Practice Summary	event

```
select
  status,
  num_reason as practices,
  cast(
    num_reason * 100.0 /(
      sum(num_reason) over()
    ) as decimal(18, 2)
  ) as percent
from
  (
    select
      (
        case when result =& #039;fail' then 'Failed' else 'Passed' end) as status, count
(distinct reason) as num_reason from ###(select result, reason from $log where $filter and
subtype='compliance-check' and result in ('fail','pass') group by result, reason)### t group
by status) t order by status desc
```

Dataset Name	Description	Log Category
PCI-DSS-Failed-Fortinet-Security-Best-Practices-By-Severity	PCI DSS Failed Fortinet Security Best Practices by Severity	event

```
select
  status,
  num_reason as practices,
  cast(
    num_reason * 100.0 /(
      sum(num_reason) over()
    ) as decimal(18, 2)
  ) as percent
from
  (
    select
      initcap(status) as status,
      count(distinct reason) as num_reason
    from
      ###(select status, reason, result from $log where $filter and subtype='compliance-
check' group by status, reason, result)### t where result='fail' group by status) t order by
status
```

Dataset Name	Description	Log Category
PCI-DSS-Passed-Fortinet-Security-Best-Practices-By-Severity	PCI DSS Passed Fortinet Security Best Practices by Severity	event

```
select
  status,
  num_reason as practices,
  cast(
    num_reason * 100.0 /(
      sum(num_reason) over()
    ) as decimal(18, 2)
  ) as percent
from
  (
    select
      initcap(status) as status,
      count(distinct reason) as num_reason
    from
      ###(select status, reason, result from $log where $filter and subtype='compliance-
check' group by status, reason, result)### t where result='pass' group by status) t order by
status
```

Dataset Name	Description	Log Category
PCI-DSS-Requirements-Compliance-Details	PCI DSS Requirements Compliance Details	event

```
select
  ftnt_pci_id,
  left(
    string_agg(
      distinct ftnt_id,
      & #039;,'), 120) as practice, (case when sum(fail_count)>0 then 'Non-Compliant' else
'Compliant' end) as compliance, pci_requirement from ###(select ftnt_pci_id, ftnt_id, (case
when result='fail' then 1 else 0 end) as fail_count, pci_requirement from $log t1 inner join
pci_dss_mdata t2 on t1.reason=t2.ftnt_id where $filter and subtype='compliance-check' group
by ftnt_pci_id, ftnt_id, result, pci_requirement)### t group by ftnt_pci_id, pci_requirement
order by ftnt_pci_id
```

Dataset Name	Description	Log Category
PCI-DSS-Fortinet-Security-Best-Practice-Details	PCI DSS Fortinet Security Best Practice Details	event

```
select
  reason as ftnt_id,
  msg,
  initcap(status) as status,
  module
from
  $log
where
  $filter
  and subtype =& #039;compliance-check' group by reason, status, module, msg order by ftnt_
id
```

Dataset Name	Description	Log Category
DLP-Email-Activity-Details	Email DLP Violations Summary	dlp

```
select
  from_itime(itime) as timestamp,
  sender,
  receiver,
  regexp_replace(
    filename,
    & #039;.*/', '') as filename, filesize, profile, action, direction from ###(select
itime, hostname,`from` as sender, `to` as receiver, profile, action, service, subtype,
srcip, dstip, severity, filename, direction, filesize, (case when severity='critical' then
'Critical Data Exfiltration' else (case when coalesce(nullifna(`user`), ipstr(`srcip`)) is
not null then 'User Associated Data Loss' else NULL end) end) as data_loss from $log where
$filter /*SkipSTART*/order by itime desc/*SkipEND*/)### t where $filter-drilldown and
(service in ('smtp', 'SMTP', '25/tcp', '587/tcp', 'smtps', 'SMTPS', '465/tcp') or service in
('pop3', 'POP3', '110/tcp', 'imap', 'IMAP', '143/tcp', 'imaps', 'IMAPS', '993/tcp', 'pop3s',
'POP3S', '995/tcp')) order by timestamp desc
```

Dataset Name	Description	Log Category
Email-DLP-Chart	Email DLP Activity Summary	dlp

```
select
  profile,
  count(*) as total_num
from
  ###(select itime, hostname,`from` as sender, `to` as receiver, profile, action, service,
subtype, srcip, dstip, severity, filename, direction, filesize, (case when
severity='critical' then 'Critical Data Exfiltration' else (case when coalesce(nullifna
(`user`), ipstr(`srcip`)) is not null then 'User Associated Data Loss' else NULL end) end)
as data_loss from $log where $filter /*SkipSTART*/order by itime desc/*SkipEND*/)### t where
$filter-drilldown and (service in ('smtp', 'SMTP', '25/tcp', '587/tcp', 'smtps', 'SMTPS',
'465/tcp') or service in ('pop3', 'POP3', '110/tcp', 'imap', 'IMAP', '143/tcp', 'imaps',
'IMAPS', '993/tcp', 'pop3s', 'POP3S', '995/tcp')) group by profile order by total_num desc
```

Dataset Name	Description	Log Category
DLP-Web-Activity-Details	Web DLP Violations Summary	dlp

```
select
  from_itime(itime) as timestamp,
  srcip,
  dstip,
  hostname,
  profile,
  filename,
  filesize,
  action,
  direction
from
  ###(select itime, hostname,`from` as sender, `to` as receiver, profile, action, service,
subtype, srcip, dstip, severity, filename, direction, filesize, (case when
severity='critical' then 'Critical Data Exfiltration' else (case when coalesce(nullifna
(`user`), ipstr(`srcip`)) is not null then 'User Associated Data Loss' else NULL end) end)
as data_loss from $log where $filter /*SkipSTART*/order by itime desc/*SkipEND*/)### t where
$filter-drilldown and lower(service) in ('http', 'https') order by timestamp desc
```

Dataset Name	Description	Log Category
Web-DLP-Chart	Web DLP Activity Summary	dlp

```
select
  profile,
  count(*) as total_num
from
  ###(select itime, hostname,`from` as sender, `to` as receiver, profile, action, service,
subtype, srcip, dstip, severity, filename, direction, filesize, (case when
severity='critical' then 'Critical Data Exfiltration' else (case when coalesce(nullifna
(`user`), ipstr(`srcip`)) is not null then 'User Associated Data Loss' else NULL end) end)
as data_loss from $log where $filter /*SkipSTART*/order by itime desc/*SkipEND*/)### t where
$filter-drilldown and lower(service) in ('http', 'https') group by profile order by total_
num desc
```

Dataset Name	Description	Log Category
DLP-FTP-Activity-Details	Web DLP Violations Summary	dlp

```
select
  from_itime(itime) as timestamp,
  srcip,
  dstip,
  filename,
  profile,
  filesize,
  action,
  direction
from
  ###(select itime, hostname,`from` as sender, `to` as receiver, profile, action, service,
subtype, srcip, dstip, severity, filename, direction, filesize, (case when
severity='critical' then 'Critical Data Exfiltration' else (case when coalesce(nullifna
(`user`), ipstr(`srcip`)) is not null then 'User Associated Data Loss' else NULL end) end)
as data_loss from $log where $filter /*SkipSTART*/order by itime desc/*SkipEND*/)### t where
$filter-drilldown and lower(service) in ('ftp', 'ftps') order by timestamp desc
```

Dataset Name	Description	Log Category
FTP-DLP-Chart	FTP DLP Activity Summary	dlp

```
select
  profile,
  count(*) as total_num
from
  ###(select itime, hostname,`from` as sender, `to` as receiver, profile, action, service,
subtype, srcip, dstip, severity, filename, direction, filesize, (case when
severity='critical' then 'Critical Data Exfiltration' else (case when coalesce(nullifna
(`user`), ipstr(`srcip`)) is not null then 'User Associated Data Loss' else NULL end) end)
as data_loss from $log where $filter /*SkipSTART*/order by itime desc/*SkipEND*/)### t where
$filter-drilldown and lower(service) in ('ftp', 'ftps') group by profile order by total_num
desc
```

Dataset Name	Description	Log Category
top-users-by-browsetime	Top Users by website browsetime	traffic

```
select
  user_src,
  domain,
  ebtr_value(
    ebtr_agg_flat(browsetime),
    null,
    $timespan
  ) as browsetime
from
  ###(select user_src, domain, ebtr_agg_flat(browsetime) as browsetime from (select coalesce
(nullifna(`user`), ipstr(`srcip`)) as user_src, coalesce(nullifna(hostname), ipstr(`dstip`))
as domain, ebtr_agg_flat($browse_time) as browsetime from $log where $filter and $browse_
time is not null group by user_src, domain) t group by user_src, domain order by ebtr_value
(ebtr_agg_flat(browsetime), null, null) desc)### t group by user_src, domain order by
browsetime desc
```

Dataset Name	Description	Log Category
wifi-usage-by-hour-authenticated	Wifi Usage by Hour - Authenticated	event

```
select
  hod,
  count(distinct stamac) as totalnum
from
  ###(select $HOUR_OF_DAY as hod, stamac from $log where $filter and subtype='wireless' and
action='client-authentication' group by hod, stamac)### t group by hod order by hod
```

Dataset Name	Description	Log Category
wifi-usage-authenticated-timeline	Wifi Usage Timeline - Authenticated	event

```
select
  $flex_timescale(timestamp) as hodex,
  count(distinct stamac) as totalnum
from
  ###(select $flex_timestamp as timestamp, stamac from $log where $filter and
subtype='wireless' and action='client-authentication' group by timestamp, stamac order by
timestamp desc)### t group by hodex order by hodex
```

Dataset Name	Description	Log Category
app-top-user-by-bandwidth	Top 10 Applications Bandwidth by User Drilldown	traffic

```
select
  app,
  coalesce(
    nullifna(`user`),
    nullifna(`unauthuser`),
    ipstr(`srcip`)
  ) as user_src,
  sum(
    coalesce(`sentbyte`, 0)+ coalesce(`rcvdbyte`, 0)
  ) as bandwidth
from
  $log
where
  $filter
  and (
    logflag&1>0
  )
  and nullifna(app) is not null
group by
  app,
  user_src
order by
  bandwidth desc
```

Dataset Name	Description	Log Category
app-top-user-by-session	Top 10 Application Sessions by User Drilldown	traffic

```
select
  app,
  coalesce(
    nullifna(`user`),
    nullifna(`unauthuser`),
    ipstr(`srcip`)
  ) as user_src,
  count(*) as sessions
from
  $log
where
  $filter
  and (
    logflag&1>0
  )
  and nullifna(app) is not null
group by
  app,
  user_src
order by
  sessions desc
```

Dataset Name	Description	Log Category
traffic-Interface-Bandwidth-Usage	Interface Bandwidth Usage	traffic

```
with qry as (
  select
    dom as dom_s,
    devid as devid_s,
    vd as vd_s,
    srcintf,
    dstintf,
    total_sent,
    total_rcvd
  from
    ###(select $DAY_OF_MONTH as dom, devid, vd, srcintf, dstintf, sum(coalesce(sentbyte, 0))
as total_sent, sum(coalesce(rcvdbyte, 0)) as total_rcvd, sum(coalesce(sentbyte, 0)+coalesce
(rcvdbyte, 0)) as total from $log where $filter and (logflag&1>0) and nullifna(srcintf) is
not null and nullifna(dstintf) is not null group by dom, devid, vd, srcintf, dstintf having
sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0))>0 order by total desc)### t) select dom,
unnest(array['download', 'upload']) as type, unnest(array[sum(download), sum(upload)]) as
bandwidth from (select coalesce(t1.dom_s, t2.dom_s) as dom, coalesce(t1.devid_s, t2.devid_s)
as devid, coalesce(t1.vd_s, t2.vd_s) as vd, coalesce(t1.srcintf, t2.dstintf) as intf, sum
(coalesce(t1.total_sent, 0)+coalesce(t2.total_rcvd, 0)) as download, sum(coalesce(t2.total_
sent, 0)+coalesce(t1.total_rcvd, 0)) as upload from qry t1 full join qry t2 on t1.dom_
s=t2.dom_s and t1.srcintf=t2.dstintf group by dom, devid, vd, intf) t where $filter-
drilldown group by dom order by dom
```

Dataset Name	Description	Log Category
ctap-SB-Files-Needing-Inspection-vs-Others	Files Needing Inspection vs Others	virus

```
select
  (
    case when suffix in (
      &
#039;bat','cmd','exe','jar','msi','vbs','7z','zip','gzip','lzw','tar','rar','cab','doc','doc
x','xls','xlsx','ppt','pptx','pdf','swf','lnk','js') then 'Higher Risk File Types' else
'Excluded Files' end) as files, sum(total_num) as total_num from ###(select file_name_ext
(filename) as suffix, count(*) as total_num from $log where $filter and dtype='fortisandbox'
and nullifna(filename) is not null group by suffix order by total_num desc)### t group by
files order by total_num desc
```

Dataset Name	Description	Log Category
ctap-SB-Breakdown-of-File-Types	Breakdown of File Types	virus

```
select
  (
    case when suffix in (
      & #039;exe','msi','upx','vbs','bat','cmd','dll','ps1','jar') then 'Executable Files'
when suffix in ('pdf') then 'Adobe PDF' when suffix in ('swf') then 'Adobe Flash' when
suffix in ('doc','docx','rtf','dotx','docm','dotm','dot') then 'Microsoft Word' when suffix
in ('xls','xlsx','xltx','xlsm','xlsb','xlam','xlt') then 'Microsoft Excel' when suffix in
('ppsx','ppt','pptx','potx','sldx','pptm','ppsm','potm','ppam','sldm','pps','pot') then
'Microsoft PowerPoint' when suffix in ('msg') then 'Microsoft Outlook' when suffix in
('htm','js','url','lnk') then 'Web Files' when suffix in
('cab','tgz','z','7z','tar','lzh','kgb','rar','zip','gz','xz','bz2') then 'Archive Files'
when suffix in ('apk') then 'Android Files' else 'Others' end) as filetype, sum(total_num)
as total_num from ###(select file_name_ext(filename) as suffix, count(*) as total_num from
$log where $filter and dtype='fortisandbox' and nullifna(filename) is not null group by
suffix order by total_num desc)### t group by filetype order by total_num desc
```

Dataset Name	Description	Log Category
ctap-SB-Top-Sandbox-Malicious-Exes		virus

```
select
  (
    case fsaverdict when & #039;malicious' then 5 when 'high risk' then 4 when 'medium risk'
then 3 when 'low risk' then 2 else 1 end) as risk, filename, service, count(*) as total_num
from $log where $filter and dtype='fortisandbox' and file_name_ext(filename)='exe' and
fsaverdict not in ('clean','submission failed') group by filename, risk, service order by
risk desc, total_num desc, filename
```

Dataset Name	Description	Log Category
ctap-SB-Sources-of-Sandbox-Discovered-Malware	Sources of Sandbox Discovered Malware	virus

```
select
  source,
  sum(total_num) as total_num
from
  (
    select
      (
        CASE WHEN direction =& #039;incoming' THEN dstip ELSE srcip END) as source, count(*)
as total_num from $log where $filter and dtype='fortisandbox' and nullifna(filename) is not
null and fsaverdict not in ('clean','submission failed') group by source) t group by source
order by total_num desc
```

Dataset Name	Description	Log Category
ctap-apprisk-ctrl-High-Risk-Application	Application risk high risk application	traffic

```
select
  risk as d_risk,
  count(distinct user_src) as users,
  id,
  name,
  app_cat,
  technology,
  sum(bandwidth) as bandwidth,
  sum(sessions) as sessions
from
  ###(select app, coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as
user_src, action, utmaction, sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0)) as bandwidth,
count(*) as sessions from $log where $filter and (logflag&1>0) group by app, user_src,
action, utmaction order by bandwidth desc)### t1 inner join app_mdata t2 on t1.app=t2.name
where risk>='4' group by id, name, app_cat, technology, risk order by d_risk desc, sessions
desc
```

Dataset Name	Description	Log Category
ctap-apprisk-ctrl-Application-Vulnerability	Application vulnerabilities discovered	attack

```
select
  attack,
  attackid,
  vuln_type,
  cve,
  severity_number,
  count(
    distinct (
      CASE WHEN direction =& #039;incoming' THEN srcip ELSE dstip END)) as victims, count
(distinct (CASE WHEN direction='incoming' THEN dstip ELSE srcip END)) as sources, sum
(totalnum) as totalnum from ###(select attack, attackid, (case when severity='critical' then
5 when severity='high' then 4 when severity='medium' then 3 when severity='low' then 2 when
severity='info' then 1 else 0 end) as severity_number, direction, dstip, srcip, count(*) as
totalnum from $log where $filter and nullifna(attack) is not null and severity is not null
group by attack, attackid, severity, direction, dstip, srcip order by totalnum desc)### t1
left join (select name, cve, vuln_type from ips_mdata) t2 on t1.attack=t2.name group by
attack, attackid, vuln_type, severity_number, cve order by severity_number desc, totalnum
desc
```

Dataset Name	Description	Log Category
ctap-apprisk-ctrl-Common-Virus-Botnet-Spyware	Common Virus Botnet Spyware	app-ctrl

```
select
  malware as virus,
  (
    case when lower(appcat)=& #039;botnet' then 'Botnet C&C' else (case when malware like
'Riskware%' then 'Spyware' when malware like 'Adware%' then 'Adware' else 'Virus' end) end)
as malware_type, appid, app, count(distinct victim) as victims, count(distinct source) as
source, sum(total_num) as total_num from (###(select app as malware, appcat, appid, app,
(CASE WHEN direction='incoming' THEN dstip ELSE srcip END) as source, (CASE WHEN
direction='incoming' THEN srcip ELSE dstip END) as victim, count(*) as total_num from $log-
app-ctrl where $filter and lower(appcat)='botnet' group by malware, appcat, appid, app,
victim, source, app order by total_num desc)### union all ###(select virus as malware,
'null' as appcat, 0 as appid, service as app, (CASE WHEN direction='incoming' THEN dstip
ELSE srcip END) as source, (CASE WHEN direction='incoming' THEN srcip ELSE dstip END) as
victim, count(*) as total_num from $log-virus where $filter and virus is not null group by
malware, appcat, app, appid, victim, source order by total_num desc)### union all ###(select
attack as malware, 'null' as appcat, 0 as appid, service as app, (CASE WHEN
direction='incoming' THEN dstip ELSE srcip END) as source, (CASE WHEN direction='incoming'
THEN srcip ELSE dstip END) as victim, count(*) as total_num from $log-attack where $filter
and (logflag&16>0) group by malware, appcat, app, appid, victim, source order by total_num
desc)###) t group by malware, malware_type, app, appid order by total_num desc
```

Dataset Name	Description	Log Category
ctap-App-Risk-Reputation-Top-Devices-By-Scores	Reputation Top Devices By-Scores	traffic

```
select
  coalesce(
    nullifna(`srcname`),
    ipstr(`srcip`),
    nullifna(`srcmac`)
  ) as dev_src,
  sum(crscore % 65536) as scores
from
  $log
where
  $filter
  and (
    logflag&1>0
  )
  and crscore is not null
group by
  dev_src
having
  sum(crscore % 65536)> 0
order by
  scores desc
```

Dataset Name	Description	Log Category
ctap-HTTP-SSL-Traffic-Ratio	HTTP SSL Traffic Ratio	traffic

```
select
  (
    case when service in (
      & #039;80/tcp', 'HTTP', 'http') then 'HTTP' else  'HTTPS' end) as service, sum
(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0)) as bandwidth from $log where $filter and
(logflag&1>0) and nullifna(app) is not null and service in ('80/tcp', '443/tcp', 'HTTP',
'HTTPS', 'http', 'https') group by service having sum(coalesce(sentbyte, 0)+coalesce
(rcvdbyte, 0))>0 order by bandwidth desc
```

Dataset Name	Description	Log Category
ctap-Top-Source-Countries	Top Source Countries	traffic

```
select
  srccountry,
  sum(
    coalesce(sentbyte, 0)+ coalesce(rcvdbyte, 0)
  ) as bandwidth
from
  $log
where
  $filter
  and (
    logflag&1>0
  )
  and nullifna(srccountry) is not null
  and srccountry <> & #039;Reserved' group by srccountry having sum(coalesce(sentbyte,
0)+coalesce(rcvdbyte, 0))>0 order by bandwidth desc, srccountry
```

Dataset Name	Description	Log Category
ctap-SaaS-Apps	CTAP SaaS Apps	traffic

```
select
  app_group,
  sum(bandwidth) as bandwidth
from
  ###(select app_group_name(app) as app_group, sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte,
0)) as bandwidth, sum(coalesce(rcvdbyte, 0)) as traffic_in, sum(coalesce(sentbyte, 0)) as
traffic_out, count(*) as sessions from $log where $filter and (logflag&1>0) and nullifna
(app) is not null group by app_group having sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte,
0))>0 order by bandwidth desc)### t1 inner join app_mdata t2 on lower(t1.app_group)=lower
(t2.name) where behavior like '%Cloud%' group by app_group order by bandwidth desc
```

Dataset Name	Description	Log Category
ctap-IaaS-Apps	CTAP IaaS Apps	traffic

```
select
  app_group,
  sum(bandwidth) as bandwidth
from
  ###(select app_group_name(app) as app_group, sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte,
0)) as bandwidth, sum(coalesce(rcvdbyte, 0)) as traffic_in, sum(coalesce(sentbyte, 0)) as
traffic_out, count(*) as sessions from $log where $filter and (logflag&1>0) and nullifna
(app) is not null group by app_group having sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte,
0))>0 order by bandwidth desc)### t1 inner join app_mdata t2 on lower(t1.app_group)=lower
(t2.name) where app_cat='Cloud.IT' group by app_group order by bandwidth desc
```

Dataset Name	Description	Log Category
ctap-RAS-Apps	CTAP RAS Apps	traffic

```
select
  name as app_group,
  sum(bandwidth) as bandwidth
from
  ###(select app_group_name(app) as app_group, sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte,
0)) as bandwidth, sum(coalesce(rcvdbyte, 0)) as traffic_in, sum(coalesce(sentbyte, 0)) as
traffic_out, count(*) as sessions from $log where $filter and (logflag&1>0) and nullifna
(app) is not null group by app_group having sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte,
0))>0 order by bandwidth desc)### t1 inner join app_mdata t2 on lower(t1.app_group)=lower
(t2.name) where app_cat='Remote.Access' group by name order by bandwidth desc
```

Dataset Name	Description	Log Category
ctap-Proxy-Apps	CTAP Proxy Apps	traffic

```
select
  name as app_group,
  sum(bandwidth) as bandwidth
from
  ###(select app_group_name(app) as app_group, sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte,
0)) as bandwidth, sum(coalesce(rcvdbyte, 0)) as traffic_in, sum(coalesce(sentbyte, 0)) as
traffic_out, count(*) as sessions from $log where $filter and (logflag&1>0) and nullifna
(app) is not null group by app_group having sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte,
0))>0 order by bandwidth desc)### t1 inner join app_mdata t2 on lower(t1.app_group)=lower
(t2.name) where app_cat='Proxy' group by name order by bandwidth desc
```

Dataset Name	Description	Log Category
ctap-Top-SocialMedia-App-By-Bandwidth	Top SocialMedia Applications by Bandwidth Usage	traffic

```
select
  app_group,
  sum(bandwidth) as bandwidth,
  sum(traffic_in) as traffic_in,
  sum(traffic_out) as traffic_out,
  sum(sessions) as sessions
from
  ###(select app_group_name(app) as app_group, sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte,
0)) as bandwidth, sum(coalesce(rcvdbyte, 0)) as traffic_in, sum(coalesce(sentbyte, 0)) as
traffic_out, count(*) as sessions from $log where $filter and (logflag&1>0) and nullifna
(app) is not null group by app_group having sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte,
0))>0 order by bandwidth desc)### t1 inner join app_mdata t2 on lower(t1.app_group)=lower
(t2.name) where app_cat='Social.Media' group by app_group order by bandwidth desc
```

Dataset Name	Description	Log Category
ctap-Top-Streaming-App-By-Bandwidth	Top Streaming applications by bandwidth usage	traffic

```
select
  app_group,
  sum(bandwidth) as bandwidth,
  sum(traffic_in) as traffic_in,
  sum(traffic_out) as traffic_out,
  sum(sessions) as sessions
```

```
from
  ###(select app_group_name(app) as app_group, sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte,
0)) as bandwidth, sum(coalesce(rcvdbyte, 0)) as traffic_in, sum(coalesce(sentbyte, 0)) as
traffic_out, count(*) as sessions from $log where $filter and (logflag&1>0) and nullifna
(app) is not null group by app_group having sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte,
0))>0 order by bandwidth desc)### t1 inner join app_mdata t2 on lower(t1.app_group)=lower
(t2.name) where app_cat='Video/Audio' group by app_group order by bandwidth desc
```

Dataset Name	Description	Log Category
ctap-Top-Game-App-By-Bandwidth	Top Game applications by bandwidth usage	traffic

```
select
  app_group,
  sum(bandwidth) as bandwidth,
  sum(traffic_in) as traffic_in,
  sum(traffic_out) as traffic_out,
  sum(sessions) as sessions
from
  ###(select app_group_name(app) as app_group, sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte,
0)) as bandwidth, sum(coalesce(rcvdbyte, 0)) as traffic_in, sum(coalesce(sentbyte, 0)) as
traffic_out, count(*) as sessions from $log where $filter and (logflag&1>0) and nullifna
(app) is not null group by app_group having sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte,
0))>0 order by bandwidth desc)### t1 inner join app_mdata t2 on lower(t1.app_group)=lower
(t2.name) where app_cat='Game' group by app_group order by bandwidth desc
```

Dataset Name	Description	Log Category
ctap-Top-P2P-App-By-Bandwidth	Top P2P applications by bandwidth usage	traffic

```
select
  app_group,
  sum(bandwidth) as bandwidth,
  sum(traffic_in) as traffic_in,
  sum(traffic_out) as traffic_out,
  sum(sessions) as sessions
from
  ###(select app_group_name(app) as app_group, sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte,
0)) as bandwidth, sum(coalesce(rcvdbyte, 0)) as traffic_in, sum(coalesce(sentbyte, 0)) as
traffic_out, count(*) as sessions from $log where $filter and (logflag&1>0) and nullifna
(app) is not null group by app_group having sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte,
0))>0 order by bandwidth desc)### t1 inner join app_mdata t2 on lower(t1.app_group)=lower
(t2.name) where app_cat='P2P' group by app_group order by bandwidth desc
```

Dataset Name	Description	Log Category
ctap-apprisk-ctrl-Top-Web-Categories-Visited	Top 25 Web Categories Visited	traffic

```
select
  catdesc,
  count(distinct f_user) as user_num,
  sum(sessions) as sessions,
  sum(bandwidth) as bandwidth
from
  ###(select catdesc, coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as
f_user, count(*) as sessions, sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0)) as bandwidth
from $log-traffic where $filter and catdesc is not null and (logflag&1>0) and (countweb>0 or
((logver is null or logver<502000000) and (hostname is not null or utmevent in ('webfilter',
'banned-word', 'web-content', 'command-block', 'script-filter')))) group by f_user, catdesc
order by sessions desc)### t group by catdesc order by sessions desc
```

Dataset Name	Description	Log Category
ctap-App-Risk-Applications-Running-Over-HTTP	Application risk applications running over HTTP	traffic

```
select
  app_group,
  service,
  sum(sessions) as sessions,
  sum(bandwidth) as bandwidth
from
  ###(select app_group_name(app) as app_group, appcat, service, sum(coalesce(sentdelta,
sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as bandwidth, sum(coalesce(rcvddelta,
rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as traffic_out, count(*)
as sessions from $log where $filter and (logflag&(1|32)>0) and nullifna(app) is not null
group by app_group, appcat, service order by bandwidth desc)### t where service in
('80/tcp', '443/tcp', 'HTTP', 'HTTPS', 'http', 'https') group by app_group, service having
sum(bandwidth)>0 order by bandwidth desc
```

Dataset Name	Description	Log Category
ctap-App-Risk-Web-Browsing-Activity-Hostname-Category	Application risk web browsing activity hostname category	webfilter

```
select
  domain,
  catdesc,
  sum(visits) as visits
from
  ###(select coalesce(nullifna(hostname), ipstr(`dstip`)) as domain, catdesc, count(*) as
visits from $log where $filter and (eventtype is null or logver>=502000000) and catdesc is
not null group by domain, catdesc order by visits desc)### t group by domain, catdesc order
by visits desc
```

Dataset Name	Description	Log Category
ctap-Top-Sites-By-Browsing-Time	Traffic top sites by browsing time	traffic

```
select
  hostname,
  string_agg(
    distinct catdesc,
    & #039;, ') as agg_catdesc, ebtr_value(ebtr_agg_flat(browsetime), null, $timespan) as
browsetime, sum(bandwidth) as bandwidth, sum(traffic_in) as traffic_in, sum(traffic_out) as
traffic_out from ###(select hostname, catdesc, ebtr_agg_flat(browsetime) as browsetime, sum
(bandwidth) as bandwidth, sum(traffic_in) as traffic_in, sum(traffic_out) as traffic_out
from (select hostname, catdesc, ebtr_agg_flat($browse_time) as browsetime, sum(coalesce
(sentbyte, 0)+coalesce(rcvdbyte, 0)) as bandwidth, sum(coalesce(rcvdbyte, 0)) as traffic_in,
sum(coalesce(sentbyte, 0)) as traffic_out from $log where $filter and (logflag&1>0) and
hostname is not null and $browse_time is not null group by hostname, catdesc) t group by
hostname, catdesc /*SkipSTART*/order by ebtr_value(ebtr_agg_flat(browsetime), null, null)
desc/*SkipEND*/)### t group by hostname order by browsetime desc
```

Dataset Name	Description	Log Category
ctap-Average-Bandwidth-Hour	Average Bandwidth Hour	traffic

```
select
  hourstamp,
  sum(bandwidth)/ count(distinct daystamp) as bandwidth
from
  ###(select to_char(from_dtime(dtime), 'HH24:00') as hourstamp, to_char(from_dtime(dtime),
'DD Mon') as daystamp, sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0)) as bandwidth from
$log where $filter and (logflag&1>0) group by hourstamp, daystamp having sum(coalesce
(sentbyte, 0)+coalesce(rcvdbyte, 0))>0 order by hourstamp)### t group by hourstamp order by
hourstamp
```

Dataset Name	Description	Log Category
ctap-Top-Bandwidth-Hosts	Top Bandwidth Hosts	traffic

```
select
  hostname,
  sum(
    coalesce(sentbyte, 0)+ coalesce(rcvdbyte, 0)
  ) as bandwidth
from
  $log - traffic
where
  $filter
  and hostname is not null
  and (
    logflag&1>0
  )
group by
  hostname
having
  sum(
    coalesce(sentbyte, 0)+ coalesce(rcvdbyte, 0)
  )>0
order by
  bandwidth desc
```

Dataset Name	Description	Log Category
saas-Application-Discovered	All Applications Discovered on the Network	traffic

```
select
  (
    case is_saas when 1 then & #039;SaaS Apps' else 'Other Apps' end) as app_type, count
(distinct app_s) as total_num from ###(select app_s, (case when saas_s>=10 then 1 else 0
end) as is_saas from (select unnest(apps) as app_s, unnest(saasinfo) as saas_s from $log
where $filter and apps is not null) t group by app_s, is_saas order by is_saas desc)### t
group by is_saas order by is_saas
```

Dataset Name	Description	Log Category
saas-SaaS-Application-by-Category	Number of SaaS Applications by Category	traffic

```
select
  (
    case saas_cat when 0 then & #039;Sanctioned' else 'Unsanctioned' end) as saas_cat_str,
count(distinct app_s) as num_saas_app from ###(select app_s, saas_s%10 as saas_cat, sum
(sentbyte+rcvdbyte) as bandwidth, count(*) as total_app from (select unnest(apps) as app_s,
unnest(saasinfo) as saas_s, coalesce(sentbyte, 0) as sentbyte, coalesce(rcvdbyte, 0) as
rcvdbyte from $log where $filter and apps is not null) t where saas_s>=10 group by app_s,
saas_cat order by bandwidth desc)### t where saas_cat in (0, 1) group by saas_cat order by
saas_cat
```

Dataset Name	Description	Log Category
saas-SaaS-Application-by-Bandwidth	Number of SaaS Applications by Bandwidth	traffic

```
select
  (
    case saas_cat when 0 then & #039;Sanctioned' else 'Tolerated' end) as saas_cat_str, sum
(bandwidth) as bandwidth from ###(select app_s, saas_s%10 as saas_cat, sum
(sentbyte+rcvdbyte) as bandwidth, count(*) as total_app from (select unnest(apps) as app_s,
unnest(saasinfo) as saas_s, coalesce(sentbyte, 0) as sentbyte, coalesce(rcvdbyte, 0) as
rcvdbyte from $log where $filter and apps is not null) t where saas_s>=10 group by app_s,
saas_cat order by bandwidth desc)### t where saas_cat in (0, 2) group by saas_cat order by
saas_cat
```

Dataset Name	Description	Log Category
saas-SaaS-Application-by-Session	Number of SaaS Applications by Session	traffic

```
select
  (
    case saas_cat when 0 then & #039;Sanctioned' else 'Tolerated' end) as saas_cat_str, sum
(total_app) as total_app from ###(select app_s, saas_s%10 as saas_cat, sum
(sentbyte+rcvdbyte) as bandwidth, count(*) as total_app from (select unnest(apps) as app_s,
unnest(saasinfo) as saas_s, coalesce(sentbyte, 0) as sentbyte, coalesce(rcvdbyte, 0) as
rcvdbyte from $log where $filter and apps is not null) t where saas_s>=10 group by app_s,
saas_cat order by bandwidth desc)### t where saas_cat in (0, 2) group by saas_cat order by
saas_cat
```

Dataset Name	Description	Log Category
saas-SaaS-App-Users-vs-Others	Number of Users of SaaS Apps vs Others	traffic

```
select
  (
    case is_saas when 0 then & #039;Other Apps' else 'SaaS Apps' end) as app_type, count
(distinct saasuser) as total_user from ###(select saasuser, saas_s/10 as is_saas from
(select coalesce(nullifna(`user`), nullifna(`clouduser`), nullifna(`unauthuser`), srcname,
ipstr(`srcip`)) as saasuser, unnest(saasinfo) as saas_s from $log where $filter and apps is
not null) t group by saasuser, is_saas)### t group by app_type
```

Dataset Name	Description	Log Category
saas-SaaS-App-Users	Number of Users of SaaS Apps	traffic

```
select
  (
    case saas_cat when 0 then & #039;Sanctioned' when 1 then 'Unsanctioned' else 'Others'
end) as app_type, count(distinct saasuser) as total_user from ###(select saasuser, saas_s%10
as saas_cat from (select coalesce(nullifna(`user`), nullifna(`clouduser`), nullifna
(`unauthuser`), srcname, ipstr(`srcip`)) as saasuser, unnest(saasinfo) as saas_s from $log
where $filter and apps is not null) t where saas_s>=10 group by saasuser, saas_cat)### t
group by saas_cat order by saas_cat
```

Dataset Name	Description	Log Category
saas-Top-SaaS-User-by-Bandwidth-Session	Top SaaS Users by Bandwidth and Session	traffic

```
select
  saasuser,
  sum(bandwidth) as bandwidth,
  sum(traffic_in) as traffic_in,
  sum(traffic_out) as traffic_out,
  sum(sessions) as sessions,
  sum(session_block) as session_block,
  (
    sum(sessions)- sum(session_block)
  ) as session_pass,
  count(distinct app_s) as total_app
from
  ###(select saasuser, app_s, sum(sentbyte+rcvdbyte) as bandwidth, sum(rcvdbyte) as traffic_
in, sum(sentbyte) as traffic_out, count(*) as sessions, sum(is_blocked) as session_block
from (select coalesce(nullifna(`user`), nullifna(`clouduser`), nullifna(`unauthuser`),
srcname, ipstr(`srcip`)) as saasuser, unnest(apps) as app_s, unnest(saasinfo) as saas_s,
coalesce(sentbyte, 0) as sentbyte, coalesce(rcvdbyte, 0) as rcvdbyte, (CASE WHEN
(logflag&2>0) THEN 1 ELSE 0 END) as is_blocked from $log where $filter and apps is not null)
t where saas_s>=10 group by saasuser, app_s order by bandwidth desc)### t group by saasuser
order by bandwidth desc
```

Dataset Name	Description	Log Category
saas-Top-Category-by-SaaS-Application-Usage	Top Categories by SaaS Application Usage	traffic

```
select
  app_cat,
  (
    case saas_cat when 0 then & #039;Sanctioned' else 'Unsactioned' end) as saas_cat_str,
count(distinct app_s) as total_app from ###(select app_s, saas_s%10 as saas_cat from (select
unnest(apps) as app_s, unnest(saasinfo) as saas_s from $log where $filter and apps is not
null) t where saas_s>=10 group by app_s, saas_cat)### t1 inner join app_mdata t2 on t1.app_
s=t2.name where saas_cat in (0, 1) group by app_cat, saas_cat order by total_app desc
```

Dataset Name	Description	Log Category
saas-Top-SaaS-Category-by-Number-of-User	Top SaaS Categories by Number of Users	traffic

```
select
  app_cat,
  (
    case saas_cat when 0 then & #039;Sanctioned' else 'Unsactioned' end) as saas_cat_str,
count(distinct saasuser) as total_user from ###(select app_s, saas_s%10 as saas_cat,
saasuser from (select unnest(apps) as app_s, unnest(saasinfo) as saas_s, coalesce(nullifna
(`user`), nullifna(`clouduser`), nullifna(`unauthuser`), srcname, ipstr(`srcip`)) as
saasuser from $log where $filter and apps is not null) t where saas_s>=10 group by app_s,
saas_cat, saasuser order by saas_cat desc)### t1 inner join app_mdata t2 on t1.app_s=t2.name
where saas_cat in (0, 1) group by app_cat, saas_cat order by total_user desc
```

Dataset Name	Description	Log Category
saas-Top-User-by-Number-of-SaaS-Application	Top Users by Number of SaaS Applications	traffic

```
select
  saasuser,
  (
    case saas_cat when 0 then & #039;Sanctioned' else 'Unsactioned' end) as saas_cat_str,
count(distinct app_s) as total_app from ###(select app_s, saas_s%10 as saas_cat, saasuser
from (select unnest(apps) as app_s, unnest(saasinfo) as saas_s, coalesce(nullifna(`user`),
nullifna(`clouduser`), nullifna(`unauthuser`), srcname, ipstr(`srcip`)) as saasuser from
$log where $filter and apps is not null) t where saas_s>=10 group by app_s, saas_cat,
saasuser order by saas_cat desc)### t where saas_cat in (0, 1) group by saasuser, saas_cat
order by total_app desc
```

Dataset Name	Description	Log Category
saas-Top-SaaS-Application-by-Bandwidth-Session	Top SaaS Applications by Sessions and Bandwidth	traffic

```
select
  t2.id as app_id,
  app_s,
  app_cat,
  sum(bandwidth) as bandwidth,
  sum(traffic_in) as traffic_in,
  sum(traffic_out) as traffic_out,
  sum(sessions) as sessions,
  sum(session_block) as session_block,
  (
    sum(sessions)- sum(session_block)
  ) as session_pass
from
  ###(select app_s, sum(sentbyte+rcvdbyte) as bandwidth, sum(rcvdbyte) as traffic_in, sum
(sentbyte) as traffic_out, count(*) as sessions, sum(is_blocked) as session_block from
(select unnest(apps) as app_s, unnest(saasinfo) as saas_s, coalesce(sentbyte, 0) as
sentbyte, coalesce(rcvdbyte, 0) as rcvdbyte, (CASE WHEN (logflag&2>0) THEN 1 ELSE 0 END) as
is_blocked from $log where $filter and apps is not null) t where saas_s>=10 group by app_
s)### t1 inner join app_mdata t2 on t1.app_s=t2.name group by app_id, app_s, app_cat order
by bandwidth desc
```

Dataset Name	Description	Log Category
saas-Top-Tolerated-SaaS-Application-by-Bandwidth	Top Tolerated SaaS Applications by Bandwidth	traffic

```
select
  app_s,
  sum(sentbyte + rcvdbyte) as bandwidth
from
  (
    select
      unnest(apps) as app_s,
      unnest(saasinfo) as saas_s,
      coalesce(sentbyte, 0) as sentbyte,
      coalesce(rcvdbyte, 0) as rcvdbyte
    from
      $log
    where
      $filter
      and apps is not null
  ) t
where
  saas_s = 12
group by
  app_s
order by
  bandwidth desc
```

Dataset Name	Description	Log Category
saas-drilldown-Top-Tolerated-SaaS-Application	Top Tolerated SaaS Applications	traffic

```
select
  app_s,
  sum(bandwidth) as bandwidth,
  sum(traffic_in) as traffic_in,
  sum(traffic_out) as traffic_out,
  sum(sessions) as sessions,
  sum(session_block) as session_block,
  (
    sum(sessions)- sum(session_block)
  ) as session_pass
from
  ###(select saasuser, app_s, sum(sentbyte+rcvdbyte) as bandwidth, sum(rcvdbyte) as traffic_
in, sum(sentbyte) as traffic_out, count(*) as sessions, sum(is_blocked) as session_block
from (select coalesce(nullifna(`user`), nullifna(`clouduser`), nullifna(`unauthuser`),
srcname, ipstr(`srcip`)) as saasuser, unnest(apps) as app_s, unnest(saasinfo) as saas_s,
coalesce(sentbyte, 0) as sentbyte, coalesce(rcvdbyte, 0) as rcvdbyte, (CASE WHEN
(logflag&2>0) THEN 1 ELSE 0 END) as is_blocked from $log where $filter and apps is not null)
t where saas_s=12 group by saasuser, app_s order by bandwidth desc)### t where $filter-
drilldown group by app_s order by bandwidth desc
```

Dataset Name	Description	Log Category
saas-Top-User-by-Tolerated-SaaS-Application-Drilldown	Top Users by Tolerated SaaS Applications	traffic

```
select
  saasuser,
  count(distinct app_s) as total_app
from
  ###(select saasuser, app_s, sum(sentbyte+rcvdbyte) as bandwidth, sum(rcvdbyte) as traffic_
in, sum(sentbyte) as traffic_out, count(*) as sessions, sum(is_blocked) as session_block
from (select coalesce(nullifna(`user`), nullifna(`clouduser`), nullifna(`unauthuser`),
srcname, ipstr(`srcip`)) as saasuser, unnest(apps) as app_s, unnest(saasinfo) as saas_s,
coalesce(sentbyte, 0) as sentbyte, coalesce(rcvdbyte, 0) as rcvdbyte, (CASE WHEN
(logflag&2>0) THEN 1 ELSE 0 END) as is_blocked from $log where $filter and apps is not null)
t where saas_s=12 group by saasuser, app_s order by bandwidth desc)### t group by saasuser
order by total_app desc
```

Dataset Name	Description	Log Category
saas-drilldown-Top-File-Sharing-SaaS-Application-Detail	Top File Sharing SaaS Applications Detail	traffic

```
select
  saasuser,
  sum(bandwidth) as bandwidth,
  sum(traffic_in) as traffic_in,
  sum(traffic_out) as traffic_out,
  sum(sessions) as sessions,
  sum(session_block) as session_block,
  (
    sum(sessions)- sum(session_block)
  ) as session_pass
from
  ###(select app_group_name(app_s) as app_group, saasuser, sum(sentbyte+rcvdbyte) as
bandwidth, sum(rcvdbyte) as traffic_in, sum(sentbyte) as traffic_out, count(*) as sessions,
sum(is_blocked) as session_block from (select coalesce(nullifna(`user`), nullifna
(`clouduser`), nullifna(`unauthuser`), srcname, ipstr(`srcip`)) as saasuser, unnest(apps) as
app_s, unnest(saasinfo) as saas_s, coalesce(sentbyte, 0) as sentbyte, coalesce(rcvdbyte, 0)
as rcvdbyte, (CASE WHEN (logflag&2>0) THEN 1 ELSE 0 END) as is_blocked from $log where
$filter and apps is not null) t where saas_s>=10 group by app_group, saasuser order by
bandwidth desc)### t where $filter-drilldown group by saasuser order by sessions desc
```

Dataset Name	Description	Log Category
saas-Top-File-Sharing-SaaS-Application	Top File Sharing Applications	traffic

```
select
  t2.id as appid,
  (
    case t2.risk when & #039;5' then 'Critical' when '4' then 'High' when '3' then 'Medium'
when '2' then 'Info' else 'Low' end) as risk, app_group, bandwidth, traffic_in, traffic_out,
sessions, session_block, session_pass, total_user from (select app_group, count(distinct
saasuser) as total_user, sum(bandwidth) as bandwidth, sum(traffic_in) as traffic_in, sum
(traffic_out) as traffic_out, sum(sessions) as sessions, sum(session_block) as session_
block, (sum(sessions)-sum(session_block)) as session_pass from ###(select app_group_name
(app_s) as app_group, saasuser, sum(sentbyte+rcvdbyte) as bandwidth, sum(rcvdbyte) as
traffic_in, sum(sentbyte) as traffic_out, count(*) as sessions, sum(is_blocked) as session_
block from (select coalesce(nullifna(`user`), nullifna(`clouduser`), nullifna(`unauthuser`),
srcname, ipstr(`srcip`)) as saasuser, unnest(apps) as app_s, unnest(saasinfo) as saas_s,
coalesce(sentbyte, 0) as sentbyte, coalesce(rcvdbyte, 0) as rcvdbyte, (CASE WHEN
(logflag&2>0) THEN 1 ELSE 0 END) as is_blocked from $log where $filter and apps is not null)
t where saas_s>=10 group by app_group, saasuser order by bandwidth desc)### t group by app_
group) t1 inner join app_mdata t2 on lower(t1.app_group)=lower(t2.name) where t2.app_
cat='Storage.Backup' order by total_user desc, bandwidth desc
```

Dataset Name	Description	Log Category
saas-Top-File-Sharing-SaaS-Application-Drilldown	Top File Sharing Applications	traffic

```
select
  t2.id as appid,
  (
    case t2.risk when & #039;5' then 'Critical' when '4' then 'High' when '3' then 'Medium'
when '2' then 'Info' else 'Low' end) as risk, app_group, bandwidth, traffic_in, traffic_out,
sessions, session_block, session_pass, total_user from (select app_group, count(distinct
saasuser) as total_user, sum(bandwidth) as bandwidth, sum(traffic_in) as traffic_in, sum
(traffic_out) as traffic_out, sum(sessions) as sessions, sum(session_block) as session_
block, (sum(sessions)-sum(session_block)) as session_pass from ###(select app_group_name
(app_s) as app_group, saasuser, sum(sentbyte+rcvdbyte) as bandwidth, sum(rcvdbyte) as
traffic_in, sum(sentbyte) as traffic_out, count(*) as sessions, sum(is_blocked) as session_
block from (select coalesce(nullifna(`user`), nullifna(`clouduser`), nullifna(`unauthuser`),
srcname, ipstr(`srcip`)) as saasuser, unnest(apps) as app_s, unnest(saasinfo) as saas_s,
coalesce(sentbyte, 0) as sentbyte, coalesce(rcvdbyte, 0) as rcvdbyte, (CASE WHEN
(logflag&2>0) THEN 1 ELSE 0 END) as is_blocked from $log where $filter and apps is not null)
t where saas_s>=10 group by app_group, saasuser order by bandwidth desc)### t group by app_
group) t1 inner join app_mdata t2 on lower(t1.app_group)=lower(t2.name) where t2.app_
cat='Storage.Backup' order by total_user desc, bandwidth desc
```

Dataset Name	Description	Log Category
aware-Device-By-Location	Device by Location	traffic

```
select
  & #039;All'::text as country, count(distinct devid) as device_count from ###(select devid
from $log where $filter group by devid)### t
```

Dataset Name	Description	Log Category
aware-Network-Endpoint-Devices	Endpoint Devices on Network	

```
select
  category,
  total_num
from
  (
    select
      & #039;Seen Devices' as category, 1 as idx, count(distinct epname) as total_num from
(select epname, map_dev.devid, map_dev.vd, max(lastseen) as itime from $ADOM_ENDPOINT t
inner join $ADOM_EPEU_DEVMAP map_dev on t.epid=map_dev.epid where $filter-drilldown and
epname is not null group by epname, map_dev.devid, map_dev.vd) t where $filter and $filter-
drilldown union all select 'New Devices' as category, 2 as idx, count(distinct epname) as
total_num from (select epname, map_dev.devid, map_dev.vd, min(firstseen) as itime from
$ADOM_ENDPOINT  t inner join $ADOM_EPEU_DEVMAP map_dev on t.epid=map_dev.epid where epname
is not null group by epname, map_dev.devid, map_dev.vd) t where $filter and $filter-
drilldown union all select 'Unseen Devices' as category, 3 as idx, count(distinct t1.epname)
as total_num from $ADOM_ENDPOINT t1 where not exists (select 1 from (select epname, map_
dev.devid, map_dev.vd, max(lastseen) as itime from $ADOM_ENDPOINT t inner join $ADOM_EPEU_
DEVMAP map_dev on t.epid=map_dev.epid where epname is not null group by epname, map_
dev.devid, map_dev.vd) t2 where $filter and $filter-drilldown and t1.epname=t2.epname)) t
order by idx
```

Dataset Name	Description	Log Category
aware-New-Endpoint-Devices	New Endpoint Devices	

```
drop
  table if exists devmap_tmp; create temporary table devmap_tmp as (
    select
      epid,
      max(euid) as max_euid
    from
      $ADOM_EPEU_DEVMAP
    where
      $filter - drilldown
      and euid >= 1024
    group by
      epid
  );
select
  timestamp,
  epname as hostname,
  max(osname) as osname,
  max(devtype) as devtype,
  max(srcip) as srcip,
  string_agg(
    distinct epname,
    & #039;,') as user_agg from (select from_itime(itime) as timestamp, osname, epname,
epdevtype as devtype, epip as srcip, epid from (select max(osname) as osname, max(epname) as
epname, max(epdevtype) as epdevtype, max(epip) as epip, t.epid, map_dev.devid, map_dev.vd,
min(firstseen) as itime from $ADOM_ENDPOINT t inner join $ADOM_EPEU_DEVMAP map_dev on
t.epid=map_dev.epid where epname is not null group by epname, t.epid, map_dev.devid, map_
dev.vd) t where $filter and $filter-drilldown) t1 inner join devmap_tmp on devmap_
tmp.epid=t1.epid inner join $ADOM_ENDUSER as teu on devmap_tmp.max_euid=teu.euid group by
timestamp, hostname order by timestamp desc
```

Dataset Name	Description	Log Category
aware-New-Endpoint-Devices-Trend	New Endpoint Devices Trend	

```
select
  $flex_timescale(itime) as hodex,
  count(distinct epname) as total_num
from
  (
    select
      epname,
      map_dev.devid,
      map_dev.vd,
      min(firstseen) as itime
    from
      $ADOM_ENDPOINT t
      inner join $ADOM_EPEU_DEVMAP map_dev on t.epid = map_dev.epid
    where
      $filter - drilldown
      and epname is not null
    group by
      epname,
      map_dev.devid,
      map_dev.vd
  ) t
where
  $filter
  and $filter - drilldown
group by
  hodex
order by
  hodex
```

Dataset Name	Description	Log Category
aware-Top-Endpoint-Operating-Systems	Top Endpoint Operating Systems	fct-traffic

```
select
  os1 as os,
  count(distinct hostname) as total_num
from
  ###(select split_part(os, ',', 1) as os1, hostname from $log where $filter and nullifna
(os) is not null group by os1, hostname)### t group by os order by total_num desc
```

Dataset Name	Description	Log Category
aware-Top-Endpoint-Applications-Windows	Top Endpoint Applications Windows	fct-traffic

```
select
  srcname1 as srcname,
  count(distinct hostname) as total_num
from
  ###(select split_part(srcname, '.', 1) as srcname1, hostname from $log where $filter and
nullifna(srcname) is not null and lower(os) like '%windows%' group by srcname, hostname)###
t group by srcname order by total_num desc
```

Dataset Name	Description	Log Category
aware-Top-Endpoint-Applications-Mac	Top Endpoint Applications Mac	fct-traffic

```
select
  srcname1 as srcname,
  count(distinct hostname) as total_num
```

```
from
  ###(select split_part(srcname, '.', 1) as srcname1, hostname from $log where $filter and
nullifna(srcname) is not null and lower(os) like '%mac os%' group by srcname, hostname)### t
group by srcname order by total_num desc
```

Dataset Name	Description	Log Category
aware-Top-SaaS-Application-by-Number-of-Users	Top SaaS Applications by Number of Users	traffic

```
select
  app_group,
  count(distinct saasuser) as total_user
from
  ###(select app_group_name(app_s) as app_group, saasuser from (select unnest(apps) as app_
s, unnest(saasinfo) as saas_s, coalesce(nullifna(`user`), nullifna(`clouduser`), nullifna
(`unauthuser`), srcname, ipstr(`srcip`)) as saasuser from $log where $filter and
(logflag&1>0) and apps is not null) t where saas_s>=10 group by app_group, saasuser)### t
group by app_group order by total_user desc
```

Dataset Name	Description	Log Category
aware-Summary-Of-Changes	Summary of Changes	event

```
select
  regexp_replace(
    msg,
    & #039;[^ ]*$','') as msg_trim, count(*) as total_num from $log where $filter and logid_
to_int(logid)=44547 group by msg_trim order by total_num desc
```

Dataset Name	Description	Log Category
aware-Change-Details	Change Details	event

```
select
  $calendar_time as timestamp,
  `user`,
  ui,
  msg
from
  $log
where
  $filter
  and logid_to_int(logid)= 44547
order by
  timestamp desc
```

Dataset Name	Description	Log Category
aware-Vulnerabilities-By-Severity	Vulnerabilities by Security	fct-netscan

```
select
  vulnseverity,
  count(distinct vulnname) as vuln_num
from
  ###(select vulnseverity, vulnname from $log where $filter and nullifna(vulnname) is not
null and nullifna(vulnseverity) is not null group by vulnseverity, vulnname)### t group by
vulnseverity order by vuln_num desc
```

Dataset Name	Description	Log Category
aware-Vulnerabilities-Trend	Vulnerabilities Trend	fct-netscan

```
select
  $flex_timescale(timestamp) as timescale,
  sum(critical) as critical,
  sum(high) as high,
  sum(medium) as medium,
  sum(low) as low
from
  ###(select $flex_timestamp as timestamp, sum(case when lower(vulnseverity) = 'critical'
then 1 else 0 end) as critical, sum(case when lower(vulnseverity) = 'high' then 1 else 0
end) as high, sum(case when lower(vulnseverity) = 'medium' then 1 else 0 end) as medium, sum
(case when lower(vulnseverity) = 'notice' then 1 else 0 end) as Low from $log where $filter
group by timestamp order by timestamp desc)### t group by timescale order by timescale
```

Dataset Name	Description	Log Category
aware-Top-Critical-Vulnerabilities	Top Critical Vulnerabilities	fct-netscan

```
select
  vulnname,
  vulnseverity,
  vulncat,
  count(distinct hostname) as total_num
from
  ###(select hostname, vulnname, vulnseverity, vulncat, count(*) as total_num from $log
where $filter and nullifna(vulnname) is not null and vulnseverity='Critical' group by
hostname, vulnname, vulnseverity, vulncat order by total_num desc)### t group by vulnname,
vulnseverity, vulncat order by total_num desc
```

Dataset Name	Description	Log Category
aware-Top-Vulnerabilities-Last-Period	Top Vulnerabilities Last Period	fct-netscan

```
select
  vulnname,
  vulnseverity,
  sev_num,
  vulncat,
  count(distinct hostname) as total_num
from
  ###(select hostname, vulnname, vulnseverity, (CASE vulnseverity WHEN 'Critical' THEN 5
WHEN 'High' THEN 4 WHEN 'Medium' THEN 3 WHEN 'Info' THEN 2 WHEN 'Low' THEN 1 ELSE 0 END) as
sev_num, vulncat, count(*) as total_num from $log where $pre_period $filter and nullifna
(vulnname) is not null group by hostname, vulnname, vulnseverity, vulncat order by sev_num
desc, total_num desc)### t group by vulnname, vulnseverity, sev_num, vulncat order by sev_
num desc, total_num desc
```

Dataset Name	Description	Log Category
aware-Top-New-Vulnerabilities	Top New Vulnerabilities	fct-netscan

```
drop
  table if exists rpt_tmptbl_1;
drop
  table if exists rpt_tmptbl_2; create temporary table rpt_tmptbl_1 as
select
  vulnid,
  vulnname,
  vulnseverity,
  vulncat,
  hostname
from
  ###(select vulnid, vulnname, vulnseverity, vulncat, hostname from $log where $pre_period
$filter and nullifna(vulnname) is not null group by vulnid, vulnname, vulnseverity, vulncat,
hostname)### t group by vulnid, vulnname, vulnseverity, vulncat, hostname; create temporary
table rpt_tmptbl_2 as select vulnid, vulnname, vulnseverity, vulncat, hostname from ###
(select vulnid, vulnname, vulnseverity, vulncat, hostname from $log where $filter and
nullifna(vulnname) is not null group by vulnid, vulnname, vulnseverity, vulncat,
hostname)### t group by vulnid, vulnname, vulnseverity, vulncat, hostname; select vulnname,
(case when vulnseverity='Critical' then 5 when vulnseverity='High' then 4 when
vulnseverity='Medium' then 3 when vulnseverity='Low' then 2 when vulnseverity='Info' then 1
else 0 end) as sev, vulnseverity, vulncat, count(distinct hostname) as host_num, cve_id from
rpt_tmptbl_2 t1 left join fct_mdata t2 on t1.vulnid=t2.vid::int where not exists (select 1
from rpt_tmptbl_1 where t1.vulnid=rpt_tmptbl_1.vulnid) group by vulnname, sev, vulnseverity,
vulncat, cve_id order by sev desc, host_num desc
```

Dataset Name	Description	Log Category
aware-Top-User-With-Critical-Vulnerabilities	Top Users with Critical Vulnerabilities	fct-netscan

```
select
  hostname,
  `user` as user_src,
  vulnname,
  vulncat,
  count(*) as total_num
from
  $log
where
  $filter
  and nullifna(`user`) is not null
  and vulnseverity =& #039;Critical' group by hostname, user_src, vulnname, vulncat order by
total_num desc
```

Dataset Name	Description	Log Category
aware-Ingress-Data-Flow-By-Zone	Ingress Data Flow By Zone	traffic

```
select
  app,
  tag,
  sum(rcvdbyte) as rcvdbyte
from
  ###(select dvid, app, dstintf, sum(coalesce(rcvdbyte, 0)) as rcvdbyte from $log where
$filter group by dvid, app, dstintf having sum(coalesce(rcvdbyte, 0)) > 0 order by rcvdbyte
desc)### tt1 inner join (select dvid, intfname, unnest(tags) as tag from intfinfo) tt2 on
tt1.dvid=tt2.dvid and tt1.dstintf=tt2.intfname group by app, tag order by rcvdbyte desc
```

Dataset Name	Description	Log Category
aware-Egress-Data-Flow-By-Zone	Egress Data Flow By Zone	traffic

```
select
  app,
  tag,
  sum(sentbyte) as sentbyte
from
  ###(select dvid, app, srcintf, sum(coalesce(sentbyte, 0)) as sentbyte from $log where
$filter group by dvid, app, srcintf having sum(coalesce(sentbyte, 0)) > 0 order by sentbyte
desc)### tt1 inner join (select dvid, intfname, unnest(tags) as tag from intfinfo) tt2 on
tt1.dvid=tt2.dvid and tt1.srcintf=tt2.intfname group by app, tag order by sentbyte desc
```

Dataset Name	Description	Log Category
aware-Top-Device-Attack-Targets	Top Device Attack Targets	fct-netscan

```
select
  hostname,
  count(*) as total_num
from
  $log
where
  $filter
  and nullifna(hostname) is not null
  and nullifna(vulnname) is not null
group by
  hostname
order by
  total_num desc
```

Dataset Name	Description	Log Category
aware-Top-Attack-Targets	Top Attack Targets	fct-netscan

```
select
  hostname,
  srcip,
  os,
  vuln_num,
  (
    CASE sevid WHEN 5 THEN & #039;Critical' WHEN 4 THEN 'High' WHEN 3 THEN 'Medium' WHEN '2'
THEN 'Info' ELSE 'Low' END) as vulnseverity, sevid as severity_num, left(cve_agg, 512) as
cve_agg from (select hostname, max(srcip) as srcip, string_agg(distinct os1, '/') as os,
count(distinct vulnname) as vuln_num, max((CASE vulnseverity WHEN 'Critical' THEN 5 WHEN
'High' THEN 4 WHEN 'Medium' THEN 3 WHEN 'Info' THEN 2 WHEN 'Low' THEN 1 ELSE 0 END)) as
sevid, string_agg(distinct cve_id, ',') as cve_agg from ###(select hostname, max(deviceip)
as srcip, split_part(os, ',', 1) as os1, vulnname, vulnseverity, vulnid from $log where
$filter and nullifna(vulnname) is not null and nullifna(vulnseverity) is not null group by
hostname, os1, vulnname, vulnseverity, vulnid)### t1 left join fct_mdata t2 on
t1.vulnid=t2.vid::int group by hostname) t order by severity_num desc, vuln_num desc
```

Dataset Name	Description	Log Category
aware-Threats-By-Severity	Threats by Severity	attack

```
select
  initcap(sev) as severity,
  sum(total_num) as total_num
from
  (
    ###(select crlevel::text as sev, count(*) as total_num from $log-virus where $filter and
nullifna(virus) is not null  and crlevel is not null group by sev order by total_num
desc)### union all ###(select severity::text as sev, count(*) as total_num from $log-attack
where $filter and nullifna(attack) is not null and severity is not null group by sev order
by total_num desc)### union all ###(select apprisk::text as sev, count(*) as total_num from
$log-app-ctrl where $filter and lower(appcat)='botnet' and apprisk is not null group by sev
order by total_num desc)###) t group by severity order by total_num desc
```

Dataset Name	Description	Log Category
aware-Threats-Type-By-Severity	Threats Type by Severity	virus

```
select
  threat_type,
  sum(critical) as critical,
  sum(high) as high,
  sum(medium) as medium,
  sum(low) as low
from
  (
    ###(select (case when eventtype='botnet' then 'Botnets' else 'Malware' end) as threat_
type, sum(case when crlevel = 'critical' then 1 else 0 end) as critical, sum(case when
crlevel = 'high' then 1 else 0 end) as high, sum(case when crlevel = 'medium' then 1 else 0
end) as medium, sum(case when crlevel = 'low' then 1 else 0 end) as low from $log-virus
where $filter and nullifna(virus) is not null group by threat_type)### union all ###(select
'Intrusions' as threat_type, sum(case when severity = 'critical' then 1 else 0 end) as
critical, sum(case when severity = 'high' then 1 else 0 end) as high, sum(case when severity
= 'medium' then 1 else 0 end) as medium, sum(case when severity = 'low' then 1 else 0 end)
as low from $log-attack where $filter and nullifna(attack) is not null group by threat_
type)### union all ###(select 'Botnets' as threat_type, sum(case when apprisk = 'critical'
then 1 else 0 end) as critical, sum(case when apprisk = 'high' then 1 else 0 end) as high,
sum(case when apprisk = 'medium' then 1 else 0 end) as medium, sum(case when apprisk = 'low'
then 1 else 0 end) as low from $log-app-ctrl where $filter and lower(appcat)='botnet' group
by threat_type)###) t group by threat_type
```

Dataset Name	Description	Log Category
aware-Threats-By-Day	Threats by Day	virus

```
select
  daystamp,
  sum(total_num) as total_num
from
  (
    ###(select $day_of_week as daystamp, count(*) as total_num from $log-virus where $filter
and nullifna(virus) is not null group by daystamp)### union all ###(select $day_of_week as
daystamp, count(*) as total_num from $log-attack where $filter and nullifna(attack) is not
null group by daystamp)### union all ###(select $day_of_week as daystamp, count(*) as total_
num from $log-app-ctrl where $filter and lower(appcat)='botnet' group by daystamp)###) t
group by daystamp order by daystamp
```

Dataset Name	Description	Log Category
aware-Threats-By-Day-Radar	Threats by Day	virus

```
select
  daystamp,
  sum(total_num) as total_num
from
  (
    ###(select $day_of_week as daystamp, count(*) as total_num from $log-virus where $filter
and nullifna(virus) is not null group by daystamp)### union all ###(select $day_of_week as
daystamp, count(*) as total_num from $log-attack where $filter and nullifna(attack) is not
null group by daystamp)### union all ###(select $day_of_week as daystamp, count(*) as total_
num from $log-app-ctrl where $filter and lower(appcat)='botnet' group by daystamp)###) t
group by daystamp order by daystamp
```

Dataset Name	Description	Log Category
aware-Count-Of-Malware-Events	Count of Malware Events	virus

```
select
  virus,
  count(*) as total_num
from
  $log
where
  $filter
  and nullifna(virus) is not null
group by
  virus
order by
  total_num desc
```

Dataset Name	Description	Log Category
aware-Top-Malware-By-Count	Top Malware by Count	app-ctrl

```
select
  virus,
  malware_type,
  risk_level,
  count(distinct victim) as victim,
  count(distinct source) as source,
  sum(total_num) as total_num
from
  (
    ###(select app as virus, 'Botnet C&C' as malware_type, apprisk::text as risk_level,
(CASE WHEN direction='incoming' THEN dstip ELSE srcip END) as source, (CASE WHEN
direction='incoming' THEN srcip ELSE dstip END) as victim, count(*) as total_num from $log-
app-ctrl where $filter and lower(appcat)='botnet' and apprisk is not null group by app,
malware_type, apprisk, victim, source order by total_num desc)### union all ###(select
virus, (case when eventtype='botnet' then 'Botnet C&C' else 'Virus' end) as malware_type,
crlevel::text as risk_level, (CASE WHEN direction='incoming' THEN dstip ELSE srcip END) as
source, (CASE WHEN direction='incoming' THEN srcip ELSE dstip END) as victim, count(*) as
total_num from $log-virus where $filter and nullifna(virus) is not null and crlevel is not
null group by virus, malware_type, crlevel, victim, source order by total_num desc)### union
all ###(select attack as virus, (case when eventtype='botnet' then 'Botnet C&C' else 'Virus'
end) as malware_type, crlevel::text as risk_level, (CASE WHEN direction='incoming' THEN
dstip ELSE srcip END) as source, (CASE WHEN direction='incoming' THEN srcip ELSE dstip END)
as victim, count(*) as total_num from $log-attack where $filter and (logflag&16>0) and
crlevel is not null group by virus, malware_type, crlevel, victim, source order by total_num
desc)###) t group by virus, malware_type, risk_level order by total_num desc
```

Dataset Name	Description	Log Category
aware-Top-Failed-Login-Attempts	Top Failed Login Attempts	event

```
select
  `user` as f_user,
  ui,
  dstip,
  count(status) as total_failed
from
  $log
where
  $filter
  and nullifna(`user`) is not null
  and logid_to_int(logid) = 32002
group by
  ui,
  f_user,
  dstip
order by
  total_failed desc
```

Dataset Name	Description	Log Category
aware-Top-Failed-Authentication-Attempts	VPN failed logins	event

```
select
  f_user,
  tunneltype,
  sum(total_num) as total_num
from
  ###(select coalesce(nullifna(`xauthuser`), `user`) as f_user, tunneltype, count(*) as
total_num from $log where $filter and subtype='vpn' and (tunneltype='ipsec' or left
(tunneltype, 3)='ssl') and action in ('ssl-login-fail', 'ipsec-login-fail') and coalesce
(nullifna(`xauthuser`), nullifna(`user`)) is not null group by f_user, tunneltype)### t
group by f_user, tunneltype order by total_num desc
```

Dataset Name	Description	Log Category
aware-Top-Denied-Connections	Top Denied Connections	traffic

```
select
  coalesce(
    nullifna(`user`),
    ipstr(`srcip`)
  ) as user_src,
  service || & #039;(' || ipstr(srcip) || ')' as interface, dstip, count(*) as total_num
from $log where $filter and (logflag&1>0) and action = 'deny' group by user_src, interface,
dstip order by total_num desc
```

Dataset Name	Description	Log Category
aware-Failed-Compliance-Checked-By-Device	Failed Compliance Checked by Device	event

```
select
  devid,
  & #039;Failed' as results, count(distinct reason) as total_num from ###(select devid,
reason from $log where $filter and subtype='compliance-check' and result='fail' group by
devid, reason)### t group by devid, results order by total_num desc
```

Dataset Name	Description	Log Category
aware-Ioc-Blacklist-Summary	IOC Blacklist Summary	app-ctrl

```
drop
  table if exists tmp_ep_eu_map; create temporary table tmp_ep_eu_map as (
    select
      epid,
      euid
    from
      $ADOM_EPEU_DEVMAP
    where
      euid >= 1024
  );
select
  coalesce(
    nullifna(epname),
    nullifna(
      ipstr(`srcip`)
    ),
    & #039;Unknown') as epname, user_agg, sevid, (CASE sevid WHEN 5 THEN 'Critical' WHEN 4
THEN 'High' WHEN 3 THEN 'Medium' WHEN '2' THEN 'Info' ELSE 'Low' END) as severity, threats,
bl_count as total_bl from (select th1.epid, srcip, sevid, bl_count, threats from (select
epid, srcip, max(verdict)+1 as sevid, sum(bl_count) as bl_count from ((select epid, srcip,
day_st as itime, bl_count, verdict, unnest(dvid) as dvid_s from $ADOMTBL_PLHD_IOC_VERDICT
where bl_count>0) union all (select epid, srcip, day_st as itime, bl_count, verdict, unnest
(dvid) as dvid_s from $ADOMTBL_PLHD_INTERIM_IOC_VERDICT where bl_count>0)) tvdt inner join
devtable td on td.dvid = tvdt.dvid_s where $filter and $filter-drilldown and $dev_filter
group by epid, srcip) th1 inner join (select epid, string_agg(name, ',') as threats from
((select epid, thid from ((select epid, thid, itime, unnest(dvid) as dvid_s from (select
epid, unnest(threatid) as thid, day_st as itime, dvid from $ADOMTBL_PLHD_IOC_VERDICT where
bl_count>0) ta1) union all (select epid, thid, itime, unnest(dvid) as dvid_s from (select
epid, unnest(threatid) as thid, day_st as itime, dvid from $ADOMTBL_PLHD_INTERIM_IOC_VERDICT
where  bl_count>0) ta2)) t inner join devtable td on td.dvid = t.dvid_s where $filter and
$filter-drilldown and $dev_filter group by epid, thid) thr inner join td_threat_name_mdata
tm on tm.id=thr.thid) t group by epid) th2 on th1.epid=th2.epid) t1 left join (select epid,
string_agg(distinct euname, ',') as user_agg from tmp_ep_eu_map tpu inner join $ADOM_ENDUSER
as teu on tpu.euid=teu.euid group by epid) t2 on t2.epid=t1.epid inner join $ADOM_ENDPOINT
as tep on tep.epid=t1.epid order by total_bl desc, sevid desc
```

Dataset Name	Description	Log Category
aware-Ioc-Potential-Breach-By-Day	IOC Potential Breach by Day	app-ctrl

```
select
  number,
  day_st as itime
from
  (
    select
      count(epid) as number,
      to_char(
        from_itime(itime),
        & #039;Day') as day_st from (select epid, day_st as itime, unnest(dvid) as dvid_s
from $ADOMTBL_PLHD_INTERIM_IOC_VERDICT where $filter-drilldown and cs_count>0 union all
(select epid, day_st as itime, unnest(dvid) as dvid_s from $ADOMTBL_PLHD_IOC_VERDICT where
$filter-drilldown and cs_count>0)) t inner join devtable td on td.dvid = t.dvid_s where
$filter and $filter-drilldown group by day_st) tt order by itime
```

Dataset Name	Description	Log Category
aware-Ioc-Potential-Breach-By-Day-Bar	IOC Potential Breach by Day	app-ctrl

```
select
  number,
  day_st as itime
from
  (
    select
      count(epid) as number,
      to_char(
        from_itime(itime),
        & #039;Day') as day_st from (select epid, day_st as itime, unnest(dvid) as dvid_s
from $ADOMTBL_PLHD_INTERIM_IOC_VERDICT where $filter-drilldown and cs_count>0 union all
(select epid, day_st as itime, unnest(dvid) as dvid_s from $ADOMTBL_PLHD_IOC_VERDICT where
$filter-drilldown and cs_count>0)) t inner join devtable td on td.dvid = t.dvid_s where
$filter and $filter-drilldown group by day_st) tt order by itime
```

Dataset Name	Description	Log Category
aware-Ioc-Suspicion-Summary	IOC Suspicion Summary	app-ctrl

```
select
  coalesce(
    nullifna(epname),
    nullifna(
      ipstr(`srcip`)
    ),
    & #039;Unknown') as epname, cs_count as total_cs, cs_score as max_cs, verdict as max_
verdict, threats from (select th1.epid, srcip, itime, cs_count, verdict, cs_score, threats
from (select epid, srcip, min(itime) as itime, sum(cs_count) as cs_count, max(verdict) as
verdict, max(cs_score) as cs_score from ((select epid, srcip, day_st as itime, cs_count,
verdict, cs_score, unnest(dvid) as dvid_s from $ADOMTBL_PLHD_IOC_VERDICT where $filter-
drilldown and bl_count=0 and cs_count>0) union all (select epid, srcip, day_st as itime, cs_
count, verdict, cs_score, unnest(dvid) as dvid_s from $ADOMTBL_PLHD_INTERIM_IOC_VERDICT
where $filter-drilldown and bl_count=0 and cs_count>0)) tvdt inner join devtable td on
td.dvid = tvdt.dvid_s where $filter and $filter-drilldown group by epid, srcip) th1 inner
join (select epid, string_agg(name, ',') as threats from ((select epid, thid from ((select
epid, thid, itime, unnest(dvid) as dvid_s from (select epid, unnest(threatid) as thid, day_
st as itime, dvid from $ADOMTBL_PLHD_IOC_VERDICT where bl_count=0 and cs_count>0) ta1) union
all (select epid, thid, itime, unnest(dvid) as dvid_s from (select epid, unnest(threatid) as
thid, day_st as itime, dvid from $ADOMTBL_PLHD_INTERIM_IOC_VERDICT where bl_count=0 and cs_
count>0) ta2)) tt1 inner join devtable td on td.dvid = tt1.dvid_s where $filter and $filter-
drilldown group by epid, thid) thr inner join td_threat_name_mdata tm on tm.id=thr.thid) tt2
group by epid) th2 on th1.epid=th2.epid) t inner join $ADOM_ENDPOINT as tep on
tep.epid=t.epid order by max_verdict desc, max_cs desc, total_cs desc
```

Dataset Name	Description	Log Category
aware-Botnet-IP	Top Source IP Affected by Botnet	virus

```
select
  f_user,
  source,
  string_agg(
    distinct `virus`,
    & #039;,') as virus_agg, count(distinct ipstr(`victim`)) as dstip_cnt, max(action) as
action, sum(total_num) as total_num, min(from_itime(first_seen)) as first_seen, max(from_
itime(last_seen)) as last_seen from ###(select coalesce(nullifna(`user`), nullifna
(`unauthuser`)) as f_user, virus, (CASE WHEN direction='incoming' THEN dstip ELSE srcip END)
as source, (CASE WHEN direction='incoming' THEN srcip ELSE dstip END) as victim, max(action)
as action, count(*) as total_num, min(itime) as first_seen, max(itime) as last_seen from
$log where $filter and logid in ('0202009248', '0202009249') and virus is not null group by
f_user, virus, source, victim order by total_num desc)### t group by source, f_user order by
total_num desc
```

Dataset Name	Description	Log Category
aware-Botnet-Domain	New Botnet Domains	dns

```
select
  botnet,
  count(distinct `qname`) as qname_cnt,
  count(
    distinct ipstr(`dstip`)
  ) as dnssvr_cnt,
  sum(total_num) as total_num,
  min(
    from_itime(first_seen)
  ) as first_seen,
  max(
    from_itime(last_seen)
  ) as last_seen
from
  ###(select coalesce(`botnetdomain`, ipstr(`botnetip`)) as botnet, qname, dstip, count(*)
as total_num, min(nanosec_to_sec(eventtime)) as first_seen, max(nanosec_to_sec(eventtime))
as last_seen from $log where $filter and logid in ('1501054601', '1501054600') group by
botnet, qname, dstip order by total_num desc)### t group by botnet order by first_seen desc
```

Dataset Name	Description	Log Category
aware-High-Risk-URL-Category	Category of High Risk URLs	webfilter

```
select
  catdesc,
  string_agg(
    distinct hostname,
    & #039;,') as hostname_agg, max(action) as action, sum(total_num) as total_num, min
(from_itime(first_seen)) as first_seen, max(from_itime(last_seen)) as last_seen from ###
(select catdesc, hostname, max(action) as action, count(*) as total_num, min(itime) as
first_seen, max(itime) as last_seen from $log where $filter and cat in (26, 61, 86, 88, 90,
91, 93) group by catdesc, hostname order by total_num desc)### t group by catdesc order by
total_num desc
```

Dataset Name	Description	Log Category
aware-Malicious-Files	Type of Malicious Files from AV and Sandbox	virus

```
select
  virus,
  left(url_agg, 1000) as url_agg,
  left(filename_agg, 1000) as filename_agg,
  quarskip,
  action,
  from_sandbox,
  total_num,
  first_seen,
  last_seen
from
  (
    select
      virus,
      string_agg(
        distinct url,
        & #039;<br/>') as url_agg, string_agg(distinct filename, '<br/>') as filename_agg,
max(quarskip) as quarskip, max(action) as action, max(from_sandbox) as from_sandbox, sum
(total_num) as total_num, min(from_itime(first_seen)) as first_seen, max(from_itime(last_
seen)) as last_seen from ###(select virus, url, filename, max(quarskip) as quarskip, max
(action) as action, (case when logid in ('0211009234', '0211009235') then 1 else 0 end) as
from_sandbox, count(*) as total_num, min(itime) as first_seen, max(itime) as last_seen from
$log where $filter and virus is not null and logid in ('0211009234', '0201009235',
'0211008192', '0211008193', '0211008194', '0211008195') group by virus, url, filename, from_
sandbox order by total_num desc)### t group by virus) t order by total_num desc
```

Dataset Name	Description	Log Category
newthing-New-Users	New users	fct-traffic

```
drop
  table if exists rpt_tmptbl_1;
drop
  table if exists rpt_tmptbl_2; create temporary table rpt_tmptbl_1 as
select
  f_user,
  min(start_time) as start_time
from
  ###(select coalesce(nullifna(`user`), ipstr(`srcip`)) as f_user, min(dtime) as start_time
from $log where $pre_period $filter group by f_user order by start_time desc)### t group by
f_user; create temporary table rpt_tmptbl_2 as select f_user, min(start_time) as start_time
```

```
from ###(select coalesce(nullifna(`user`), ipstr(`srcip`)) as f_user, min(dtime) as start_
time from $log where $filter group by f_user order by start_time desc)### t group by f_user;
select f_user, from_dtime(min(start_time)) as start_time from rpt_tmptbl_2 where f_user is
not null and not exists (select 1 from rpt_tmptbl_1 where rpt_tmptbl_2.f_user=rpt_tmptbl_
1.f_user) group by f_user order by start_time desc
```

Dataset Name	Description	Log Category
newthing-New-Devices	New devices	fct-traffic

```
drop
  table if exists rpt_tmptbl_1;
drop
  table if exists rpt_tmptbl_2; create temporary table rpt_tmptbl_1 as
select
  hostname,
  os,
  srcip,
  fctver
from
  ###(select hostname, os, srcip, fctver from $log where $pre_period $filter and hostname is
not null group by hostname, os, srcip, fctver order by hostname)### t group by hostname, os,
srcip, fctver; create temporary table rpt_tmptbl_2 as select hostname, os, srcip, fctver
from ###(select hostname, os, srcip, fctver from $log where $filter and hostname is not null
group by hostname, os, srcip, fctver order by hostname)### t group by hostname, os, srcip,
fctver; select hostname, max(fctos_to_devtype(os)) as devtype, string_agg(distinct os, '/')
as os_agg, string_agg(distinct ipstr(srcip), '/') as srcip_agg, string_agg(distinct fctver,
'/') as fctver_agg from rpt_tmptbl_2 where not exists (select 1 from rpt_tmptbl_1 where rpt_
tmptbl_2.hostname=rpt_tmptbl_1.hostname) group by hostname order by hostname
```

Dataset Name	Description	Log Category
newthing-New-Software-Installed	New software installed	fct-traffic

```
drop
  table if exists rpt_tmptbl_1;
drop
  table if exists rpt_tmptbl_2; create temporary table rpt_tmptbl_1 as
select
  srcproduct,
  hostname
from
  ###(select srcproduct, hostname from $log where $pre_period $filter and nullifna
(srcproduct) is not null group by srcproduct, hostname order by srcproduct)### t group by
srcproduct, hostname; create temporary table rpt_tmptbl_2 as select srcproduct, hostname
from ###(select srcproduct, hostname from $log where $filter and nullifna(srcproduct) is not
null group by srcproduct, hostname order by srcproduct)### t group by srcproduct, hostname;
select srcproduct, string_agg(distinct hostname, ',') as host_agg from rpt_tmptbl_2 where
not exists (select 1 from rpt_tmptbl_1 where rpt_tmptbl_2.srcproduct=rpt_tmptbl_
1.srcproduct) group by srcproduct order by srcproduct
```

Dataset Name	Description	Log Category
newthing-New-Security-Threats	New security threats	virus

```
drop
  table if exists rpt_tmptbl_1;
drop
  table if exists rpt_tmptbl_2; create temporary table rpt_tmptbl_1 as
select
  threat_name,
  cat_id,
  source
from
  (
    ###(select app as threat_name, 1 as cat_id, (CASE WHEN direction='incoming' THEN dstip
ELSE srcip END) as source from $log-app-ctrl where $pre_period $filter and nullifna(app) is
not null and lower(appcat)='botnet' group by threat_name, cat_id, source)### union all ###
(select virus as threat_name, 2 as cat_id, (CASE WHEN direction='incoming' THEN dstip ELSE
srcip END) as source from $log-virus where $pre_period $filter and nullifna(virus) is not
null group by threat_name, cat_id, source)### union all ###(select attack as threat_name, 3
as cat_id, (CASE WHEN direction='incoming' THEN dstip ELSE srcip END) as source from $log-
attack where $pre_period $filter and nullifna(attack) is not null group by threat_name, cat_
id, source)###) t; create temporary table rpt_tmptbl_2 as select daystamp, threat_name, cat_
id, source from (###(select $DAY_OF_MONTH as daystamp, app as threat_name, 1 as cat_id,
(CASE WHEN direction='incoming' THEN dstip ELSE srcip END) as source from $log-app-ctrl
where $filter and nullifna(app) is not null and lower(appcat)='botnet' group by daystamp,
threat_name, cat_id, source order by daystamp)### union all ###(select $DAY_OF_MONTH as
daystamp, virus as threat_name, 2 as cat_id, (CASE WHEN direction='incoming' THEN dstip ELSE
srcip END) as source from $log-virus where $filter and nullifna(virus) is not null group by
daystamp, threat_name, cat_id, source order by daystamp)### union all ###(select $DAY_OF_
MONTH as daystamp, attack as threat_name, 3 as cat_id, (CASE WHEN direction='incoming' THEN
dstip ELSE srcip END) as source from $log-attack where $filter and nullifna(attack) is not
null group by daystamp, threat_name, cat_id, source order by daystamp)###) t; select threat_
name, (case cat_id when 1 then 'Botnet' when 2 then 'Malware' when 3 then 'Attack' end) as
threat_cat, count(distinct source) as host_num, string_agg(distinct cve, ',') as cve_agg
from rpt_tmptbl_2 left join ips_mdata t2 on rpt_tmptbl_2.threat_name=t2.name where not
exists (select 1 from rpt_tmptbl_1 where rpt_tmptbl_2.threat_name=rpt_tmptbl_1.threat_name)
group by threat_name, threat_cat order by host_num desc
```

Dataset Name	Description	Log Category
newthing-dns-Botnet-Domain-IP	New Queried Botnet C&C Domains and IPs	dns

```
drop
  table if exists rpt_tmptbl_1;
drop
  table if exists rpt_tmptbl_2; create temporary table rpt_tmptbl_1 as
select
  domain,
  malware_type,
  action_s as action,
  srcip,
  sevid
from
  ###(select coalesce(botnetdomain, ipstr(botnetip)) as domain, cast('Botnet C&C' as char
(32)) as malware_type, (case when action='block' then 'Blocked' when action='redirect' then
'Redirected' else 'Passed' end) as action_s, srcip, (CASE WHEN level IN ('critical',
'alert', 'emergency') THEN 5 WHEN level='error' THEN 4 WHEN level='warning' THEN 3 WHEN
level='notice' THEN 2 ELSE 1 END) as sevid, coalesce(botnetdomain, ipstr(botnetip)) as
sources_s, count(*) as total_num from $log where $pre_period $filter and (botnetdomain is
not null or botnetip is not null) group by domain, action_s, srcip, sevid order by sevid
desc)### t group by domain, malware_type, action, srcip, sevid; create temporary table rpt_
tmptbl_2 as select domain, malware_type, action_s as action, srcip, sevid from ###(select
coalesce(botnetdomain, ipstr(botnetip)) as domain, cast('Botnet C&C' as char(32)) as
malware_type, (case when action='block' then 'Blocked' when action='redirect' then
'Redirected' else 'Passed' end) as action_s, srcip, (CASE WHEN level IN ('critical',
'alert', 'emergency') THEN 5 WHEN level='error' THEN 4 WHEN level='warning' THEN 3 WHEN
level='notice' THEN 2 ELSE 1 END) as sevid, coalesce(botnetdomain, ipstr(botnetip)) as
sources_s, count(*) as total_num from $log where $filter and (botnetdomain is not null or
botnetip is not null) group by domain, action_s, srcip, sevid order by sevid desc)### t
group by domain, malware_type, action, srcip, sevid; select domain, srcip, sevid, (CASE
sevid WHEN 5 THEN 'Critical' WHEN 4 THEN 'High' WHEN 3 THEN 'Medium' WHEN '2' THEN 'Info'
ELSE 'Low' END) as severity from rpt_tmptbl_2 where (domain is not null and not exists
(select 1 from rpt_tmptbl_1 where rpt_tmptbl_2.domain=rpt_tmptbl_1.domain)) or (srcip is not
null and not exists (select 1 from rpt_tmptbl_1 where rpt_tmptbl_2.srcip=rpt_tmptbl_
1.srcip)) group by domain, srcip, sevid order by sevid desc, domain
```

Dataset Name	Description	Log Category
newthing-New-Security-Threats-Timeline	New security threats timeline	virus

```
drop
  table if exists rpt_tmptbl_1;
drop
  table if exists rpt_tmptbl_2; create temporary table rpt_tmptbl_1 as
select
  threat_name,
  cat_id,
  source
from
  (
    ###(select app as threat_name, 1 as cat_id, (CASE WHEN direction='incoming' THEN dstip
ELSE srcip END) as source from $log-app-ctrl where $pre_period $filter and nullifna(app) is
not null and lower(appcat)='botnet' group by threat_name, cat_id, source)### union all ###
(select virus as threat_name, 2 as cat_id, (CASE WHEN direction='incoming' THEN dstip ELSE
srcip END) as source from $log-virus where $pre_period $filter and nullifna(virus) is not
null group by threat_name, cat_id, source)### union all ###(select attack as threat_name, 3
as cat_id, (CASE WHEN direction='incoming' THEN dstip ELSE srcip END) as source from $log-
attack where $pre_period $filter and nullifna(attack) is not null group by threat_name, cat_
id, source)###) t; create temporary table rpt_tmptbl_2 as select timestamp, threat_name,
cat_id, source from (###(select $flex_timestamp as timestamp, app as threat_name, 1 as cat_
id, (CASE WHEN direction='incoming' THEN dstip ELSE srcip END) as source from $log-app-ctrl
where $filter and nullifna(app) is not null and lower(appcat)='botnet' group by timestamp,
threat_name, cat_id, source order by timestamp)### union all ###(select $flex_timestamp as
timestamp, virus as threat_name, 2 as cat_id, (CASE WHEN direction='incoming' THEN dstip
ELSE srcip END) as source from $log-virus where $filter and nullifna(virus) is not null
group by timestamp, threat_name, cat_id, source order by timestamp)### union all ###(select
$flex_timestamp as timestamp, attack as threat_name, 3 as cat_id, (CASE WHEN
direction='incoming' THEN dstip ELSE srcip END) as source from $log-attack where $filter and
nullifna(attack) is not null group by timestamp, threat_name, cat_id, source order by
timestamp)###) t; select $flex_datetime(timestamp) as timescale, count(distinct source) as
host_num, (case cat_id when 1 then 'Botnet' when 2 then 'Malware' when 3 then 'Attack' end)
as threat_cat from rpt_tmptbl_2 where not exists (select 1 from rpt_tmptbl_1 where rpt_
tmptbl_2.threat_name=rpt_tmptbl_1.threat_name) group by timescale, cat_id order by
timescale, cat_id
```

Dataset Name	Description	Log Category
newthing-New-Vulnerability	New vulnerabilities	fct-netscan

```
drop
  table if exists rpt_tmptbl_1;
drop
  table if exists rpt_tmptbl_2; create temporary table rpt_tmptbl_1 as
select
  vulnid,
  vulnname,
  vulnseverity,
  vulncat,
  hostname
from
  ###(select vulnid, vulnname, vulnseverity, vulncat, hostname from $log where $pre_period
$filter and nullifna(vulnname) is not null group by vulnid, vulnname, vulnseverity, vulncat,
hostname)### t group by vulnid, vulnname, vulnseverity, vulncat, hostname; create temporary
table rpt_tmptbl_2 as select vulnid, vulnname, vulnseverity, vulncat, hostname from ###
(select vulnid, vulnname, vulnseverity, vulncat, hostname from $log where $filter and
nullifna(vulnname) is not null group by vulnid, vulnname, vulnseverity, vulncat,
hostname)### t group by vulnid, vulnname, vulnseverity, vulncat, hostname; select vulnname,
(case when vulnseverity='Critical' then 5 when vulnseverity='High' then 4 when
vulnseverity='Medium' then 3 when vulnseverity='Low' then 2 when vulnseverity='Info' then 1
else 0 end) as sev, vulnseverity, vulncat, count(distinct hostname) as host_num, cve_id from
rpt_tmptbl_2 t1 left join fct_mdata t2 on t1.vulnid=t2.vid::int where not exists (select 1
from rpt_tmptbl_1 where t1.vulnid=rpt_tmptbl_1.vulnid) group by vulnname, sev, vulnseverity,
vulncat, cve_id order by sev desc, host_num desc
```

Dataset Name	Description	Log Category
newthing-New-Vulnerability-Graph	New vulnerabilities (Graph)	fct-netscan

```
drop
  table if exists rpt_tmptbl_1;
drop
  table if exists rpt_tmptbl_2; create temporary table rpt_tmptbl_1 as
select
  vulnid,
  vulnname,
  vulnseverity,
  vulncat,
  hostname
from
  ###(select vulnid, vulnname, vulnseverity, vulncat, hostname from $log where $pre_period
$filter and nullifna(vulnname) is not null group by vulnid, vulnname, vulnseverity, vulncat,
hostname)### t group by vulnid, vulnname, vulnseverity, vulncat, hostname; create temporary
table rpt_tmptbl_2 as select vulnid, vulnname, vulnseverity, vulncat, hostname from ###
(select vulnid, vulnname, vulnseverity, vulncat, hostname from $log where $filter and
nullifna(vulnname) is not null group by vulnid, vulnname, vulnseverity, vulncat,
hostname)### t group by vulnid, vulnname, vulnseverity, vulncat, hostname; select
vulnseverity, count (distinct vulnid) as vuln_num from rpt_tmptbl_2 where not exists (select
1 from rpt_tmptbl_1 where rpt_tmptbl_2.vulnid=rpt_tmptbl_1.vulnid) group by vulnseverity
order by (case when vulnseverity='Critical' then 5 when vulnseverity='High' then 4 when
vulnseverity='Medium' then 3 when vulnseverity='Low' then 2 when vulnseverity='Info' then 1
else 0 end) desc
```

Dataset Name	Description	Log Category
newthing-System-Alerts	System Alerts	local-event

```
select
  from_itime(itime) as timestamp,
  msg
from
  $log
where
  $filter
  and msg is not null
  and level =& #039;critical' order by timestamp desc
```

Dataset Name	Description	Log Category
newthing-Configuration-Changes	Configuration Changes	event

```
select
  `user` as f_user,
  devid,
  from_dtime(dtime) as time_s,
  ui,
  msg
from
  $log
where
  $filter
  and cfgtid>0
order by
  time_s desc
```

Dataset Name	Description	Log Category
newthing-FortiGate-Upgrades	FortiGate Upgrades	event

```
select
  devid,
  from_dtime(dtime) as time_s,
  info[1] as intf,
  info[2] as prev_ver,
  info[3] as new_ver
from
  (
    select
      devid,
      dtime,
      regexp_matches(
        msg,
        & #039;from ([^ ]+) \\(([^ ]+) -> ([^)]+)\\)') as info from $log where $filter and
action='restore-image') t order by time_s desc
```

Dataset Name	Description	Log Category
newthing-User-Upgrades	User Upgrades	fct-event

```
drop
  table if exists rpt_tmptbl_1;
drop
  table if exists rpt_tmptbl_2; create temporary table rpt_tmptbl_1 as
select
  fgtserial,
  hostname,
  deviceip,
  os,
  dtime
from
  ###(select distinct on (fgtserial, hostname) fgtserial, hostname, deviceip, os, dtime from
$log where $pre_period $filter and hostname is not null order by fgtserial, hostname, dtime
desc)### t; create temporary table rpt_tmptbl_2 as select fgtserial, hostname, deviceip, os,
dtime from ###(select distinct on (fgtserial, hostname) fgtserial, hostname, deviceip, os,
dtime from $log where $filter and hostname is not null order by fgtserial, hostname, dtime
desc)### t; select distinct on (1, 2) t2.fgtserial as devid, t2.hostname, t2.deviceip, t1.os
as prev_os, t2.os as cur_os, from_dtime(t1.dtime) as time_s from rpt_tmptbl_2 t2 inner join
rpt_tmptbl_1 t1 on t2.fgtserial=t1.fgtserial and t2.hostname=t1.hostname and t2.os!=t1.os
order by devid, t2.hostname, t1.dtime desc
```

Dataset Name	Description	Log Category
GTP-List-of-APN-Used	List of APNs Used	gtp

```
select
  apn,
  from_dtime(
    min(first_seen)
  ) as first_seen,
  from_dtime(
    max(last_seen)
  ) as last_seen
from
  ###(select apn, min(dtime) as first_seen, max(dtime) as last_seen from $log where $filter
and nullifna(apn) is not null group by apn order by last_seen desc)### t group by apn order
by last_seen desc, first_seen
```

Dataset Name	Description	Log Category
GTP-Top-APN-by-Bytes	Top APNs by Bytes	gtp

```
select
  apn,
  sum(
    coalesce(`u-bytes`, 0)
  ) as total_bytes
from
  $log
where
  $filter
  and nullifna(apn) is not null
  and status =& #039;traffic-count' group by apn having sum(coalesce(`u-bytes`, 0))>0 order
by total_bytes desc
```

Dataset Name	Description	Log Category
GTP-Top-APN-by-Duration	Top APNs by Duration	gtp

```
select
  apn,
  sum(
    coalesce(duration, 0)
  ) as total_dura
from
  $log
where
  $filter
  and nullifna(apn) is not null
  and status =& #039;traffic-count' group by apn having sum(coalesce(duration, 0)) >0 order
by total_dura desc
```

Dataset Name	Description	Log Category
GTP-Top-APN-by-Packets	Top APNs by Number of Packets	gtp

```
select
  apn,
  sum(
    coalesce(`u-pkts`, 0)
  ) as total_num
from
  $log
where
  $filter
  and nullifna(apn) is not null
  and status =& #039;traffic-count' group by apn having sum(coalesce(`u-pkts`, 0))>0 order
by total_num desc
```

Dataset Name	Description	Log Category
Top10-dns-Botnet-Domain-IP	Top Queried Botnet C&C Domains and IPs	dns

```
select
  domain,
  malware_type,
  action,
  count(distinct srcip) as victims,
  count(distinct sources_s) as sources,
  sum(total_num) as total_num
from
  ###(select coalesce(botnetdomain, ipstr(botnetip)) as domain, qname, cast('Botnet C&C' as
char(32)) as malware_type, (case when action='block' then 'Blocked' when action='redirect'
then 'Redirected' else 'Passed' end) as action, srcip, (CASE WHEN level IN ('critical',
'alert', 'emergency') THEN 5 WHEN level='error' THEN 4 WHEN level='warning' THEN 3 WHEN
level='notice' THEN 2 ELSE 1 END) as sevid, coalesce(botnetdomain, ipstr(botnetip)) as
sources_s, count(*) as total_num from $log where $filter and (botnetdomain is not null or
botnetip is not null) group by domain, qname, action, srcip, sevid order by sevid desc)### t
group by domain, malware_type, action order by total_num desc
```

Dataset Name	Description	Log Category
dns-Botnet-Usage	Top Queried Botnet C&C Domains and IPs	dns

```
select
  domain,
  malware_type,
  action,
  count(distinct srcip) as victims,
  count(distinct sources_s) as sources,
  sum(total_num) as total_num
from
  ###(select coalesce(botnetdomain, ipstr(botnetip)) as domain, qname, cast('Botnet C&C' as
char(32)) as malware_type, (case when action='block' then 'Blocked' when action='redirect'
then 'Redirected' else 'Passed' end) as action, srcip, (CASE WHEN level IN ('critical',
'alert', 'emergency') THEN 5 WHEN level='error' THEN 4 WHEN level='warning' THEN 3 WHEN
level='notice' THEN 2 ELSE 1 END) as sevid, coalesce(botnetdomain, ipstr(botnetip)) as
sources_s, count(*) as total_num from $log where $filter and (botnetdomain is not null or
botnetip is not null) group by domain, qname, action, srcip, sevid order by sevid desc)### t
group by domain, malware_type, action order by total_num desc
```

Dataset Name	Description	Log Category
Dns-Detected-Botnet	Top Queried Botnet C&C Domains and IPs	dns

```
select
  domain,
  malware_type,
  action,
  count(distinct srcip) as victims,
  count(distinct sources_s) as sources,
  sum(total_num) as total_num
from
  ###(select coalesce(botnetdomain, ipstr(botnetip)) as domain, qname, cast('Botnet C&C' as
char(32)) as malware_type, (case when action='block' then 'Blocked' when action='redirect'
then 'Redirected' else 'Passed' end) as action, srcip, (CASE WHEN level IN ('critical',
'alert', 'emergency') THEN 5 WHEN level='error' THEN 4 WHEN level='warning' THEN 3 WHEN
level='notice' THEN 2 ELSE 1 END) as sevid, coalesce(botnetdomain, ipstr(botnetip)) as
sources_s, count(*) as total_num from $log where $filter and (botnetdomain is not null or
botnetip is not null) group by domain, qname, action, srcip, sevid order by sevid desc)### t
group by domain, malware_type, action order by total_num desc
```

Dataset Name	Description	Log Category
dns-Botnet-Domain-IP	Queried Botnet C&C Domains and IPs	dns

```
select
  domain,
  srcip,
  sevid,
  (
    CASE sevid WHEN 5 THEN & #039;Critical' WHEN 4 THEN 'High' WHEN 3 THEN 'Medium' WHEN '2'
THEN 'Info' ELSE 'Low' END) as severity from ###(select coalesce(botnetdomain, ipstr
(botnetip)) as domain, qname, cast('Botnet C&C' as char(32)) as malware_type, (case when
action='block' then 'Blocked' when action='redirect' then 'Redirected' else 'Passed' end) as
action, srcip, (CASE WHEN level IN ('critical', 'alert', 'emergency') THEN 5 WHEN
level='error' THEN 4 WHEN level='warning' THEN 3 WHEN level='notice' THEN 2 ELSE 1 END) as
sevid, coalesce(botnetdomain, ipstr(botnetip)) as sources_s, count(*) as total_num from $log
where $filter and (botnetdomain is not null or botnetip is not null) group by domain, qname,
action, srcip, sevid order by sevid desc)### t group by domain, srcip, sevid order by sevid
desc, domain
```

Dataset Name	Description	Log Category
dns-High-Risk-Source	High Risk Sources	dns

```
select
  srcip,
  sum(total_num) as total_num,
  sum(
    case when sevid = 5 then total_num else 0 end
  ) as num_cri,
  sum(
    case when sevid = 4 then total_num else 0 end
  ) as num_hig,
  sum(
    case when sevid = 3 then total_num else 0 end
  ) as num_med
from
  ###(select srcip, (CASE WHEN level IN ('critical', 'alert', 'emergency') THEN 5 WHEN
level='error' THEN 4 WHEN level='warning' THEN 3 WHEN level='notice' THEN 2 ELSE 1 END) as
sevid, count(*) as total_num from $log where $filter and srcip is not null group by srcip,
sevid order by total_num desc)### t where sevid>=3 group by srcip having sum(total_num)>0
order by total_num desc
```

Dataset Name	Description	Log Category
dns-DNS-Request-Over-Time	DNS Request Over Time	dns

```
select
  $flex_timescale(timestamp) as timescale,
  sum(
    case when sevid = 5 then total_num else 0 end
  ) as num_cri,
  sum(
    case when sevid = 4 then total_num else 0 end
  ) as num_hig,
  sum(
    case when sevid = 3 then total_num else 0 end
  ) as num_med,
  sum(
    case when sevid = 2 then total_num else 0 end
  ) as num_inf,
  sum(
    case when sevid = 1 then total_num else 0 end
  ) as num_low
from
  ###(select $flex_timestamp as timestamp, (CASE WHEN level IN ('critical', 'alert',
'emergency') THEN 5 WHEN level='error' THEN 4 WHEN level='warning' THEN 3 WHEN
level='notice' THEN 2 ELSE 1 END) as sevid, count(*) as total_num from $log where $filter
group by timestamp, sevid order by total_num desc)### t group by timescale order by
timescale
```

Dataset Name	Description	Log Category
dns-Top-Queried-Domain	Top Queried Domain	dns

```
select
  qname,
  count(*) as total_num
from
  $log
where
  $filter
  and qname is not null
group by
  qname
order by
  total_num desc
```

Dataset Name	Description	Log Category
dns-Top-Domain-Lookup-Failure-Bar	Top Domain Lookup Failures	dns

```
select
  qname,
  srcip,
  count(*) as total_num
from
  $log
where
  $filter
  and qname is not null
  and (
    action =& #039;block' or logid_to_int(logid)=54200) group by qname, srcip order by
total_num desc
```

Dataset Name	Description	Log Category
dns-Top-Domain-Lookup-Failure-Table	Top Domain Lookup Failures	dns

```
select
  qname,
  srcip,
  count(*) as total_num
from
  $log
where
  $filter
  and qname is not null
  and (
    action =& #039;block' or logid_to_int(logid)=54200) group by qname, srcip order by
total_num desc
```

Dataset Name	Description	Log Category
dns-Query-Timeout	Query Timeout	dns

```
select
  srcip,
  qname,
  count(*) as total_num
from
  $log
where
  $filter
  and srcip is not null
  and logid_to_int(logid)= 54200
group by
  qname,
  srcip
order by
  total_num desc
```

Dataset Name	Description	Log Category
dns-Blocked-Query	Blocked Queries	dns

```
select
  srcip,
  msg,
  count(*) as total_num
from
  $log
where
  $filter
  and srcip is not null
  and action =& #039;block' group by srcip, msg order by total_num desc
```

Dataset Name	Description	Log Category
perf-stat-cpu-usage-drilldown	Fortigate resource detail timeline	event

```
select
  hodex,
  cast(
    sum(cpu_ave)/ count(*) as decimal(6, 0)
  ) as cpu_ave,
  cast(
    sum(mem_ave)/ count(*) as decimal(6, 0)
  ) as mem_ave,
  cast(
    sum(disk_ave)/ count(*) as decimal(6, 0)
  ) as disk_ave,
  cast(
    sum(log_rate)/ count(*) as decimal(10, 2)
  ) as log_rate,
  cast(
    sum(sessions)/ count(*) as decimal(10, 0)
  ) as sessions,
  cast(
    sum(sent_kbps)/ count(*) as decimal(10, 0)
  ) as sent_kbps,
  cast(
    sum(recv_kbps)/ count(*) as decimal(10, 0)
  ) as recv_kbps,
  cast(
    sum(transmit_kbps)/ count(*) as decimal(10, 0)
  ) as transmit_kbps,
  max(mem_peak) as mem_peak,
  max(disk_peak) as disk_peak,
  max(cpu_peak) as cpu_peak,
  max(lograte_peak) as lograte_peak,
  max(session_peak) as session_peak,
  max(transmit_kbps_peak) as transmit_kbps_peak,
  cast(
    sum(cps_ave)/ count(*) as decimal(10, 0)
  ) as cps_ave,
  max(cps_peak) as cps_peak
from
  (
    select
      hodex,
      devid,
      get_fgt_role(devid, slot) as role,
      cast(
        sum(cpu_ave)/ count(*) as decimal(6, 0)
      ) as cpu_ave,
      cast(
        sum(mem_ave)/ count(*) as decimal(6, 0)
      ) as mem_ave,
      cast(
        sum(disk_ave)/ count(*) as decimal(6, 0)
      ) as disk_ave,
      cast(
        sum(log_rate) as decimal(10, 2)
      ) as log_rate,
      cast(
        sum(sessions) as decimal(10, 0)
      ) as sessions,
      cast(
        sum(sent_kbps) as decimal(10, 0)
      ) as sent_kbps,
      cast(
        sum(recv_kbps) as decimal(10, 0)
      ) as recv_kbps,
      cast(
        sum(transmit_kbps) as decimal(10, 0)
      ) as transmit_kbps,
      max(mem_peak) as mem_peak,
      max(disk_peak) as disk_peak,
      max(cpu_peak) as cpu_peak,
      cast(
        max(lograte_peak) as decimal(10, 2)
      ) as lograte_peak,
      max(session_peak) as session_peak,
      max(transmit_kbps_peak) as transmit_kbps_peak,
      cast(
        sum(cps_ave) as decimal(10, 0)
      ) as cps_ave,
      sum(cps_peak) as cps_peak
    from
      (
        select
          $flex_timescale(timestamp) as hodex,
          devid,
          slot,
          sum(total_cpu)/ sum(count) cpu_ave,
          sum(total_mem)/ sum(count) as mem_ave,
          sum(total_disk)/ sum(count) as disk_ave,
          sum(
            total_trate + total_erate + total_orate
          )/ 100.00 / sum(count) as log_rate,
          sum(totalsession)/ sum(count) as sessions,
          sum(sent)/ sum(count) as sent_kbps,
          sum(recv)/ sum(count) as recv_kbps,
          sum(sent + recv)/ sum(count) as transmit_kbps,
          max(mem_peak) as mem_peak,
          max(disk_peak) as disk_peak,
          max(cpu_peak) as cpu_peak,
          max(lograte_peak)/ 100.00 as lograte_peak,
          max(session_peak) as session_peak,
          max(transmit_peak) as transmit_kbps_peak,
          sum(cps)/ sum(count) as cps_ave,
          max(cps_peak) as cps_peak
        from
          ###(select $flex_timestamp as timestamp, devid, slot, sum(coalesce(trate, 0)) as
total_trate, sum(coalesce(erate, 0)) as total_erate, sum(coalesce(orate, 0)) as total_orate,
min(itime) as first_seen, max(itime) as last_seen, sum(coalesce(mem, 0)) as total_mem, max
(coalesce(mem, 0)) as mem_peak, sum(coalesce(disk, 0)) as total_disk, max(coalesce(disk, 0))
as disk_peak, sum(coalesce(cpu, 0)) as total_cpu, max(coalesce(cpu, 0)) as cpu_peak, max
(coalesce(trate, 0)+coalesce(erate, 0)+coalesce(orate, 0)) as lograte_peak, sum(coalesce
(totalsession, 0)) as totalsession, max(coalesce(totalsession, 0)) as session_peak, sum(cast
(coalesce(split_part(bandwidth, '/', 1), '0') as integer)) as sent, sum(cast(coalesce(split_
part(bandwidth, '/', 2), '0') as integer)) as recv, max(cast(coalesce(split_part(bandwidth,
'/', 1), '0') as integer)+cast(coalesce(split_part(bandwidth, '/', 2), '0') as integer)) as
transmit_peak, sum(coalesce(setuprate, 0)) as cps, max(coalesce(setuprate, 0)) as cps_peak,
count(*) as count from $log where $filter and subtype='system' and action='perf-stats' group
by timestamp, devid, slot order by total_mem desc)### t where $filter-drilldown group by
hodex, devid, slot) t group by hodex, devid, role) t group by hodex order by hodex
```

Dataset Name	Description	Log Category
perf-stat-mem-usage-drilldown	Fortigate resource detail timeline	event

```
select
  hodex,
  cast(
    sum(cpu_ave)/ count(*) as decimal(6, 0)
  ) as cpu_ave,
  cast(
    sum(mem_ave)/ count(*) as decimal(6, 0)
  ) as mem_ave,
  cast(
    sum(disk_ave)/ count(*) as decimal(6, 0)
  ) as disk_ave,
  cast(
    sum(log_rate)/ count(*) as decimal(10, 2)
  ) as log_rate,
  cast(
    sum(sessions)/ count(*) as decimal(10, 0)
  ) as sessions,
  cast(
    sum(sent_kbps)/ count(*) as decimal(10, 0)
  ) as sent_kbps,
  cast(
    sum(recv_kbps)/ count(*) as decimal(10, 0)
  ) as recv_kbps,
  cast(
    sum(transmit_kbps)/ count(*) as decimal(10, 0)
  ) as transmit_kbps,
  max(mem_peak) as mem_peak,
  max(disk_peak) as disk_peak,
  max(cpu_peak) as cpu_peak,
  max(lograte_peak) as lograte_peak,
  max(session_peak) as session_peak,
  max(transmit_kbps_peak) as transmit_kbps_peak,
  cast(
    sum(cps_ave)/ count(*) as decimal(10, 0)
  ) as cps_ave,
  max(cps_peak) as cps_peak
from
  (
    select
      hodex,
      devid,
      get_fgt_role(devid, slot) as role,
      cast(
        sum(cpu_ave)/ count(*) as decimal(6, 0)
      ) as cpu_ave,
      cast(
        sum(mem_ave)/ count(*) as decimal(6, 0)
      ) as mem_ave,
      cast(
        sum(disk_ave)/ count(*) as decimal(6, 0)
      ) as disk_ave,
      cast(
        sum(log_rate) as decimal(10, 2)
      ) as log_rate,
      cast(
        sum(sessions) as decimal(10, 0)
      ) as sessions,
      cast(
        sum(sent_kbps) as decimal(10, 0)
      ) as sent_kbps,
      cast(
        sum(recv_kbps) as decimal(10, 0)
      ) as recv_kbps,
      cast(
        sum(transmit_kbps) as decimal(10, 0)
      ) as transmit_kbps,
      max(mem_peak) as mem_peak,
      max(disk_peak) as disk_peak,
      max(cpu_peak) as cpu_peak,
      cast(
        max(lograte_peak) as decimal(10, 2)
      ) as lograte_peak,
      max(session_peak) as session_peak,
      max(transmit_kbps_peak) as transmit_kbps_peak,
      cast(
        sum(cps_ave) as decimal(10, 0)
      ) as cps_ave,
      sum(cps_peak) as cps_peak
    from
      (
        select
          $flex_timescale(timestamp) as hodex,
          devid,
          slot,
          sum(total_cpu)/ sum(count) cpu_ave,
          sum(total_mem)/ sum(count) as mem_ave,
          sum(total_disk)/ sum(count) as disk_ave,
          sum(
            total_trate + total_erate + total_orate
          )/ 100.00 / sum(count) as log_rate,
          sum(totalsession)/ sum(count) as sessions,
          sum(sent)/ sum(count) as sent_kbps,
          sum(recv)/ sum(count) as recv_kbps,
          sum(sent + recv)/ sum(count) as transmit_kbps,
          max(mem_peak) as mem_peak,
          max(disk_peak) as disk_peak,
          max(cpu_peak) as cpu_peak,
          max(lograte_peak)/ 100.00 as lograte_peak,
          max(session_peak) as session_peak,
          max(transmit_peak) as transmit_kbps_peak,
          sum(cps)/ sum(count) as cps_ave,
          max(cps_peak) as cps_peak
        from
          ###(select $flex_timestamp as timestamp, devid, slot, sum(coalesce(trate, 0)) as
total_trate, sum(coalesce(erate, 0)) as total_erate, sum(coalesce(orate, 0)) as total_orate,
min(itime) as first_seen, max(itime) as last_seen, sum(coalesce(mem, 0)) as total_mem, max
(coalesce(mem, 0)) as mem_peak, sum(coalesce(disk, 0)) as total_disk, max(coalesce(disk, 0))
as disk_peak, sum(coalesce(cpu, 0)) as total_cpu, max(coalesce(cpu, 0)) as cpu_peak, max
(coalesce(trate, 0)+coalesce(erate, 0)+coalesce(orate, 0)) as lograte_peak, sum(coalesce
(totalsession, 0)) as totalsession, max(coalesce(totalsession, 0)) as session_peak, sum(cast
(coalesce(split_part(bandwidth, '/', 1), '0') as integer)) as sent, sum(cast(coalesce(split_
part(bandwidth, '/', 2), '0') as integer)) as recv, max(cast(coalesce(split_part(bandwidth,
'/', 1), '0') as integer)+cast(coalesce(split_part(bandwidth, '/', 2), '0') as integer)) as
transmit_peak, sum(coalesce(setuprate, 0)) as cps, max(coalesce(setuprate, 0)) as cps_peak,
count(*) as count from $log where $filter and subtype='system' and action='perf-stats' group
by timestamp, devid, slot order by total_mem desc)### t where $filter-drilldown group by
hodex, devid, slot) t group by hodex, devid, role) t group by hodex order by hodex
```

Dataset Name	Description	Log Category
perf-stat-disk-usage-drilldown	Fortigate resource detail timeline	event

```
select
  hodex,
  cast(
    sum(cpu_ave)/ count(*) as decimal(6, 0)
  ) as cpu_ave,
  cast(
    sum(mem_ave)/ count(*) as decimal(6, 0)
  ) as mem_ave,
  cast(
    sum(disk_ave)/ count(*) as decimal(6, 0)
  ) as disk_ave,
  cast(
    sum(log_rate)/ count(*) as decimal(10, 2)
  ) as log_rate,
  cast(
    sum(sessions)/ count(*) as decimal(10, 0)
  ) as sessions,
  cast(
    sum(sent_kbps)/ count(*) as decimal(10, 0)
  ) as sent_kbps,
  cast(
    sum(recv_kbps)/ count(*) as decimal(10, 0)
  ) as recv_kbps,
  cast(
    sum(transmit_kbps)/ count(*) as decimal(10, 0)
  ) as transmit_kbps,
  max(mem_peak) as mem_peak,
  max(disk_peak) as disk_peak,
  max(cpu_peak) as cpu_peak,
  max(lograte_peak) as lograte_peak,
  max(session_peak) as session_peak,
  max(transmit_kbps_peak) as transmit_kbps_peak,
  cast(
    sum(cps_ave)/ count(*) as decimal(10, 0)
  ) as cps_ave,
  max(cps_peak) as cps_peak
from
  (
    select
      hodex,
      devid,
      get_fgt_role(devid, slot) as role,
      cast(
        sum(cpu_ave)/ count(*) as decimal(6, 0)
      ) as cpu_ave,
      cast(
        sum(mem_ave)/ count(*) as decimal(6, 0)
      ) as mem_ave,
      cast(
        sum(disk_ave)/ count(*) as decimal(6, 0)
      ) as disk_ave,
      cast(
        sum(log_rate) as decimal(10, 2)
      ) as log_rate,
      cast(
        sum(sessions) as decimal(10, 0)
      ) as sessions,
      cast(
        sum(sent_kbps) as decimal(10, 0)
      ) as sent_kbps,
      cast(
        sum(recv_kbps) as decimal(10, 0)
      ) as recv_kbps,
      cast(
        sum(transmit_kbps) as decimal(10, 0)
      ) as transmit_kbps,
      max(mem_peak) as mem_peak,
      max(disk_peak) as disk_peak,
      max(cpu_peak) as cpu_peak,
      cast(
        max(lograte_peak) as decimal(10, 2)
      ) as lograte_peak,
      max(session_peak) as session_peak,
      max(transmit_kbps_peak) as transmit_kbps_peak,
      cast(
        sum(cps_ave) as decimal(10, 0)
      ) as cps_ave,
      sum(cps_peak) as cps_peak
    from
      (
        select
          $flex_timescale(timestamp) as hodex,
          devid,
          slot,
          sum(total_cpu)/ sum(count) cpu_ave,
          sum(total_mem)/ sum(count) as mem_ave,
          sum(total_disk)/ sum(count) as disk_ave,
          sum(
            total_trate + total_erate + total_orate
          )/ 100.00 / sum(count) as log_rate,
          sum(totalsession)/ sum(count) as sessions,
          sum(sent)/ sum(count) as sent_kbps,
          sum(recv)/ sum(count) as recv_kbps,
          sum(sent + recv)/ sum(count) as transmit_kbps,
          max(mem_peak) as mem_peak,
          max(disk_peak) as disk_peak,
          max(cpu_peak) as cpu_peak,
          max(lograte_peak)/ 100.00 as lograte_peak,
          max(session_peak) as session_peak,
          max(transmit_peak) as transmit_kbps_peak,
          sum(cps)/ sum(count) as cps_ave,
          max(cps_peak) as cps_peak
        from
          ###(select $flex_timestamp as timestamp, devid, slot, sum(coalesce(trate, 0)) as
total_trate, sum(coalesce(erate, 0)) as total_erate, sum(coalesce(orate, 0)) as total_orate,
min(itime) as first_seen, max(itime) as last_seen, sum(coalesce(mem, 0)) as total_mem, max
(coalesce(mem, 0)) as mem_peak, sum(coalesce(disk, 0)) as total_disk, max(coalesce(disk, 0))
as disk_peak, sum(coalesce(cpu, 0)) as total_cpu, max(coalesce(cpu, 0)) as cpu_peak, max
(coalesce(trate, 0)+coalesce(erate, 0)+coalesce(orate, 0)) as lograte_peak, sum(coalesce
(totalsession, 0)) as totalsession, max(coalesce(totalsession, 0)) as session_peak, sum(cast
(coalesce(split_part(bandwidth, '/', 1), '0') as integer)) as sent, sum(cast(coalesce(split_
part(bandwidth, '/', 2), '0') as integer)) as recv, max(cast(coalesce(split_part(bandwidth,
'/', 1), '0') as integer)+cast(coalesce(split_part(bandwidth, '/', 2), '0') as integer)) as
transmit_peak, sum(coalesce(setuprate, 0)) as cps, max(coalesce(setuprate, 0)) as cps_peak,
count(*) as count from $log where $filter and subtype='system' and action='perf-stats' group
by timestamp, devid, slot order by total_mem desc)### t where $filter-drilldown group by
hodex, devid, slot) t group by hodex, devid, role) t group by hodex order by hodex
```

Dataset Name	Description	Log Category
perf-stat-sessions-drilldown	Fortigate resource detail timeline	event

```
select
  hodex,
  cast(
    sum(cpu_ave)/ count(*) as decimal(6, 0)
  ) as cpu_ave,
  cast(
    sum(mem_ave)/ count(*) as decimal(6, 0)
  ) as mem_ave,
  cast(
    sum(disk_ave)/ count(*) as decimal(6, 0)
  ) as disk_ave,
  cast(
    sum(log_rate)/ count(*) as decimal(10, 2)
  ) as log_rate,
  cast(
    sum(sessions)/ count(*) as decimal(10, 0)
  ) as sessions,
  cast(
    sum(sent_kbps)/ count(*) as decimal(10, 0)
  ) as sent_kbps,
  cast(
    sum(recv_kbps)/ count(*) as decimal(10, 0)
  ) as recv_kbps,
  cast(
    sum(transmit_kbps)/ count(*) as decimal(10, 0)
  ) as transmit_kbps,
  max(mem_peak) as mem_peak,
  max(disk_peak) as disk_peak,
  max(cpu_peak) as cpu_peak,
  max(lograte_peak) as lograte_peak,
  max(session_peak) as session_peak,
  max(transmit_kbps_peak) as transmit_kbps_peak,
  cast(
    sum(cps_ave)/ count(*) as decimal(10, 0)
  ) as cps_ave,
  max(cps_peak) as cps_peak
from
  (
    select
      hodex,
      devid,
      get_fgt_role(devid, slot) as role,
      cast(
        sum(cpu_ave)/ count(*) as decimal(6, 0)
      ) as cpu_ave,
      cast(
        sum(mem_ave)/ count(*) as decimal(6, 0)
      ) as mem_ave,
      cast(
        sum(disk_ave)/ count(*) as decimal(6, 0)
      ) as disk_ave,
      cast(
        sum(log_rate) as decimal(10, 2)
      ) as log_rate,
      cast(
        sum(sessions) as decimal(10, 0)
      ) as sessions,
      cast(
        sum(sent_kbps) as decimal(10, 0)
      ) as sent_kbps,
      cast(
        sum(recv_kbps) as decimal(10, 0)
      ) as recv_kbps,
      cast(
        sum(transmit_kbps) as decimal(10, 0)
      ) as transmit_kbps,
      max(mem_peak) as mem_peak,
      max(disk_peak) as disk_peak,
      max(cpu_peak) as cpu_peak,
      cast(
        max(lograte_peak) as decimal(10, 2)
      ) as lograte_peak,
      max(session_peak) as session_peak,
      max(transmit_kbps_peak) as transmit_kbps_peak,
      cast(
        sum(cps_ave) as decimal(10, 0)
      ) as cps_ave,
      sum(cps_peak) as cps_peak
    from
      (
        select
          $flex_timescale(timestamp) as hodex,
          devid,
          slot,
          sum(total_cpu)/ sum(count) cpu_ave,
          sum(total_mem)/ sum(count) as mem_ave,
          sum(total_disk)/ sum(count) as disk_ave,
          sum(
            total_trate + total_erate + total_orate
          )/ 100.00 / sum(count) as log_rate,
          sum(totalsession)/ sum(count) as sessions,
          sum(sent)/ sum(count) as sent_kbps,
          sum(recv)/ sum(count) as recv_kbps,
          sum(sent + recv)/ sum(count) as transmit_kbps,
          max(mem_peak) as mem_peak,
          max(disk_peak) as disk_peak,
          max(cpu_peak) as cpu_peak,
          max(lograte_peak)/ 100.00 as lograte_peak,
          max(session_peak) as session_peak,
          max(transmit_peak) as transmit_kbps_peak,
          sum(cps)/ sum(count) as cps_ave,
          max(cps_peak) as cps_peak
        from
          ###(select $flex_timestamp as timestamp, devid, slot, sum(coalesce(trate, 0)) as
total_trate, sum(coalesce(erate, 0)) as total_erate, sum(coalesce(orate, 0)) as total_orate,
min(itime) as first_seen, max(itime) as last_seen, sum(coalesce(mem, 0)) as total_mem, max
(coalesce(mem, 0)) as mem_peak, sum(coalesce(disk, 0)) as total_disk, max(coalesce(disk, 0))
as disk_peak, sum(coalesce(cpu, 0)) as total_cpu, max(coalesce(cpu, 0)) as cpu_peak, max
(coalesce(trate, 0)+coalesce(erate, 0)+coalesce(orate, 0)) as lograte_peak, sum(coalesce
(totalsession, 0)) as totalsession, max(coalesce(totalsession, 0)) as session_peak, sum(cast
(coalesce(split_part(bandwidth, '/', 1), '0') as integer)) as sent, sum(cast(coalesce(split_
part(bandwidth, '/', 2), '0') as integer)) as recv, max(cast(coalesce(split_part(bandwidth,
'/', 1), '0') as integer)+cast(coalesce(split_part(bandwidth, '/', 2), '0') as integer)) as
transmit_peak, sum(coalesce(setuprate, 0)) as cps, max(coalesce(setuprate, 0)) as cps_peak,
count(*) as count from $log where $filter and subtype='system' and action='perf-stats' group
by timestamp, devid, slot order by total_mem desc)### t where $filter-drilldown group by
hodex, devid, slot) t group by hodex, devid, role) t group by hodex order by hodex
```

Dataset Name	Description	Log Category
perf-stat-lograte-drilldown	Fortigate resource detail timeline	event

```
select
  hodex,
  cast(
    sum(cpu_ave)/ count(*) as decimal(6, 0)
  ) as cpu_ave,
  cast(
    sum(mem_ave)/ count(*) as decimal(6, 0)
  ) as mem_ave,
  cast(
    sum(disk_ave)/ count(*) as decimal(6, 0)
  ) as disk_ave,
  cast(
    sum(log_rate)/ count(*) as decimal(10, 2)
  ) as log_rate,
  cast(
    sum(sessions)/ count(*) as decimal(10, 0)
  ) as sessions,
  cast(
    sum(sent_kbps)/ count(*) as decimal(10, 0)
  ) as sent_kbps,
  cast(
    sum(recv_kbps)/ count(*) as decimal(10, 0)
  ) as recv_kbps,
  cast(
    sum(transmit_kbps)/ count(*) as decimal(10, 0)
  ) as transmit_kbps,
  max(mem_peak) as mem_peak,
  max(disk_peak) as disk_peak,
  max(cpu_peak) as cpu_peak,
  max(lograte_peak) as lograte_peak,
  max(session_peak) as session_peak,
  max(transmit_kbps_peak) as transmit_kbps_peak,
  cast(
    sum(cps_ave)/ count(*) as decimal(10, 0)
  ) as cps_ave,
  max(cps_peak) as cps_peak
```

```
from
  (
    select
      hodex,
      devid,
      get_fgt_role(devid, slot) as role,
      cast(
        sum(cpu_ave)/ count(*) as decimal(6, 0)
      ) as cpu_ave,
      cast(
        sum(mem_ave)/ count(*) as decimal(6, 0)
      ) as mem_ave,
      cast(
        sum(disk_ave)/ count(*) as decimal(6, 0)
      ) as disk_ave,
      cast(
        sum(log_rate) as decimal(10, 2)
      ) as log_rate,
      cast(
        sum(sessions) as decimal(10, 0)
      ) as sessions,
      cast(
        sum(sent_kbps) as decimal(10, 0)
      ) as sent_kbps,
      cast(
        sum(recv_kbps) as decimal(10, 0)
      ) as recv_kbps,
      cast(
        sum(transmit_kbps) as decimal(10, 0)
      ) as transmit_kbps,
      max(mem_peak) as mem_peak,
      max(disk_peak) as disk_peak,
      max(cpu_peak) as cpu_peak,
      cast(
        max(lograte_peak) as decimal(10, 2)
      ) as lograte_peak,
      max(session_peak) as session_peak,
      max(transmit_kbps_peak) as transmit_kbps_peak,
      cast(
        sum(cps_ave) as decimal(10, 0)
      ) as cps_ave,
      sum(cps_peak) as cps_peak
    from
      (
        select
          $flex_timescale(timestamp) as hodex,
          devid,
          slot,
          sum(total_cpu)/ sum(count) cpu_ave,
          sum(total_mem)/ sum(count) as mem_ave,
          sum(total_disk)/ sum(count) as disk_ave,
          sum(
            total_trate + total_erate + total_orate
          )/ 100.00 / sum(count) as log_rate,
          sum(totalsession)/ sum(count) as sessions,
          sum(sent)/ sum(count) as sent_kbps,
          sum(recv)/ sum(count) as recv_kbps,
          sum(sent + recv)/ sum(count) as transmit_kbps,
          max(mem_peak) as mem_peak,
          max(disk_peak) as disk_peak,
          max(cpu_peak) as cpu_peak,
          max(lograte_peak)/ 100.00 as lograte_peak,
          max(session_peak) as session_peak,
          max(transmit_peak) as transmit_kbps_peak,
          sum(cps)/ sum(count) as cps_ave,
          max(cps_peak) as cps_peak
        from
          ###(select $flex_timestamp as timestamp, devid, slot, sum(coalesce(trate, 0)) as
total_trate, sum(coalesce(erate, 0)) as total_erate, sum(coalesce(orate, 0)) as total_orate,
min(itime) as first_seen, max(itime) as last_seen, sum(coalesce(mem, 0)) as total_mem, max
(coalesce(mem, 0)) as mem_peak, sum(coalesce(disk, 0)) as total_disk, max(coalesce(disk, 0))
as disk_peak, sum(coalesce(cpu, 0)) as total_cpu, max(coalesce(cpu, 0)) as cpu_peak, max
(coalesce(trate, 0)+coalesce(erate, 0)+coalesce(orate, 0)) as lograte_peak, sum(coalesce
(totalsession, 0)) as totalsession, max(coalesce(totalsession, 0)) as session_peak, sum(cast
(coalesce(split_part(bandwidth, '/', 1), '0') as integer)) as sent, sum(cast(coalesce(split_
part(bandwidth, '/', 2), '0') as integer)) as recv, max(cast(coalesce(split_part(bandwidth,
'/', 1), '0') as integer)+cast(coalesce(split_part(bandwidth, '/', 2), '0') as integer)) as
transmit_peak, sum(coalesce(setuprate, 0)) as cps, max(coalesce(setuprate, 0)) as cps_peak,
count(*) as count from $log where $filter and subtype='system' and action='perf-stats' group
by timestamp, devid, slot order by total_mem desc)### t where $filter-drilldown group by
hodex, devid, slot) t group by hodex, devid, role) t group by hodex order by hodex
```

Dataset Name	Description	Log Category
perf-stat-connections-drilldown	Fortigate resource detail timeline	event

```
select
  hodex,
  cast(
    sum(cpu_ave)/ count(*) as decimal(6, 0)
  ) as cpu_ave,
  cast(
    sum(mem_ave)/ count(*) as decimal(6, 0)
  ) as mem_ave,
  cast(
    sum(disk_ave)/ count(*) as decimal(6, 0)
  ) as disk_ave,
  cast(
    sum(log_rate)/ count(*) as decimal(10, 2)
  ) as log_rate,
  cast(
    sum(sessions)/ count(*) as decimal(10, 0)
  ) as sessions,
  cast(
    sum(sent_kbps)/ count(*) as decimal(10, 0)
  ) as sent_kbps,
  cast(
    sum(recv_kbps)/ count(*) as decimal(10, 0)
  ) as recv_kbps,
  cast(
    sum(transmit_kbps)/ count(*) as decimal(10, 0)
  ) as transmit_kbps,
  max(mem_peak) as mem_peak,
  max(disk_peak) as disk_peak,
  max(cpu_peak) as cpu_peak,
  max(lograte_peak) as lograte_peak,
  max(session_peak) as session_peak,
  max(transmit_kbps_peak) as transmit_kbps_peak,
  cast(
    sum(cps_ave)/ count(*) as decimal(10, 0)
  ) as cps_ave,
  max(cps_peak) as cps_peak
from
  (
    select
      hodex,
      devid,
      get_fgt_role(devid, slot) as role,
      cast(
        sum(cpu_ave)/ count(*) as decimal(6, 0)
      ) as cpu_ave,
      cast(
        sum(mem_ave)/ count(*) as decimal(6, 0)
      ) as mem_ave,
      cast(
        sum(disk_ave)/ count(*) as decimal(6, 0)
      ) as disk_ave,
      cast(
        sum(log_rate) as decimal(10, 2)
      ) as log_rate,
      cast(
        sum(sessions) as decimal(10, 0)
      ) as sessions,
      cast(
        sum(sent_kbps) as decimal(10, 0)
      ) as sent_kbps,
      cast(
        sum(recv_kbps) as decimal(10, 0)
      ) as recv_kbps,
      cast(
        sum(transmit_kbps) as decimal(10, 0)
      ) as transmit_kbps,
      max(mem_peak) as mem_peak,
      max(disk_peak) as disk_peak,
      max(cpu_peak) as cpu_peak,
      cast(
        max(lograte_peak) as decimal(10, 2)
      ) as lograte_peak,
      max(session_peak) as session_peak,
      max(transmit_kbps_peak) as transmit_kbps_peak,
      cast(
        sum(cps_ave) as decimal(10, 0)
      ) as cps_ave,
      sum(cps_peak) as cps_peak
    from
      (
        select
          $flex_timescale(timestamp) as hodex,
          devid,
          slot,
          sum(total_cpu)/ sum(count) cpu_ave,
          sum(total_mem)/ sum(count) as mem_ave,
          sum(total_disk)/ sum(count) as disk_ave,
          sum(
            total_trate + total_erate + total_orate
          )/ 100.00 / sum(count) as log_rate,
          sum(totalsession)/ sum(count) as sessions,
          sum(sent)/ sum(count) as sent_kbps,
          sum(recv)/ sum(count) as recv_kbps,
          sum(sent + recv)/ sum(count) as transmit_kbps,
          max(mem_peak) as mem_peak,
          max(disk_peak) as disk_peak,
          max(cpu_peak) as cpu_peak,
          max(lograte_peak)/ 100.00 as lograte_peak,
          max(session_peak) as session_peak,
          max(transmit_peak) as transmit_kbps_peak,
          sum(cps)/ sum(count) as cps_ave,
          max(cps_peak) as cps_peak
        from
          ###(select $flex_timestamp as timestamp, devid, slot, sum(coalesce(trate, 0)) as
total_trate, sum(coalesce(erate, 0)) as total_erate, sum(coalesce(orate, 0)) as total_orate,
min(itime) as first_seen, max(itime) as last_seen, sum(coalesce(mem, 0)) as total_mem, max
(coalesce(mem, 0)) as mem_peak, sum(coalesce(disk, 0)) as total_disk, max(coalesce(disk, 0))
as disk_peak, sum(coalesce(cpu, 0)) as total_cpu, max(coalesce(cpu, 0)) as cpu_peak, max
(coalesce(trate, 0)+coalesce(erate, 0)+coalesce(orate, 0)) as lograte_peak, sum(coalesce
(totalsession, 0)) as totalsession, max(coalesce(totalsession, 0)) as session_peak, sum(cast
(coalesce(split_part(bandwidth, '/', 1), '0') as integer)) as sent, sum(cast(coalesce(split_
part(bandwidth, '/', 2), '0') as integer)) as recv, max(cast(coalesce(split_part(bandwidth,
'/', 1), '0') as integer)+cast(coalesce(split_part(bandwidth, '/', 2), '0') as integer)) as
transmit_peak, sum(coalesce(setuprate, 0)) as cps, max(coalesce(setuprate, 0)) as cps_peak,
count(*) as count from $log where $filter and subtype='system' and action='perf-stats' group
by timestamp, devid, slot order by total_mem desc)### t where $filter-drilldown group by
hodex, devid, slot) t group by hodex, devid, role) t group by hodex order by hodex
```

Dataset Name	Description	Log Category
perf-stat-bandwidth-drilldown	Fortigate resource detail timeline	event

```
select
  hodex,
  cast(
    sum(cpu_ave)/ count(*) as decimal(6, 0)
  ) as cpu_ave,
  cast(
    sum(mem_ave)/ count(*) as decimal(6, 0)
  ) as mem_ave,
  cast(
    sum(disk_ave)/ count(*) as decimal(6, 0)
  ) as disk_ave,
  cast(
    sum(log_rate)/ count(*) as decimal(10, 2)
  ) as log_rate,
  cast(
    sum(sessions)/ count(*) as decimal(10, 0)
  ) as sessions,
  cast(
    sum(sent_kbps)/ count(*) as decimal(10, 0)
  ) as sent_kbps,
  cast(
    sum(recv_kbps)/ count(*) as decimal(10, 0)
  ) as recv_kbps,
  cast(
    sum(transmit_kbps)/ count(*) as decimal(10, 0)
  ) as transmit_kbps,
  max(mem_peak) as mem_peak,
  max(disk_peak) as disk_peak,
  max(cpu_peak) as cpu_peak,
  max(lograte_peak) as lograte_peak,
  max(session_peak) as session_peak,
  max(transmit_kbps_peak) as transmit_kbps_peak,
  cast(
    sum(cps_ave)/ count(*) as decimal(10, 0)
  ) as cps_ave,
  max(cps_peak) as cps_peak
from
  (
    select
      hodex,
      devid,
      get_fgt_role(devid, slot) as role,
      cast(
        sum(cpu_ave)/ count(*) as decimal(6, 0)
      ) as cpu_ave,
      cast(
        sum(mem_ave)/ count(*) as decimal(6, 0)
      ) as mem_ave,
      cast(
        sum(disk_ave)/ count(*) as decimal(6, 0)
      ) as disk_ave,
      cast(
        sum(log_rate) as decimal(10, 2)
      ) as log_rate,
      cast(
        sum(sessions) as decimal(10, 0)
      ) as sessions,
      cast(
        sum(sent_kbps) as decimal(10, 0)
      ) as sent_kbps,
      cast(
        sum(recv_kbps) as decimal(10, 0)
      ) as recv_kbps,
      cast(
        sum(transmit_kbps) as decimal(10, 0)
      ) as transmit_kbps,
      max(mem_peak) as mem_peak,
      max(disk_peak) as disk_peak,
      max(cpu_peak) as cpu_peak,
      cast(
        max(lograte_peak) as decimal(10, 2)
      ) as lograte_peak,
      max(session_peak) as session_peak,
      max(transmit_kbps_peak) as transmit_kbps_peak,
      cast(
        sum(cps_ave) as decimal(10, 0)
      ) as cps_ave,
      sum(cps_peak) as cps_peak
    from
      (
        select
          $flex_timescale(timestamp) as hodex,
          devid,
          slot,
          sum(total_cpu)/ sum(count) cpu_ave,
          sum(total_mem)/ sum(count) as mem_ave,
          sum(total_disk)/ sum(count) as disk_ave,
          sum(
            total_trate + total_erate + total_orate
          )/ 100.00 / sum(count) as log_rate,
          sum(totalsession)/ sum(count) as sessions,
          sum(sent)/ sum(count) as sent_kbps,
          sum(recv)/ sum(count) as recv_kbps,
          sum(sent + recv)/ sum(count) as transmit_kbps,
          max(mem_peak) as mem_peak,
          max(disk_peak) as disk_peak,
          max(cpu_peak) as cpu_peak,
          max(lograte_peak)/ 100.00 as lograte_peak,
          max(session_peak) as session_peak,
          max(transmit_peak) as transmit_kbps_peak,
          sum(cps)/ sum(count) as cps_ave,
          max(cps_peak) as cps_peak
        from
          ###(select $flex_timestamp as timestamp, devid, slot, sum(coalesce(trate, 0)) as
total_trate, sum(coalesce(erate, 0)) as total_erate, sum(coalesce(orate, 0)) as total_orate,
min(itime) as first_seen, max(itime) as last_seen, sum(coalesce(mem, 0)) as total_mem, max
(coalesce(mem, 0)) as mem_peak, sum(coalesce(disk, 0)) as total_disk, max(coalesce(disk, 0))
as disk_peak, sum(coalesce(cpu, 0)) as total_cpu, max(coalesce(cpu, 0)) as cpu_peak, max
(coalesce(trate, 0)+coalesce(erate, 0)+coalesce(orate, 0)) as lograte_peak, sum(coalesce
(totalsession, 0)) as totalsession, max(coalesce(totalsession, 0)) as session_peak, sum(cast
(coalesce(split_part(bandwidth, '/', 1), '0') as integer)) as sent, sum(cast(coalesce(split_
part(bandwidth, '/', 2), '0') as integer)) as recv, max(cast(coalesce(split_part(bandwidth,
'/', 1), '0') as integer)+cast(coalesce(split_part(bandwidth, '/', 2), '0') as integer)) as
transmit_peak, sum(coalesce(setuprate, 0)) as cps, max(coalesce(setuprate, 0)) as cps_peak,
count(*) as count from $log where $filter and subtype='system' and action='perf-stats' group
by timestamp, devid, slot order by total_mem desc)### t where $filter-drilldown group by
hodex, devid, slot) t group by hodex, devid, role) t group by hodex order by hodex
```

Dataset Name	Description	Log Category
perf-stat-usage-summary-average	Fortigate resource summary view	event

```
select
  devid,
  get_fgt_role(devid, slot) as role,
  cast(
    sum(cpu_ave)/ count(*) as decimal(6, 0)
  ) as cpu_ave,
  cast(
    sum(mem_ave)/ count(*) as decimal(6, 0)
  ) as mem_ave,
  cast(
    sum(disk_ave)/ count(*) as decimal(6, 0)
  ) as disk_ave,
  cast(
    sum(log_rate) as decimal(10, 2)
  ) as log_rate,
  cast(
    sum(sessions) as decimal(10, 0)
  ) as sessions,
  cast(
    sum(sent_kbps) as decimal(10, 0)
  ) as sent_kbps,
  cast(
    sum(recv_kbps) as decimal(10, 0)
  ) as recv_kbps,
  cast(
    sum(transmit_kbps) as decimal(10, 0)
  ) as transmit_kbps,
  max(mem_peak) as mem_peak,
  max(disk_peak) as disk_peak,
  max(cpu_peak) as cpu_peak,
  cast(
    max(lograte_peak) as decimal(10, 2)
  ) as lograte_peak,
  max(session_peak) as session_peak,
  max(transmit_kbps_peak) as transmit_kbps_peak
from
  (
    select
      devid,
      slot,
      sum(total_cpu)/ sum(count) as cpu_ave,
      sum(total_mem)/ sum(count) as mem_ave,
      sum(total_disk)/ sum(count) as disk_ave,
      sum(
        total_trate + total_erate + total_orate
      )/ 100.00 / sum(count) as log_rate,
      sum(totalsession)/ sum(count) as sessions,
      sum(sent)/ sum(count) as sent_kbps,
      sum(recv)/ sum(count) as recv_kbps,
      sum(sent + recv)/ sum(count) as transmit_kbps,
      max(mem_peak) as mem_peak,
      max(disk_peak) as disk_peak,
      max(cpu_peak) as cpu_peak,
      max(lograte_peak)/ 100.00 as lograte_peak,
      max(session_peak) as session_peak,
      max(transmit_peak) as transmit_kbps_peak
    from
      ###(select $flex_timestamp as timestamp, devid, slot, sum(coalesce(trate, 0)) as
total_trate, sum(coalesce(erate, 0)) as total_erate, sum(coalesce(orate, 0)) as total_orate,
min(itime) as first_seen, max(itime) as last_seen, sum(coalesce(mem, 0)) as total_mem, max
(coalesce(mem, 0)) as mem_peak, sum(coalesce(disk, 0)) as total_disk, max(coalesce(disk, 0))
as disk_peak, sum(coalesce(cpu, 0)) as total_cpu, max(coalesce(cpu, 0)) as cpu_peak, max
```

```
(coalesce(trate, 0)+coalesce(erate, 0)+coalesce(orate, 0)) as lograte_peak, sum(coalesce
(totalsession, 0)) as totalsession, max(coalesce(totalsession, 0)) as session_peak, sum(cast
(coalesce(split_part(bandwidth, '/', 1), '0') as integer)) as sent, sum(cast(coalesce(split_
part(bandwidth, '/', 2), '0') as integer)) as recv, max(cast(coalesce(split_part(bandwidth,
'/', 1), '0') as integer)+cast(coalesce(split_part(bandwidth, '/', 2), '0') as integer)) as
transmit_peak, sum(coalesce(setuprate, 0)) as cps, max(coalesce(setuprate, 0)) as cps_peak,
count(*) as count from $log where $filter and subtype='system' and action='perf-stats' group
by timestamp, devid, slot order by total_mem desc)### t group by devid, slot) t group by
devid, role order by devid, role
```

Dataset Name	Description	Log Category
perf-stat-usage-summary-peak	Fortigate resource summary view	event

```
select
  devid,
  get_fgt_role(devid, slot) as role,
  cast(
    sum(cpu_ave)/ count(*) as decimal(6, 0)
  ) as cpu_ave,
  cast(
    sum(mem_ave)/ count(*) as decimal(6, 0)
  ) as mem_ave,
  cast(
    sum(disk_ave)/ count(*) as decimal(6, 0)
  ) as disk_ave,
  cast(
    sum(log_rate) as decimal(10, 2)
  ) as log_rate,
  cast(
    sum(sessions) as decimal(10, 0)
  ) as sessions,
  cast(
    sum(sent_kbps) as decimal(10, 0)
  ) as sent_kbps,
  cast(
    sum(recv_kbps) as decimal(10, 0)
  ) as recv_kbps,
  cast(
    sum(transmit_kbps) as decimal(10, 0)
  ) as transmit_kbps,
  max(mem_peak) as mem_peak,
  max(disk_peak) as disk_peak,
  max(cpu_peak) as cpu_peak,
  cast(
    max(lograte_peak) as decimal(10, 2)
  ) as lograte_peak,
  max(session_peak) as session_peak,
  max(transmit_kbps_peak) as transmit_kbps_peak
from
  (
    select
      devid,
      slot,
      sum(total_cpu)/ sum(count) as cpu_ave,
      sum(total_mem)/ sum(count) as mem_ave,
      sum(total_disk)/ sum(count) as disk_ave,
      sum(
        total_trate + total_erate + total_orate
      )/ 100.00 / sum(count) as log_rate,
      sum(totalsession)/ sum(count) as sessions,
      sum(sent)/ sum(count) as sent_kbps,
      sum(recv)/ sum(count) as recv_kbps,
      sum(sent + recv)/ sum(count) as transmit_kbps,
      max(mem_peak) as mem_peak,
      max(disk_peak) as disk_peak,
      max(cpu_peak) as cpu_peak,
      max(lograte_peak)/ 100.00 as lograte_peak,
      max(session_peak) as session_peak,
      max(transmit_peak) as transmit_kbps_peak
    from
      ###(select $flex_timestamp as timestamp, devid, slot, sum(coalesce(trate, 0)) as
total_trate, sum(coalesce(erate, 0)) as total_erate, sum(coalesce(orate, 0)) as total_orate,
min(itime) as first_seen, max(itime) as last_seen, sum(coalesce(mem, 0)) as total_mem, max
(coalesce(mem, 0)) as mem_peak, sum(coalesce(disk, 0)) as total_disk, max(coalesce(disk, 0))
as disk_peak, sum(coalesce(cpu, 0)) as total_cpu, max(coalesce(cpu, 0)) as cpu_peak, max
(coalesce(trate, 0)+coalesce(erate, 0)+coalesce(orate, 0)) as lograte_peak, sum(coalesce
(totalsession, 0)) as totalsession, max(coalesce(totalsession, 0)) as session_peak, sum(cast
(coalesce(split_part(bandwidth, '/', 1), '0') as integer)) as sent, sum(cast(coalesce(split_
part(bandwidth, '/', 2), '0') as integer)) as recv, max(cast(coalesce(split_part(bandwidth,
'/', 1), '0') as integer)+cast(coalesce(split_part(bandwidth, '/', 2), '0') as integer)) as
transmit_peak, sum(coalesce(setuprate, 0)) as cps, max(coalesce(setuprate, 0)) as cps_peak,
count(*) as count from $log where $filter and subtype='system' and action='perf-stats' group
by timestamp, devid, slot order by total_mem desc)### t group by devid, slot) t group by
devid, role order by devid, role
```

Dataset Name	Description	Log Category
perf-stat-usage-details-drilldown-master	Fortigate resource summary view	event

```
select
  devid,
  get_fgt_role(devid, slot) as role,
  cast(
    sum(cpu_ave)/ count(*) as decimal(6, 0)
  ) as cpu_ave,
  cast(
    sum(mem_ave)/ count(*) as decimal(6, 0)
  ) as mem_ave,
  cast(
    sum(disk_ave)/ count(*) as decimal(6, 0)
  ) as disk_ave,
  cast(
    sum(log_rate) as decimal(10, 2)
  ) as log_rate,
  cast(
    sum(sessions) as decimal(10, 0)
  ) as sessions,
  cast(
    sum(sent_kbps) as decimal(10, 0)
  ) as sent_kbps,
  cast(
    sum(recv_kbps) as decimal(10, 0)
  ) as recv_kbps,
  cast(
    sum(transmit_kbps) as decimal(10, 0)
  ) as transmit_kbps,
  max(mem_peak) as mem_peak,
  max(disk_peak) as disk_peak,
  max(cpu_peak) as cpu_peak,
  cast(
    max(lograte_peak) as decimal(10, 2)
  ) as lograte_peak,
  max(session_peak) as session_peak,
  max(transmit_kbps_peak) as transmit_kbps_peak
from
  (
    select
      devid,
      slot,
      sum(total_cpu)/ sum(count) as cpu_ave,
      sum(total_mem)/ sum(count) as mem_ave,
      sum(total_disk)/ sum(count) as disk_ave,
      sum(
        total_trate + total_erate + total_orate
      )/ 100.00 / sum(count) as log_rate,
      sum(totalsession)/ sum(count) as sessions,
      sum(sent)/ sum(count) as sent_kbps,
      sum(recv)/ sum(count) as recv_kbps,
      sum(sent + recv)/ sum(count) as transmit_kbps,
      max(mem_peak) as mem_peak,
      max(disk_peak) as disk_peak,
      max(cpu_peak) as cpu_peak,
      max(lograte_peak)/ 100.00 as lograte_peak,
      max(session_peak) as session_peak,
      max(transmit_peak) as transmit_kbps_peak
    from
      ###(select $flex_timestamp as timestamp, devid, slot, sum(coalesce(trate, 0)) as
total_trate, sum(coalesce(erate, 0)) as total_erate, sum(coalesce(orate, 0)) as total_orate,
min(itime) as first_seen, max(itime) as last_seen, sum(coalesce(mem, 0)) as total_mem, max
(coalesce(mem, 0)) as mem_peak, sum(coalesce(disk, 0)) as total_disk, max(coalesce(disk, 0))
as disk_peak, sum(coalesce(cpu, 0)) as total_cpu, max(coalesce(cpu, 0)) as cpu_peak, max
(coalesce(trate, 0)+coalesce(erate, 0)+coalesce(orate, 0)) as lograte_peak, sum(coalesce
(totalsession, 0)) as totalsession, max(coalesce(totalsession, 0)) as session_peak, sum(cast
(coalesce(split_part(bandwidth, '/', 1), '0') as integer)) as sent, sum(cast(coalesce(split_
part(bandwidth, '/', 2), '0') as integer)) as recv, max(cast(coalesce(split_part(bandwidth,
'/', 1), '0') as integer)+cast(coalesce(split_part(bandwidth, '/', 2), '0') as integer)) as
transmit_peak, sum(coalesce(setuprate, 0)) as cps, max(coalesce(setuprate, 0)) as cps_peak,
count(*) as count from $log where $filter and subtype='system' and action='perf-stats' group
by timestamp, devid, slot order by total_mem desc)### t group by devid, slot) t group by
devid, role order by devid, role
```

Dataset Name	Description	Log Category
incident-Incident-Count-by-Status	Incident status distribution	

```
select
  status,
  count(*) as cnt
from
  $incident
where
  $filter - drilldown
group by
  status
order by
  status
```

Dataset Name	Description	Log Category
incident-Incident-Count-by-Status-Donut	Incident status distribution	

```
select
  status,
  count(*) as cnt
from
  $incident
where
  $filter - drilldown
group by
  status
order by
  status
```

Dataset Name	Description	Log Category
incident-Open-Incident-Count-Timeline	Incident count by status over time	

```
select
  $flex_timescale(agg_time) as hodex,
  max(num_sta_draft) as num_sta_draft,
  max(num_sta_analysis) as num_sta_analysis,
  max(num_sta_response) as num_sta_response,
  max(num_sta_closed) as num_sta_closed,
  max(num_sta_cancelled) as num_sta_cancelled
from
  $incident_history
where
  $filter - drilldown
  and $cust_time_filter(agg_time)
group by
  hodex
order by
  hodex
```

Dataset Name	Description	Log Category
incident-Closed-Incident-Count-Timeline	Incident count by status over time	

```
select
  $flex_timescale(agg_time) as hodex,
  max(num_sta_draft) as num_sta_draft,
  max(num_sta_analysis) as num_sta_analysis,
  max(num_sta_response) as num_sta_response,
  max(num_sta_closed) as num_sta_closed,
  max(num_sta_cancelled) as num_sta_cancelled
from
  $incident_history
where
  $filter - drilldown
  and $cust_time_filter(agg_time)
group by
  hodex
order by
  hodex
```

Dataset Name	Description	Log Category
Top-10-Apps-by-Bandwidth	Top applications by bandwidth usage	traffic

```
select
  app_group,
  sum(bandwidth) as bandwidth,
  sum(traffic_in) as traffic_in,
  sum(traffic_out) as traffic_out,
  sum(sessions) as sessions
from
  ###(select app_group_name(app) as app_group, appcat, service, sum(coalesce(sentdelta,
sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as bandwidth, sum(coalesce(rcvddelta,
rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as traffic_out, count(*)
as sessions from $log where $filter and (logflag&(1|32)>0) and nullifna(app) is not null
group by app_group, appcat, service order by bandwidth desc)### t group by app_group having
sum(bandwidth)>0 order by bandwidth desc
```

Dataset Name	Description	Log Category
Top-10-User-by-Bandwidth	Top users by bandwidth usage	traffic

```
select
  coalesce(
    nullifna(`user`),
    nullifna(`unauthuser`),
    ipstr(`srcip`)
  ) as user_src,
  srcip,
  sum(
    coalesce(sentbyte, 0)+ coalesce(rcvdbyte, 0)
  ) as bandwidth,
  sum(
    coalesce(rcvdbyte, 0)
  ) as traffic_in,
  sum(
    coalesce(sentbyte, 0)
  ) as traffic_out
from
```

```
  $log
where
  $filter
  and (
    logflag&1>0
  )
  and srcip is not null
group by
  user_src,
  srcip
having
  sum(
    coalesce(sentbyte, 0)+ coalesce(rcvdbyte, 0)
  )> 0
order by
  bandwidth desc
```

Dataset Name	Description	Log Category
Top-10-Applications-by-Number-of-Users	Top Applications by number of users	traffic

```
select
  app_group_name(app) as app_group,
  count(distinct user_src) as number
from
  ###(select coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src,
app, appcat from $log where $filter and (logflag&1>0) and nullifna(app) is not null group by
user_src, app, appcat)### t group by app_group order by number desc
```

Dataset Name	Description	Log Category
Top-10-User-by-Session	Top user by session count	traffic

```
select
  user_src,
  sum(sessions) as sessions
from
  ###(select coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src,
count(*) as sessions from $log where $filter and (logflag&1>0) group by user_src order by
sessions desc)### t group by user_src order by sessions desc
```

Dataset Name	Description	Log Category
Top-10-Apps-by-Session	Top applications by bandwidth usage	traffic

```
select
  app_group,
  sum(bandwidth) as bandwidth,
  sum(traffic_in) as traffic_in,
  sum(traffic_out) as traffic_out,
  sum(sessions) as sessions
from
  ###(select app_group_name(app) as app_group, appcat, service, sum(coalesce(sentdelta,
sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as bandwidth, sum(coalesce(rcvddelta,
rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as traffic_out, count(*)
as sessions from $log where $filter and (logflag&(1|32)>0) and nullifna(app) is not null
group by app_group, appcat, service order by bandwidth desc)### t group by app_group having
sum(bandwidth)>0 order by bandwidth desc
```

Dataset Name	Description	Log Category
Applications-by-Risk-Level	Applications by Risk Level	traffic

```
select
  app_group_name(app) as app_group,
  min(id) as id,
  appcat,
  max(risk) as d_risk,
  (
    case when max(risk)=& #039;5' then 'Critical' when max(risk)='4' then 'High' when max
(risk)='3' then 'Medium' when max(risk)='2' then 'Low' else 'Info' end) as risk_level, sum
(sessions) as sessions, sum(sent) as sent, sum(received) as received, sum(bandwidth) as
bandwidth from ###(select appid, app, appcat, sum(coalesce(sentbyte, 0)) as sent, sum
(coalesce(rcvdbyte, 0)) as received, sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0)) as
bandwidth, count(*) as sessions from $log where $filter and (logflag&1>0) group by appid,
app, appcat order by bandwidth desc)### t1 inner join app_mdata t2 on lower(t1.app)=lower
(t2.name) group by app_group, appcat order by d_risk desc, bandwidth desc
```

Dataset Name	Description	Log Category
soc-Event-vs-Incident-Today-Trend	Events vs Incidents Today Trend	

```
select
  item,
  num_cur,
  num_pre,
  num_diff
from
  (
    select
      & #039;Events' as item, num_cur, num_pre, (num_cur-num_pre) as num_diff from (select
(select count(*) from $event t1 left join devtable t2 on t1.dvid=t2.dvid where $filter-
drilldown and $cust_time_filter(alerttime,TODAY)) as num_cur, (select count(*) from $event
t1 left join devtable t2 on t1.dvid=t2.dvid where $filter-drilldown and $cust_time_filter
(alerttime,YESTERDAY)) as num_pre) t union all select 'Incidents' as item, num_cur, num_pre,
(num_cur-num_pre) as num_diff from (select (select count(*) from $incident where $cust_time_
filter(createtime,TODAY)) as num_cur, (select count(*) from $incident where $cust_time_
filter(createtime,YESTERDAY)) as num_pre) t) t order by item
```

Dataset Name	Description	Log Category
soc-Event-vs-Incident-History-Trend	Events vs Incidents History Trend	

```
select
  item,
  num_cur,
  num_pre,
  num_diff
from
  (
    select
```

```
      & #039;Events' as item, num_cur, num_pre, (num_cur-num_pre) as num_diff from (select
(select count(*) from $event t1 left join devtable t2 on t1.dvid=t2.dvid where $filter-
drilldown and $cust_time_filter(alerttime)) as num_cur, (select count(*) from $event t1 left
join devtable t2 on t1.dvid=t2.dvid where $filter-drilldown and $cust_time_filter
(alerttime,LAST_N_PERIOD,1)) as num_pre) t union all select 'Incidents' as item, num_cur,
num_pre, (num_cur-num_pre) as num_diff from (select (select count(*) from $incident where
$cust_time_filter(createtime)) as num_cur, (select count(*) from $incident where $cust_time_
filter(createtime,LAST_N_PERIOD,1)) as num_pre) t) t order by item
```

Dataset Name	Description	Log Category
soc-Event-vs-Incident-Trend	Events vs Incidents Trend	

```
select
  t1.item,
  t1.num_cur as num_today,
  t1.num_pre as num_yesterday,
  t1.num_diff as num_diff1,
  t2.num_cur as num_this_period,
  t2.num_pre as num_last_period,
  t2.num_diff as num_diff2
from
  (
    select
      & #039;Events' as item, num_cur, num_pre, (num_cur-num_pre) as num_diff from (select
(select count(*) from $event t1 left join devtable t2 on t1.dvid=t2.dvid where $filter-
drilldown and $cust_time_filter(alerttime,TODAY)) as num_cur, (select count(*) from $event
t1 left join devtable t2 on t1.dvid=t2.dvid where $filter-drilldown and $cust_time_filter
(alerttime,YESTERDAY)) as num_pre) t union all select 'Incidents' as item, num_cur, num_pre,
(num_cur-num_pre) as num_diff from (select (select count(*) from $incident where $cust_time_
filter(createtime,TODAY)) as num_cur, (select count(*) from $incident where $cust_time_
filter(createtime,YESTERDAY)) as num_pre) t) t1 full join (select 'Events' as item, num_cur,
num_pre, (num_cur-num_pre) as num_diff from (select (select count(*) from $event t1 left
join devtable t2 on t1.dvid=t2.dvid where $filter-drilldown and $cust_time_filter
(alerttime)) as num_cur, (select count(*) from $event t1 left join devtable t2 on
t1.dvid=t2.dvid where $filter-drilldown and $cust_time_filter(alerttime,LAST_N_PERIOD,1)) as
num_pre) t union all select 'Incidents' as item, num_cur, num_pre, (num_cur-num_pre) as num_
diff from (select (select count(*) from $incident where $cust_time_filter(createtime)) as
num_cur, (select count(*) from $incident where $cust_time_filter(createtime,LAST_N_
PERIOD,1)) as num_pre) t) t2 on t1.item=t2.item order by t1.item
```

Dataset Name	Description	Log Category
soc-Total-Event-by-Severity	Total Events by Severity	

```
select
  (
    CASE severity WHEN 0 THEN & #039;Critical' WHEN 1 THEN 'High' WHEN 2 THEN 'Medium' WHEN
3 THEN 'Low' ELSE NULL END) as sev, count(*) as num_events from $event t1 left join devtable
t2 on t1.dvid=t2.dvid where $filter-drilldown group by severity order by severity
```

Dataset Name	Description	Log Category
soc-Total-Event-by-Severity-History	Total Events by Severity History	

```
select
  dom,
  (
    CASE severity WHEN 0 THEN & #039;Critical' WHEN 1 THEN 'High' WHEN 2 THEN 'Medium' WHEN
3 THEN 'Low' ELSE NULL END) as sev, sum(num_events) as num_events from (select dom, unnest
(agg_sev) as severity, unnest(agg_num) as num_events from (select $DAY_OF_MONTH(agg_time) as
dom, array[0, 1, 2, 3] as agg_sev, array[max(num_sev_critical), max(num_sev_high), max(num_
sev_medium), max(num_sev_low)] as agg_num from $event_history where $filter-drilldown and
$cust_time_filter(agg_time) group by dom order by dom) t) t group by dom, severity order by
dom, severity
```

Dataset Name	Description	Log Category
soc-Total-Event-by-Severity-Category	Total Events Count by Severity and Category	

```
select
  (
    CASE severity WHEN 0 THEN & #039;Critical' WHEN 1 THEN 'High' WHEN 2 THEN 'Medium' WHEN
3 THEN 'Low' ELSE NULL END) as sev, triggername, count(*) as num_events from $event t1 left
join devtable t2 on t1.dvid=t2.dvid where $filter-drilldown group by severity, triggername
order by severity, triggername
```

Dataset Name	Description	Log Category
soc-Total-Incident-by-Severity	Total Incidents by Severity	

```
select
  severity,
  count(*) as num_inc
from
  $incident
where
  $filter - drilldown
group by
  severity
order by
  severity
```

Dataset Name	Description	Log Category
soc-Total-Event-vs-Incident-History	Total Events vs Incidents History	

```
select
  coalesce(t1.hodex, t2.hodex) as hodex,
  coalesce(num_event_total, 0) as num_event_total,
  coalesce(num_inc_total, 0) as num_inc_total,
  coalesce(num_event_high, 0) as num_event_high
from
  (
    select
      $flex_timescale(agg_time) as hodex,
      max(num_total) as num_event_total,
      max(num_sev_critical + num_sev_high) as num_event_high
    from
      $event_history
    where
```

```
      $cust_time_filter(agg_time)
    group by
      hodex
    order by
      hodex
  ) t1 full
  join (
    select
      $flex_timescale(agg_time) as hodex,
      max(
        num_sev_high + num_sev_medium + num_sev_low
      ) as num_inc_total
    from
      $incident_history
    where
      $cust_time_filter(agg_time)
    group by
      hodex
    order by
      hodex
  ) t2 on t1.hodex = t2.hodex
order by
  hodex
```

Dataset Name	Description	Log Category
soc-Incident-List	List of Incidents	

```
select
  incid_to_str(incid) as incnum,
  from_itime(createtime) as timestamp,
  inc_cat_encode(category) as category,
  severity,
  status,
  endpoint
from
  $incident
where
  $cust_time_filter(createtime)
order by
  createtime desc
```

Dataset Name	Description	Log Category
soc-Incident-by-Severity	Incidents by Severity	

```
select
  severity,
  count(*) as incnum
from
  $incident
where
  $filter - drilldown
  and $cust_time_filter(createtime)
group by
  severity
```

```
order by
  incnum desc
```

Dataset Name	Description	Log Category
soc-Incident-by-Status	Incidents by Status	

```
select
  status,
  count(*) as incnum
from
  $incident
where
  $filter - drilldown
  and $cust_time_filter(createtime)
group by
  status
order by
  incnum desc
```

Dataset Name	Description	Log Category
soc-Incident-by-Category-Unresolved	Unresolved Incidents by Category	

```
select
  inc_cat_encode(category) as category,
  count(*) as incnum
from
  $incident
where
  $filter - drilldown
  and $cust_time_filter(createtime)
  and status not in (
    & #039;closed', 'cancelled') group by category order by incnum desc
```

Dataset Name	Description	Log Category
soc-Incident-by-Severity-Unresolved	Unresolved Incidents by Severity	

```
select
  severity,
  count(*) as incnum
from
  $incident
where
  $filter - drilldown
  and $cust_time_filter(createtime)
  and status not in (
    & #039;closed', 'cancelled') group by severity order by incnum desc
```

Dataset Name	Description	Log Category
soc-Incident-Timeline-by-Category	Incidents Timeline by Category	

```
select
  $flex_timescale(agg_time) as hodex,
  max(num_cat_cat1) as num_cat1,
  max(num_cat_cat2) as num_cat2,
  max(num_cat_cat3) as num_cat3,
  max(num_cat_cat4) as num_cat4,
  max(num_cat_cat5) as num_cat5,
  max(num_cat_cat6) as num_cat6
from
  $incident_history
where
  $filter - drilldown
  and $cust_time_filter(agg_time)
group by
  hodex
order by
  hodex
```

Dataset Name	Description	Log Category
soc-Incident-List-Unresolved	List of Unresolved Incidents	

```
select
  incid_to_str(incid) as incnum,
  from_itime(createtime) as timestamp,
  severity,
  status,
  endpoint,
  description
from
  $incident
where
  $filter - drilldown
  and $cust_time_filter(createtime)
  and status not in (
    & #039;closed', 'cancelled') order by severity desc
```

Dataset Name	Description	Log Category
fex-RSRQ-timeline	FortiExtender RSRQ timeline	event

```
select
  $flex_timescale(timestamp) as hodex,
  cast(
    sum(rsrq_sum)/ sum(count) as decimal(18, 2)
  ) || & #039;dB' as rsrq from ###(select $flex_timestamp(dtime) as timestamp, sum(to_number
(rsrq, '999999.99')) as rsrq_sum, sum(to_number(sinr, '999999.99')) as sinr_sum, count(*) as
count from $log where $filter and logid='0111046409' group by timestamp order by timestamp
desc)### t group by hodex order by hodex desc
```

Dataset Name	Description	Log Category
fex-SINR-timeline	FortiExtender SINR timeline	event

```
select
  $flex_timescale(timestamp) as hodex,
  cast(
    sum(sinr_sum)/ sum(count) as decimal(18, 0)
  ) || & #039;dB' as sinr from ###(select $flex_timestamp(dtime) as timestamp, sum(to_number
(rsrq, '999999.99')) as rsrq_sum, sum(to_number(sinr, '999999.99')) as sinr_sum, count(*) as
count from $log where $filter and logid='0111046409' group by timestamp order by timestamp
desc)### t group by hodex order by hodex desc
```

Dataset Name	Description	Log Category
fgt-device-monitoring-inventory	FortiGate Device Monitoring Inventory	event

```
select
  devname,
  (
    & #039; ' || devid) as id_devid, ip, platform, os, '1' as total_num from $func-fgt-
inventory as t1 where exists (select 1 from devtable t2 where $dev_filter and
t2.devid=t1.devid) order by devname
```

Dataset Name	Description	Log Category
fgt-inventory-hardware	FortiGate Monitoring Inventory Hardware	event

```
select
  platform,
  count(*) as total_num
from
  $func - fgt - inventory as t1
where
  exists (
    select
      1
    from
      devtable t2
    where
      $dev_filter
      and t2.devid = t1.devid
  )
group by
  platform
order by
  total_num desc
```

Dataset Name	Description	Log Category
fgt-inventory-software	FortiGate Monitoring Inventory Software	event

```
select
  & #039;FortiOS' as sf_name, (platform || ' ' || os) as firmware, count(*) as total_num
from $func-fgt-inventory as t1 where exists (select 1 from devtable t2 where $dev_filter and
t2.devid=t1.devid) group by platform, os order by total_num desc
```

Dataset Name	Description	Log Category
cup-utilization-timeline-for-each-device	FortiGate cpu utilization timeline	event

```
select
  $flex_timescale(timestamp) as hodex,
  devid,
  cast(
    sum(total_cpu)/ sum(count) as decimal(6, 0)
  ) as cpu_ave,
  cast(
    sum(total_mem)/ sum(count) as decimal(6, 0)
  ) as mem_ave,
  cast(
    sum(total_disk)/ sum(count) as decimal(6, 0)
  ) as disk_ave,
  cast(
    sum(sent)/ sum(count) as decimal(10, 0)
  ) as sent_kbps,
  cast(
    sum(recv)/ sum(count) as decimal(10, 0)
  ) as recv_kbps
from
  ###(select $flex_timestamp as timestamp, devid, slot, sum(coalesce(trate, 0)) as total_
trate, sum(coalesce(erate, 0)) as total_erate, sum(coalesce(orate, 0)) as total_orate, min
(itime) as first_seen, max(itime) as last_seen, sum(coalesce(mem, 0)) as total_mem, max
(coalesce(mem, 0)) as mem_peak, sum(coalesce(disk, 0)) as total_disk, max(coalesce(disk, 0))
as disk_peak, sum(coalesce(cpu, 0)) as total_cpu, max(coalesce(cpu, 0)) as cpu_peak, max
(coalesce(trate, 0)+coalesce(erate, 0)+coalesce(orate, 0)) as lograte_peak, sum(coalesce
(totalsession, 0)) as totalsession, max(coalesce(totalsession, 0)) as session_peak, sum(cast
(coalesce(split_part(bandwidth, '/', 1), '0') as integer)) as sent, sum(cast(coalesce(split_
part(bandwidth, '/', 2), '0') as integer)) as recv, max(cast(coalesce(split_part(bandwidth,
'/', 1), '0') as integer)+cast(coalesce(split_part(bandwidth, '/', 2), '0') as integer)) as
transmit_peak, sum(coalesce(setuprate, 0)) as cps, max(coalesce(setuprate, 0)) as cps_peak,
count(*) as count from $log where $filter and subtype='system' and action='perf-stats' group
by timestamp, devid, slot order by total_mem desc)### t where $filter-drilldown group by
hodex, devid order by hodex
```

Dataset Name	Description	Log Category
status-timeline-by-device-cpu-utilization	FortiGate cpu summary view	event

```
select
  devid,
  cast(
    sum(total_cpu)/ sum(count) as decimal(6, 0)
  ) as cpu_ave,
  max(cpu_peak) as cpu_peak
from
  ###(select $flex_timestamp as timestamp, devid, slot, sum(coalesce(trate, 0)) as total_
trate, sum(coalesce(erate, 0)) as total_erate, sum(coalesce(orate, 0)) as total_orate, min
(itime) as first_seen, max(itime) as last_seen, sum(coalesce(mem, 0)) as total_mem, max
(coalesce(mem, 0)) as mem_peak, sum(coalesce(disk, 0)) as total_disk, max(coalesce(disk, 0))
as disk_peak, sum(coalesce(cpu, 0)) as total_cpu, max(coalesce(cpu, 0)) as cpu_peak, max
(coalesce(trate, 0)+coalesce(erate, 0)+coalesce(orate, 0)) as lograte_peak, sum(coalesce
(totalsession, 0)) as totalsession, max(coalesce(totalsession, 0)) as session_peak, sum(cast
(coalesce(split_part(bandwidth, '/', 1), '0') as integer)) as sent, sum(cast(coalesce(split_
part(bandwidth, '/', 2), '0') as integer)) as recv, max(cast(coalesce(split_part(bandwidth,
'/', 1), '0') as integer)+cast(coalesce(split_part(bandwidth, '/', 2), '0') as integer)) as
transmit_peak, sum(coalesce(setuprate, 0)) as cps, max(coalesce(setuprate, 0)) as cps_peak,
count(*) as count from $log where $filter and subtype='system' and action='perf-stats' group
by timestamp, devid, slot order by total_mem desc)### t group by devid order by cpu_peak
desc
```

Dataset Name	Description	Log Category
event-cpu-utilization-dev	FortiGate cpu summary view	event

```
select
  devid,
  cast(
    sum(total_cpu)/ sum(count) as decimal(6, 0)
  ) as cpu_ave,
  max(cpu_peak) as cpu_peak
from
  ###(select $flex_timestamp as timestamp, devid, slot, sum(coalesce(trate, 0)) as total_
trate, sum(coalesce(erate, 0)) as total_erate, sum(coalesce(orate, 0)) as total_orate, min
(itime) as first_seen, max(itime) as last_seen, sum(coalesce(mem, 0)) as total_mem, max
(coalesce(mem, 0)) as mem_peak, sum(coalesce(disk, 0)) as total_disk, max(coalesce(disk, 0))
as disk_peak, sum(coalesce(cpu, 0)) as total_cpu, max(coalesce(cpu, 0)) as cpu_peak, max
(coalesce(trate, 0)+coalesce(erate, 0)+coalesce(orate, 0)) as lograte_peak, sum(coalesce
(totalsession, 0)) as totalsession, max(coalesce(totalsession, 0)) as session_peak, sum(cast
(coalesce(split_part(bandwidth, '/', 1), '0') as integer)) as sent, sum(cast(coalesce(split_
part(bandwidth, '/', 2), '0') as integer)) as recv, max(cast(coalesce(split_part(bandwidth,
'/', 1), '0') as integer)+cast(coalesce(split_part(bandwidth, '/', 2), '0') as integer)) as
transmit_peak, sum(coalesce(setuprate, 0)) as cps, max(coalesce(setuprate, 0)) as cps_peak,
count(*) as count from $log where $filter and subtype='system' and action='perf-stats' group
by timestamp, devid, slot order by total_mem desc)### t group by devid order by cpu_peak
desc
```

Dataset Name	Description	Log Category
memory-utilization-timeline-for-each-device	FortiGate cpu utilization timeline	event

```
select
  $flex_timescale(timestamp) as hodex,
  devid,
  cast(
    sum(total_cpu)/ sum(count) as decimal(6, 0)
  ) as cpu_ave,
  cast(
    sum(total_mem)/ sum(count) as decimal(6, 0)
  ) as mem_ave,
  cast(
    sum(total_disk)/ sum(count) as decimal(6, 0)
  ) as disk_ave,
  cast(
    sum(sent)/ sum(count) as decimal(10, 0)
  ) as sent_kbps,
  cast(
    sum(recv)/ sum(count) as decimal(10, 0)
  ) as recv_kbps
from
  ###(select $flex_timestamp as timestamp, devid, slot, sum(coalesce(trate, 0)) as total_
trate, sum(coalesce(erate, 0)) as total_erate, sum(coalesce(orate, 0)) as total_orate, min
(itime) as first_seen, max(itime) as last_seen, sum(coalesce(mem, 0)) as total_mem, max
(coalesce(mem, 0)) as mem_peak, sum(coalesce(disk, 0)) as total_disk, max(coalesce(disk, 0))
as disk_peak, sum(coalesce(cpu, 0)) as total_cpu, max(coalesce(cpu, 0)) as cpu_peak, max
(coalesce(trate, 0)+coalesce(erate, 0)+coalesce(orate, 0)) as lograte_peak, sum(coalesce
(totalsession, 0)) as totalsession, max(coalesce(totalsession, 0)) as session_peak, sum(cast
(coalesce(split_part(bandwidth, '/', 1), '0') as integer)) as sent, sum(cast(coalesce(split_
part(bandwidth, '/', 2), '0') as integer)) as recv, max(cast(coalesce(split_part(bandwidth,
'/', 1), '0') as integer)+cast(coalesce(split_part(bandwidth, '/', 2), '0') as integer)) as
transmit_peak, sum(coalesce(setuprate, 0)) as cps, max(coalesce(setuprate, 0)) as cps_peak,
count(*) as count from $log where $filter and subtype='system' and action='perf-stats' group
by timestamp, devid, slot order by total_mem desc)### t where $filter-drilldown group by
hodex, devid order by hodex
```

Dataset Name	Description	Log Category
status-timeline-by-device-mem-utilization	FortiGate memory summary view	event

```
select
  devid,
  cast(
    sum(total_mem)/ sum(count) as decimal(6, 0)
  ) as mem_ave,
  max(mem_peak) as mem_peak
from
  ###(select $flex_timestamp as timestamp, devid, slot, sum(coalesce(trate, 0)) as total_
trate, sum(coalesce(erate, 0)) as total_erate, sum(coalesce(orate, 0)) as total_orate, min
(itime) as first_seen, max(itime) as last_seen, sum(coalesce(mem, 0)) as total_mem, max
(coalesce(mem, 0)) as mem_peak, sum(coalesce(disk, 0)) as total_disk, max(coalesce(disk, 0))
as disk_peak, sum(coalesce(cpu, 0)) as total_cpu, max(coalesce(cpu, 0)) as cpu_peak, max
(coalesce(trate, 0)+coalesce(erate, 0)+coalesce(orate, 0)) as lograte_peak, sum(coalesce
(totalsession, 0)) as totalsession, max(coalesce(totalsession, 0)) as session_peak, sum(cast
(coalesce(split_part(bandwidth, '/', 1), '0') as integer)) as sent, sum(cast(coalesce(split_
part(bandwidth, '/', 2), '0') as integer)) as recv, max(cast(coalesce(split_part(bandwidth,
'/', 1), '0') as integer)+cast(coalesce(split_part(bandwidth, '/', 2), '0') as integer)) as
transmit_peak, sum(coalesce(setuprate, 0)) as cps, max(coalesce(setuprate, 0)) as cps_peak,
count(*) as count from $log where $filter and subtype='system' and action='perf-stats' group
by timestamp, devid, slot order by total_mem desc)### t group by devid order by mem_peak
desc
```

Dataset Name	Description	Log Category
event-mem-utilization-dev	FortiGate memory summary view	event

```
select
  devid,
  cast(
    sum(total_mem)/ sum(count) as decimal(6, 0)
  ) as mem_ave,
  max(mem_peak) as mem_peak
from
  ###(select $flex_timestamp as timestamp, devid, slot, sum(coalesce(trate, 0)) as total_
trate, sum(coalesce(erate, 0)) as total_erate, sum(coalesce(orate, 0)) as total_orate, min
(itime) as first_seen, max(itime) as last_seen, sum(coalesce(mem, 0)) as total_mem, max
(coalesce(mem, 0)) as mem_peak, sum(coalesce(disk, 0)) as total_disk, max(coalesce(disk, 0))
as disk_peak, sum(coalesce(cpu, 0)) as total_cpu, max(coalesce(cpu, 0)) as cpu_peak, max
(coalesce(trate, 0)+coalesce(erate, 0)+coalesce(orate, 0)) as lograte_peak, sum(coalesce
(totalsession, 0)) as totalsession, max(coalesce(totalsession, 0)) as session_peak, sum(cast
(coalesce(split_part(bandwidth, '/', 1), '0') as integer)) as sent, sum(cast(coalesce(split_
part(bandwidth, '/', 2), '0') as integer)) as recv, max(cast(coalesce(split_part(bandwidth,
'/', 1), '0') as integer)+cast(coalesce(split_part(bandwidth, '/', 2), '0') as integer)) as
transmit_peak, sum(coalesce(setuprate, 0)) as cps, max(coalesce(setuprate, 0)) as cps_peak,
count(*) as count from $log where $filter and subtype='system' and action='perf-stats' group
by timestamp, devid, slot order by total_mem desc)### t group by devid order by mem_peak
desc
```

Dataset Name	Description	Log Category
disk-utilization-timeline-for-each-device	FortiGate cpu utilization timeline	event

```
select
  $flex_timescale(timestamp) as hodex,
  devid,
  cast(
    sum(total_cpu)/ sum(count) as decimal(6, 0)
  ) as cpu_ave,
  cast(
    sum(total_mem)/ sum(count) as decimal(6, 0)
  ) as mem_ave,
  cast(
    sum(total_disk)/ sum(count) as decimal(6, 0)
  ) as disk_ave,
  cast(
    sum(sent)/ sum(count) as decimal(10, 0)
  ) as sent_kbps,
  cast(
    sum(recv)/ sum(count) as decimal(10, 0)
  ) as recv_kbps
from
  ###(select $flex_timestamp as timestamp, devid, slot, sum(coalesce(trate, 0)) as total_
trate, sum(coalesce(erate, 0)) as total_erate, sum(coalesce(orate, 0)) as total_orate, min
(itime) as first_seen, max(itime) as last_seen, sum(coalesce(mem, 0)) as total_mem, max
(coalesce(mem, 0)) as mem_peak, sum(coalesce(disk, 0)) as total_disk, max(coalesce(disk, 0))
as disk_peak, sum(coalesce(cpu, 0)) as total_cpu, max(coalesce(cpu, 0)) as cpu_peak, max
(coalesce(trate, 0)+coalesce(erate, 0)+coalesce(orate, 0)) as lograte_peak, sum(coalesce
(totalsession, 0)) as totalsession, max(coalesce(totalsession, 0)) as session_peak, sum(cast
(coalesce(split_part(bandwidth, '/', 1), '0') as integer)) as sent, sum(cast(coalesce(split_
part(bandwidth, '/', 2), '0') as integer)) as recv, max(cast(coalesce(split_part(bandwidth,
'/', 1), '0') as integer)+cast(coalesce(split_part(bandwidth, '/', 2), '0') as integer)) as
transmit_peak, sum(coalesce(setuprate, 0)) as cps, max(coalesce(setuprate, 0)) as cps_peak,
count(*) as count from $log where $filter and subtype='system' and action='perf-stats' group
by timestamp, devid, slot order by total_mem desc)### t where $filter-drilldown group by
hodex, devid order by hodex
```

Dataset Name	Description	Log Category
status-timeline-by-device-disk-utilization	FortiGate disk summary view	event

```
select
  devid,
  cast(
    sum(total_disk)/ sum(count) as decimal(6, 0)
  ) as disk_ave,
  max(disk_peak) as disk_peak
from
  ###(select $flex_timestamp as timestamp, devid, slot, sum(coalesce(trate, 0)) as total_
trate, sum(coalesce(erate, 0)) as total_erate, sum(coalesce(orate, 0)) as total_orate, min
(itime) as first_seen, max(itime) as last_seen, sum(coalesce(mem, 0)) as total_mem, max
(coalesce(mem, 0)) as mem_peak, sum(coalesce(disk, 0)) as total_disk, max(coalesce(disk, 0))
as disk_peak, sum(coalesce(cpu, 0)) as total_cpu, max(coalesce(cpu, 0)) as cpu_peak, max
(coalesce(trate, 0)+coalesce(erate, 0)+coalesce(orate, 0)) as lograte_peak, sum(coalesce
(totalsession, 0)) as totalsession, max(coalesce(totalsession, 0)) as session_peak, sum(cast
(coalesce(split_part(bandwidth, '/', 1), '0') as integer)) as sent, sum(cast(coalesce(split_
part(bandwidth, '/', 2), '0') as integer)) as recv, max(cast(coalesce(split_part(bandwidth,
'/', 1), '0') as integer)+cast(coalesce(split_part(bandwidth, '/', 2), '0') as integer)) as
transmit_peak, sum(coalesce(setuprate, 0)) as cps, max(coalesce(setuprate, 0)) as cps_peak,
count(*) as count from $log where $filter and subtype='system' and action='perf-stats' group
by timestamp, devid, slot order by total_mem desc)### t group by devid order by disk_peak
desc
```

Dataset Name	Description	Log Category
event-disk-utilization-dev	FortiGate disk summary view	event

```
select
  devid,
  cast(
    sum(total_disk)/ sum(count) as decimal(6, 0)
  ) as disk_ave,
  max(disk_peak) as disk_peak
from
  ###(select $flex_timestamp as timestamp, devid, slot, sum(coalesce(trate, 0)) as total_
trate, sum(coalesce(erate, 0)) as total_erate, sum(coalesce(orate, 0)) as total_orate, min
(itime) as first_seen, max(itime) as last_seen, sum(coalesce(mem, 0)) as total_mem, max
(coalesce(mem, 0)) as mem_peak, sum(coalesce(disk, 0)) as total_disk, max(coalesce(disk, 0))
as disk_peak, sum(coalesce(cpu, 0)) as total_cpu, max(coalesce(cpu, 0)) as cpu_peak, max
(coalesce(trate, 0)+coalesce(erate, 0)+coalesce(orate, 0)) as lograte_peak, sum(coalesce
(totalsession, 0)) as totalsession, max(coalesce(totalsession, 0)) as session_peak, sum(cast
(coalesce(split_part(bandwidth, '/', 1), '0') as integer)) as sent, sum(cast(coalesce(split_
part(bandwidth, '/', 2), '0') as integer)) as recv, max(cast(coalesce(split_part(bandwidth,
'/', 1), '0') as integer)+cast(coalesce(split_part(bandwidth, '/', 2), '0') as integer)) as
transmit_peak, sum(coalesce(setuprate, 0)) as cps, max(coalesce(setuprate, 0)) as cps_peak,
count(*) as count from $log where $filter and subtype='system' and action='perf-stats' group
by timestamp, devid, slot order by total_mem desc)### t group by devid order by disk_peak
desc
```

Dataset Name	Description	Log Category
event-total-session-summary	FortiGate Total Sessions	event

```
select
  devid,
  max(session_peak) as max_session,
  cast(
    sum(totalsession)/ sum(count) as decimal(10, 0)
  ) as sessions,
  max(cps_peak) as cps_peak,
  cast(
    sum(cps)/ sum(count) as decimal(10, 0)
  ) as cps_ave
from
  ###(select $flex_timestamp as timestamp, devid, slot, sum(coalesce(trate, 0)) as total_
trate, sum(coalesce(erate, 0)) as total_erate, sum(coalesce(orate, 0)) as total_orate, min
(itime) as first_seen, max(itime) as last_seen, sum(coalesce(mem, 0)) as total_mem, max
(coalesce(mem, 0)) as mem_peak, sum(coalesce(disk, 0)) as total_disk, max(coalesce(disk, 0))
as disk_peak, sum(coalesce(cpu, 0)) as total_cpu, max(coalesce(cpu, 0)) as cpu_peak, max
(coalesce(trate, 0)+coalesce(erate, 0)+coalesce(orate, 0)) as lograte_peak, sum(coalesce
(totalsession, 0)) as totalsession, max(coalesce(totalsession, 0)) as session_peak, sum(cast
(coalesce(split_part(bandwidth, '/', 1), '0') as integer)) as sent, sum(cast(coalesce(split_
part(bandwidth, '/', 2), '0') as integer)) as recv, max(cast(coalesce(split_part(bandwidth,
'/', 1), '0') as integer)+cast(coalesce(split_part(bandwidth, '/', 2), '0') as integer)) as
transmit_peak, sum(coalesce(setuprate, 0)) as cps, max(coalesce(setuprate, 0)) as cps_peak,
count(*) as count from $log where $filter and subtype='system' and action='perf-stats' group
by timestamp, devid, slot order by total_mem desc)### t group by devid order by max_session
desc
```

Dataset Name	Description	Log Category
event-session-rate-summary	FortiGate Session Rate	event

```
select
  devid,
  max(cps_peak) as max_rate
from
  ###(select $flex_timestamp as timestamp, devid, slot, sum(coalesce(trate, 0)) as total_
trate, sum(coalesce(erate, 0)) as total_erate, sum(coalesce(orate, 0)) as total_orate, min
(itime) as first_seen, max(itime) as last_seen, sum(coalesce(mem, 0)) as total_mem, max
(coalesce(mem, 0)) as mem_peak, sum(coalesce(disk, 0)) as total_disk, max(coalesce(disk, 0))
as disk_peak, sum(coalesce(cpu, 0)) as total_cpu, max(coalesce(cpu, 0)) as cpu_peak, max
(coalesce(trate, 0)+coalesce(erate, 0)+coalesce(orate, 0)) as lograte_peak, sum(coalesce
(totalsession, 0)) as totalsession, max(coalesce(totalsession, 0)) as session_peak, sum(cast
(coalesce(split_part(bandwidth, '/', 1), '0') as integer)) as sent, sum(cast(coalesce(split_
part(bandwidth, '/', 2), '0') as integer)) as recv, max(cast(coalesce(split_part(bandwidth,
'/', 1), '0') as integer)+cast(coalesce(split_part(bandwidth, '/', 2), '0') as integer)) as
transmit_peak, sum(coalesce(setuprate, 0)) as cps, max(coalesce(setuprate, 0)) as cps_peak,
count(*) as count from $log where $filter and subtype='system' and action='perf-stats' group
by timestamp, devid, slot order by total_mem desc)### t group by devid order by max_rate
desc
```

Dataset Name	Description	Log Category
event-session-summary-dev	FortiGate Total Sessions	event

```
select
  devid,
  max(session_peak) as max_session,
  cast(
    sum(totalsession)/ sum(count) as decimal(10, 0)
  ) as sessions,
  max(cps_peak) as cps_peak,
  cast(
    sum(cps)/ sum(count) as decimal(10, 0)
  ) as cps_ave
```

```
from
  ###(select $flex_timestamp as timestamp, devid, slot, sum(coalesce(trate, 0)) as total_
trate, sum(coalesce(erate, 0)) as total_erate, sum(coalesce(orate, 0)) as total_orate, min
(itime) as first_seen, max(itime) as last_seen, sum(coalesce(mem, 0)) as total_mem, max
(coalesce(mem, 0)) as mem_peak, sum(coalesce(disk, 0)) as total_disk, max(coalesce(disk, 0))
as disk_peak, sum(coalesce(cpu, 0)) as total_cpu, max(coalesce(cpu, 0)) as cpu_peak, max
(coalesce(trate, 0)+coalesce(erate, 0)+coalesce(orate, 0)) as lograte_peak, sum(coalesce
(totalsession, 0)) as totalsession, max(coalesce(totalsession, 0)) as session_peak, sum(cast
(coalesce(split_part(bandwidth, '/', 1), '0') as integer)) as sent, sum(cast(coalesce(split_
part(bandwidth, '/', 2), '0') as integer)) as recv, max(cast(coalesce(split_part(bandwidth,
'/', 1), '0') as integer)+cast(coalesce(split_part(bandwidth, '/', 2), '0') as integer)) as
transmit_peak, sum(coalesce(setuprate, 0)) as cps, max(coalesce(setuprate, 0)) as cps_peak,
count(*) as count from $log where $filter and subtype='system' and action='perf-stats' group
by timestamp, devid, slot order by total_mem desc)### t group by devid order by max_session
desc
```

Dataset Name	Description	Log Category
fgt-intf-down-timeline-for-each-device	FortiGate Interface Down Timeline	event

```
select
  $flex_timescale(timestamp) as hodex,
  devid,
  sum(total_num) as total_num
from
  ###(select $flex_timestamp as timestamp, devid, status, count(*) as total_num from $log
where $filter and logid_to_int(logid)=20099 and status='DOWN' group by timestamp, devid,
status)### t where $filter-drilldown group by hodex, devid order by hodex
```

Dataset Name	Description	Log Category
fgt-intf-down-timeline-by-device	FortiGate Interface Down by Device	event

```
select
  devid,
  status,
  sum(total_num) as total_num
from
  ###(select $flex_timestamp as timestamp, devid, status, count(*) as total_num from $log
where $filter and logid_to_int(logid)=20099 and status='DOWN' group by timestamp, devid,
status)### t group by devid, status order by total_num desc
```

Dataset Name	Description	Log Category
fgt-intf-down-dev-donut	FortiGate Interface Down by Device	event

```
select
  devid,
  status,
  sum(total_num) as total_num
from
  ###(select $flex_timestamp as timestamp, devid, status, count(*) as total_num from $log
where $filter and logid_to_int(logid)=20099 and status='DOWN' group by timestamp, devid,
status)### t group by devid, status order by total_num desc
```

Dataset Name	Description	Log Category
fgt-intf-down-dev-tbl	FortiGate Interface Down by Device	event

```
select
  devid,
  status,
  sum(total_num) as total_num
from
  ###(select $flex_timestamp as timestamp, devid, status, count(*) as total_num from $log
where $filter and logid_to_int(logid)=20099 and status='DOWN' group by timestamp, devid,
status)### t group by devid, status order by total_num desc
```

Dataset Name	Description	Log Category
intf-sent-timeline-for-each-device	FortiGate cpu utilization timeline	event

```
select
  $flex_timescale(timestamp) as hodex,
  devid,
  cast(
    sum(total_cpu)/ sum(count) as decimal(6, 0)
  ) as cpu_ave,
  cast(
    sum(total_mem)/ sum(count) as decimal(6, 0)
  ) as mem_ave,
  cast(
    sum(total_disk)/ sum(count) as decimal(6, 0)
  ) as disk_ave,
  cast(
    sum(sent)/ sum(count) as decimal(10, 0)
  ) as sent_kbps,
  cast(
    sum(recv)/ sum(count) as decimal(10, 0)
  ) as recv_kbps
from
  ###(select $flex_timestamp as timestamp, devid, slot, sum(coalesce(trate, 0)) as total_
trate, sum(coalesce(erate, 0)) as total_erate, sum(coalesce(orate, 0)) as total_orate, min
(itime) as first_seen, max(itime) as last_seen, sum(coalesce(mem, 0)) as total_mem, max
(coalesce(mem, 0)) as mem_peak, sum(coalesce(disk, 0)) as total_disk, max(coalesce(disk, 0))
as disk_peak, sum(coalesce(cpu, 0)) as total_cpu, max(coalesce(cpu, 0)) as cpu_peak, max
(coalesce(trate, 0)+coalesce(erate, 0)+coalesce(orate, 0)) as lograte_peak, sum(coalesce
(totalsession, 0)) as totalsession, max(coalesce(totalsession, 0)) as session_peak, sum(cast
(coalesce(split_part(bandwidth, '/', 1), '0') as integer)) as sent, sum(cast(coalesce(split_
part(bandwidth, '/', 2), '0') as integer)) as recv, max(cast(coalesce(split_part(bandwidth,
'/', 1), '0') as integer)+cast(coalesce(split_part(bandwidth, '/', 2), '0') as integer)) as
transmit_peak, sum(coalesce(setuprate, 0)) as cps, max(coalesce(setuprate, 0)) as cps_peak,
count(*) as count from $log where $filter and subtype='system' and action='perf-stats' group
by timestamp, devid, slot order by total_mem desc)### t where $filter-drilldown group by
hodex, devid order by hodex
```

Dataset Name	Description	Log Category
status-timeline-by-device-intf-sent	FortiGate interface summary view	event

```
select
  devid,
  cast(
    sum(sent)/ sum(count) as decimal(10, 0)
  ) as sent_kbps,
  cast(
    sum(recv)/ sum(count) as decimal(10, 0)
  ) as recv_kbps,
  cast(
    sum(sent + recv)/ sum(count) as decimal(10, 0)
  ) as transmit_kbps,
  max(transmit_peak) as transmit_kbps_peak
from
  ###(select $flex_timestamp as timestamp, devid, slot, sum(coalesce(trate, 0)) as total_
trate, sum(coalesce(erate, 0)) as total_erate, sum(coalesce(orate, 0)) as total_orate, min
(itime) as first_seen, max(itime) as last_seen, sum(coalesce(mem, 0)) as total_mem, max
(coalesce(mem, 0)) as mem_peak, sum(coalesce(disk, 0)) as total_disk, max(coalesce(disk, 0))
as disk_peak, sum(coalesce(cpu, 0)) as total_cpu, max(coalesce(cpu, 0)) as cpu_peak, max
(coalesce(trate, 0)+coalesce(erate, 0)+coalesce(orate, 0)) as lograte_peak, sum(coalesce
(totalsession, 0)) as totalsession, max(coalesce(totalsession, 0)) as session_peak, sum(cast
(coalesce(split_part(bandwidth, '/', 1), '0') as integer)) as sent, sum(cast(coalesce(split_
part(bandwidth, '/', 2), '0') as integer)) as recv, max(cast(coalesce(split_part(bandwidth,
'/', 1), '0') as integer)+cast(coalesce(split_part(bandwidth, '/', 2), '0') as integer)) as
transmit_peak, sum(coalesce(setuprate, 0)) as cps, max(coalesce(setuprate, 0)) as cps_peak,
count(*) as count from $log where $filter and subtype='system' and action='perf-stats' group
by timestamp, devid, slot order by total_mem desc)### t group by devid order by transmit_
kbps_peak desc
```

Dataset Name	Description	Log Category
intf-recv-timeline-for-each-device	FortiGate cpu utilization timeline	event

```
select
  $flex_timescale(timestamp) as hodex,
  devid,
  cast(
    sum(total_cpu)/ sum(count) as decimal(6, 0)
  ) as cpu_ave,
  cast(
    sum(total_mem)/ sum(count) as decimal(6, 0)
  ) as mem_ave,
  cast(
    sum(total_disk)/ sum(count) as decimal(6, 0)
  ) as disk_ave,
  cast(
    sum(sent)/ sum(count) as decimal(10, 0)
  ) as sent_kbps,
  cast(
    sum(recv)/ sum(count) as decimal(10, 0)
  ) as recv_kbps
from
  ###(select $flex_timestamp as timestamp, devid, slot, sum(coalesce(trate, 0)) as total_
trate, sum(coalesce(erate, 0)) as total_erate, sum(coalesce(orate, 0)) as total_orate, min
(itime) as first_seen, max(itime) as last_seen, sum(coalesce(mem, 0)) as total_mem, max
(coalesce(mem, 0)) as mem_peak, sum(coalesce(disk, 0)) as total_disk, max(coalesce(disk, 0))
as disk_peak, sum(coalesce(cpu, 0)) as total_cpu, max(coalesce(cpu, 0)) as cpu_peak, max
(coalesce(trate, 0)+coalesce(erate, 0)+coalesce(orate, 0)) as lograte_peak, sum(coalesce
(totalsession, 0)) as totalsession, max(coalesce(totalsession, 0)) as session_peak, sum(cast
(coalesce(split_part(bandwidth, '/', 1), '0') as integer)) as sent, sum(cast(coalesce(split_
part(bandwidth, '/', 2), '0') as integer)) as recv, max(cast(coalesce(split_part(bandwidth,
'/', 1), '0') as integer)+cast(coalesce(split_part(bandwidth, '/', 2), '0') as integer)) as
transmit_peak, sum(coalesce(setuprate, 0)) as cps, max(coalesce(setuprate, 0)) as cps_peak,
count(*) as count from $log where $filter and subtype='system' and action='perf-stats' group
by timestamp, devid, slot order by total_mem desc)### t where $filter-drilldown group by
hodex, devid order by hodex
```

Dataset Name	Description	Log Category
status-timeline-by-device-intf-recv	FortiGate interface summary view	event

```
select
  devid,
  cast(
    sum(sent)/ sum(count) as decimal(10, 0)
  ) as sent_kbps,
  cast(
    sum(recv)/ sum(count) as decimal(10, 0)
  ) as recv_kbps,
  cast(
    sum(sent + recv)/ sum(count) as decimal(10, 0)
  ) as transmit_kbps,
  max(transmit_peak) as transmit_kbps_peak
from
  ###(select $flex_timestamp as timestamp, devid, slot, sum(coalesce(trate, 0)) as total_
trate, sum(coalesce(erate, 0)) as total_erate, sum(coalesce(orate, 0)) as total_orate, min
(itime) as first_seen, max(itime) as last_seen, sum(coalesce(mem, 0)) as total_mem, max
(coalesce(mem, 0)) as mem_peak, sum(coalesce(disk, 0)) as total_disk, max(coalesce(disk, 0))
as disk_peak, sum(coalesce(cpu, 0)) as total_cpu, max(coalesce(cpu, 0)) as cpu_peak, max
(coalesce(trate, 0)+coalesce(erate, 0)+coalesce(orate, 0)) as lograte_peak, sum(coalesce
(totalsession, 0)) as totalsession, max(coalesce(totalsession, 0)) as session_peak, sum(cast
(coalesce(split_part(bandwidth, '/', 1), '0') as integer)) as sent, sum(cast(coalesce(split_
part(bandwidth, '/', 2), '0') as integer)) as recv, max(cast(coalesce(split_part(bandwidth,
'/', 1), '0') as integer)+cast(coalesce(split_part(bandwidth, '/', 2), '0') as integer)) as
transmit_peak, sum(coalesce(setuprate, 0)) as cps, max(coalesce(setuprate, 0)) as cps_peak,
count(*) as count from $log where $filter and subtype='system' and action='perf-stats' group
by timestamp, devid, slot order by total_mem desc)### t group by devid order by transmit_
kbps_peak desc
```

Dataset Name	Description	Log Category
event-intf-summary-dev	FortiGate interface summary view	event

```
select
  devid,
  cast(
    sum(sent)/ sum(count) as decimal(10, 0)
  ) as sent_kbps,
  cast(
    sum(recv)/ sum(count) as decimal(10, 0)
  ) as recv_kbps,
  cast(
    sum(sent + recv)/ sum(count) as decimal(10, 0)
  ) as transmit_kbps,
  max(transmit_peak) as transmit_kbps_peak
from
  ###(select $flex_timestamp as timestamp, devid, slot, sum(coalesce(trate, 0)) as total_
trate, sum(coalesce(erate, 0)) as total_erate, sum(coalesce(orate, 0)) as total_orate, min
(itime) as first_seen, max(itime) as last_seen, sum(coalesce(mem, 0)) as total_mem, max
(coalesce(mem, 0)) as mem_peak, sum(coalesce(disk, 0)) as total_disk, max(coalesce(disk, 0))
as disk_peak, sum(coalesce(cpu, 0)) as total_cpu, max(coalesce(cpu, 0)) as cpu_peak, max
(coalesce(trate, 0)+coalesce(erate, 0)+coalesce(orate, 0)) as lograte_peak, sum(coalesce
(totalsession, 0)) as totalsession, max(coalesce(totalsession, 0)) as session_peak, sum(cast
(coalesce(split_part(bandwidth, '/', 1), '0') as integer)) as sent, sum(cast(coalesce(split_
part(bandwidth, '/', 2), '0') as integer)) as recv, max(cast(coalesce(split_part(bandwidth,
'/', 1), '0') as integer)+cast(coalesce(split_part(bandwidth, '/', 2), '0') as integer)) as
transmit_peak, sum(coalesce(setuprate, 0)) as cps, max(coalesce(setuprate, 0)) as cps_peak,
count(*) as count from $log where $filter and subtype='system' and action='perf-stats' group
by timestamp, devid, slot order by total_mem desc)### t group by devid order by transmit_
kbps_peak desc
```

Dataset Name	Description	Log Category
fgt-intf-stats-timeline-util-in-each	FortiGate Interface Statistics Timeline	event

```
select
  $flex_timescale(tmstamp) as hodex,
  (
    devname || & #039;:' || intfname) as dev_intf, cast(sum(bps_out)/sum(interval)/1000 as
decimal(10, 0)) as kbps_out_avg, cast(sum(bps_in)/sum(interval)/1000 as decimal(10, 0)) as
kbps_in_avg, cast(sum(util_out)/sum(interval)/100 as decimal(10, 2)) as util_out_avg, cast
(sum(util_in)/sum(interval)/100 as decimal(10, 2)) as util_in_avg from (select $flex_
timestamp(timestamp) as tmstamp, dvid, intfname, sum(interval) as interval, sum
(sentbps*interval) as bps_out, sum(rcvdbps*interval) as bps_in, sum(sentutil*interval) as
util_out, sum(rcvdutil*interval) as util_in from intfstats where $cust_time_filter
(timestamp) group by tmstamp, dvid, intfname) t1 left join devtable t2 on t1.dvid = t2.dvid
where $filter-drilldown group by hodex, dev_intf order by hodex
```

Dataset Name	Description	Log Category
fgt-intf-stats-timeline-util-in	FortiGate Interface Received Utilization	event

```
select
  (
    devname || & #039;:' || intfname) as dev_intf, cast(sum(bps_out)/sum(interval)/1000 as
decimal(10, 0)) as kbps_out_avg, cast(sum(bps_in)/sum(interval)/1000 as decimal(10, 0)) as
kbps_in_avg, cast(sum(util_out)/sum(interval)/100 as decimal(10, 2)) as util_out_avg, cast
(sum(util_in)/sum(interval)/100 as decimal(10, 2)) as util_in_avg from (select $flex_
timestamp(timestamp) as tmstamp, tbl_intf.dvid, intfname, sum(interval) as interval, sum
(sentbps*interval) as bps_out, sum(rcvdbps*interval) as bps_in, sum(sentutil*interval) as
util_out, sum(rcvdutil*interval) as util_in from (select distinct dvid from ###(select dvid
from $log-event where $filter and action='perf-stats' group by dvid)### t) tbl_log inner
join intfstats tbl_intf on tbl_log.dvid = tbl_intf.dvid where $cust_time_filter(timestamp)
group by tmstamp, tbl_intf.dvid, intfname) t1 left join devtable t2 on t1.dvid = t2.dvid
group by dev_intf order by util_in_avg desc, kbps_in_avg desc, kbps_out_avg desc
```

Dataset Name	Description	Log Category
fgt-intf-stats-timeline-util-out-each	FortiGate Interface Statistics Timeline	event

```
select
  $flex_timescale(tmstamp) as hodex,
  (
    devname || & #039;:' || intfname) as dev_intf, cast(sum(bps_out)/sum(interval)/1000 as
decimal(10, 0)) as kbps_out_avg, cast(sum(bps_in)/sum(interval)/1000 as decimal(10, 0)) as
kbps_in_avg, cast(sum(util_out)/sum(interval)/100 as decimal(10, 2)) as util_out_avg, cast
(sum(util_in)/sum(interval)/100 as decimal(10, 2)) as util_in_avg from (select $flex_
timestamp(timestamp) as tmstamp, dvid, intfname, sum(interval) as interval, sum
(sentbps*interval) as bps_out, sum(rcvdbps*interval) as bps_in, sum(sentutil*interval) as
util_out, sum(rcvdutil*interval) as util_in from intfstats where $cust_time_filter
(timestamp) group by tmstamp, dvid, intfname) t1 left join devtable t2 on t1.dvid = t2.dvid
where $filter-drilldown group by hodex, dev_intf order by hodex
```

Dataset Name	Description	Log Category
fgt-intf-stats-timeline-util-out	FortiGate Interface Sent Utilization	event

```
select
  (
    devname || & #039;:' || intfname) as dev_intf, cast(sum(bps_out)/sum(interval)/1000 as
decimal(10, 0)) as kbps_out_avg, cast(sum(bps_in)/sum(interval)/1000 as decimal(10, 0)) as
kbps_in_avg, cast(sum(util_out)/sum(interval)/100 as decimal(10, 2)) as util_out_avg, cast
(sum(util_in)/sum(interval)/100 as decimal(10, 2)) as util_in_avg from (select $flex_
timestamp(timestamp) as tmstamp, tbl_intf.dvid, intfname, sum(interval) as interval, sum
(sentbps*interval) as bps_out, sum(rcvdbps*interval) as bps_in, sum(sentutil*interval) as
util_out, sum(rcvdutil*interval) as util_in from (select distinct dvid from ###(select dvid
from $log-event where $filter and action='perf-stats' group by dvid)### t) tbl_log inner
join intfstats tbl_intf on tbl_log.dvid = tbl_intf.dvid where $cust_time_filter(timestamp)
group by tmstamp, tbl_intf.dvid, intfname) t1 left join devtable t2 on t1.dvid = t2.dvid
group by dev_intf order by util_out_avg desc, kbps_out_avg desc, kbps_in_avg desc
```

Dataset Name	Description	Log Category
fgt-intf-stats-timeline-bit-rate-in-each	FortiGate Interface Statistics Timeline	event

```
select
  $flex_timescale(tmstamp) as hodex,
  (
    devname || & #039;:' || intfname) as dev_intf, cast(sum(bps_out)/sum(interval)/1000 as
decimal(10, 0)) as kbps_out_avg, cast(sum(bps_in)/sum(interval)/1000 as decimal(10, 0)) as
kbps_in_avg, cast(sum(util_out)/sum(interval)/100 as decimal(10, 2)) as util_out_avg, cast
(sum(util_in)/sum(interval)/100 as decimal(10, 2)) as util_in_avg from (select $flex_
timestamp(timestamp) as tmstamp, dvid, intfname, sum(interval) as interval, sum
(sentbps*interval) as bps_out, sum(rcvdbps*interval) as bps_in, sum(sentutil*interval) as
util_out, sum(rcvdutil*interval) as util_in from intfstats where $cust_time_filter
(timestamp) group by tmstamp, dvid, intfname) t1 left join devtable t2 on t1.dvid = t2.dvid
where $filter-drilldown group by hodex, dev_intf order by hodex
```

Dataset Name	Description	Log Category
fgt-intf-stats-timeline-bit-rate-in	FortiGate Interface Received Bit Rate	event

```
select
  (
    devname || & #039;:' || intfname) as dev_intf, cast(sum(bps_out)/sum(interval)/1000 as
decimal(10, 0)) as kbps_out_avg, cast(sum(bps_in)/sum(interval)/1000 as decimal(10, 0)) as
```

```
kbps_in_avg, cast(sum(util_out)/sum(interval)/100 as decimal(10, 2)) as util_out_avg, cast
(sum(util_in)/sum(interval)/100 as decimal(10, 2)) as util_in_avg from (select $flex_
timestamp(timestamp) as tmstamp, tbl_intf.dvid, intfname, sum(interval) as interval, sum
(sentbps*interval) as bps_out, sum(rcvdbps*interval) as bps_in, sum(sentutil*interval) as
util_out, sum(rcvdutil*interval) as util_in from (select distinct dvid from ###(select dvid
from $log-event where $filter and action='perf-stats' group by dvid)### t) tbl_log inner
join intfstats tbl_intf on tbl_log.dvid = tbl_intf.dvid where $cust_time_filter(timestamp)
group by tmstamp, tbl_intf.dvid, intfname) t1 left join devtable t2 on t1.dvid = t2.dvid
group by dev_intf order by kbps_in_avg desc
```

Dataset Name	Description	Log Category
fgt-intf-stats-timeline-bit-rate-out-each	FortiGate Interface Statistics Timeline	event

```
select
  $flex_timescale(tmstamp) as hodex,
  (
    devname || & #039;:' || intfname) as dev_intf, cast(sum(bps_out)/sum(interval)/1000 as
decimal(10, 0)) as kbps_out_avg, cast(sum(bps_in)/sum(interval)/1000 as decimal(10, 0)) as
kbps_in_avg, cast(sum(util_out)/sum(interval)/100 as decimal(10, 2)) as util_out_avg, cast
(sum(util_in)/sum(interval)/100 as decimal(10, 2)) as util_in_avg from (select $flex_
timestamp(timestamp) as tmstamp, dvid, intfname, sum(interval) as interval, sum
(sentbps*interval) as bps_out, sum(rcvdbps*interval) as bps_in, sum(sentutil*interval) as
util_out, sum(rcvdutil*interval) as util_in from intfstats where $cust_time_filter
(timestamp) group by tmstamp, dvid, intfname) t1 left join devtable t2 on t1.dvid = t2.dvid
where $filter-drilldown group by hodex, dev_intf order by hodex
```

Dataset Name	Description	Log Category
fgt-intf-stats-timeline-bit-rate-out	FortiGate Interface Sent Bit Rate	event

```
select
  (
    devname || & #039;:' || intfname) as dev_intf, cast(sum(bps_out)/sum(interval)/1000 as
decimal(10, 0)) as kbps_out_avg, cast(sum(bps_in)/sum(interval)/1000 as decimal(10, 0)) as
kbps_in_avg, cast(sum(util_out)/sum(interval)/100 as decimal(10, 2)) as util_out_avg, cast
(sum(util_in)/sum(interval)/100 as decimal(10, 2)) as util_in_avg from (select $flex_
timestamp(timestamp) as tmstamp, tbl_intf.dvid, intfname, sum(interval) as interval, sum
(sentbps*interval) as bps_out, sum(rcvdbps*interval) as bps_in, sum(sentutil*interval) as
util_out, sum(rcvdutil*interval) as util_in from (select distinct dvid from ###(select dvid
from $log-event where $filter and action='perf-stats' group by dvid)### t) tbl_log inner
join intfstats tbl_intf on tbl_log.dvid = tbl_intf.dvid where $cust_time_filter(timestamp)
group by tmstamp, tbl_intf.dvid, intfname) t1 left join devtable t2 on t1.dvid = t2.dvid
group by dev_intf order by kbps_out_avg desc
```

Dataset Name	Description	Log Category
fgt-intf-stats-summary-view	FortiGate Interface Received Utilization	event

```
select
  (
    devname || & #039;:' || intfname) as dev_intf, cast(sum(bps_out)/sum(interval)/1000 as
decimal(10, 0)) as kbps_out_avg, cast(sum(bps_in)/sum(interval)/1000 as decimal(10, 0)) as
kbps_in_avg, cast(sum(util_out)/sum(interval)/100 as decimal(10, 2)) as util_out_avg, cast
(sum(util_in)/sum(interval)/100 as decimal(10, 2)) as util_in_avg from (select $flex_
timestamp(timestamp) as tmstamp, tbl_intf.dvid, intfname, sum(interval) as interval, sum
(sentbps*interval) as bps_out, sum(rcvdbps*interval) as bps_in, sum(sentutil*interval) as
util_out, sum(rcvdutil*interval) as util_in from (select distinct dvid from ###(select dvid
from $log-event where $filter and action='perf-stats' group by dvid)### t) tbl_log inner
join intfstats tbl_intf on tbl_log.dvid = tbl_intf.dvid where $cust_time_filter(timestamp)
group by tmstamp, tbl_intf.dvid, intfname) t1 left join devtable t2 on t1.dvid = t2.dvid
group by dev_intf order by util_in_avg desc, kbps_in_avg desc, kbps_out_avg desc
```

Dataset Name	Description	Log Category
fgt-ha-failure-timeline	FortiGate HA Failure Timeline	event

```
select
  $flex_timescale(timestamp) as hodex,
  count(*) as total_num
from
  ###(select $flex_timestamp as timestamp, dtime, devid, coalesce(nullifna(logdesc), msg) as
msg_desc from $log where $filter and subtype='ha' and logid_to_int(logid) in (35011, 35012,
35013, 37892, 37893, 37897, 37898, 37901, 37902, 37907, 37908) order by dtime desc)### t
group by hodex order by hodex
```

Dataset Name	Description	Log Category
fgt-ha-failure-summary	FortiGate HA Failure Summary	event

```
select
  from_dtime(dtime) as time_s,
  devid,
  msg_desc
from
  ###(select $flex_timestamp as timestamp, dtime, devid, coalesce(nullifna(logdesc), msg) as
msg_desc from $log where $filter and subtype='ha' and logid_to_int(logid) in (35011, 35012,
35013, 37892, 37893, 37897, 37898, 37901, 37902, 37907, 37908) order by dtime desc)### t
order by time_s desc
```

Dataset Name	Description	Log Category
fgt-env-faults-power	FortiGate Power Supply Faults	event

```
select
  time_s,
  devid,
  msg_desc
from
  ###(select from_dtime(dtime) as time_s, devid, coalesce(nullifna(logdesc), msg) as msg_
desc, logid_to_int(logid) as logid from $log where $filter and logid_to_int(logid) in
(22105, 22107, 22108, 22109) order by time_s desc)### t where logid in (22105, 22107) order
by time_s desc
```

Dataset Name	Description	Log Category
fgt-env-faults-fan	FortiGate Fan Faults	event

```
select
  time_s,
  devid,
  msg_desc
```

```
from
  ###(select from_dtime(dtime) as time_s, devid, coalesce(nullifna(logdesc), msg) as msg_
desc, logid_to_int(logid) as logid from $log where $filter and logid_to_int(logid) in
(22105, 22107, 22108, 22109) order by time_s desc)### t where logid=22108 order by time_s
desc
```

Dataset Name	Description	Log Category
fgt-env-faults-temperature	FortiGate Temperatre Too High	event

```
select
  time_s,
  devid,
  msg_desc
from
  ###(select from_dtime(dtime) as time_s, devid, coalesce(nullifna(logdesc), msg) as msg_
desc, logid_to_int(logid) as logid from $log where $filter and logid_to_int(logid) in
(22105, 22107, 22108, 22109) order by time_s desc)### t where logid=22109 order by time_s
desc
```

Dataset Name	Description	Log Category
Behaviour-Banned-Application	Bullying Chat Search and Message Logging	app-ctrl

```
select
  filename,
  string_agg(
    distinct app,
    & #039; ') as app_agg, string_agg(distinct from_itime(itime)::text, ' ') as itime_agg,
string_agg(distinct user_src, ' ') as user_agg, string_agg(distinct `group`, ' ') as group_
agg, string_agg(distinct ipstr(`srcip`), ' ') as srcip_agg, count(*) as requests from ###
(select filename, app, itime, coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr
(`srcip`)) as user_src, `group`, `srcip` from $log where $filter and (lower(app) in
('facebook_post', 'facebook_chat', 'twitter_post', 'youtube_video.access', 'gmail_chat',
'gmail_send.message', 'linkedin_post', 'vimeo_video.access', 'google.search_search.phrase',
'bing.search_search.phrase')) order by itime desc)### t where ($bully_keywords) group by
filename order by requests desc
```

Dataset Name	Description	Log Category
Behaviour-Banned-User	Bullying Chat Search and Message Logging	app-ctrl

```
select
  filename,
  string_agg(
    distinct app,
    & #039; ') as app_agg, string_agg(distinct from_itime(itime)::text, ' ') as itime_agg,
string_agg(distinct user_src, ' ') as user_agg, string_agg(distinct `group`, ' ') as group_
agg, string_agg(distinct ipstr(`srcip`), ' ') as srcip_agg, count(*) as requests from ###
(select filename, app, itime, coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr
(`srcip`)) as user_src, `group`, `srcip` from $log where $filter and (lower(app) in
('facebook_post', 'facebook_chat', 'twitter_post', 'youtube_video.access', 'gmail_chat',
'gmail_send.message', 'linkedin_post', 'vimeo_video.access', 'google.search_search.phrase',
'bing.search_search.phrase')) order by itime desc)### t where ($bully_keywords) group by
filename order by requests desc
```

Dataset Name	Description	Log Category
Behaviour-Banned-User-Drilldown	Bullying Chat Search and Message Logging	app-ctrl

```
select
  filename,
  string_agg(
    distinct app,
    & #039; ') as app_agg, string_agg(distinct from_itime(itime)::text, ' ') as itime_agg,
string_agg(distinct user_src, ' ') as user_agg, string_agg(distinct `group`, ' ') as group_
agg, string_agg(distinct ipstr(`srcip`), ' ') as srcip_agg, count(*) as requests from ###
(select filename, app, itime, coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr
(`srcip`)) as user_src, `group`, `srcip` from $log where $filter and (lower(app) in
('facebook_post', 'facebook_chat', 'twitter_post', 'youtube_video.access', 'gmail_chat',
'gmail_send.message', 'linkedin_post', 'vimeo_video.access', 'google.search_search.phrase',
'bing.search_search.phrase')) order by itime desc)### t where ($bully_keywords) group by
filename order by requests desc
```

Dataset Name	Description	Log Category
behaviour-banned	Bullying Chat Search and Message Logging	app-ctrl

```
select
  filename,
  string_agg(
    distinct app,
    & #039; ') as app_agg, string_agg(distinct from_itime(itime)::text, ' ') as itime_agg,
string_agg(distinct user_src, ' ') as user_agg, string_agg(distinct `group`, ' ') as group_
agg, string_agg(distinct ipstr(`srcip`), ' ') as srcip_agg, count(*) as requests from ###
(select filename, app, itime, coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr
(`srcip`)) as user_src, `group`, `srcip` from $log where $filter and (lower(app) in
('facebook_post', 'facebook_chat', 'twitter_post', 'youtube_video.access', 'gmail_chat',
'gmail_send.message', 'linkedin_post', 'vimeo_video.access', 'google.search_search.phrase',
'bing.search_search.phrase')) order by itime desc)### t where ($bully_keywords) group by
filename order by requests desc
```

Dataset Name	Description	Log Category
Self-Harm-Behaviour-Banned-User-Pie	Self-Harm Chat Search and Message Logging	app-ctrl

```
select
  filename,
  string_agg(
    distinct app,
    & #039; ') as app_agg, string_agg(distinct from_itime(itime)::text, ' ') as itime_agg,
string_agg(distinct user_src, ' ') as user_agg, string_agg(distinct `group`, ' ') as group_
agg, string_agg(distinct ipstr(`srcip`), ' ') as srcip_agg, count(*) as requests from ###
(select filename, app, itime, coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr
(`srcip`)) as user_src, `group`, `srcip` from $log where $filter and (lower(app) in
('facebook_post', 'facebook_chat', 'twitter_post', 'youtube_video.access', 'gmail_chat',
'gmail_send.message', 'linkedin_post', 'vimeo_video.access', 'google.search_search.phrase',
'bing.search_search.phrase')) order by itime desc)### t where ($banned_keywords) group by
filename order by requests desc
```

Dataset Name	Description	Log Category
Self-Harm-Behaviour-Banned-Application-Pie	Self-Harm Chat Search and Message Logging	app-ctrl

```
select
  filename,
  string_agg(
    distinct app,
    & #039; ') as app_agg, string_agg(distinct from_itime(itime)::text, ' ') as itime_agg,
string_agg(distinct user_src, ' ') as user_agg, string_agg(distinct `group`, ' ') as group_
agg, string_agg(distinct ipstr(`srcip`), ' ') as srcip_agg, count(*) as requests from ###
(select filename, app, itime, coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr
(`srcip`)) as user_src, `group`, `srcip` from $log where $filter and (lower(app) in
('facebook_post', 'facebook_chat', 'twitter_post', 'youtube_video.access', 'gmail_chat',
'gmail_send.message', 'linkedin_post', 'vimeo_video.access', 'google.search_search.phrase',
'bing.search_search.phrase')) order by itime desc)### t where ($banned_keywords) group by
filename order by requests desc
```

Dataset Name	Description	Log Category
Self-Harm-Behaviour-Banned-User-Bar	Self-Harm Chat Search and Message Logging	app-ctrl

```
select
  filename,
  string_agg(
    distinct app,
    & #039; ') as app_agg, string_agg(distinct from_itime(itime)::text, ' ') as itime_agg,
string_agg(distinct user_src, ' ') as user_agg, string_agg(distinct `group`, ' ') as group_
agg, string_agg(distinct ipstr(`srcip`), ' ') as srcip_agg, count(*) as requests from ###
(select filename, app, itime, coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr
(`srcip`)) as user_src, `group`, `srcip` from $log where $filter and (lower(app) in
('facebook_post', 'facebook_chat', 'twitter_post', 'youtube_video.access', 'gmail_chat',
'gmail_send.message', 'linkedin_post', 'vimeo_video.access', 'google.search_search.phrase',
'bing.search_search.phrase')) order by itime desc)### t where ($banned_keywords) group by
filename order by requests desc
```

Dataset Name	Description	Log Category
Self-Harm-Behaviour-Banned-User-Drilldown	Self-Harm Chat Search and Message Logging	app-ctrl

```
select
  filename,
  string_agg(
    distinct app,
    & #039; ') as app_agg, string_agg(distinct from_itime(itime)::text, ' ') as itime_agg,
string_agg(distinct user_src, ' ') as user_agg, string_agg(distinct `group`, ' ') as group_
agg, string_agg(distinct ipstr(`srcip`), ' ') as srcip_agg, count(*) as requests from ###
(select filename, app, itime, coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr
(`srcip`)) as user_src, `group`, `srcip` from $log where $filter and (lower(app) in
('facebook_post', 'facebook_chat', 'twitter_post', 'youtube_video.access', 'gmail_chat',
'gmail_send.message', 'linkedin_post', 'vimeo_video.access', 'google.search_search.phrase',
'bing.search_search.phrase')) order by itime desc)### t where ($banned_keywords) group by
filename order by requests desc
```

Dataset Name	Description	Log Category
Self-Harm-behaviour-banned	Self-Harm Chat Search and Message Logging	app-ctrl

```
select
  filename,
  string_agg(
    distinct app,
    & #039; ') as app_agg, string_agg(distinct from_itime(itime)::text, ' ') as itime_agg,
string_agg(distinct user_src, ' ') as user_agg, string_agg(distinct `group`, ' ') as group_
agg, string_agg(distinct ipstr(`srcip`), ' ') as srcip_agg, count(*) as requests from ###
(select filename, app, itime, coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr
(`srcip`)) as user_src, `group`, `srcip` from $log where $filter and (lower(app) in
('facebook_post', 'facebook_chat', 'twitter_post', 'youtube_video.access', 'gmail_chat',
'gmail_send.message', 'linkedin_post', 'vimeo_video.access', 'google.search_search.phrase',
'bing.search_search.phrase')) order by itime desc)### t where ($banned_keywords) group by
filename order by requests desc
```

Dataset Name	Description	Log Category
Browsing-Time-per-Social-Media	Browsing Time vs. Domain	traffic

```
select
  domain,
  ebtr_value(
    ebtr_agg_flat(browsetime),
    null,
    $timespan
  ) as browsetime
from
  ###(select domain, f_user, srcip, ebtr_agg_flat(browsetime) as browsetime, sum(bandwidth)
as bandwidth from (select app_group_name(app) as app_group, coalesce(nullifna(`user`),
nullifna(`unauthuser`), ipstr(`srcip`)) as f_user, srcip, coalesce(nullifna(root_domain
(hostname)), ipstr(dstip), NULL) as domain, ebtr_agg_flat($browse_time) as browsetime, sum
(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0)) as bandwidth from $log where $filter and
(logflag&1>0) group by app_group, f_user, hostname, domain, srcip, dstip) t1 inner join app_
mdata t2 on lower(t1.app_group)=lower(t2.name) where app_cat='Social.Media' group by domain,
f_user, srcip order by browsetime, bandwidth desc)### t where browsetime is not null group
by domain order by browsetime desc
```

Dataset Name	Description	Log Category
Social-Networking-Bar-Graph	Social Networking Browsing Time	traffic

```
select
  f_user,
  sum(bandwidth) as bandwidth
from
  ###(select domain, f_user, srcip, ebtr_agg_flat(browsetime) as browsetime, sum(bandwidth)
as bandwidth from (select app_group_name(app) as app_group, coalesce(nullifna(`user`),
nullifna(`unauthuser`), ipstr(`srcip`)) as f_user, srcip, coalesce(nullifna(root_domain
(hostname)), ipstr(dstip), NULL) as domain, ebtr_agg_flat($browse_time) as browsetime, sum
(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0)) as bandwidth from $log where $filter and
(logflag&1>0) group by app_group, f_user, hostname, domain, srcip, dstip) t1 inner join app_
mdata t2 on lower(t1.app_group)=lower(t2.name) where app_cat='Social.Media' group by domain,
f_user, srcip order by browsetime, bandwidth desc)### t where bandwidth>0 group by f_user
order by bandwidth desc
```

Dataset Name	Description	Log Category
Top-Social-Networking-Durations-Sources-Drilldown	Top Social Networking Durations from Sources Drilldown	traffic

```
select
  f_user,
  ebtr_value(
    ebtr_agg_flat(browsetime),
    null,
    $timespan
  ) as browsetime
from
  ###(select domain, f_user, srcip, ebtr_agg_flat(browsetime) as browsetime, sum(bandwidth)
as bandwidth from (select app_group_name(app) as app_group, coalesce(nullifna(`user`),
nullifna(`unauthuser`), ipstr(`srcip`)) as f_user, srcip, coalesce(nullifna(root_domain
(hostname)), ipstr(dstip), NULL) as domain, ebtr_agg_flat($browse_time) as browsetime, sum
(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0)) as bandwidth from $log where $filter and
(logflag&1>0) group by app_group, f_user, hostname, domain, srcip, dstip) t1 inner join app_
mdata t2 on lower(t1.app_group)=lower(t2.name) where app_cat='Social.Media' group by domain,
f_user, srcip order by browsetime, bandwidth desc)### t where $filter-drilldown and
browsetime is not null group by f_user order by browsetime desc
```

Dataset Name	Description	Log Category
Top-Social-Networking-Durations-Domains-Drilldown	Browsing Time vs. Domain	traffic

```
select
  domain,
  ebtr_value(
    ebtr_agg_flat(browsetime),
    null,
    $timespan
  ) as browsetime
from
  ###(select domain, f_user, srcip, ebtr_agg_flat(browsetime) as browsetime, sum(bandwidth)
as bandwidth from (select app_group_name(app) as app_group, coalesce(nullifna(`user`),
nullifna(`unauthuser`), ipstr(`srcip`)) as f_user, srcip, coalesce(nullifna(root_domain
(hostname)), ipstr(dstip), NULL) as domain, ebtr_agg_flat($browse_time) as browsetime, sum
(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0)) as bandwidth from $log where $filter and
(logflag&1>0) group by app_group, f_user, hostname, domain, srcip, dstip) t1 inner join app_
mdata t2 on lower(t1.app_group)=lower(t2.name) where app_cat='Social.Media' group by domain,
f_user, srcip order by browsetime, bandwidth desc)### t where browsetime is not null group
by domain order by browsetime desc
```

Dataset Name	Description	Log Category
Facebook-Posts	Facebook Posts	app-ctrl

```
select
  i_time,
  f_user,
  srcip,
  filename
from
  ###(select from_itime(itime) as i_time, coalesce(nullifna(`user`), nullifna(`unauthuser`),
ipstr(`srcip`)) as f_user, srcip, filename, app from $log where $filter and filename is not
null order by i_time desc)### t where lower(app)=lower('Facebook_Post') order by i_time desc
```

Dataset Name	Description	Log Category
Facebook-Chats	Facebook Chats	app-ctrl

```
select
  filename,
  string_agg(
    distinct from_itime(itime): :text,
    & #039; ') as itime_agg, string_agg(distinct user_src, ' ') as user_agg, string_agg
(distinct `group`, ' ') as group_agg, string_agg(distinct ipstr(srcip), ' ') as srcip_agg,
count(*) as requests from ###(select filename, itime, coalesce(nullifna(`user`), nullifna
(`unauthuser`), ipstr(`srcip`)) as user_src, `group`, srcip, app from $log where $filter and
filename is not null order by itime desc)### t where lower(app)=lower('Facebook_Chat') group
by filename order by requests desc
```

Dataset Name	Description	Log Category
Twitter-Posts	Twitter Posts	app-ctrl

```
select
  i_time,
  f_user,
  srcip,
  filename
from
  ###(select from_itime(itime) as i_time, coalesce(nullifna(`user`), nullifna(`unauthuser`),
ipstr(`srcip`)) as f_user, srcip, filename, app from $log where $filter and filename is not
null order by i_time desc)### t where lower(app)=lower('Twitter_Post') order by i_time desc
```

Dataset Name	Description	Log Category
LinkedIn-Posts-and-Comments	LinkedIn Posts and Comments	app-ctrl

```
select
  filename,
  string_agg(
    distinct from_itime(itime): :text,
    & #039; ') as itime_agg, string_agg(distinct user_src, ' ') as user_agg, string_agg
(distinct `group`, ' ') as group_agg, string_agg(distinct ipstr(srcip), ' ') as srcip_agg,
count(*) as requests from ###(select filename, itime, coalesce(nullifna(`user`), nullifna
(`unauthuser`), ipstr(`srcip`)) as user_src, `group`, srcip, app from $log where $filter and
filename is not null order by itime desc)### t where lower(app)=lower('LinkedIn_Post') group
by filename order by requests desc
```

Dataset Name	Description	Log Category
sdwan-fw-Device-Interface-Quality_Bibandwidth-drilldown	SD-WAN Device-Interface Statistic	event

```
select
  devid,
  sum(bibandwidth)/ sum(count) as bibandwidth
from
  ###(select $flex_timestamp as timestamp, csf, devname, devid, vd, interface, healthcheck
as sla_rule, sum(link_status) as link_status, sum(failed_latency) as failed_latency, sum
(failed_jitter) as failed_jitter,  sum(failed_packetloss) as failed_packetloss, sum(latency)
as latency, max(latency) as latency_max, min(latency) as latency_min, sum(jitter) as jitter,
max(jitter) as jitter_max, min(jitter) as jitter_min, sum(packetloss) as packetloss, max
(packetloss) as packetloss_max, min(packetloss) as packetloss_min, sum(inbandwidth) as
inbandwidth, sum(outbandwidth) as outbandwidth, sum(bibandwidth) as bibandwidth, count(*) as
count, sum(CASE WHEN link_status=1 THEN 1 ELSE 0 END) AS count_linkup, min(sdwan_status) as
sdwan_status from (select itime, csf, devname, devid, vd, interface, healthcheck, link_
status, (CASE WHEN link_status=1 THEN latency ELSE 0 END) AS latency, (CASE WHEN link_
status=1 THEN jitter ELSE 0 END) AS jitter, (CASE WHEN link_status=1 THEN packetloss ELSE
100 END) AS packetloss, (CASE WHEN sla_failed=1 AND metric='packetloss' THEN 1 ELSE 0 END)
AS failed_packetloss, (CASE WHEN sla_failed=1 AND metric='jitter' THEN 1 ELSE 0 END) AS
failed_jitter, (CASE WHEN sla_failed=1 AND metric='latency' THEN 1 ELSE 0 END) AS failed_
latency, (CASE WHEN sla_failed=1 THEN 3 ELSE sdwan_status END) AS sdwan_status,  (CASE WHEN
link_status=1 THEN inbandwidth ELSE 0 END) AS inbandwidth,  (CASE WHEN link_status=1 THEN
outbandwidth ELSE 0 END) AS outbandwidth,  (CASE WHEN link_status=1 THEN bibandwidth ELSE 0
END) AS bibandwidth from (select itime, csf, devname, devid, vd, interface, healthcheck,
(CASE WHEN status='down' THEN 0 ELSE 1 END) AS link_status, latency::float as latency,
jitter::float as jitter, trim(trailing '%' from packetloss)::float as packetloss, (CASE WHEN
status='down' THEN 1 WHEN msg LIKE '%SLA failed%' THEN 1 ELSE 0 END) AS sla_failed, metric,
(CASE WHEN msg LIKE '%SLA status%' THEN 1 ELSE 0 END) AS sdwan_status, convert_unit_to_num
(inbandwidthused) as inbandwidth, convert_unit_to_num(outbandwidthused) as outbandwidth,
convert_unit_to_num(bibandwidthused) as bibandwidth from $log where $filter and logid_to_int
(logid) in (22925, 22933, 22936) and interface is not null) t ) t group by timestamp, csf,
devname, devid, vd, interface, healthcheck /*SkipSTART*/order by timestamp
desc/*SkipEND*/)### t where $filter-drilldown and bibandwidth is not null group by devid
having sum(count)>0 order by bibandwidth desc
```

Dataset Name	Description	Log Category
sdwan-Device-Interface-Latency-Line	SD-WAN Device-Interface Latency Timeline	event

```
select
  $flex_timescale(timestamp) as hodex,
  t1.interface,
  min(latency) as latency
from
  (
    select
      timestamp,
      devid,
      interface,
      sum(latency)/ sum(count) as latency
    from
      ###(select $flex_timestamp as timestamp, csf, devname, devid, vd, interface,
healthcheck as sla_rule, sum(link_status) as link_status, sum(failed_latency) as failed_
latency, sum(failed_jitter) as failed_jitter,  sum(failed_packetloss) as failed_packetloss,
sum(latency) as latency, max(latency) as latency_max, min(latency) as latency_min, sum
(jitter) as jitter, max(jitter) as jitter_max, min(jitter) as jitter_min, sum(packetloss) as
packetloss, max(packetloss) as packetloss_max, min(packetloss) as packetloss_min, sum
(inbandwidth) as inbandwidth, sum(outbandwidth) as outbandwidth, sum(bibandwidth) as
bibandwidth, count(*) as count, sum(CASE WHEN link_status=1 THEN 1 ELSE 0 END) AS count_
linkup, min(sdwan_status) as sdwan_status from (select itime, csf, devname, devid, vd,
interface, healthcheck, link_status, (CASE WHEN link_status=1 THEN latency ELSE 0 END) AS
latency, (CASE WHEN link_status=1 THEN jitter ELSE 0 END) AS jitter, (CASE WHEN link_
status=1 THEN packetloss ELSE 100 END) AS packetloss, (CASE WHEN sla_failed=1 AND
metric='packetloss' THEN 1 ELSE 0 END) AS failed_packetloss, (CASE WHEN sla_failed=1 AND
metric='jitter' THEN 1 ELSE 0 END) AS failed_jitter, (CASE WHEN sla_failed=1 AND
metric='latency' THEN 1 ELSE 0 END) AS failed_latency, (CASE WHEN sla_failed=1 THEN 3 ELSE
sdwan_status END) AS sdwan_status,  (CASE WHEN link_status=1 THEN inbandwidth ELSE 0 END) AS
inbandwidth,  (CASE WHEN link_status=1 THEN outbandwidth ELSE 0 END) AS outbandwidth,  (CASE
WHEN link_status=1 THEN bibandwidth ELSE 0 END) AS bibandwidth from (select itime, csf,
devname, devid, vd, interface, healthcheck, (CASE WHEN status='down' THEN 0 ELSE 1 END) AS
link_status, latency::float as latency, jitter::float as jitter, trim(trailing '%' from
packetloss)::float as packetloss, (CASE WHEN status='down' THEN 1 WHEN msg LIKE '%SLA
failed%' THEN 1 ELSE 0 END) AS sla_failed, metric, (CASE WHEN msg LIKE '%SLA status%' THEN 1
ELSE 0 END) AS sdwan_status, convert_unit_to_num(inbandwidthused) as inbandwidth, convert_
unit_to_num(outbandwidthused) as outbandwidth, convert_unit_to_num(bibandwidthused) as
bibandwidth from $log where $filter and logid_to_int(logid) in (22925, 22933, 22936) and
interface is not null) t ) t group by timestamp, csf, devname, devid, vd, interface,
healthcheck /*SkipSTART*/order by timestamp desc/*SkipEND*/)### t group by timestamp, devid,
interface having sum(count)>0) t1 inner join (select interface, count(*) as num_intf from
###(select $flex_timestamp as timestamp, csf, devname, devid, vd, interface, healthcheck as
sla_rule, sum(link_status) as link_status, sum(failed_latency) as failed_latency, sum
(failed_jitter) as failed_jitter,  sum(failed_packetloss) as failed_packetloss, sum(latency)
as latency, max(latency) as latency_max, min(latency) as latency_min, sum(jitter) as jitter,
max(jitter) as jitter_max, min(jitter) as jitter_min, sum(packetloss) as packetloss, max
(packetloss) as packetloss_max, min(packetloss) as packetloss_min, sum(inbandwidth) as
inbandwidth, sum(outbandwidth) as outbandwidth, sum(bibandwidth) as bibandwidth, count(*) as
count, sum(CASE WHEN link_status=1 THEN 1 ELSE 0 END) AS count_linkup, min(sdwan_status) as
sdwan_status from (select itime, csf, devname, devid, vd, interface, healthcheck, link_
status, (CASE WHEN link_status=1 THEN latency ELSE 0 END) AS latency, (CASE WHEN link_
status=1 THEN jitter ELSE 0 END) AS jitter, (CASE WHEN link_status=1 THEN packetloss ELSE
100 END) AS packetloss, (CASE WHEN sla_failed=1 AND metric='packetloss' THEN 1 ELSE 0 END)
AS failed_packetloss, (CASE WHEN sla_failed=1 AND metric='jitter' THEN 1 ELSE 0 END) AS
failed_jitter, (CASE WHEN sla_failed=1 AND metric='latency' THEN 1 ELSE 0 END) AS failed_
latency, (CASE WHEN sla_failed=1 THEN 3 ELSE sdwan_status END) AS sdwan_status,  (CASE WHEN
link_status=1 THEN inbandwidth ELSE 0 END) AS inbandwidth,  (CASE WHEN link_status=1 THEN
outbandwidth ELSE 0 END) AS outbandwidth,  (CASE WHEN link_status=1 THEN bibandwidth ELSE 0
END) AS bibandwidth from (select itime, csf, devname, devid, vd, interface, healthcheck,
(CASE WHEN status='down' THEN 0 ELSE 1 END) AS link_status, latency::float as latency,
jitter::float as jitter, trim(trailing '%' from packetloss)::float as packetloss, (CASE WHEN
status='down' THEN 1 WHEN msg LIKE '%SLA failed%' THEN 1 ELSE 0 END) AS sla_failed, metric,
(CASE WHEN msg LIKE '%SLA status%' THEN 1 ELSE 0 END) AS sdwan_status, convert_unit_to_num
(inbandwidthused) as inbandwidth, convert_unit_to_num(outbandwidthused) as outbandwidth,
convert_unit_to_num(bibandwidthused) as bibandwidth from $log where $filter and logid_to_int
(logid) in (22925, 22933, 22936) and interface is not null) t ) t group by timestamp, csf,
devname, devid, vd, interface, healthcheck /*SkipSTART*/order by timestamp
desc/*SkipEND*/)### t where $filter-drilldown and interface is not null group by interface
order by num_intf desc limit 10)t2 on t1.interface=t2.interface group by hodex, t1.interface
order by hodex
```

Dataset Name	Description	Log Category
sdwan-Device-Interface-Jitter-Line	SD-WAN Device-Interface Jitter Timeline	event

```
select
  $flex_timescale(timestamp) as hodex,
  t1.interface,
  min(jitter) as jitter
from
  (
    select
      timestamp,
      devid,
      interface,
      sum(jitter)/ sum(count) as jitter
    from
      ###(select $flex_timestamp as timestamp, csf, devname, devid, vd, interface,
healthcheck as sla_rule, sum(link_status) as link_status, sum(failed_latency) as failed_
latency, sum(failed_jitter) as failed_jitter,  sum(failed_packetloss) as failed_packetloss,
sum(latency) as latency, max(latency) as latency_max, min(latency) as latency_min, sum
(jitter) as jitter, max(jitter) as jitter_max, min(jitter) as jitter_min, sum(packetloss) as
packetloss, max(packetloss) as packetloss_max, min(packetloss) as packetloss_min, sum
(inbandwidth) as inbandwidth, sum(outbandwidth) as outbandwidth, sum(bibandwidth) as
bibandwidth, count(*) as count, sum(CASE WHEN link_status=1 THEN 1 ELSE 0 END) AS count_
linkup, min(sdwan_status) as sdwan_status from (select itime, csf, devname, devid, vd,
interface, healthcheck, link_status, (CASE WHEN link_status=1 THEN latency ELSE 0 END) AS
latency, (CASE WHEN link_status=1 THEN jitter ELSE 0 END) AS jitter, (CASE WHEN link_
status=1 THEN packetloss ELSE 100 END) AS packetloss, (CASE WHEN sla_failed=1 AND
metric='packetloss' THEN 1 ELSE 0 END) AS failed_packetloss, (CASE WHEN sla_failed=1 AND
metric='jitter' THEN 1 ELSE 0 END) AS failed_jitter, (CASE WHEN sla_failed=1 AND
metric='latency' THEN 1 ELSE 0 END) AS failed_latency, (CASE WHEN sla_failed=1 THEN 3 ELSE
sdwan_status END) AS sdwan_status,  (CASE WHEN link_status=1 THEN inbandwidth ELSE 0 END) AS
inbandwidth,  (CASE WHEN link_status=1 THEN outbandwidth ELSE 0 END) AS outbandwidth,  (CASE
WHEN link_status=1 THEN bibandwidth ELSE 0 END) AS bibandwidth from (select itime, csf,
devname, devid, vd, interface, healthcheck, (CASE WHEN status='down' THEN 0 ELSE 1 END) AS
link_status, latency::float as latency, jitter::float as jitter, trim(trailing '%' from
packetloss)::float as packetloss, (CASE WHEN status='down' THEN 1 WHEN msg LIKE '%SLA
failed%' THEN 1 ELSE 0 END) AS sla_failed, metric, (CASE WHEN msg LIKE '%SLA status%' THEN 1
ELSE 0 END) AS sdwan_status, convert_unit_to_num(inbandwidthused) as inbandwidth, convert_
unit_to_num(outbandwidthused) as outbandwidth, convert_unit_to_num(bibandwidthused) as
bibandwidth from $log where $filter and logid_to_int(logid) in (22925, 22933, 22936) and
interface is not null) t ) t group by timestamp, csf, devname, devid, vd, interface,
healthcheck /*SkipSTART*/order by timestamp desc/*SkipEND*/)### t group by timestamp, devid,
interface having sum(count)>0) t1 inner join (select interface, count(*) as num_intf from
###(select $flex_timestamp as timestamp, csf, devname, devid, vd, interface, healthcheck as
sla_rule, sum(link_status) as link_status, sum(failed_latency) as failed_latency, sum
(failed_jitter) as failed_jitter,  sum(failed_packetloss) as failed_packetloss, sum(latency)
as latency, max(latency) as latency_max, min(latency) as latency_min, sum(jitter) as jitter,
max(jitter) as jitter_max, min(jitter) as jitter_min, sum(packetloss) as packetloss, max
(packetloss) as packetloss_max, min(packetloss) as packetloss_min, sum(inbandwidth) as
inbandwidth, sum(outbandwidth) as outbandwidth, sum(bibandwidth) as bibandwidth, count(*) as
count, sum(CASE WHEN link_status=1 THEN 1 ELSE 0 END) AS count_linkup, min(sdwan_status) as
sdwan_status from (select itime, csf, devname, devid, vd, interface, healthcheck, link_
status, (CASE WHEN link_status=1 THEN latency ELSE 0 END) AS latency, (CASE WHEN link_
status=1 THEN jitter ELSE 0 END) AS jitter, (CASE WHEN link_status=1 THEN packetloss ELSE
100 END) AS packetloss, (CASE WHEN sla_failed=1 AND metric='packetloss' THEN 1 ELSE 0 END)
AS failed_packetloss, (CASE WHEN sla_failed=1 AND metric='jitter' THEN 1 ELSE 0 END) AS
failed_jitter, (CASE WHEN sla_failed=1 AND metric='latency' THEN 1 ELSE 0 END) AS failed_
latency, (CASE WHEN sla_failed=1 THEN 3 ELSE sdwan_status END) AS sdwan_status,  (CASE WHEN
link_status=1 THEN inbandwidth ELSE 0 END) AS inbandwidth,  (CASE WHEN link_status=1 THEN
outbandwidth ELSE 0 END) AS outbandwidth,  (CASE WHEN link_status=1 THEN bibandwidth ELSE 0
END) AS bibandwidth from (select itime, csf, devname, devid, vd, interface, healthcheck,
(CASE WHEN status='down' THEN 0 ELSE 1 END) AS link_status, latency::float as latency,
jitter::float as jitter, trim(trailing '%' from packetloss)::float as packetloss, (CASE WHEN
status='down' THEN 1 WHEN msg LIKE '%SLA failed%' THEN 1 ELSE 0 END) AS sla_failed, metric,
(CASE WHEN msg LIKE '%SLA status%' THEN 1 ELSE 0 END) AS sdwan_status, convert_unit_to_num
(inbandwidthused) as inbandwidth, convert_unit_to_num(outbandwidthused) as outbandwidth,
convert_unit_to_num(bibandwidthused) as bibandwidth from $log where $filter and logid_to_int
(logid) in (22925, 22933, 22936) and interface is not null) t ) t group by timestamp, csf,
devname, devid, vd, interface, healthcheck /*SkipSTART*/order by timestamp
desc/*SkipEND*/)### t where $filter-drilldown and interface is not null group by interface
order by num_intf desc limit 10)t2 on t1.interface=t2.interface group by hodex, t1.interface
order by hodex
```

Dataset Name	Description	Log Category
sdwan-Device-Interface-Packetloss-Line	SD-WAN Device-Interface Packetloss Timeline	event

```
select
  $flex_timescale(timestamp) as hodex,
  t1.interface,
  min(packetloss) as packetloss
from
  (
    select
      timestamp,
      devid,
      interface,
      sum(packetloss)/ sum(count) as packetloss
    from
      ###(select $flex_timestamp as timestamp, csf, devname, devid, vd, interface,
healthcheck as sla_rule, sum(link_status) as link_status, sum(failed_latency) as failed_
latency, sum(failed_jitter) as failed_jitter,  sum(failed_packetloss) as failed_packetloss,
sum(latency) as latency, max(latency) as latency_max, min(latency) as latency_min, sum
(jitter) as jitter, max(jitter) as jitter_max, min(jitter) as jitter_min, sum(packetloss) as
packetloss, max(packetloss) as packetloss_max, min(packetloss) as packetloss_min, sum
(inbandwidth) as inbandwidth, sum(outbandwidth) as outbandwidth, sum(bibandwidth) as
bibandwidth, count(*) as count, sum(CASE WHEN link_status=1 THEN 1 ELSE 0 END) AS count_
linkup, min(sdwan_status) as sdwan_status from (select itime, csf, devname, devid, vd,
interface, healthcheck, link_status, (CASE WHEN link_status=1 THEN latency ELSE 0 END) AS
latency, (CASE WHEN link_status=1 THEN jitter ELSE 0 END) AS jitter, (CASE WHEN link_
status=1 THEN packetloss ELSE 100 END) AS packetloss, (CASE WHEN sla_failed=1 AND
metric='packetloss' THEN 1 ELSE 0 END) AS failed_packetloss, (CASE WHEN sla_failed=1 AND
metric='jitter' THEN 1 ELSE 0 END) AS failed_jitter, (CASE WHEN sla_failed=1 AND
metric='latency' THEN 1 ELSE 0 END) AS failed_latency, (CASE WHEN sla_failed=1 THEN 3 ELSE
sdwan_status END) AS sdwan_status,  (CASE WHEN link_status=1 THEN inbandwidth ELSE 0 END) AS
inbandwidth,  (CASE WHEN link_status=1 THEN outbandwidth ELSE 0 END) AS outbandwidth,  (CASE
WHEN link_status=1 THEN bibandwidth ELSE 0 END) AS bibandwidth from (select itime, csf,
devname, devid, vd, interface, healthcheck, (CASE WHEN status='down' THEN 0 ELSE 1 END) AS
link_status, latency::float as latency, jitter::float as jitter, trim(trailing '%' from
packetloss)::float as packetloss, (CASE WHEN status='down' THEN 1 WHEN msg LIKE '%SLA
failed%' THEN 1 ELSE 0 END) AS sla_failed, metric, (CASE WHEN msg LIKE '%SLA status%' THEN 1
ELSE 0 END) AS sdwan_status, convert_unit_to_num(inbandwidthused) as inbandwidth, convert_
unit_to_num(outbandwidthused) as outbandwidth, convert_unit_to_num(bibandwidthused) as
bibandwidth from $log where $filter and logid_to_int(logid) in (22925, 22933, 22936) and
interface is not null) t ) t group by timestamp, csf, devname, devid, vd, interface,
healthcheck /*SkipSTART*/order by timestamp desc/*SkipEND*/)### t group by timestamp, devid,
interface having sum(count)>0) t1 inner join (select interface, count(*) as num_intf from
###(select $flex_timestamp as timestamp, csf, devname, devid, vd, interface, healthcheck as
sla_rule, sum(link_status) as link_status, sum(failed_latency) as failed_latency, sum
(failed_jitter) as failed_jitter,  sum(failed_packetloss) as failed_packetloss, sum(latency)
as latency, max(latency) as latency_max, min(latency) as latency_min, sum(jitter) as jitter,
max(jitter) as jitter_max, min(jitter) as jitter_min, sum(packetloss) as packetloss, max
(packetloss) as packetloss_max, min(packetloss) as packetloss_min, sum(inbandwidth) as
inbandwidth, sum(outbandwidth) as outbandwidth, sum(bibandwidth) as bibandwidth, count(*) as
count, sum(CASE WHEN link_status=1 THEN 1 ELSE 0 END) AS count_linkup, min(sdwan_status) as
sdwan_status from (select itime, csf, devname, devid, vd, interface, healthcheck, link_
status, (CASE WHEN link_status=1 THEN latency ELSE 0 END) AS latency, (CASE WHEN link_
status=1 THEN jitter ELSE 0 END) AS jitter, (CASE WHEN link_status=1 THEN packetloss ELSE
100 END) AS packetloss, (CASE WHEN sla_failed=1 AND metric='packetloss' THEN 1 ELSE 0 END)
AS failed_packetloss, (CASE WHEN sla_failed=1 AND metric='jitter' THEN 1 ELSE 0 END) AS
failed_jitter, (CASE WHEN sla_failed=1 AND metric='latency' THEN 1 ELSE 0 END) AS failed_
latency, (CASE WHEN sla_failed=1 THEN 3 ELSE sdwan_status END) AS sdwan_status,  (CASE WHEN
link_status=1 THEN inbandwidth ELSE 0 END) AS inbandwidth,  (CASE WHEN link_status=1 THEN
outbandwidth ELSE 0 END) AS outbandwidth,  (CASE WHEN link_status=1 THEN bibandwidth ELSE 0
END) AS bibandwidth from (select itime, csf, devname, devid, vd, interface, healthcheck,
(CASE WHEN status='down' THEN 0 ELSE 1 END) AS link_status, latency::float as latency,
jitter::float as jitter, trim(trailing '%' from packetloss)::float as packetloss, (CASE WHEN
status='down' THEN 1 WHEN msg LIKE '%SLA failed%' THEN 1 ELSE 0 END) AS sla_failed, metric,
(CASE WHEN msg LIKE '%SLA status%' THEN 1 ELSE 0 END) AS sdwan_status, convert_unit_to_num
(inbandwidthused) as inbandwidth, convert_unit_to_num(outbandwidthused) as outbandwidth,
convert_unit_to_num(bibandwidthused) as bibandwidth from $log where $filter and logid_to_int
(logid) in (22925, 22933, 22936) and interface is not null) t ) t group by timestamp, csf,
devname, devid, vd, interface, healthcheck /*SkipSTART*/order by timestamp
desc/*SkipEND*/)### t where $filter-drilldown and interface is not null group by interface
order by num_intf desc limit 10)t2 on t1.interface=t2.interface group by hodex, t1.interface
order by hodex
```

Dataset Name	Description	Log Category
sdwan-Device-Latency-Line	SD-WAN Device Latency Timeline	event

```
select
  $flex_timescale(timestamp) as hodex,
  devid,
  min(latency) as latency
from
  (
    select
      timestamp,
      devid,
      interface,
      sum(latency)/ sum(count) as latency
    from
      ###(select $flex_timestamp as timestamp, csf, devname, devid, vd, interface,
healthcheck as sla_rule, sum(link_status) as link_status, sum(failed_latency) as failed_
latency, sum(failed_jitter) as failed_jitter,  sum(failed_packetloss) as failed_packetloss,
sum(latency) as latency, max(latency) as latency_max, min(latency) as latency_min, sum
(jitter) as jitter, max(jitter) as jitter_max, min(jitter) as jitter_min, sum(packetloss) as
packetloss, max(packetloss) as packetloss_max, min(packetloss) as packetloss_min, sum
(inbandwidth) as inbandwidth, sum(outbandwidth) as outbandwidth, sum(bibandwidth) as
bibandwidth, count(*) as count, sum(CASE WHEN link_status=1 THEN 1 ELSE 0 END) AS count_
linkup, min(sdwan_status) as sdwan_status from (select itime, csf, devname, devid, vd,
interface, healthcheck, link_status, (CASE WHEN link_status=1 THEN latency ELSE 0 END) AS
latency, (CASE WHEN link_status=1 THEN jitter ELSE 0 END) AS jitter, (CASE WHEN link_
status=1 THEN packetloss ELSE 100 END) AS packetloss, (CASE WHEN sla_failed=1 AND
metric='packetloss' THEN 1 ELSE 0 END) AS failed_packetloss, (CASE WHEN sla_failed=1 AND
metric='jitter' THEN 1 ELSE 0 END) AS failed_jitter, (CASE WHEN sla_failed=1 AND
metric='latency' THEN 1 ELSE 0 END) AS failed_latency, (CASE WHEN sla_failed=1 THEN 3 ELSE
sdwan_status END) AS sdwan_status,  (CASE WHEN link_status=1 THEN inbandwidth ELSE 0 END) AS
inbandwidth,  (CASE WHEN link_status=1 THEN outbandwidth ELSE 0 END) AS outbandwidth,  (CASE
WHEN link_status=1 THEN bibandwidth ELSE 0 END) AS bibandwidth from (select itime, csf,
devname, devid, vd, interface, healthcheck, (CASE WHEN status='down' THEN 0 ELSE 1 END) AS
link_status, latency::float as latency, jitter::float as jitter, trim(trailing '%' from
packetloss)::float as packetloss, (CASE WHEN status='down' THEN 1 WHEN msg LIKE '%SLA
failed%' THEN 1 ELSE 0 END) AS sla_failed, metric, (CASE WHEN msg LIKE '%SLA status%' THEN 1
ELSE 0 END) AS sdwan_status, convert_unit_to_num(inbandwidthused) as inbandwidth, convert_
unit_to_num(outbandwidthused) as outbandwidth, convert_unit_to_num(bibandwidthused) as
bibandwidth from $log where $filter and logid_to_int(logid) in (22925, 22933, 22936) and
interface is not null) t ) t group by timestamp, csf, devname, devid, vd, interface,
healthcheck /*SkipSTART*/order by timestamp desc/*SkipEND*/)### t where $filter-drilldown
and latency is not null group by timestamp, devid, interface having sum(count)>0) t1 group
by hodex, devid order by hodex
```

Dataset Name	Description	Log Category
sdwan-Device-Jitter-Line	SD-WAN Device Jitter Timeline	event

```
select
  $flex_timescale(timestamp) as hodex,
  devid,
  min(jitter) as jitter
from
  (
    select
      timestamp,
      devid,
      interface,
      sum(jitter)/ sum(count) as jitter
    from
      ###(select $flex_timestamp as timestamp, csf, devname, devid, vd, interface,
healthcheck as sla_rule, sum(link_status) as link_status, sum(failed_latency) as failed_
latency, sum(failed_jitter) as failed_jitter,  sum(failed_packetloss) as failed_packetloss,
sum(latency) as latency, max(latency) as latency_max, min(latency) as latency_min, sum
(jitter) as jitter, max(jitter) as jitter_max, min(jitter) as jitter_min, sum(packetloss) as
packetloss, max(packetloss) as packetloss_max, min(packetloss) as packetloss_min, sum
(inbandwidth) as inbandwidth, sum(outbandwidth) as outbandwidth, sum(bibandwidth) as
bibandwidth, count(*) as count, sum(CASE WHEN link_status=1 THEN 1 ELSE 0 END) AS count_
linkup, min(sdwan_status) as sdwan_status from (select itime, csf, devname, devid, vd,
interface, healthcheck, link_status, (CASE WHEN link_status=1 THEN latency ELSE 0 END) AS
latency, (CASE WHEN link_status=1 THEN jitter ELSE 0 END) AS jitter, (CASE WHEN link_
status=1 THEN packetloss ELSE 100 END) AS packetloss, (CASE WHEN sla_failed=1 AND
metric='packetloss' THEN 1 ELSE 0 END) AS failed_packetloss, (CASE WHEN sla_failed=1 AND
metric='jitter' THEN 1 ELSE 0 END) AS failed_jitter, (CASE WHEN sla_failed=1 AND
metric='latency' THEN 1 ELSE 0 END) AS failed_latency, (CASE WHEN sla_failed=1 THEN 3 ELSE
sdwan_status END) AS sdwan_status,  (CASE WHEN link_status=1 THEN inbandwidth ELSE 0 END) AS
inbandwidth,  (CASE WHEN link_status=1 THEN outbandwidth ELSE 0 END) AS outbandwidth,  (CASE
WHEN link_status=1 THEN bibandwidth ELSE 0 END) AS bibandwidth from (select itime, csf,
devname, devid, vd, interface, healthcheck, (CASE WHEN status='down' THEN 0 ELSE 1 END) AS
link_status, latency::float as latency, jitter::float as jitter, trim(trailing '%' from
packetloss)::float as packetloss, (CASE WHEN status='down' THEN 1 WHEN msg LIKE '%SLA
failed%' THEN 1 ELSE 0 END) AS sla_failed, metric, (CASE WHEN msg LIKE '%SLA status%' THEN 1
ELSE 0 END) AS sdwan_status, convert_unit_to_num(inbandwidthused) as inbandwidth, convert_
unit_to_num(outbandwidthused) as outbandwidth, convert_unit_to_num(bibandwidthused) as
bibandwidth from $log where $filter and logid_to_int(logid) in (22925, 22933, 22936) and
interface is not null) t ) t group by timestamp, csf, devname, devid, vd, interface,
healthcheck /*SkipSTART*/order by timestamp desc/*SkipEND*/)### t where $filter-drilldown
and jitter is not null group by timestamp, devid, interface having sum(count)>0) t1 group by
hodex, devid order by hodex
```

Dataset Name	Description	Log Category
sdwan-Device-Packetloss-Line	SD-WAN Device Packet Loss Timeline	event

```
select
  $flex_timescale(timestamp) as hodex,
  devid,
  min(packetloss) as packetloss
from
  (
    select
      timestamp,
      devid,
      interface,
      sum(packetloss)/ sum(count) as packetloss
    from
      ###(select $flex_timestamp as timestamp, csf, devname, devid, vd, interface,
healthcheck as sla_rule, sum(link_status) as link_status, sum(failed_latency) as failed_
latency, sum(failed_jitter) as failed_jitter,  sum(failed_packetloss) as failed_packetloss,
sum(latency) as latency, max(latency) as latency_max, min(latency) as latency_min, sum
(jitter) as jitter, max(jitter) as jitter_max, min(jitter) as jitter_min, sum(packetloss) as
packetloss, max(packetloss) as packetloss_max, min(packetloss) as packetloss_min, sum
(inbandwidth) as inbandwidth, sum(outbandwidth) as outbandwidth, sum(bibandwidth) as
bibandwidth, count(*) as count, sum(CASE WHEN link_status=1 THEN 1 ELSE 0 END) AS count_
linkup, min(sdwan_status) as sdwan_status from (select itime, csf, devname, devid, vd,
interface, healthcheck, link_status, (CASE WHEN link_status=1 THEN latency ELSE 0 END) AS
latency, (CASE WHEN link_status=1 THEN jitter ELSE 0 END) AS jitter, (CASE WHEN link_
status=1 THEN packetloss ELSE 100 END) AS packetloss, (CASE WHEN sla_failed=1 AND
metric='packetloss' THEN 1 ELSE 0 END) AS failed_packetloss, (CASE WHEN sla_failed=1 AND
metric='jitter' THEN 1 ELSE 0 END) AS failed_jitter, (CASE WHEN sla_failed=1 AND
metric='latency' THEN 1 ELSE 0 END) AS failed_latency, (CASE WHEN sla_failed=1 THEN 3 ELSE
sdwan_status END) AS sdwan_status,  (CASE WHEN link_status=1 THEN inbandwidth ELSE 0 END) AS
inbandwidth,  (CASE WHEN link_status=1 THEN outbandwidth ELSE 0 END) AS outbandwidth,  (CASE
WHEN link_status=1 THEN bibandwidth ELSE 0 END) AS bibandwidth from (select itime, csf,
devname, devid, vd, interface, healthcheck, (CASE WHEN status='down' THEN 0 ELSE 1 END) AS
link_status, latency::float as latency, jitter::float as jitter, trim(trailing '%' from
packetloss)::float as packetloss, (CASE WHEN status='down' THEN 1 WHEN msg LIKE '%SLA
failed%' THEN 1 ELSE 0 END) AS sla_failed, metric, (CASE WHEN msg LIKE '%SLA status%' THEN 1
ELSE 0 END) AS sdwan_status, convert_unit_to_num(inbandwidthused) as inbandwidth, convert_
unit_to_num(outbandwidthused) as outbandwidth, convert_unit_to_num(bibandwidthused) as
bibandwidth from $log where $filter and logid_to_int(logid) in (22925, 22933, 22936) and
interface is not null) t ) t group by timestamp, csf, devname, devid, vd, interface,
healthcheck /*SkipSTART*/order by timestamp desc/*SkipEND*/)### t where $filter-drilldown
and packetloss is not null group by timestamp, devid, interface having sum(count)>0) t1
group by hodex, devid order by hodex
```

Dataset Name	Description	Log Category
sdwan-Device-Interface-Summary-by-Bibandwidth	SD-WAN Device Interface Summary by Bibandwidth	event

```
select
  devid,
  interface,
  sum(bibandwidth)/ sum(count) as bibandwidth,
  cast(
    min(latency_min) as decimal(18, 2)
  ) as latency_min,
  cast(
    sum(latency)/ sum(count) as decimal(18, 2)
  ) as latency_avg,
  cast(
    max(latency_max) as decimal(18, 2)
  ) as latency_max,
  cast(
    min(jitter_min) as decimal(18, 2)
  ) as jitter_min,
  cast(
    sum(jitter)/ sum(count) as decimal(18, 2)
  ) as jitter_avg,
  cast(
    max(jitter_max) as decimal(18, 2)
  ) as jitter_max,
  cast(
    min(packetloss_min) as decimal(18, 2)
  ) as packetloss_min,
  cast(
    sum(packetloss)/ sum(count) as decimal(18, 2)
  ) as packetloss_avg,
  cast(
    max(packetloss_max) as decimal(18, 2)
  ) as packetloss_max
from
  ###(select $flex_timestamp as timestamp, csf, devname, devid, vd, interface, healthcheck
as sla_rule, sum(link_status) as link_status, sum(failed_latency) as failed_latency, sum
(failed_jitter) as failed_jitter,  sum(failed_packetloss) as failed_packetloss, sum(latency)
as latency, max(latency) as latency_max, min(latency) as latency_min, sum(jitter) as jitter,
max(jitter) as jitter_max, min(jitter) as jitter_min, sum(packetloss) as packetloss, max
(packetloss) as packetloss_max, min(packetloss) as packetloss_min, sum(inbandwidth) as
inbandwidth, sum(outbandwidth) as outbandwidth, sum(bibandwidth) as bibandwidth, count(*) as
count, sum(CASE WHEN link_status=1 THEN 1 ELSE 0 END) AS count_linkup, min(sdwan_status) as
sdwan_status from (select itime, csf, devname, devid, vd, interface, healthcheck, link_
status, (CASE WHEN link_status=1 THEN latency ELSE 0 END) AS latency, (CASE WHEN link_
status=1 THEN jitter ELSE 0 END) AS jitter, (CASE WHEN link_status=1 THEN packetloss ELSE
100 END) AS packetloss, (CASE WHEN sla_failed=1 AND metric='packetloss' THEN 1 ELSE 0 END)
AS failed_packetloss, (CASE WHEN sla_failed=1 AND metric='jitter' THEN 1 ELSE 0 END) AS
failed_jitter, (CASE WHEN sla_failed=1 AND metric='latency' THEN 1 ELSE 0 END) AS failed_
latency, (CASE WHEN sla_failed=1 THEN 3 ELSE sdwan_status END) AS sdwan_status,  (CASE WHEN
link_status=1 THEN inbandwidth ELSE 0 END) AS inbandwidth,  (CASE WHEN link_status=1 THEN
outbandwidth ELSE 0 END) AS outbandwidth,  (CASE WHEN link_status=1 THEN bibandwidth ELSE 0
END) AS bibandwidth from (select itime, csf, devname, devid, vd, interface, healthcheck,
(CASE WHEN status='down' THEN 0 ELSE 1 END) AS link_status, latency::float as latency,
jitter::float as jitter, trim(trailing '%' from packetloss)::float as packetloss, (CASE WHEN
status='down' THEN 1 WHEN msg LIKE '%SLA failed%' THEN 1 ELSE 0 END) AS sla_failed, metric,
(CASE WHEN msg LIKE '%SLA status%' THEN 1 ELSE 0 END) AS sdwan_status, convert_unit_to_num
(inbandwidthused) as inbandwidth, convert_unit_to_num(outbandwidthused) as outbandwidth,
convert_unit_to_num(bibandwidthused) as bibandwidth from $log where $filter and logid_to_int
(logid) in (22925, 22933, 22936) and interface is not null) t ) t group by timestamp, csf,
devname, devid, vd, interface, healthcheck /*SkipSTART*/order by timestamp
desc/*SkipEND*/)### t where $filter-drilldown and interface is not null group by devid,
interface having sum(count)>0 order by devid, interface
```

Dataset Name	Description	Log Category
sdwan-Top-App-By-Bandwidth	Top SD-WAN application by bandwidth	traffic

```
select
  appid,
  app_group,
  sum(bandwidth) as bandwidth,
  sum(sessions) as sessions
from
  ###(select $flex_timestamp as timestamp, csf, devid, vd, srccountry, dstintf, srcintf,
srcintfrole, dstintfrole, appid, appcat, app_group_name(app) as app_group, coalesce
(vwlname,vwlservice) as rulename, service, coalesce(nullifna(`srcname`),ipstr
(`srcip`),nullifna(`srcmac`)) as dev_src,  sum(crscore%65536) as crscore, coalesce(nullifna
(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src, sum(coalesce(sentdelta,
sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as bandwidth, sum(coalesce(rcvddelta,
rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as traffic_out, count(*)
as sessions from $log-traffic where $filter and vwlid IS NOT NULL and (logflag&(1|32)>0)
group by timestamp, srccountry, dstintf, csf, devid, vd, srcintf, srcintfrole, dstintfrole,
appid, appcat, app_group, rulename, service, user_src, dev_src order by bandwidth desc)### t
where $filter-drilldown group by appid, app_group order by bandwidth desc
```

Dataset Name	Description	Log Category
sdwan-Top-App-By-Bandwidth-Sankey	Top SD-WAN application by bandwidth usage	traffic

```
select
  & #039;SD-WAN Utilization' as summary, app_group, devid, dstintf as interface, sum
(bandwidth) as bandwidth  from ###(select $flex_timestamp as timestamp, csf, devid, vd,
srccountry, dstintf, srcintf, srcintfrole, dstintfrole, appid, appcat, app_group_name(app)
as app_group, coalesce(vwlname,vwlservice) as rulename, service, coalesce(nullifna
(`srcname`),ipstr(`srcip`),nullifna(`srcmac`)) as dev_src,  sum(crscore%65536) as crscore,
coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src, sum(coalesce
(sentdelta, sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as bandwidth, sum(coalesce
(rcvddelta, rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as traffic_
out, count(*) as sessions from $log-traffic where $filter and vwlid IS NOT NULL and
(logflag&(1|32)>0) group by timestamp, srccountry, dstintf, csf, devid, vd, srcintf,
srcintfrole, dstintfrole, appid, appcat, app_group, rulename, service, user_src, dev_src
order by bandwidth desc)### t where $filter-drilldown group by app_group, devid, interface
order by bandwidth desc
```

Dataset Name	Description	Log Category
sdwan-Device-Interface-bandwidth-Drilldown	SD-WAN Device Statistic by Bibandwidth	event

```
select
  devid,
  sum(bibandwidth)/ sum(count) as bibandwidth
from
  ###(select $flex_timestamp as timestamp, csf, devname, devid, vd, interface, healthcheck
as sla_rule, sum(link_status) as link_status, sum(failed_latency) as failed_latency, sum
(failed_jitter) as failed_jitter,  sum(failed_packetloss) as failed_packetloss, sum(latency)
as latency, max(latency) as latency_max, min(latency) as latency_min, sum(jitter) as jitter,
max(jitter) as jitter_max, min(jitter) as jitter_min, sum(packetloss) as packetloss, max
(packetloss) as packetloss_max, min(packetloss) as packetloss_min, sum(inbandwidth) as
inbandwidth, sum(outbandwidth) as outbandwidth, sum(bibandwidth) as bibandwidth, count(*) as
count, sum(CASE WHEN link_status=1 THEN 1 ELSE 0 END) AS count_linkup, min(sdwan_status) as
sdwan_status from (select itime, csf, devname, devid, vd, interface, healthcheck, link_
status, (CASE WHEN link_status=1 THEN latency ELSE 0 END) AS latency, (CASE WHEN link_
status=1 THEN jitter ELSE 0 END) AS jitter, (CASE WHEN link_status=1 THEN packetloss ELSE
100 END) AS packetloss, (CASE WHEN sla_failed=1 AND metric='packetloss' THEN 1 ELSE 0 END)
AS failed_packetloss, (CASE WHEN sla_failed=1 AND metric='jitter' THEN 1 ELSE 0 END) AS
failed_jitter, (CASE WHEN sla_failed=1 AND metric='latency' THEN 1 ELSE 0 END) AS failed_
latency, (CASE WHEN sla_failed=1 THEN 3 ELSE sdwan_status END) AS sdwan_status,  (CASE WHEN
link_status=1 THEN inbandwidth ELSE 0 END) AS inbandwidth,  (CASE WHEN link_status=1 THEN
outbandwidth ELSE 0 END) AS outbandwidth,  (CASE WHEN link_status=1 THEN bibandwidth ELSE 0
END) AS bibandwidth from (select itime, csf, devname, devid, vd, interface, healthcheck,
(CASE WHEN status='down' THEN 0 ELSE 1 END) AS link_status, latency::float as latency,
jitter::float as jitter, trim(trailing '%' from packetloss)::float as packetloss, (CASE WHEN
status='down' THEN 1 WHEN msg LIKE '%SLA failed%' THEN 1 ELSE 0 END) AS sla_failed, metric,
(CASE WHEN msg LIKE '%SLA status%' THEN 1 ELSE 0 END) AS sdwan_status, convert_unit_to_num
(inbandwidthused) as inbandwidth, convert_unit_to_num(outbandwidthused) as outbandwidth,
convert_unit_to_num(bibandwidthused) as bibandwidth from $log where $filter and logid_to_int
(logid) in (22925, 22933, 22936) and interface is not null) t ) t group by timestamp, csf,
devname, devid, vd, interface, healthcheck /*SkipSTART*/order by timestamp
desc/*SkipEND*/)### t where $filter-drilldown and bibandwidth is not null group by devid
having sum(count)>0 order by bibandwidth desc
```

Dataset Name	Description	Log Category
sdwan-Device-Rules-Donut-Bandwidth	Top SD-WAN Links bandwidth	traffic

```
select
  coalesce(
    rulename,
    & #039;Unknown') as rulename, sum(bandwidth) as bandwidth from ###(select $flex_
timestamp as timestamp, csf, devid, vd, srccountry, dstintf, srcintf, srcintfrole,
dstintfrole, appid, appcat, app_group_name(app) as app_group, coalesce(vwlname,vwlservice)
as rulename, service, coalesce(nullifna(`srcname`),ipstr(`srcip`),nullifna(`srcmac`)) as
dev_src,  sum(crscore%65536) as crscore, coalesce(nullifna(`user`), nullifna(`unauthuser`),
ipstr(`srcip`)) as user_src, sum(coalesce(sentdelta, sentbyte, 0)+coalesce(rcvddelta,
rcvdbyte, 0)) as bandwidth, sum(coalesce(rcvddelta, rcvdbyte, 0)) as traffic_in, sum
(coalesce(sentdelta, sentbyte, 0)) as traffic_out, count(*) as sessions from $log-traffic
where $filter and vwlid IS NOT NULL and (logflag&(1|32)>0) group by timestamp, srccountry,
dstintf, csf, devid, vd, srcintf, srcintfrole, dstintfrole, appid, appcat, app_group,
rulename, service, user_src, dev_src order by bandwidth desc)### t where $filter-drilldown
group by rulename order by bandwidth desc limit 10
```

Dataset Name	Description	Log Category
sdwan-device-interface-bandwidth	Top SD-WAN Links bandwidth	traffic

```
select
  interface,
  sum(bandwidth) as bandwidth
from
  (
    (
      select
        srcintf as interface,
        sum(bandwidth) as bandwidth
      from
        ###(select $flex_timestamp as timestamp, csf, devid, vd, srccountry, dstintf,
srcintf, srcintfrole, dstintfrole, appid, appcat, app_group_name(app) as app_group, coalesce
(vwlname,vwlservice) as rulename, service, coalesce(nullifna(`srcname`),ipstr
(`srcip`),nullifna(`srcmac`)) as dev_src,  sum(crscore%65536) as crscore, coalesce(nullifna
(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src, sum(coalesce(sentdelta,
sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as bandwidth, sum(coalesce(rcvddelta,
rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as traffic_out, count(*)
as sessions from $log-traffic where $filter and vwlid IS NOT NULL and (logflag&(1|32)>0)
group by timestamp, srccountry, dstintf, csf, devid, vd, srcintf, srcintfrole, dstintfrole,
appid, appcat, app_group, rulename, service, user_src, dev_src order by bandwidth desc)### t
where srcintfrole='wan' and $filter-drilldown group by interface) union all (select dstintf
as interface, sum(bandwidth) as bandwidth from ###(select $flex_timestamp as timestamp, csf,
devid, vd, srccountry, dstintf, srcintf, srcintfrole, dstintfrole, appid, appcat, app_group_
name(app) as app_group, coalesce(vwlname,vwlservice) as rulename, service, coalesce(nullifna
(`srcname`),ipstr(`srcip`),nullifna(`srcmac`)) as dev_src,  sum(crscore%65536) as crscore,
coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src, sum(coalesce
(sentdelta, sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as bandwidth, sum(coalesce
(rcvddelta, rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as traffic_
out, count(*) as sessions from $log-traffic where $filter and vwlid IS NOT NULL and
(logflag&(1|32)>0) group by timestamp, srccountry, dstintf, csf, devid, vd, srcintf,
srcintfrole, dstintfrole, appid, appcat, app_group, rulename, service, user_src, dev_src
order by bandwidth desc)### t where $filter-drilldown group by interface)) t group by
interface order by bandwidth desc limit 10
```

Dataset Name	Description	Log Category
sdwan-Top-Application-Session-Bandwidth	Top SD-WAN application by bandwidth	traffic

```
select
  appid,
  app_group,
  sum(bandwidth) as bandwidth,
  sum(sessions) as sessions
from
  ###(select $flex_timestamp as timestamp, csf, devid, vd, srccountry, dstintf, srcintf,
srcintfrole, dstintfrole, appid, appcat, app_group_name(app) as app_group, coalesce
(vwlname,vwlservice) as rulename, service, coalesce(nullifna(`srcname`),ipstr
(`srcip`),nullifna(`srcmac`)) as dev_src,  sum(crscore%65536) as crscore, coalesce(nullifna
(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src, sum(coalesce(sentdelta,
sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as bandwidth, sum(coalesce(rcvddelta,
rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as traffic_out, count(*)
as sessions from $log-traffic where $filter and vwlid IS NOT NULL and (logflag&(1|32)>0)
group by timestamp, srccountry, dstintf, csf, devid, vd, srcintf, srcintfrole, dstintfrole,
appid, appcat, app_group, rulename, service, user_src, dev_src order by bandwidth desc)### t
where $filter-drilldown group by appid, app_group order by bandwidth desc
```

Dataset Name	Description	Log Category
sdwan-Top-Users-By-Bandwidth-Bar	SD-WAN Top users by bandwidth usage	traffic

```
select
  user_src,
  sum(bandwidth) as bandwidth
from
  ###(select $flex_timestamp as timestamp, csf, devid, vd, srccountry, dstintf, srcintf,
srcintfrole, dstintfrole, appid, appcat, app_group_name(app) as app_group, coalesce
(vwlname,vwlservice) as rulename, service, coalesce(nullifna(`srcname`),ipstr
(`srcip`),nullifna(`srcmac`)) as dev_src,  sum(crscore%65536) as crscore, coalesce(nullifna
(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src, sum(coalesce(sentdelta,
sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as bandwidth, sum(coalesce(rcvddelta,
rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as traffic_out, count(*)
as sessions from $log-traffic where $filter and vwlid IS NOT NULL and (logflag&(1|32)>0)
group by timestamp, srccountry, dstintf, csf, devid, vd, srcintf, srcintfrole, dstintfrole,
appid, appcat, app_group, rulename, service, user_src, dev_src order by bandwidth desc)### t
where $filter-drilldown group by user_src order by bandwidth desc
```

Dataset Name	Description	Log Category
sdwan-top-user-app-Drilldown	SD-WAN Top users and Application by bandwidth	traffic

```
select
  user_src,
  app_group,
  sum(bandwidth) as bandwidth
from
  ###(select $flex_timestamp as timestamp, csf, devid, vd, srccountry, dstintf, srcintf,
srcintfrole, dstintfrole, appid, appcat, app_group_name(app) as app_group, coalesce
(vwlname,vwlservice) as rulename, service, coalesce(nullifna(`srcname`),ipstr
(`srcip`),nullifna(`srcmac`)) as dev_src,  sum(crscore%65536) as crscore, coalesce(nullifna
(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src, sum(coalesce(sentdelta,
sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as bandwidth, sum(coalesce(rcvddelta,
rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as traffic_out, count(*)
as sessions from $log-traffic where $filter and vwlid IS NOT NULL and (logflag&(1|32)>0)
group by timestamp, srccountry, dstintf, csf, devid, vd, srcintf, srcintfrole, dstintfrole,
appid, appcat, app_group, rulename, service, user_src, dev_src order by bandwidth desc)### t
where $filter-drilldown group by user_src, app_group order by bandwidth desc
```

Dataset Name	Description	Log Category
sdwan-Device-Intfe-traffic-out-bandwidth-Line	SD-WAN Device-Interface traffic sent bandwidth Timeline	traffic

```
select
  $flex_timescale(timestamp) as hodex,
  t1.dstintf as interface,
  sum(traffic_out) as bandwidth
from
  ###(select $flex_timestamp as timestamp, csf, devid, vd, srccountry, dstintf, srcintf,
srcintfrole, dstintfrole, appid, appcat, app_group_name(app) as app_group, coalesce
(vwlname,vwlservice) as rulename, service, coalesce(nullifna(`srcname`),ipstr
(`srcip`),nullifna(`srcmac`)) as dev_src,  sum(crscore%65536) as crscore, coalesce(nullifna
(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src, sum(coalesce(sentdelta,
sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as bandwidth, sum(coalesce(rcvddelta,
rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as traffic_out, count(*)
as sessions from $log-traffic where $filter and vwlid IS NOT NULL and (logflag&(1|32)>0)
group by timestamp, srccountry, dstintf, csf, devid, vd, srcintf, srcintfrole, dstintfrole,
appid, appcat, app_group, rulename, service, user_src, dev_src order by bandwidth desc)###
t1 inner join (select dstintf, count(*) as num_intf from ###(select $flex_timestamp as
timestamp, csf, devid, vd, srccountry, dstintf, srcintf, srcintfrole, dstintfrole, appid,
appcat, app_group_name(app) as app_group, coalesce(vwlname,vwlservice) as rulename, service,
coalesce(nullifna(`srcname`),ipstr(`srcip`),nullifna(`srcmac`)) as dev_src,  sum
(crscore%65536) as crscore, coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr
(`srcip`)) as user_src, sum(coalesce(sentdelta, sentbyte, 0)+coalesce(rcvddelta, rcvdbyte,
0)) as bandwidth, sum(coalesce(rcvddelta, rcvdbyte, 0)) as traffic_in, sum(coalesce
(sentdelta, sentbyte, 0)) as traffic_out, count(*) as sessions from $log-traffic where
$filter and vwlid IS NOT NULL and (logflag&(1|32)>0) group by timestamp, srccountry,
dstintf, csf, devid, vd, srcintf, srcintfrole, dstintfrole, appid, appcat, app_group,
rulename, service, user_src, dev_src order by bandwidth desc)### t where $filter-drilldown
group by dstintf order by num_intf desc limit 10)t2 on t1.dstintf=t2.dstintf group by hodex,
t1.dstintf order by hodex
```

Dataset Name	Description	Log Category
sdwan-Device-Intfe-traffic-in-bandwidth-Line	SD-WAN Device-Interface traffic received bandwidth Timeline	traffic

```
select
  $flex_timescale(timestamp) as hodex,
  t1.srcintf as interface,
  sum(traffic_in) as bandwidth
from
  ###(select $flex_timestamp as timestamp, csf, devid, vd, srccountry, dstintf, srcintf,
srcintfrole, dstintfrole, appid, appcat, app_group_name(app) as app_group, coalesce
(vwlname,vwlservice) as rulename, service, coalesce(nullifna(`srcname`),ipstr
(`srcip`),nullifna(`srcmac`)) as dev_src,  sum(crscore%65536) as crscore, coalesce(nullifna
(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src, sum(coalesce(sentdelta,
sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as bandwidth, sum(coalesce(rcvddelta,
rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as traffic_out, count(*)
as sessions from $log-traffic where $filter and vwlid IS NOT NULL and (logflag&(1|32)>0)
group by timestamp, srccountry, dstintf, csf, devid, vd, srcintf, srcintfrole, dstintfrole,
appid, appcat, app_group, rulename, service, user_src, dev_src order by bandwidth desc)###
t1 inner join (select srcintf, count(*) as num_intf from ###(select $flex_timestamp as
timestamp, csf, devid, vd, srccountry, dstintf, srcintf, srcintfrole, dstintfrole, appid,
appcat, app_group_name(app) as app_group, coalesce(vwlname,vwlservice) as rulename, service,
coalesce(nullifna(`srcname`),ipstr(`srcip`),nullifna(`srcmac`)) as dev_src,  sum
(crscore%65536) as crscore, coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr
(`srcip`)) as user_src, sum(coalesce(sentdelta, sentbyte, 0)+coalesce(rcvddelta, rcvdbyte,
0)) as bandwidth, sum(coalesce(rcvddelta, rcvdbyte, 0)) as traffic_in, sum(coalesce
(sentdelta, sentbyte, 0)) as traffic_out, count(*) as sessions from $log-traffic where
$filter and vwlid IS NOT NULL and (logflag&(1|32)>0) group by timestamp, srccountry,
dstintf, csf, devid, vd, srcintf, srcintfrole, dstintfrole, appid, appcat, app_group,
rulename, service, user_src, dev_src order by bandwidth desc)### t where $filter-drilldown
and srcintf is not null and srcintfrole ='wan' group by srcintf order by num_intf desc limit
10)t2 on t1.srcintf=t2.srcintf group by hodex, t1.srcintf order by hodex
```

Dataset Name	Description	Log Category
sdwan-Device-Intfe-traffic-bandwidth-Line	SD-WAN Device-Interface traffic sent bandwidth Timeline	traffic

```
select
  $flex_timescale(timestamp) as hodex,
  t1.dstintf as interface,
  sum(traffic_out) as bandwidth
from
  ###(select $flex_timestamp as timestamp, csf, devid, vd, srccountry, dstintf, srcintf,
srcintfrole, dstintfrole, appid, appcat, app_group_name(app) as app_group, coalesce
(vwlname,vwlservice) as rulename, service, coalesce(nullifna(`srcname`),ipstr
(`srcip`),nullifna(`srcmac`)) as dev_src,  sum(crscore%65536) as crscore, coalesce(nullifna
(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src, sum(coalesce(sentdelta,
sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as bandwidth, sum(coalesce(rcvddelta,
rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as traffic_out, count(*)
as sessions from $log-traffic where $filter and vwlid IS NOT NULL and (logflag&(1|32)>0)
group by timestamp, srccountry, dstintf, csf, devid, vd, srcintf, srcintfrole, dstintfrole,
appid, appcat, app_group, rulename, service, user_src, dev_src order by bandwidth desc)###
t1 inner join (select dstintf, count(*) as num_intf from ###(select $flex_timestamp as
timestamp, csf, devid, vd, srccountry, dstintf, srcintf, srcintfrole, dstintfrole, appid,
appcat, app_group_name(app) as app_group, coalesce(vwlname,vwlservice) as rulename, service,
coalesce(nullifna(`srcname`),ipstr(`srcip`),nullifna(`srcmac`)) as dev_src,  sum
(crscore%65536) as crscore, coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr
(`srcip`)) as user_src, sum(coalesce(sentdelta, sentbyte, 0)+coalesce(rcvddelta, rcvdbyte,
0)) as bandwidth, sum(coalesce(rcvddelta, rcvdbyte, 0)) as traffic_in, sum(coalesce
(sentdelta, sentbyte, 0)) as traffic_out, count(*) as sessions from $log-traffic where
$filter and vwlid IS NOT NULL and (logflag&(1|32)>0) group by timestamp, srccountry,
dstintf, csf, devid, vd, srcintf, srcintfrole, dstintfrole, appid, appcat, app_group,
rulename, service, user_src, dev_src order by bandwidth desc)### t where $filter-drilldown
group by dstintf order by num_intf desc limit 10)t2 on t1.dstintf=t2.dstintf group by hodex,
t1.dstintf order by hodex
```

Dataset Name	Description	Log Category
sdwan-Device-SLA-Interface-bandwidth-Drilldown	SD-WAN Device Statistic by Bibandwidth	event

```
select
  devid,
  sum(bibandwidth)/ sum(count) as bibandwidth
from
  ###(select $flex_timestamp as timestamp, csf, devname, devid, vd, interface, healthcheck
as sla_rule, sum(link_status) as link_status, sum(failed_latency) as failed_latency, sum
(failed_jitter) as failed_jitter,  sum(failed_packetloss) as failed_packetloss, sum(latency)
as latency, max(latency) as latency_max, min(latency) as latency_min, sum(jitter) as jitter,
max(jitter) as jitter_max, min(jitter) as jitter_min, sum(packetloss) as packetloss, max
(packetloss) as packetloss_max, min(packetloss) as packetloss_min, sum(inbandwidth) as
inbandwidth, sum(outbandwidth) as outbandwidth, sum(bibandwidth) as bibandwidth, count(*) as
count, sum(CASE WHEN link_status=1 THEN 1 ELSE 0 END) AS count_linkup, min(sdwan_status) as
sdwan_status from (select itime, csf, devname, devid, vd, interface, healthcheck, link_
status, (CASE WHEN link_status=1 THEN latency ELSE 0 END) AS latency, (CASE WHEN link_
status=1 THEN jitter ELSE 0 END) AS jitter, (CASE WHEN link_status=1 THEN packetloss ELSE
100 END) AS packetloss, (CASE WHEN sla_failed=1 AND metric='packetloss' THEN 1 ELSE 0 END)
AS failed_packetloss, (CASE WHEN sla_failed=1 AND metric='jitter' THEN 1 ELSE 0 END) AS
failed_jitter, (CASE WHEN sla_failed=1 AND metric='latency' THEN 1 ELSE 0 END) AS failed_
latency, (CASE WHEN sla_failed=1 THEN 3 ELSE sdwan_status END) AS sdwan_status,  (CASE WHEN
link_status=1 THEN inbandwidth ELSE 0 END) AS inbandwidth,  (CASE WHEN link_status=1 THEN
outbandwidth ELSE 0 END) AS outbandwidth,  (CASE WHEN link_status=1 THEN bibandwidth ELSE 0
END) AS bibandwidth from (select itime, csf, devname, devid, vd, interface, healthcheck,
(CASE WHEN status='down' THEN 0 ELSE 1 END) AS link_status, latency::float as latency,
jitter::float as jitter, trim(trailing '%' from packetloss)::float as packetloss, (CASE WHEN
status='down' THEN 1 WHEN msg LIKE '%SLA failed%' THEN 1 ELSE 0 END) AS sla_failed, metric,
(CASE WHEN msg LIKE '%SLA status%' THEN 1 ELSE 0 END) AS sdwan_status, convert_unit_to_num
(inbandwidthused) as inbandwidth, convert_unit_to_num(outbandwidthused) as outbandwidth,
convert_unit_to_num(bibandwidthused) as bibandwidth from $log where $filter and logid_to_int
(logid) in (22925, 22933, 22936) and interface is not null) t ) t group by timestamp, csf,
devname, devid, vd, interface, healthcheck /*SkipSTART*/order by timestamp
desc/*SkipEND*/)### t where $filter-drilldown and bibandwidth is not null group by devid
having sum(count)>0 order by bibandwidth desc
```

Dataset Name	Description	Log Category
sdwan-Device-SLA-Rule-Latency-Line	SD-WAN Device-SLA-Rule Latency Line	event

```
select
  $flex_timescale(timestamp) as hodex,
  t1.intf_sla,
  sum(latency)/ sum(count) as latency
from
  (
    select
      timestamp,
      interface || & #039;:' || sla_rule as intf_sla, sum(latency) as latency, sum(count) as
count from ###(select $flex_timestamp as timestamp, csf, devname, devid, vd, interface,
healthcheck as sla_rule, sum(link_status) as link_status, sum(failed_latency) as failed_
latency, sum(failed_jitter) as failed_jitter,  sum(failed_packetloss) as failed_packetloss,
sum(latency) as latency, max(latency) as latency_max, min(latency) as latency_min, sum
(jitter) as jitter, max(jitter) as jitter_max, min(jitter) as jitter_min, sum(packetloss) as
packetloss, max(packetloss) as packetloss_max, min(packetloss) as packetloss_min, sum
(inbandwidth) as inbandwidth, sum(outbandwidth) as outbandwidth, sum(bibandwidth) as
bibandwidth, count(*) as count, sum(CASE WHEN link_status=1 THEN 1 ELSE 0 END) AS count_
linkup, min(sdwan_status) as sdwan_status from (select itime, csf, devname, devid, vd,
interface, healthcheck, link_status, (CASE WHEN link_status=1 THEN latency ELSE 0 END) AS
latency, (CASE WHEN link_status=1 THEN jitter ELSE 0 END) AS jitter, (CASE WHEN link_
status=1 THEN packetloss ELSE 100 END) AS packetloss, (CASE WHEN sla_failed=1 AND
metric='packetloss' THEN 1 ELSE 0 END) AS failed_packetloss, (CASE WHEN sla_failed=1 AND
metric='jitter' THEN 1 ELSE 0 END) AS failed_jitter, (CASE WHEN sla_failed=1 AND
metric='latency' THEN 1 ELSE 0 END) AS failed_latency, (CASE WHEN sla_failed=1 THEN 3 ELSE
sdwan_status END) AS sdwan_status,  (CASE WHEN link_status=1 THEN inbandwidth ELSE 0 END) AS
inbandwidth,  (CASE WHEN link_status=1 THEN outbandwidth ELSE 0 END) AS outbandwidth,  (CASE
WHEN link_status=1 THEN bibandwidth ELSE 0 END) AS bibandwidth from (select itime, csf,
devname, devid, vd, interface, healthcheck, (CASE WHEN status='down' THEN 0 ELSE 1 END) AS
link_status, latency::float as latency, jitter::float as jitter, trim(trailing '%' from
packetloss)::float as packetloss, (CASE WHEN status='down' THEN 1 WHEN msg LIKE '%SLA
failed%' THEN 1 ELSE 0 END) AS sla_failed, metric, (CASE WHEN msg LIKE '%SLA status%' THEN 1
ELSE 0 END) AS sdwan_status, convert_unit_to_num(inbandwidthused) as inbandwidth, convert_
unit_to_num(outbandwidthused) as outbandwidth, convert_unit_to_num(bibandwidthused) as
bibandwidth from $log where $filter and logid_to_int(logid) in (22925, 22933, 22936) and
interface is not null) t ) t group by timestamp, csf, devname, devid, vd, interface,
healthcheck /*SkipSTART*/order by timestamp desc/*SkipEND*/)### t where latency is not null
group by timestamp, intf_sla having sum(count)>0) t1 inner join (select interface || ':' ||
sla_rule as intf_sla, count(*) as num_intf from ###(select $flex_timestamp as timestamp,
csf, devname, devid, vd, interface, healthcheck as sla_rule, sum(link_status) as link_
status, sum(failed_latency) as failed_latency, sum(failed_jitter) as failed_jitter,  sum
(failed_packetloss) as failed_packetloss, sum(latency) as latency, max(latency) as latency_
max, min(latency) as latency_min, sum(jitter) as jitter, max(jitter) as jitter_max, min
(jitter) as jitter_min, sum(packetloss) as packetloss, max(packetloss) as packetloss_max,
min(packetloss) as packetloss_min, sum(inbandwidth) as inbandwidth, sum(outbandwidth) as
outbandwidth, sum(bibandwidth) as bibandwidth, count(*) as count, sum(CASE WHEN link_
status=1 THEN 1 ELSE 0 END) AS count_linkup, min(sdwan_status) as sdwan_status from (select
itime, csf, devname, devid, vd, interface, healthcheck, link_status, (CASE WHEN link_
status=1 THEN latency ELSE 0 END) AS latency, (CASE WHEN link_status=1 THEN jitter ELSE 0
END) AS jitter, (CASE WHEN link_status=1 THEN packetloss ELSE 100 END) AS packetloss, (CASE
WHEN sla_failed=1 AND metric='packetloss' THEN 1 ELSE 0 END) AS failed_packetloss, (CASE
WHEN sla_failed=1 AND metric='jitter' THEN 1 ELSE 0 END) AS failed_jitter, (CASE WHEN sla_
failed=1 AND metric='latency' THEN 1 ELSE 0 END) AS failed_latency, (CASE WHEN sla_failed=1
THEN 3 ELSE sdwan_status END) AS sdwan_status,  (CASE WHEN link_status=1 THEN inbandwidth
ELSE 0 END) AS inbandwidth,  (CASE WHEN link_status=1 THEN outbandwidth ELSE 0 END) AS
outbandwidth,  (CASE WHEN link_status=1 THEN bibandwidth ELSE 0 END) AS bibandwidth from
(select itime, csf, devname, devid, vd, interface, healthcheck, (CASE WHEN status='down'
THEN 0 ELSE 1 END) AS link_status, latency::float as latency, jitter::float as jitter, trim
(trailing '%' from packetloss)::float as packetloss, (CASE WHEN status='down' THEN 1 WHEN
msg LIKE '%SLA failed%' THEN 1 ELSE 0 END) AS sla_failed, metric, (CASE WHEN msg LIKE '%SLA
status%' THEN 1 ELSE 0 END) AS sdwan_status, convert_unit_to_num(inbandwidthused) as
inbandwidth, convert_unit_to_num(outbandwidthused) as outbandwidth, convert_unit_to_num
(bibandwidthused) as bibandwidth from $log where $filter and logid_to_int(logid) in (22925,
22933, 22936) and interface is not null) t ) t group by timestamp, csf, devname, devid, vd,
interface, healthcheck /*SkipSTART*/order by timestamp desc/*SkipEND*/)### t where $filter-
drilldown and sla_rule is not null group by intf_sla order by num_intf desc limit 10)t2 on
t1.intf_sla=t2.intf_sla group by hodex, t1.intf_sla order by hodex
```

Dataset Name	Description	Log Category
sdwan-Device-SLA-Rule-Jitter-Line	SD-WAN Device-SLA-Rule Jitter Line	event

```
select
  $flex_timescale(timestamp) as hodex,
  t1.intf_sla,
  sum(jitter)/ sum(count) as jitter
from
  (
    select
      timestamp,
      interface || & #039;:' || sla_rule as intf_sla, sum(jitter) as jitter, sum(count) as
count from ###(select $flex_timestamp as timestamp, csf, devname, devid, vd, interface,
healthcheck as sla_rule, sum(link_status) as link_status, sum(failed_latency) as failed_
latency, sum(failed_jitter) as failed_jitter,  sum(failed_packetloss) as failed_packetloss,
sum(latency) as latency, max(latency) as latency_max, min(latency) as latency_min, sum
(jitter) as jitter, max(jitter) as jitter_max, min(jitter) as jitter_min, sum(packetloss) as
packetloss, max(packetloss) as packetloss_max, min(packetloss) as packetloss_min, sum
(inbandwidth) as inbandwidth, sum(outbandwidth) as outbandwidth, sum(bibandwidth) as
bibandwidth, count(*) as count, sum(CASE WHEN link_status=1 THEN 1 ELSE 0 END) AS count_
linkup, min(sdwan_status) as sdwan_status from (select itime, csf, devname, devid, vd,
interface, healthcheck, link_status, (CASE WHEN link_status=1 THEN latency ELSE 0 END) AS
latency, (CASE WHEN link_status=1 THEN jitter ELSE 0 END) AS jitter, (CASE WHEN link_
status=1 THEN packetloss ELSE 100 END) AS packetloss, (CASE WHEN sla_failed=1 AND
metric='packetloss' THEN 1 ELSE 0 END) AS failed_packetloss, (CASE WHEN sla_failed=1 AND
metric='jitter' THEN 1 ELSE 0 END) AS failed_jitter, (CASE WHEN sla_failed=1 AND
metric='latency' THEN 1 ELSE 0 END) AS failed_latency, (CASE WHEN sla_failed=1 THEN 3 ELSE
sdwan_status END) AS sdwan_status,  (CASE WHEN link_status=1 THEN inbandwidth ELSE 0 END) AS
inbandwidth,  (CASE WHEN link_status=1 THEN outbandwidth ELSE 0 END) AS outbandwidth,  (CASE
WHEN link_status=1 THEN bibandwidth ELSE 0 END) AS bibandwidth from (select itime, csf,
devname, devid, vd, interface, healthcheck, (CASE WHEN status='down' THEN 0 ELSE 1 END) AS
link_status, latency::float as latency, jitter::float as jitter, trim(trailing '%' from
packetloss)::float as packetloss, (CASE WHEN status='down' THEN 1 WHEN msg LIKE '%SLA
failed%' THEN 1 ELSE 0 END) AS sla_failed, metric, (CASE WHEN msg LIKE '%SLA status%' THEN 1
ELSE 0 END) AS sdwan_status, convert_unit_to_num(inbandwidthused) as inbandwidth, convert_
unit_to_num(outbandwidthused) as outbandwidth, convert_unit_to_num(bibandwidthused) as
bibandwidth from $log where $filter and logid_to_int(logid) in (22925, 22933, 22936) and
interface is not null) t ) t group by timestamp, csf, devname, devid, vd, interface,
healthcheck /*SkipSTART*/order by timestamp desc/*SkipEND*/)### t where jitter is not null
group by timestamp, intf_sla having sum(count)>0) t1 inner join (select interface || ':' ||
sla_rule as intf_sla, count(*) as num_intf from ###(select $flex_timestamp as timestamp,
csf, devname, devid, vd, interface, healthcheck as sla_rule, sum(link_status) as link_
status, sum(failed_latency) as failed_latency, sum(failed_jitter) as failed_jitter,  sum
(failed_packetloss) as failed_packetloss, sum(latency) as latency, max(latency) as latency_
max, min(latency) as latency_min, sum(jitter) as jitter, max(jitter) as jitter_max, min
(jitter) as jitter_min, sum(packetloss) as packetloss, max(packetloss) as packetloss_max,
min(packetloss) as packetloss_min, sum(inbandwidth) as inbandwidth, sum(outbandwidth) as
outbandwidth, sum(bibandwidth) as bibandwidth, count(*) as count, sum(CASE WHEN link_
status=1 THEN 1 ELSE 0 END) AS count_linkup, min(sdwan_status) as sdwan_status from (select
itime, csf, devname, devid, vd, interface, healthcheck, link_status, (CASE WHEN link_
status=1 THEN latency ELSE 0 END) AS latency, (CASE WHEN link_status=1 THEN jitter ELSE 0
END) AS jitter, (CASE WHEN link_status=1 THEN packetloss ELSE 100 END) AS packetloss, (CASE
WHEN sla_failed=1 AND metric='packetloss' THEN 1 ELSE 0 END) AS failed_packetloss, (CASE
WHEN sla_failed=1 AND metric='jitter' THEN 1 ELSE 0 END) AS failed_jitter, (CASE WHEN sla_
failed=1 AND metric='latency' THEN 1 ELSE 0 END) AS failed_latency, (CASE WHEN sla_failed=1
THEN 3 ELSE sdwan_status END) AS sdwan_status,  (CASE WHEN link_status=1 THEN inbandwidth
ELSE 0 END) AS inbandwidth,  (CASE WHEN link_status=1 THEN outbandwidth ELSE 0 END) AS
outbandwidth,  (CASE WHEN link_status=1 THEN bibandwidth ELSE 0 END) AS bibandwidth from
(select itime, csf, devname, devid, vd, interface, healthcheck, (CASE WHEN status='down'
THEN 0 ELSE 1 END) AS link_status, latency::float as latency, jitter::float as jitter, trim
(trailing '%' from packetloss)::float as packetloss, (CASE WHEN status='down' THEN 1 WHEN
msg LIKE '%SLA failed%' THEN 1 ELSE 0 END) AS sla_failed, metric, (CASE WHEN msg LIKE '%SLA
status%' THEN 1 ELSE 0 END) AS sdwan_status, convert_unit_to_num(inbandwidthused) as
inbandwidth, convert_unit_to_num(outbandwidthused) as outbandwidth, convert_unit_to_num
(bibandwidthused) as bibandwidth from $log where $filter and logid_to_int(logid) in (22925,
22933, 22936) and interface is not null) t ) t group by timestamp, csf, devname, devid, vd,
interface, healthcheck /*SkipSTART*/order by timestamp desc/*SkipEND*/)### t where $filter-
drilldown and sla_rule is not null group by intf_sla order by num_intf desc limit 10)t2 on
t1.intf_sla=t2.intf_sla group by hodex, t1.intf_sla order by hodex
```

Dataset Name	Description	Log Category
sdwan-Device-SLA-Rule-Packetloss-Line	SD-WAN Device-SLA-Rule Packetloss Line	event

```
select
  $flex_timescale(timestamp) as hodex,
  t1.intf_sla,
  sum(packetloss)/ sum(count) as packetloss
from
  (
    select
      timestamp,
      interface || & #039;:' || sla_rule as intf_sla, sum(packetloss) as packetloss, sum
(count) as count from ###(select $flex_timestamp as timestamp, csf, devname, devid, vd,
interface, healthcheck as sla_rule, sum(link_status) as link_status, sum(failed_latency) as
failed_latency, sum(failed_jitter) as failed_jitter,  sum(failed_packetloss) as failed_
packetloss, sum(latency) as latency, max(latency) as latency_max, min(latency) as latency_
min, sum(jitter) as jitter, max(jitter) as jitter_max, min(jitter) as jitter_min, sum
(packetloss) as packetloss, max(packetloss) as packetloss_max, min(packetloss) as
packetloss_min, sum(inbandwidth) as inbandwidth, sum(outbandwidth) as outbandwidth, sum
(bibandwidth) as bibandwidth, count(*) as count, sum(CASE WHEN link_status=1 THEN 1 ELSE 0
END) AS count_linkup, min(sdwan_status) as sdwan_status from (select itime, csf, devname,
devid, vd, interface, healthcheck, link_status, (CASE WHEN link_status=1 THEN latency ELSE 0
END) AS latency, (CASE WHEN link_status=1 THEN jitter ELSE 0 END) AS jitter, (CASE WHEN
link_status=1 THEN packetloss ELSE 100 END) AS packetloss, (CASE WHEN sla_failed=1 AND
metric='packetloss' THEN 1 ELSE 0 END) AS failed_packetloss, (CASE WHEN sla_failed=1 AND
metric='jitter' THEN 1 ELSE 0 END) AS failed_jitter, (CASE WHEN sla_failed=1 AND
metric='latency' THEN 1 ELSE 0 END) AS failed_latency, (CASE WHEN sla_failed=1 THEN 3 ELSE
sdwan_status END) AS sdwan_status,  (CASE WHEN link_status=1 THEN inbandwidth ELSE 0 END) AS
inbandwidth,  (CASE WHEN link_status=1 THEN outbandwidth ELSE 0 END) AS outbandwidth,  (CASE
WHEN link_status=1 THEN bibandwidth ELSE 0 END) AS bibandwidth from (select itime, csf,
devname, devid, vd, interface, healthcheck, (CASE WHEN status='down' THEN 0 ELSE 1 END) AS
link_status, latency::float as latency, jitter::float as jitter, trim(trailing '%' from
packetloss)::float as packetloss, (CASE WHEN status='down' THEN 1 WHEN msg LIKE '%SLA
failed%' THEN 1 ELSE 0 END) AS sla_failed, metric, (CASE WHEN msg LIKE '%SLA status%' THEN 1
ELSE 0 END) AS sdwan_status, convert_unit_to_num(inbandwidthused) as inbandwidth, convert_
unit_to_num(outbandwidthused) as outbandwidth, convert_unit_to_num(bibandwidthused) as
bibandwidth from $log where $filter and logid_to_int(logid) in (22925, 22933, 22936) and
interface is not null) t ) t group by timestamp, csf, devname, devid, vd, interface,
healthcheck /*SkipSTART*/order by timestamp desc/*SkipEND*/)### t where packetloss is not
null group by timestamp, intf_sla having sum(count)>0) t1 inner join (select interface ||
':' || sla_rule as intf_sla, count(*) as num_intf from ###(select $flex_timestamp as
timestamp, csf, devname, devid, vd, interface, healthcheck as sla_rule, sum(link_status) as
link_status, sum(failed_latency) as failed_latency, sum(failed_jitter) as failed_jitter,
sum(failed_packetloss) as failed_packetloss, sum(latency) as latency, max(latency) as
latency_max, min(latency) as latency_min, sum(jitter) as jitter, max(jitter) as jitter_max,
min(jitter) as jitter_min, sum(packetloss) as packetloss, max(packetloss) as packetloss_max,
min(packetloss) as packetloss_min, sum(inbandwidth) as inbandwidth, sum(outbandwidth) as
outbandwidth, sum(bibandwidth) as bibandwidth, count(*) as count, sum(CASE WHEN link_
status=1 THEN 1 ELSE 0 END) AS count_linkup, min(sdwan_status) as sdwan_status from (select
itime, csf, devname, devid, vd, interface, healthcheck, link_status, (CASE WHEN link_
status=1 THEN latency ELSE 0 END) AS latency, (CASE WHEN link_status=1 THEN jitter ELSE 0
END) AS jitter, (CASE WHEN link_status=1 THEN packetloss ELSE 100 END) AS packetloss, (CASE
WHEN sla_failed=1 AND metric='packetloss' THEN 1 ELSE 0 END) AS failed_packetloss, (CASE
WHEN sla_failed=1 AND metric='jitter' THEN 1 ELSE 0 END) AS failed_jitter, (CASE WHEN sla_
failed=1 AND metric='latency' THEN 1 ELSE 0 END) AS failed_latency, (CASE WHEN sla_failed=1
THEN 3 ELSE sdwan_status END) AS sdwan_status,  (CASE WHEN link_status=1 THEN inbandwidth
ELSE 0 END) AS inbandwidth,  (CASE WHEN link_status=1 THEN outbandwidth ELSE 0 END) AS
outbandwidth,  (CASE WHEN link_status=1 THEN bibandwidth ELSE 0 END) AS bibandwidth from
(select itime, csf, devname, devid, vd, interface, healthcheck, (CASE WHEN status='down'
THEN 0 ELSE 1 END) AS link_status, latency::float as latency, jitter::float as jitter, trim
(trailing '%' from packetloss)::float as packetloss, (CASE WHEN status='down' THEN 1 WHEN
msg LIKE '%SLA failed%' THEN 1 ELSE 0 END) AS sla_failed, metric, (CASE WHEN msg LIKE '%SLA
status%' THEN 1 ELSE 0 END) AS sdwan_status, convert_unit_to_num(inbandwidthused) as
inbandwidth, convert_unit_to_num(outbandwidthused) as outbandwidth, convert_unit_to_num
(bibandwidthused) as bibandwidth from $log where $filter and logid_to_int(logid) in (22925,
22933, 22936) and interface is not null) t ) t group by timestamp, csf, devname, devid, vd,
interface, healthcheck /*SkipSTART*/order by timestamp desc/*SkipEND*/)### t where $filter-
drilldown and sla_rule is not null group by intf_sla order by num_intf desc limit 10)t2 on
t1.intf_sla=t2.intf_sla group by hodex, t1.intf_sla order by hodex
```

Dataset Name	Description	Log Category
sdwan-device-sla-intf-latency-pass-percent	SD-WAN Device Latency Pass Percentage by SLA rules and Interface	event

```
select
  sla_rule,
  interface,
  cast(
    100 *(
      1 - sum(failed_latency)/ sum(count_linkup)
    ) as decimal(18, 2)
  ) as latency
from
  ###(select $flex_timestamp as timestamp, csf, devname, devid, vd, interface, healthcheck
as sla_rule, sum(link_status) as link_status, sum(failed_latency) as failed_latency, sum
(failed_jitter) as failed_jitter,  sum(failed_packetloss) as failed_packetloss, sum(latency)
as latency, max(latency) as latency_max, min(latency) as latency_min, sum(jitter) as jitter,
max(jitter) as jitter_max, min(jitter) as jitter_min, sum(packetloss) as packetloss, max
(packetloss) as packetloss_max, min(packetloss) as packetloss_min, sum(inbandwidth) as
inbandwidth, sum(outbandwidth) as outbandwidth, sum(bibandwidth) as bibandwidth, count(*) as
count, sum(CASE WHEN link_status=1 THEN 1 ELSE 0 END) AS count_linkup, min(sdwan_status) as
sdwan_status from (select itime, csf, devname, devid, vd, interface, healthcheck, link_
status, (CASE WHEN link_status=1 THEN latency ELSE 0 END) AS latency, (CASE WHEN link_
status=1 THEN jitter ELSE 0 END) AS jitter, (CASE WHEN link_status=1 THEN packetloss ELSE
100 END) AS packetloss, (CASE WHEN sla_failed=1 AND metric='packetloss' THEN 1 ELSE 0 END)
AS failed_packetloss, (CASE WHEN sla_failed=1 AND metric='jitter' THEN 1 ELSE 0 END) AS
failed_jitter, (CASE WHEN sla_failed=1 AND metric='latency' THEN 1 ELSE 0 END) AS failed_
latency, (CASE WHEN sla_failed=1 THEN 3 ELSE sdwan_status END) AS sdwan_status,  (CASE WHEN
link_status=1 THEN inbandwidth ELSE 0 END) AS inbandwidth,  (CASE WHEN link_status=1 THEN
outbandwidth ELSE 0 END) AS outbandwidth,  (CASE WHEN link_status=1 THEN bibandwidth ELSE 0
END) AS bibandwidth from (select itime, csf, devname, devid, vd, interface, healthcheck,
(CASE WHEN status='down' THEN 0 ELSE 1 END) AS link_status, latency::float as latency,
jitter::float as jitter, trim(trailing '%' from packetloss)::float as packetloss, (CASE WHEN
status='down' THEN 1 WHEN msg LIKE '%SLA failed%' THEN 1 ELSE 0 END) AS sla_failed, metric,
(CASE WHEN msg LIKE '%SLA status%' THEN 1 ELSE 0 END) AS sdwan_status, convert_unit_to_num
(inbandwidthused) as inbandwidth, convert_unit_to_num(outbandwidthused) as outbandwidth,
convert_unit_to_num(bibandwidthused) as bibandwidth from $log where $filter and logid_to_int
(logid) in (22925, 22933, 22936) and interface is not null) t ) t group by timestamp, csf,
devname, devid, vd, interface, healthcheck /*SkipSTART*/order by timestamp
desc/*SkipEND*/)### t where $filter-drilldown group by sla_rule, interface having sum(count_
linkup)>0 order by latency desc
```

Dataset Name	Description	Log Category
sdwan-device-sla-intf-jitter-pass-percent	SD-WAN Device Jitter Pass Percentage by SLA rules and Interface	event

```
select
  sla_rule,
  interface,
  cast(
    100 *(
      1 - sum(failed_jitter)/ sum(count_linkup)
    ) as decimal(18, 2)
  ) as jitter
from
  ###(select $flex_timestamp as timestamp, csf, devname, devid, vd, interface, healthcheck
as sla_rule, sum(link_status) as link_status, sum(failed_latency) as failed_latency, sum
(failed_jitter) as failed_jitter,  sum(failed_packetloss) as failed_packetloss, sum(latency)
as latency, max(latency) as latency_max, min(latency) as latency_min, sum(jitter) as jitter,
max(jitter) as jitter_max, min(jitter) as jitter_min, sum(packetloss) as packetloss, max
(packetloss) as packetloss_max, min(packetloss) as packetloss_min, sum(inbandwidth) as
inbandwidth, sum(outbandwidth) as outbandwidth, sum(bibandwidth) as bibandwidth, count(*) as
count, sum(CASE WHEN link_status=1 THEN 1 ELSE 0 END) AS count_linkup, min(sdwan_status) as
sdwan_status from (select itime, csf, devname, devid, vd, interface, healthcheck, link_
status, (CASE WHEN link_status=1 THEN latency ELSE 0 END) AS latency, (CASE WHEN link_
status=1 THEN jitter ELSE 0 END) AS jitter, (CASE WHEN link_status=1 THEN packetloss ELSE
100 END) AS packetloss, (CASE WHEN sla_failed=1 AND metric='packetloss' THEN 1 ELSE 0 END)
AS failed_packetloss, (CASE WHEN sla_failed=1 AND metric='jitter' THEN 1 ELSE 0 END) AS
failed_jitter, (CASE WHEN sla_failed=1 AND metric='latency' THEN 1 ELSE 0 END) AS failed_
latency, (CASE WHEN sla_failed=1 THEN 3 ELSE sdwan_status END) AS sdwan_status,  (CASE WHEN
link_status=1 THEN inbandwidth ELSE 0 END) AS inbandwidth,  (CASE WHEN link_status=1 THEN
outbandwidth ELSE 0 END) AS outbandwidth,  (CASE WHEN link_status=1 THEN bibandwidth ELSE 0
END) AS bibandwidth from (select itime, csf, devname, devid, vd, interface, healthcheck,
(CASE WHEN status='down' THEN 0 ELSE 1 END) AS link_status, latency::float as latency,
jitter::float as jitter, trim(trailing '%' from packetloss)::float as packetloss, (CASE WHEN
status='down' THEN 1 WHEN msg LIKE '%SLA failed%' THEN 1 ELSE 0 END) AS sla_failed, metric,
(CASE WHEN msg LIKE '%SLA status%' THEN 1 ELSE 0 END) AS sdwan_status, convert_unit_to_num
(inbandwidthused) as inbandwidth, convert_unit_to_num(outbandwidthused) as outbandwidth,
convert_unit_to_num(bibandwidthused) as bibandwidth from $log where $filter and logid_to_int
(logid) in (22925, 22933, 22936) and interface is not null) t ) t group by timestamp, csf,
devname, devid, vd, interface, healthcheck /*SkipSTART*/order by timestamp
desc/*SkipEND*/)### t where $filter-drilldown group by sla_rule, interface having sum(count_
linkup)>0 order by jitter desc
```

Dataset Name	Description	Log Category
sdwan-device-sla-intf-packetloss-pass-percent	SD-WAN Device Packet Loss Pass Percentage by SLA rules and Interface	event

```
select
  sla_rule,
  interface,
  cast(
    100 *(
      1 - sum(failed_packetloss)/ sum(count_linkup)
    ) as decimal(18, 2)
  ) as packetloss
```

```
from
  ###(select $flex_timestamp as timestamp, csf, devname, devid, vd, interface, healthcheck
as sla_rule, sum(link_status) as link_status, sum(failed_latency) as failed_latency, sum
(failed_jitter) as failed_jitter,  sum(failed_packetloss) as failed_packetloss, sum(latency)
as latency, max(latency) as latency_max, min(latency) as latency_min, sum(jitter) as jitter,
max(jitter) as jitter_max, min(jitter) as jitter_min, sum(packetloss) as packetloss, max
(packetloss) as packetloss_max, min(packetloss) as packetloss_min, sum(inbandwidth) as
inbandwidth, sum(outbandwidth) as outbandwidth, sum(bibandwidth) as bibandwidth, count(*) as
count, sum(CASE WHEN link_status=1 THEN 1 ELSE 0 END) AS count_linkup, min(sdwan_status) as
sdwan_status from (select itime, csf, devname, devid, vd, interface, healthcheck, link_
status, (CASE WHEN link_status=1 THEN latency ELSE 0 END) AS latency, (CASE WHEN link_
status=1 THEN jitter ELSE 0 END) AS jitter, (CASE WHEN link_status=1 THEN packetloss ELSE
100 END) AS packetloss, (CASE WHEN sla_failed=1 AND metric='packetloss' THEN 1 ELSE 0 END)
AS failed_packetloss, (CASE WHEN sla_failed=1 AND metric='jitter' THEN 1 ELSE 0 END) AS
failed_jitter, (CASE WHEN sla_failed=1 AND metric='latency' THEN 1 ELSE 0 END) AS failed_
latency, (CASE WHEN sla_failed=1 THEN 3 ELSE sdwan_status END) AS sdwan_status,  (CASE WHEN
link_status=1 THEN inbandwidth ELSE 0 END) AS inbandwidth,  (CASE WHEN link_status=1 THEN
outbandwidth ELSE 0 END) AS outbandwidth,  (CASE WHEN link_status=1 THEN bibandwidth ELSE 0
END) AS bibandwidth from (select itime, csf, devname, devid, vd, interface, healthcheck,
(CASE WHEN status='down' THEN 0 ELSE 1 END) AS link_status, latency::float as latency,
jitter::float as jitter, trim(trailing '%' from packetloss)::float as packetloss, (CASE WHEN
status='down' THEN 1 WHEN msg LIKE '%SLA failed%' THEN 1 ELSE 0 END) AS sla_failed, metric,
(CASE WHEN msg LIKE '%SLA status%' THEN 1 ELSE 0 END) AS sdwan_status, convert_unit_to_num
(inbandwidthused) as inbandwidth, convert_unit_to_num(outbandwidthused) as outbandwidth,
convert_unit_to_num(bibandwidthused) as bibandwidth from $log where $filter and logid_to_int
(logid) in (22925, 22933, 22936) and interface is not null) t ) t group by timestamp, csf,
devname, devid, vd, interface, healthcheck /*SkipSTART*/order by timestamp
desc/*SkipEND*/)### t where $filter-drilldown group by sla_rule, interface having sum(count_
linkup)>0 order by packetloss desc
```

Dataset Name	Description	Log Category
sdwan-Device-Intf-List-by-Availability	SD-WAN Device Interface List by Availability	event

```
select
  devname || & #039;:' || interface as dev_intf, sum(count_linkup)/sum(count) as available
from ###(select $flex_timestamp as timestamp, csf, devname, devid, vd, interface,
healthcheck as sla_rule, sum(link_status) as link_status, sum(failed_latency) as failed_
latency, sum(failed_jitter) as failed_jitter,  sum(failed_packetloss) as failed_packetloss,
sum(latency) as latency, max(latency) as latency_max, min(latency) as latency_min, sum
(jitter) as jitter, max(jitter) as jitter_max, min(jitter) as jitter_min, sum(packetloss) as
packetloss, max(packetloss) as packetloss_max, min(packetloss) as packetloss_min, sum
(inbandwidth) as inbandwidth, sum(outbandwidth) as outbandwidth, sum(bibandwidth) as
bibandwidth, count(*) as count, sum(CASE WHEN link_status=1 THEN 1 ELSE 0 END) AS count_
linkup, min(sdwan_status) as sdwan_status from (select itime, csf, devname, devid, vd,
interface, healthcheck, link_status, (CASE WHEN link_status=1 THEN latency ELSE 0 END) AS
latency, (CASE WHEN link_status=1 THEN jitter ELSE 0 END) AS jitter, (CASE WHEN link_
status=1 THEN packetloss ELSE 100 END) AS packetloss, (CASE WHEN sla_failed=1 AND
metric='packetloss' THEN 1 ELSE 0 END) AS failed_packetloss, (CASE WHEN sla_failed=1 AND
metric='jitter' THEN 1 ELSE 0 END) AS failed_jitter, (CASE WHEN sla_failed=1 AND
metric='latency' THEN 1 ELSE 0 END) AS failed_latency, (CASE WHEN sla_failed=1 THEN 3 ELSE
sdwan_status END) AS sdwan_status,  (CASE WHEN link_status=1 THEN inbandwidth ELSE 0 END) AS
inbandwidth,  (CASE WHEN link_status=1 THEN outbandwidth ELSE 0 END) AS outbandwidth,  (CASE
WHEN link_status=1 THEN bibandwidth ELSE 0 END) AS bibandwidth from (select itime, csf,
devname, devid, vd, interface, healthcheck, (CASE WHEN status='down' THEN 0 ELSE 1 END) AS
link_status, latency::float as latency, jitter::float as jitter, trim(trailing '%' from
packetloss)::float as packetloss, (CASE WHEN status='down' THEN 1 WHEN msg LIKE '%SLA
failed%' THEN 1 ELSE 0 END) AS sla_failed, metric, (CASE WHEN msg LIKE '%SLA status%' THEN 1
ELSE 0 END) AS sdwan_status, convert_unit_to_num(inbandwidthused) as inbandwidth, convert_
unit_to_num(outbandwidthused) as outbandwidth, convert_unit_to_num(bibandwidthused) as
bibandwidth from $log where $filter and logid_to_int(logid) in (22925, 22933, 22936) and
interface is not null) t ) t group by timestamp, csf, devname, devid, vd, interface,
healthcheck /*SkipSTART*/order by timestamp desc/*SkipEND*/)### t where $filter-drilldown
group by dev_intf having sum(count)>0 order by dev_intf
```

Dataset Name	Description	Log Category
sdwan-Device-Intf-Updown-Timeline	SD-WAN Device Interface Updown Time Line	event

```
select
  $fv_line_timescale(timestamp) as hodex,
  devname || & #039;:' || interface as dev_intf, cast(100*sum(count_linkup)/sum(count) as
decimal(10,2)) as sdwan_status from ###(select $flex_timestamp as timestamp, csf, devname,
devid, vd, interface, healthcheck as sla_rule, sum(link_status) as link_status, sum(failed_
latency) as failed_latency, sum(failed_jitter) as failed_jitter,  sum(failed_packetloss) as
failed_packetloss, sum(latency) as latency, max(latency) as latency_max, min(latency) as
latency_min, sum(jitter) as jitter, max(jitter) as jitter_max, min(jitter) as jitter_min,
sum(packetloss) as packetloss, max(packetloss) as packetloss_max, min(packetloss) as
packetloss_min, sum(inbandwidth) as inbandwidth, sum(outbandwidth) as outbandwidth, sum
(bibandwidth) as bibandwidth, count(*) as count, sum(CASE WHEN link_status=1 THEN 1 ELSE 0
END) AS count_linkup, min(sdwan_status) as sdwan_status from (select itime, csf, devname,
devid, vd, interface, healthcheck, link_status, (CASE WHEN link_status=1 THEN latency ELSE 0
END) AS latency, (CASE WHEN link_status=1 THEN jitter ELSE 0 END) AS jitter, (CASE WHEN
link_status=1 THEN packetloss ELSE 100 END) AS packetloss, (CASE WHEN sla_failed=1 AND
metric='packetloss' THEN 1 ELSE 0 END) AS failed_packetloss, (CASE WHEN sla_failed=1 AND
metric='jitter' THEN 1 ELSE 0 END) AS failed_jitter, (CASE WHEN sla_failed=1 AND
metric='latency' THEN 1 ELSE 0 END) AS failed_latency, (CASE WHEN sla_failed=1 THEN 3 ELSE
sdwan_status END) AS sdwan_status,  (CASE WHEN link_status=1 THEN inbandwidth ELSE 0 END) AS
inbandwidth,  (CASE WHEN link_status=1 THEN outbandwidth ELSE 0 END) AS outbandwidth,  (CASE
WHEN link_status=1 THEN bibandwidth ELSE 0 END) AS bibandwidth from (select itime, csf,
devname, devid, vd, interface, healthcheck, (CASE WHEN status='down' THEN 0 ELSE 1 END) AS
link_status, latency::float as latency, jitter::float as jitter, trim(trailing '%' from
packetloss)::float as packetloss, (CASE WHEN status='down' THEN 1 WHEN msg LIKE '%SLA
failed%' THEN 1 ELSE 0 END) AS sla_failed, metric, (CASE WHEN msg LIKE '%SLA status%' THEN 1
ELSE 0 END) AS sdwan_status, convert_unit_to_num(inbandwidthused) as inbandwidth, convert_
unit_to_num(outbandwidthused) as outbandwidth, convert_unit_to_num(bibandwidthused) as
bibandwidth from $log where $filter and logid_to_int(logid) in (22925, 22933, 22936) and
interface is not null) t ) t group by timestamp, csf, devname, devid, vd, interface,
healthcheck /*SkipSTART*/order by timestamp desc/*SkipEND*/)### t group by hodex, dev_intf
order by hodex
```

Dataset Name	Description	Log Category
sdwan-Device-Availability-status	SD-WAN Device Statistic by Bibandwidth	event

```
select
  devid,
  sum(bibandwidth)/ sum(count) as bibandwidth
from
  ###(select $flex_timestamp as timestamp, csf, devname, devid, vd, interface, healthcheck
as sla_rule, sum(link_status) as link_status, sum(failed_latency) as failed_latency, sum
(failed_jitter) as failed_jitter,  sum(failed_packetloss) as failed_packetloss, sum(latency)
as latency, max(latency) as latency_max, min(latency) as latency_min, sum(jitter) as jitter,
max(jitter) as jitter_max, min(jitter) as jitter_min, sum(packetloss) as packetloss, max
(packetloss) as packetloss_max, min(packetloss) as packetloss_min, sum(inbandwidth) as
inbandwidth, sum(outbandwidth) as outbandwidth, sum(bibandwidth) as bibandwidth, count(*) as
count, sum(CASE WHEN link_status=1 THEN 1 ELSE 0 END) AS count_linkup, min(sdwan_status) as
sdwan_status from (select itime, csf, devname, devid, vd, interface, healthcheck, link_
status, (CASE WHEN link_status=1 THEN latency ELSE 0 END) AS latency, (CASE WHEN link_
status=1 THEN jitter ELSE 0 END) AS jitter, (CASE WHEN link_status=1 THEN packetloss ELSE
100 END) AS packetloss, (CASE WHEN sla_failed=1 AND metric='packetloss' THEN 1 ELSE 0 END)
AS failed_packetloss, (CASE WHEN sla_failed=1 AND metric='jitter' THEN 1 ELSE 0 END) AS
failed_jitter, (CASE WHEN sla_failed=1 AND metric='latency' THEN 1 ELSE 0 END) AS failed_
latency, (CASE WHEN sla_failed=1 THEN 3 ELSE sdwan_status END) AS sdwan_status,  (CASE WHEN
link_status=1 THEN inbandwidth ELSE 0 END) AS inbandwidth,  (CASE WHEN link_status=1 THEN
outbandwidth ELSE 0 END) AS outbandwidth,  (CASE WHEN link_status=1 THEN bibandwidth ELSE 0
END) AS bibandwidth from (select itime, csf, devname, devid, vd, interface, healthcheck,
(CASE WHEN status='down' THEN 0 ELSE 1 END) AS link_status, latency::float as latency,
jitter::float as jitter, trim(trailing '%' from packetloss)::float as packetloss, (CASE WHEN
status='down' THEN 1 WHEN msg LIKE '%SLA failed%' THEN 1 ELSE 0 END) AS sla_failed, metric,
(CASE WHEN msg LIKE '%SLA status%' THEN 1 ELSE 0 END) AS sdwan_status, convert_unit_to_num
(inbandwidthused) as inbandwidth, convert_unit_to_num(outbandwidthused) as outbandwidth,
convert_unit_to_num(bibandwidthused) as bibandwidth from $log where $filter and logid_to_int
(logid) in (22925, 22933, 22936) and interface is not null) t ) t group by timestamp, csf,
devname, devid, vd, interface, healthcheck /*SkipSTART*/order by timestamp
desc/*SkipEND*/)### t where $filter-drilldown and bibandwidth is not null group by devid
having sum(count)>0 order by bibandwidth desc
```

Dataset Name	Description	Log Category
sdwan-device-intf-availability-percentage-bar	SD-WAN Device Interface Availability Percentage	event

```
(
  select
    & #039;SD-WAN' as interface, cast(sum(availcnt)*100.0/sum(count) as decimal(18,2)) as
available from (select timestamp, devid, first_value(count) OVER (PARTITION BY timestamp,
devid ORDER BY link_status/count desc, count desc) as count, first_value(link_status) OVER
(PARTITION BY timestamp, devid ORDER BY link_status/count desc, count desc) as availcnt from
(select timestamp, devid, interface, sum(link_status) as link_status, sum(count) as count
from ###(select $flex_timestamp as timestamp, csf, devname, devid, vd, interface,
healthcheck as sla_rule, sum(link_status) as link_status, sum(failed_latency) as failed_
latency, sum(failed_jitter) as failed_jitter,  sum(failed_packetloss) as failed_packetloss,
sum(latency) as latency, max(latency) as latency_max, min(latency) as latency_min, sum
(jitter) as jitter, max(jitter) as jitter_max, min(jitter) as jitter_min, sum(packetloss) as
packetloss, max(packetloss) as packetloss_max, min(packetloss) as packetloss_min, sum
(inbandwidth) as inbandwidth, sum(outbandwidth) as outbandwidth, sum(bibandwidth) as
bibandwidth, count(*) as count, sum(CASE WHEN link_status=1 THEN 1 ELSE 0 END) AS count_
linkup, min(sdwan_status) as sdwan_status from (select itime, csf, devname, devid, vd,
interface, healthcheck, link_status, (CASE WHEN link_status=1 THEN latency ELSE 0 END) AS
latency, (CASE WHEN link_status=1 THEN jitter ELSE 0 END) AS jitter, (CASE WHEN link_
status=1 THEN packetloss ELSE 100 END) AS packetloss, (CASE WHEN sla_failed=1 AND
metric='packetloss' THEN 1 ELSE 0 END) AS failed_packetloss, (CASE WHEN sla_failed=1 AND
metric='jitter' THEN 1 ELSE 0 END) AS failed_jitter, (CASE WHEN sla_failed=1 AND
metric='latency' THEN 1 ELSE 0 END) AS failed_latency, (CASE WHEN sla_failed=1 THEN 3 ELSE
sdwan_status END) AS sdwan_status,  (CASE WHEN link_status=1 THEN inbandwidth ELSE 0 END) AS
inbandwidth,  (CASE WHEN link_status=1 THEN outbandwidth ELSE 0 END) AS outbandwidth,  (CASE
WHEN link_status=1 THEN bibandwidth ELSE 0 END) AS bibandwidth from (select itime, csf,
devname, devid, vd, interface, healthcheck, (CASE WHEN status='down' THEN 0 ELSE 1 END) AS
link_status, latency::float as latency, jitter::float as jitter, trim(trailing '%' from
packetloss)::float as packetloss, (CASE WHEN status='down' THEN 1 WHEN msg LIKE '%SLA
failed%' THEN 1 ELSE 0 END) AS sla_failed, metric, (CASE WHEN msg LIKE '%SLA status%' THEN 1
ELSE 0 END) AS sdwan_status, convert_unit_to_num(inbandwidthused) as inbandwidth, convert_
unit_to_num(outbandwidthused) as outbandwidth, convert_unit_to_num(bibandwidthused) as
bibandwidth from $log where $filter and logid_to_int(logid) in (22925, 22933, 22936) and
interface is not null) t ) t group by timestamp, csf, devname, devid, vd, interface,
healthcheck /*SkipSTART*/order by timestamp desc/*SkipEND*/)### t where $filter-drilldown
and count>0 group by timestamp, devid, interface)t) t group by interface) union all (select
interface, cast(sum(link_status)*100.0/sum(count) as decimal(18,2)) as available from ###
(select $flex_timestamp as timestamp, csf, devname, devid, vd, interface, healthcheck as
sla_rule, sum(link_status) as link_status, sum(failed_latency) as failed_latency, sum
(failed_jitter) as failed_jitter,  sum(failed_packetloss) as failed_packetloss, sum(latency)
as latency, max(latency) as latency_max, min(latency) as latency_min, sum(jitter) as jitter,
max(jitter) as jitter_max, min(jitter) as jitter_min, sum(packetloss) as packetloss, max
(packetloss) as packetloss_max, min(packetloss) as packetloss_min, sum(inbandwidth) as
inbandwidth, sum(outbandwidth) as outbandwidth, sum(bibandwidth) as bibandwidth, count(*) as
count, sum(CASE WHEN link_status=1 THEN 1 ELSE 0 END) AS count_linkup, min(sdwan_status) as
sdwan_status from (select itime, csf, devname, devid, vd, interface, healthcheck, link_
status, (CASE WHEN link_status=1 THEN latency ELSE 0 END) AS latency, (CASE WHEN link_
status=1 THEN jitter ELSE 0 END) AS jitter, (CASE WHEN link_status=1 THEN packetloss ELSE
100 END) AS packetloss, (CASE WHEN sla_failed=1 AND metric='packetloss' THEN 1 ELSE 0 END)
AS failed_packetloss, (CASE WHEN sla_failed=1 AND metric='jitter' THEN 1 ELSE 0 END) AS
failed_jitter, (CASE WHEN sla_failed=1 AND metric='latency' THEN 1 ELSE 0 END) AS failed_
latency, (CASE WHEN sla_failed=1 THEN 3 ELSE sdwan_status END) AS sdwan_status,  (CASE WHEN
link_status=1 THEN inbandwidth ELSE 0 END) AS inbandwidth,  (CASE WHEN link_status=1 THEN
outbandwidth ELSE 0 END) AS outbandwidth,  (CASE WHEN link_status=1 THEN bibandwidth ELSE 0
END) AS bibandwidth from (select itime, csf, devname, devid, vd, interface, healthcheck,
(CASE WHEN status='down' THEN 0 ELSE 1 END) AS link_status, latency::float as latency,
jitter::float as jitter, trim(trailing '%' from packetloss)::float as packetloss, (CASE WHEN
status='down' THEN 1 WHEN msg LIKE '%SLA failed%' THEN 1 ELSE 0 END) AS sla_failed, metric,
(CASE WHEN msg LIKE '%SLA status%' THEN 1 ELSE 0 END) AS sdwan_status, convert_unit_to_num
(inbandwidthused) as inbandwidth, convert_unit_to_num(outbandwidthused) as outbandwidth,
convert_unit_to_num(bibandwidthused) as bibandwidth from $log where $filter and logid_to_int
(logid) in (22925, 22933, 22936) and interface is not null) t ) t group by timestamp, csf,
devname, devid, vd, interface, healthcheck /*SkipSTART*/order by timestamp
desc/*SkipEND*/)### t where $filter-drilldown group by interface order by interface)
```

Dataset Name	Description	Log Category
sdwan-device-intf-availability-percentage-donut	SD-WAN Device Interface Availability Percentage Donut	event

```
select
  interface,
  unnest(avail) as avail,
  unnest(val) as val
from
  (
    select
      interface,
      array[ & #039;Available', 'Unavailable'] as avail, array[available, 100-available] as
val from ((select 'SD-WAN' as interface, cast(sum(availcnt)*100.0/sum(count) as decimal
(18,2)) as available from (select timestamp, devid, first_value(count) OVER (PARTITION BY
timestamp, devid ORDER BY link_status/count desc, count desc) as count, first_value(link_
status) OVER (PARTITION BY timestamp, devid ORDER BY link_status/count desc, count desc) as
availcnt from (select timestamp, devid, interface, sum(link_status) as link_status, sum
(count) as count from ###(select $flex_timestamp as timestamp, csf, devname, devid, vd,
interface, healthcheck as sla_rule, sum(link_status) as link_status, sum(failed_latency) as
failed_latency, sum(failed_jitter) as failed_jitter,  sum(failed_packetloss) as failed_
packetloss, sum(latency) as latency, max(latency) as latency_max, min(latency) as latency_
min, sum(jitter) as jitter, max(jitter) as jitter_max, min(jitter) as jitter_min, sum
(packetloss) as packetloss, max(packetloss) as packetloss_max, min(packetloss) as
packetloss_min, sum(inbandwidth) as inbandwidth, sum(outbandwidth) as outbandwidth, sum
(bibandwidth) as bibandwidth, count(*) as count, sum(CASE WHEN link_status=1 THEN 1 ELSE 0
END) AS count_linkup, min(sdwan_status) as sdwan_status from (select itime, csf, devname,
devid, vd, interface, healthcheck, link_status, (CASE WHEN link_status=1 THEN latency ELSE 0
END) AS latency, (CASE WHEN link_status=1 THEN jitter ELSE 0 END) AS jitter, (CASE WHEN
link_status=1 THEN packetloss ELSE 100 END) AS packetloss, (CASE WHEN sla_failed=1 AND
metric='packetloss' THEN 1 ELSE 0 END) AS failed_packetloss, (CASE WHEN sla_failed=1 AND
metric='jitter' THEN 1 ELSE 0 END) AS failed_jitter, (CASE WHEN sla_failed=1 AND
metric='latency' THEN 1 ELSE 0 END) AS failed_latency, (CASE WHEN sla_failed=1 THEN 3 ELSE
sdwan_status END) AS sdwan_status,  (CASE WHEN link_status=1 THEN inbandwidth ELSE 0 END) AS
inbandwidth,  (CASE WHEN link_status=1 THEN outbandwidth ELSE 0 END) AS outbandwidth,  (CASE
WHEN link_status=1 THEN bibandwidth ELSE 0 END) AS bibandwidth from (select itime, csf,
devname, devid, vd, interface, healthcheck, (CASE WHEN status='down' THEN 0 ELSE 1 END) AS
link_status, latency::float as latency, jitter::float as jitter, trim(trailing '%' from
packetloss)::float as packetloss, (CASE WHEN status='down' THEN 1 WHEN msg LIKE '%SLA
failed%' THEN 1 ELSE 0 END) AS sla_failed, metric, (CASE WHEN msg LIKE '%SLA status%' THEN 1
ELSE 0 END) AS sdwan_status, convert_unit_to_num(inbandwidthused) as inbandwidth, convert_
unit_to_num(outbandwidthused) as outbandwidth, convert_unit_to_num(bibandwidthused) as
bibandwidth from $log where $filter and logid_to_int(logid) in (22925, 22933, 22936) and
interface is not null) t ) t group by timestamp, csf, devname, devid, vd, interface,
healthcheck /*SkipSTART*/order by timestamp desc/*SkipEND*/)### t where $filter-drilldown
and count>0 group by timestamp, devid, interface)t) t group by interface) union all (select
interface, cast(sum(link_status)*100.0/sum(count) as decimal(18,2)) as available from ###
(select $flex_timestamp as timestamp, csf, devname, devid, vd, interface, healthcheck as
sla_rule, sum(link_status) as link_status, sum(failed_latency) as failed_latency, sum
(failed_jitter) as failed_jitter,  sum(failed_packetloss) as failed_packetloss, sum(latency)
as latency, max(latency) as latency_max, min(latency) as latency_min, sum(jitter) as jitter,
max(jitter) as jitter_max, min(jitter) as jitter_min, sum(packetloss) as packetloss, max
(packetloss) as packetloss_max, min(packetloss) as packetloss_min, sum(inbandwidth) as
inbandwidth, sum(outbandwidth) as outbandwidth, sum(bibandwidth) as bibandwidth, count(*) as
count, sum(CASE WHEN link_status=1 THEN 1 ELSE 0 END) AS count_linkup, min(sdwan_status) as
sdwan_status from (select itime, csf, devname, devid, vd, interface, healthcheck, link_
status, (CASE WHEN link_status=1 THEN latency ELSE 0 END) AS latency, (CASE WHEN link_
status=1 THEN jitter ELSE 0 END) AS jitter, (CASE WHEN link_status=1 THEN packetloss ELSE
100 END) AS packetloss, (CASE WHEN sla_failed=1 AND metric='packetloss' THEN 1 ELSE 0 END)
AS failed_packetloss, (CASE WHEN sla_failed=1 AND metric='jitter' THEN 1 ELSE 0 END) AS
failed_jitter, (CASE WHEN sla_failed=1 AND metric='latency' THEN 1 ELSE 0 END) AS failed_
latency, (CASE WHEN sla_failed=1 THEN 3 ELSE sdwan_status END) AS sdwan_status,  (CASE WHEN
link_status=1 THEN inbandwidth ELSE 0 END) AS inbandwidth,  (CASE WHEN link_status=1 THEN
outbandwidth ELSE 0 END) AS outbandwidth,  (CASE WHEN link_status=1 THEN bibandwidth ELSE 0
END) AS bibandwidth from (select itime, csf, devname, devid, vd, interface, healthcheck,
(CASE WHEN status='down' THEN 0 ELSE 1 END) AS link_status, latency::float as latency,
jitter::float as jitter, trim(trailing '%' from packetloss)::float as packetloss, (CASE WHEN
status='down' THEN 1 WHEN msg LIKE '%SLA failed%' THEN 1 ELSE 0 END) AS sla_failed, metric,
(CASE WHEN msg LIKE '%SLA status%' THEN 1 ELSE 0 END) AS sdwan_status, convert_unit_to_num
(inbandwidthused) as inbandwidth, convert_unit_to_num(outbandwidthused) as outbandwidth,
convert_unit_to_num(bibandwidthused) as bibandwidth from $log where $filter and logid_to_int
(logid) in (22925, 22933, 22936) and interface is not null) t ) t group by timestamp, csf,
devname, devid, vd, interface, healthcheck /*SkipSTART*/order by timestamp
desc/*SkipEND*/)### t where $filter-drilldown group by interface order by interface)) t) t
```

Dataset Name	Description	Log Category
sdwan-Device-Application-sdwan-Rules-and-Ports-drilldown	SD-WAN Device Statistic by Bibandwidth	event

```
select
  devid,
  sum(bibandwidth)/ sum(count) as bibandwidth
from
  ###(select $flex_timestamp as timestamp, csf, devname, devid, vd, interface, healthcheck
as sla_rule, sum(link_status) as link_status, sum(failed_latency) as failed_latency, sum
(failed_jitter) as failed_jitter,  sum(failed_packetloss) as failed_packetloss, sum(latency)
as latency, max(latency) as latency_max, min(latency) as latency_min, sum(jitter) as jitter,
max(jitter) as jitter_max, min(jitter) as jitter_min, sum(packetloss) as packetloss, max
(packetloss) as packetloss_max, min(packetloss) as packetloss_min, sum(inbandwidth) as
inbandwidth, sum(outbandwidth) as outbandwidth, sum(bibandwidth) as bibandwidth, count(*) as
count, sum(CASE WHEN link_status=1 THEN 1 ELSE 0 END) AS count_linkup, min(sdwan_status) as
sdwan_status from (select itime, csf, devname, devid, vd, interface, healthcheck, link_
status, (CASE WHEN link_status=1 THEN latency ELSE 0 END) AS latency, (CASE WHEN link_
status=1 THEN jitter ELSE 0 END) AS jitter, (CASE WHEN link_status=1 THEN packetloss ELSE
100 END) AS packetloss, (CASE WHEN sla_failed=1 AND metric='packetloss' THEN 1 ELSE 0 END)
AS failed_packetloss, (CASE WHEN sla_failed=1 AND metric='jitter' THEN 1 ELSE 0 END) AS
failed_jitter, (CASE WHEN sla_failed=1 AND metric='latency' THEN 1 ELSE 0 END) AS failed_
latency, (CASE WHEN sla_failed=1 THEN 3 ELSE sdwan_status END) AS sdwan_status,  (CASE WHEN
link_status=1 THEN inbandwidth ELSE 0 END) AS inbandwidth,  (CASE WHEN link_status=1 THEN
outbandwidth ELSE 0 END) AS outbandwidth,  (CASE WHEN link_status=1 THEN bibandwidth ELSE 0
END) AS bibandwidth from (select itime, csf, devname, devid, vd, interface, healthcheck,
(CASE WHEN status='down' THEN 0 ELSE 1 END) AS link_status, latency::float as latency,
jitter::float as jitter, trim(trailing '%' from packetloss)::float as packetloss, (CASE WHEN
status='down' THEN 1 WHEN msg LIKE '%SLA failed%' THEN 1 ELSE 0 END) AS sla_failed, metric,
(CASE WHEN msg LIKE '%SLA status%' THEN 1 ELSE 0 END) AS sdwan_status, convert_unit_to_num
(inbandwidthused) as inbandwidth, convert_unit_to_num(outbandwidthused) as outbandwidth,
convert_unit_to_num(bibandwidthused) as bibandwidth from $log where $filter and logid_to_int
(logid) in (22925, 22933, 22936) and interface is not null) t ) t group by timestamp, csf,
devname, devid, vd, interface, healthcheck /*SkipSTART*/order by timestamp
desc/*SkipEND*/)### t where $filter-drilldown and bibandwidth is not null group by devid
having sum(count)>0 order by bibandwidth desc
```

Dataset Name	Description	Log Category
sdwan-Device-Interface-Application-Traffic-Sankey	Top SD-WAN application by bandwidth sankey	traffic

```
select
  & #039;SD-WAN Rules' as summary, 'Rule:' || coalesce(rulename, 'Unknown') as rule_name,
app_group, devid, dstintf as interface, sum(bandwidth) as bandwidth from ###(select $flex_
timestamp as timestamp, csf, devid, vd, srccountry, dstintf, srcintf, srcintfrole,
dstintfrole, appid, appcat, app_group_name(app) as app_group, coalesce(vwlname,vwlservice)
as rulename, service, coalesce(nullifna(`srcname`),ipstr(`srcip`),nullifna(`srcmac`)) as
dev_src,  sum(crscore%65536) as crscore, coalesce(nullifna(`user`), nullifna(`unauthuser`),
ipstr(`srcip`)) as user_src, sum(coalesce(sentdelta, sentbyte, 0)+coalesce(rcvddelta,
rcvdbyte, 0)) as bandwidth, sum(coalesce(rcvddelta, rcvdbyte, 0)) as traffic_in, sum
(coalesce(sentdelta, sentbyte, 0)) as traffic_out, count(*) as sessions from $log-traffic
where $filter and vwlid IS NOT NULL and (logflag&(1|32)>0) group by timestamp, srccountry,
dstintf, csf, devid, vd, srcintf, srcintfrole, dstintfrole, appid, appcat, app_group,
rulename, service, user_src, dev_src order by bandwidth desc)### t where $filter-drilldown
group by rule_name, app_group, devid, interface order by bandwidth desc
```

Dataset Name	Description	Log Category
sdwan-fw-Device-Interface-test2	SD-WAN Device-Interface Statistic	event

```
select
  devid,
  sum(bibandwidth)/ sum(count) as bibandwidth
from
  ###(select $flex_timestamp as timestamp, csf, devname, devid, vd, interface, healthcheck
as sla_rule, sum(link_status) as link_status, sum(failed_latency) as failed_latency, sum
(failed_jitter) as failed_jitter,  sum(failed_packetloss) as failed_packetloss, sum(latency)
as latency, max(latency) as latency_max, min(latency) as latency_min, sum(jitter) as jitter,
max(jitter) as jitter_max, min(jitter) as jitter_min, sum(packetloss) as packetloss, max
(packetloss) as packetloss_max, min(packetloss) as packetloss_min, sum(inbandwidth) as
inbandwidth, sum(outbandwidth) as outbandwidth, sum(bibandwidth) as bibandwidth, count(*) as
count, sum(CASE WHEN link_status=1 THEN 1 ELSE 0 END) AS count_linkup, min(sdwan_status) as
sdwan_status from (select itime, csf, devname, devid, vd, interface, healthcheck, link_
status, (CASE WHEN link_status=1 THEN latency ELSE 0 END) AS latency, (CASE WHEN link_
status=1 THEN jitter ELSE 0 END) AS jitter, (CASE WHEN link_status=1 THEN packetloss ELSE
100 END) AS packetloss, (CASE WHEN sla_failed=1 AND metric='packetloss' THEN 1 ELSE 0 END)
AS failed_packetloss, (CASE WHEN sla_failed=1 AND metric='jitter' THEN 1 ELSE 0 END) AS
failed_jitter, (CASE WHEN sla_failed=1 AND metric='latency' THEN 1 ELSE 0 END) AS failed_
latency, (CASE WHEN sla_failed=1 THEN 3 ELSE sdwan_status END) AS sdwan_status,  (CASE WHEN
link_status=1 THEN inbandwidth ELSE 0 END) AS inbandwidth,  (CASE WHEN link_status=1 THEN
outbandwidth ELSE 0 END) AS outbandwidth,  (CASE WHEN link_status=1 THEN bibandwidth ELSE 0
END) AS bibandwidth from (select itime, csf, devname, devid, vd, interface, healthcheck,
(CASE WHEN status='down' THEN 0 ELSE 1 END) AS link_status, latency::float as latency,
jitter::float as jitter, trim(trailing '%' from packetloss)::float as packetloss, (CASE WHEN
status='down' THEN 1 WHEN msg LIKE '%SLA failed%' THEN 1 ELSE 0 END) AS sla_failed, metric,
(CASE WHEN msg LIKE '%SLA status%' THEN 1 ELSE 0 END) AS sdwan_status, convert_unit_to_num
(inbandwidthused) as inbandwidth, convert_unit_to_num(outbandwidthused) as outbandwidth,
convert_unit_to_num(bibandwidthused) as bibandwidth from $log where $filter and logid_to_int
(logid) in (22925, 22933, 22936) and interface is not null) t ) t group by timestamp, csf,
devname, devid, vd, interface, healthcheck /*SkipSTART*/order by timestamp
desc/*SkipEND*/)### t where $filter-drilldown and bibandwidth is not null group by devid
having sum(count)>0 order by bibandwidth desc
```

Dataset Name	Description	Log Category
sdwan-Device-Intf-Avail-Percentage-Timeline	SD-WAN Device Interface Availability Percentage Timeline	event

```
select
  hodex,
  interface,
  available
from
  (
    (
      select
        $flex_datetime(timestamp) as hodex,
        & #039;SD-WAN' as interface, cast(sum(availcnt)*100.0/sum(count) as decimal(18,2))
as available from (select timestamp, devid, first_value(count) OVER (PARTITION BY timestamp,
devid ORDER BY link_status/count desc, count desc) as count, first_value(link_status) OVER
(PARTITION BY timestamp, devid ORDER BY link_status/count desc, count desc) as availcnt from
(select timestamp, devid, interface, sum(link_status) as link_status, sum(count) as count
from ###(select $flex_timestamp as timestamp, csf, devname, devid, vd, interface,
healthcheck as sla_rule, sum(link_status) as link_status, sum(failed_latency) as failed_
latency, sum(failed_jitter) as failed_jitter,  sum(failed_packetloss) as failed_packetloss,
sum(latency) as latency, max(latency) as latency_max, min(latency) as latency_min, sum
(jitter) as jitter, max(jitter) as jitter_max, min(jitter) as jitter_min, sum(packetloss) as
packetloss, max(packetloss) as packetloss_max, min(packetloss) as packetloss_min, sum
(inbandwidth) as inbandwidth, sum(outbandwidth) as outbandwidth, sum(bibandwidth) as
bibandwidth, count(*) as count, sum(CASE WHEN link_status=1 THEN 1 ELSE 0 END) AS count_
linkup, min(sdwan_status) as sdwan_status from (select itime, csf, devname, devid, vd,
interface, healthcheck, link_status, (CASE WHEN link_status=1 THEN latency ELSE 0 END) AS
latency, (CASE WHEN link_status=1 THEN jitter ELSE 0 END) AS jitter, (CASE WHEN link_
status=1 THEN packetloss ELSE 100 END) AS packetloss, (CASE WHEN sla_failed=1 AND
metric='packetloss' THEN 1 ELSE 0 END) AS failed_packetloss, (CASE WHEN sla_failed=1 AND
metric='jitter' THEN 1 ELSE 0 END) AS failed_jitter, (CASE WHEN sla_failed=1 AND
metric='latency' THEN 1 ELSE 0 END) AS failed_latency, (CASE WHEN sla_failed=1 THEN 3 ELSE
sdwan_status END) AS sdwan_status,  (CASE WHEN link_status=1 THEN inbandwidth ELSE 0 END) AS
inbandwidth,  (CASE WHEN link_status=1 THEN outbandwidth ELSE 0 END) AS outbandwidth,  (CASE
WHEN link_status=1 THEN bibandwidth ELSE 0 END) AS bibandwidth from (select itime, csf,
devname, devid, vd, interface, healthcheck, (CASE WHEN status='down' THEN 0 ELSE 1 END) AS
link_status, latency::float as latency, jitter::float as jitter, trim(trailing '%' from
packetloss)::float as packetloss, (CASE WHEN status='down' THEN 1 WHEN msg LIKE '%SLA
failed%' THEN 1 ELSE 0 END) AS sla_failed, metric, (CASE WHEN msg LIKE '%SLA status%' THEN 1
ELSE 0 END) AS sdwan_status, convert_unit_to_num(inbandwidthused) as inbandwidth, convert_
unit_to_num(outbandwidthused) as outbandwidth, convert_unit_to_num(bibandwidthused) as
bibandwidth from $log where $filter and logid_to_int(logid) in (22925, 22933, 22936) and
interface is not null) t ) t group by timestamp, csf, devname, devid, vd, interface,
healthcheck /*SkipSTART*/order by timestamp desc/*SkipEND*/)### t where $filter-drilldown
and count>0 group by timestamp, devid, interface)t) t group by hodex order by hodex) union
all (select $flex_datetime(timestamp) as hodex, interface, cast(sum(link_status)*100.0/sum
(count) as decimal(18,2)) as available from ###(select $flex_timestamp as timestamp, csf,
devname, devid, vd, interface, healthcheck as sla_rule, sum(link_status) as link_status, sum
(failed_latency) as failed_latency, sum(failed_jitter) as failed_jitter,  sum(failed_
packetloss) as failed_packetloss, sum(latency) as latency, max(latency) as latency_max, min
(latency) as latency_min, sum(jitter) as jitter, max(jitter) as jitter_max, min(jitter) as
jitter_min, sum(packetloss) as packetloss, max(packetloss) as packetloss_max, min
(packetloss) as packetloss_min, sum(inbandwidth) as inbandwidth, sum(outbandwidth) as
outbandwidth, sum(bibandwidth) as bibandwidth, count(*) as count, sum(CASE WHEN link_
status=1 THEN 1 ELSE 0 END) AS count_linkup, min(sdwan_status) as sdwan_status from (select
itime, csf, devname, devid, vd, interface, healthcheck, link_status, (CASE WHEN link_
status=1 THEN latency ELSE 0 END) AS latency, (CASE WHEN link_status=1 THEN jitter ELSE 0
END) AS jitter, (CASE WHEN link_status=1 THEN packetloss ELSE 100 END) AS packetloss, (CASE
WHEN sla_failed=1 AND metric='packetloss' THEN 1 ELSE 0 END) AS failed_packetloss, (CASE
WHEN sla_failed=1 AND metric='jitter' THEN 1 ELSE 0 END) AS failed_jitter, (CASE WHEN sla_
failed=1 AND metric='latency' THEN 1 ELSE 0 END) AS failed_latency, (CASE WHEN sla_failed=1
THEN 3 ELSE sdwan_status END) AS sdwan_status,  (CASE WHEN link_status=1 THEN inbandwidth
ELSE 0 END) AS inbandwidth,  (CASE WHEN link_status=1 THEN outbandwidth ELSE 0 END) AS
outbandwidth,  (CASE WHEN link_status=1 THEN bibandwidth ELSE 0 END) AS bibandwidth from
(select itime, csf, devname, devid, vd, interface, healthcheck, (CASE WHEN status='down'
THEN 0 ELSE 1 END) AS link_status, latency::float as latency, jitter::float as jitter, trim
(trailing '%' from packetloss)::float as packetloss, (CASE WHEN status='down' THEN 1 WHEN
msg LIKE '%SLA failed%' THEN 1 ELSE 0 END) AS sla_failed, metric, (CASE WHEN msg LIKE '%SLA
status%' THEN 1 ELSE 0 END) AS sdwan_status, convert_unit_to_num(inbandwidthused) as
inbandwidth, convert_unit_to_num(outbandwidthused) as outbandwidth, convert_unit_to_num
(bibandwidthused) as bibandwidth from $log where $filter and logid_to_int(logid) in (22925,
22933, 22936) and interface is not null) t ) t group by timestamp, csf, devname, devid, vd,
interface, healthcheck /*SkipSTART*/order by timestamp desc/*SkipEND*/)### t where $filter-
drilldown group by hodex, interface order by hodex)) t order by hodex
```

Dataset Name	Description	Log Category
sdwan-Device-Intf-Inbandwidth-Timeline	SD-WAN Device-Interface Inbandwidth Timeline	event

```
select
  $flex_timescale(timestamp) as time,
  t1.interface,
  cast(
    sum(inbandwidth)/ sum(count) as decimal(18, 2)
  ) as inbandwidth
from
  (
    select
      timestamp,
      devid,
      interface,
      sum(count) as count,
      sum(inbandwidth) as inbandwidth
    from
      ###(select $flex_timestamp as timestamp, csf, devname, devid, vd, interface,
healthcheck as sla_rule, sum(link_status) as link_status, sum(failed_latency) as failed_
latency, sum(failed_jitter) as failed_jitter,  sum(failed_packetloss) as failed_packetloss,
sum(latency) as latency, max(latency) as latency_max, min(latency) as latency_min, sum
(jitter) as jitter, max(jitter) as jitter_max, min(jitter) as jitter_min, sum(packetloss) as
packetloss, max(packetloss) as packetloss_max, min(packetloss) as packetloss_min, sum
(inbandwidth) as inbandwidth, sum(outbandwidth) as outbandwidth, sum(bibandwidth) as
bibandwidth, count(*) as count, sum(CASE WHEN link_status=1 THEN 1 ELSE 0 END) AS count_
linkup, min(sdwan_status) as sdwan_status from (select itime, csf, devname, devid, vd,
interface, healthcheck, link_status, (CASE WHEN link_status=1 THEN latency ELSE 0 END) AS
latency, (CASE WHEN link_status=1 THEN jitter ELSE 0 END) AS jitter, (CASE WHEN link_
status=1 THEN packetloss ELSE 100 END) AS packetloss, (CASE WHEN sla_failed=1 AND
metric='packetloss' THEN 1 ELSE 0 END) AS failed_packetloss, (CASE WHEN sla_failed=1 AND
metric='jitter' THEN 1 ELSE 0 END) AS failed_jitter, (CASE WHEN sla_failed=1 AND
metric='latency' THEN 1 ELSE 0 END) AS failed_latency, (CASE WHEN sla_failed=1 THEN 3 ELSE
sdwan_status END) AS sdwan_status,  (CASE WHEN link_status=1 THEN inbandwidth ELSE 0 END) AS
inbandwidth,  (CASE WHEN link_status=1 THEN outbandwidth ELSE 0 END) AS outbandwidth,  (CASE
WHEN link_status=1 THEN bibandwidth ELSE 0 END) AS bibandwidth from (select itime, csf,
devname, devid, vd, interface, healthcheck, (CASE WHEN status='down' THEN 0 ELSE 1 END) AS
link_status, latency::float as latency, jitter::float as jitter, trim(trailing '%' from
packetloss)::float as packetloss, (CASE WHEN status='down' THEN 1 WHEN msg LIKE '%SLA
failed%' THEN 1 ELSE 0 END) AS sla_failed, metric, (CASE WHEN msg LIKE '%SLA status%' THEN 1
ELSE 0 END) AS sdwan_status, convert_unit_to_num(inbandwidthused) as inbandwidth, convert_
unit_to_num(outbandwidthused) as outbandwidth, convert_unit_to_num(bibandwidthused) as
bibandwidth from $log where $filter and logid_to_int(logid) in (22925, 22933, 22936) and
interface is not null) t ) t group by timestamp, csf, devname, devid, vd, interface,
healthcheck /*SkipSTART*/order by timestamp desc/*SkipEND*/)### t group by timestamp, devid,
interface) t1 inner join (select devid, interface, count(*) as num_intf from ###(select
$flex_timestamp as timestamp, csf, devname, devid, vd, interface, healthcheck as sla_rule,
sum(link_status) as link_status, sum(failed_latency) as failed_latency, sum(failed_jitter)
as failed_jitter,  sum(failed_packetloss) as failed_packetloss, sum(latency) as latency, max
(latency) as latency_max, min(latency) as latency_min, sum(jitter) as jitter, max(jitter) as
jitter_max, min(jitter) as jitter_min, sum(packetloss) as packetloss, max(packetloss) as
packetloss_max, min(packetloss) as packetloss_min, sum(inbandwidth) as inbandwidth, sum
(outbandwidth) as outbandwidth, sum(bibandwidth) as bibandwidth, count(*) as count, sum(CASE
WHEN link_status=1 THEN 1 ELSE 0 END) AS count_linkup, min(sdwan_status) as sdwan_status
from (select itime, csf, devname, devid, vd, interface, healthcheck, link_status, (CASE WHEN
link_status=1 THEN latency ELSE 0 END) AS latency, (CASE WHEN link_status=1 THEN jitter ELSE
0 END) AS jitter, (CASE WHEN link_status=1 THEN packetloss ELSE 100 END) AS packetloss,
(CASE WHEN sla_failed=1 AND metric='packetloss' THEN 1 ELSE 0 END) AS failed_packetloss,
(CASE WHEN sla_failed=1 AND metric='jitter' THEN 1 ELSE 0 END) AS failed_jitter, (CASE WHEN
sla_failed=1 AND metric='latency' THEN 1 ELSE 0 END) AS failed_latency, (CASE WHEN sla_
failed=1 THEN 3 ELSE sdwan_status END) AS sdwan_status,  (CASE WHEN link_status=1 THEN
inbandwidth ELSE 0 END) AS inbandwidth,  (CASE WHEN link_status=1 THEN outbandwidth ELSE 0
END) AS outbandwidth,  (CASE WHEN link_status=1 THEN bibandwidth ELSE 0 END) AS bibandwidth
from (select itime, csf, devname, devid, vd, interface, healthcheck, (CASE WHEN
status='down' THEN 0 ELSE 1 END) AS link_status, latency::float as latency, jitter::float as
jitter, trim(trailing '%' from packetloss)::float as packetloss, (CASE WHEN status='down'
THEN 1 WHEN msg LIKE '%SLA failed%' THEN 1 ELSE 0 END) AS sla_failed, metric, (CASE WHEN msg
LIKE '%SLA status%' THEN 1 ELSE 0 END) AS sdwan_status, convert_unit_to_num(inbandwidthused)
as inbandwidth, convert_unit_to_num(outbandwidthused) as outbandwidth, convert_unit_to_num
(bibandwidthused) as bibandwidth from $log where $filter and logid_to_int(logid) in (22925,
22933, 22936) and interface is not null) t ) t group by timestamp, csf, devname, devid, vd,
interface, healthcheck /*SkipSTART*/order by timestamp desc/*SkipEND*/)### t where $filter-
drilldown group by devid, interface order by num_intf desc limit 10)t2 on
t1.interface=t2.interface and t1.devid=t2.devid group by time, t1.interface having sum
(count)>0 order by time
```

Dataset Name	Description	Log Category
sdwan-Device-Intf-Outbandwidth-Timeline	SD-WAN Device-Interface Outbandwidth Timeline	event

```
select
  $flex_timescale(timestamp) as time,
  t1.interface,
  cast(
    sum(outbandwidth)/ sum(count) as decimal(18, 2)
  ) as outbandwidth
from
  (
    select
      timestamp,
      devid,
      interface,
      sum(count) as count,
      sum(outbandwidth) as outbandwidth
    from
      ###(select $flex_timestamp as timestamp, csf, devname, devid, vd, interface,
healthcheck as sla_rule, sum(link_status) as link_status, sum(failed_latency) as failed_
latency, sum(failed_jitter) as failed_jitter,  sum(failed_packetloss) as failed_packetloss,
sum(latency) as latency, max(latency) as latency_max, min(latency) as latency_min, sum
(jitter) as jitter, max(jitter) as jitter_max, min(jitter) as jitter_min, sum(packetloss) as
packetloss, max(packetloss) as packetloss_max, min(packetloss) as packetloss_min, sum
(inbandwidth) as inbandwidth, sum(outbandwidth) as outbandwidth, sum(bibandwidth) as
bibandwidth, count(*) as count, sum(CASE WHEN link_status=1 THEN 1 ELSE 0 END) AS count_
linkup, min(sdwan_status) as sdwan_status from (select itime, csf, devname, devid, vd,
interface, healthcheck, link_status, (CASE WHEN link_status=1 THEN latency ELSE 0 END) AS
latency, (CASE WHEN link_status=1 THEN jitter ELSE 0 END) AS jitter, (CASE WHEN link_
status=1 THEN packetloss ELSE 100 END) AS packetloss, (CASE WHEN sla_failed=1 AND
metric='packetloss' THEN 1 ELSE 0 END) AS failed_packetloss, (CASE WHEN sla_failed=1 AND
metric='jitter' THEN 1 ELSE 0 END) AS failed_jitter, (CASE WHEN sla_failed=1 AND
metric='latency' THEN 1 ELSE 0 END) AS failed_latency, (CASE WHEN sla_failed=1 THEN 3 ELSE
sdwan_status END) AS sdwan_status,  (CASE WHEN link_status=1 THEN inbandwidth ELSE 0 END) AS
inbandwidth,  (CASE WHEN link_status=1 THEN outbandwidth ELSE 0 END) AS outbandwidth,  (CASE
WHEN link_status=1 THEN bibandwidth ELSE 0 END) AS bibandwidth from (select itime, csf,
devname, devid, vd, interface, healthcheck, (CASE WHEN status='down' THEN 0 ELSE 1 END) AS
link_status, latency::float as latency, jitter::float as jitter, trim(trailing '%' from
packetloss)::float as packetloss, (CASE WHEN status='down' THEN 1 WHEN msg LIKE '%SLA
failed%' THEN 1 ELSE 0 END) AS sla_failed, metric, (CASE WHEN msg LIKE '%SLA status%' THEN 1
ELSE 0 END) AS sdwan_status, convert_unit_to_num(inbandwidthused) as inbandwidth, convert_
unit_to_num(outbandwidthused) as outbandwidth, convert_unit_to_num(bibandwidthused) as
bibandwidth from $log where $filter and logid_to_int(logid) in (22925, 22933, 22936) and
interface is not null) t ) t group by timestamp, csf, devname, devid, vd, interface,
healthcheck /*SkipSTART*/order by timestamp desc/*SkipEND*/)### t group by timestamp, devid,
interface) t1 inner join (select devid, interface, count(*) as num_intf from ###(select
$flex_timestamp as timestamp, csf, devname, devid, vd, interface, healthcheck as sla_rule,
sum(link_status) as link_status, sum(failed_latency) as failed_latency, sum(failed_jitter)
as failed_jitter,  sum(failed_packetloss) as failed_packetloss, sum(latency) as latency, max
(latency) as latency_max, min(latency) as latency_min, sum(jitter) as jitter, max(jitter) as
jitter_max, min(jitter) as jitter_min, sum(packetloss) as packetloss, max(packetloss) as
packetloss_max, min(packetloss) as packetloss_min, sum(inbandwidth) as inbandwidth, sum
(outbandwidth) as outbandwidth, sum(bibandwidth) as bibandwidth, count(*) as count, sum(CASE
WHEN link_status=1 THEN 1 ELSE 0 END) AS count_linkup, min(sdwan_status) as sdwan_status
from (select itime, csf, devname, devid, vd, interface, healthcheck, link_status, (CASE WHEN
link_status=1 THEN latency ELSE 0 END) AS latency, (CASE WHEN link_status=1 THEN jitter ELSE
0 END) AS jitter, (CASE WHEN link_status=1 THEN packetloss ELSE 100 END) AS packetloss,
(CASE WHEN sla_failed=1 AND metric='packetloss' THEN 1 ELSE 0 END) AS failed_packetloss,
(CASE WHEN sla_failed=1 AND metric='jitter' THEN 1 ELSE 0 END) AS failed_jitter, (CASE WHEN
sla_failed=1 AND metric='latency' THEN 1 ELSE 0 END) AS failed_latency, (CASE WHEN sla_
failed=1 THEN 3 ELSE sdwan_status END) AS sdwan_status,  (CASE WHEN link_status=1 THEN
inbandwidth ELSE 0 END) AS inbandwidth,  (CASE WHEN link_status=1 THEN outbandwidth ELSE 0
END) AS outbandwidth,  (CASE WHEN link_status=1 THEN bibandwidth ELSE 0 END) AS bibandwidth
from (select itime, csf, devname, devid, vd, interface, healthcheck, (CASE WHEN
status='down' THEN 0 ELSE 1 END) AS link_status, latency::float as latency, jitter::float as
jitter, trim(trailing '%' from packetloss)::float as packetloss, (CASE WHEN status='down'
THEN 1 WHEN msg LIKE '%SLA failed%' THEN 1 ELSE 0 END) AS sla_failed, metric, (CASE WHEN msg
LIKE '%SLA status%' THEN 1 ELSE 0 END) AS sdwan_status, convert_unit_to_num(inbandwidthused)
as inbandwidth, convert_unit_to_num(outbandwidthused) as outbandwidth, convert_unit_to_num
(bibandwidthused) as bibandwidth from $log where $filter and logid_to_int(logid) in (22925,
22933, 22936) and interface is not null) t ) t group by timestamp, csf, devname, devid, vd,
interface, healthcheck /*SkipSTART*/order by timestamp desc/*SkipEND*/)### t where $filter-
drilldown group by devid, interface order by num_intf desc limit 10)t2 on
t1.interface=t2.interface and t1.devid=t2.devid group by time, t1.interface having sum
(count)>0 order by time
```

Dataset Name	Description	Log Category
Top-Web-Sites-by-Bandwidth	Top web sites by bandwidth usage	webfilter

```
select
  domain,
  sum(bandwidth) as bandwidth
from
  ###(select coalesce(nullifna(hostname), ipstr(`dstip`)) as domain, sum(coalesce(sentbyte,
0)+coalesce(rcvdbyte, 0)) as bandwidth from $log-traffic where $filter and (logflag&1>0) and
(countweb>0 or ((logver is null or logver<502000000) and (hostname is not null or utmevent
in ('webfilter', 'banned-word', 'web-content', 'command-block', 'script-filter')))) group by
domain having sum(coalesce(sentbyte, 0)+coalesce(rcvdbyte, 0))>0 order by bandwidth desc)###
t group by domain order by bandwidth desc
```

Dataset Name	Description	Log Category
Top-App-Category-by-Session	Application risk application usage by category	traffic

```
select
  appcat,
  sum(sessions) as total_num
from
  ###(select appid, app, appcat, apprisk, sum(bandwidth) as bandwidth, sum(sessions) as
sessions from ###base(/*tag:rpt_base_t_top_app*/select dvid, srcip, dstip, epid, euid,
coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src, appid, app,
appcat, apprisk, hostname, sum(coalesce(rcvddelta, rcvdbyte, 0)) as traffic_in, sum(coalesce
(sentdelta, sentbyte, 0)) as traffic_out, sum(coalesce(sentdelta, sentbyte, 0)+coalesce
(rcvddelta, rcvdbyte, 0)) as bandwidth, count(*) as sessions from $log-traffic where $filter
and (logflag&(1|32)>0) and nullifna(app) is not null group by dvid, srcip, dstip, epid,
euid, user_src, appid, app, appcat, apprisk, hostname order by sessions desc)base### t group
by appid, app, appcat, apprisk /*SkipSTART*/order by sessions desc, bandwidth
desc/*SkipEND*/)### t where $filter-drilldown group by appcat order by total_num desc
```

Dataset Name	Description	Log Category
Top-Region-Name-by-Traffic	Traffic top destination countries by browsing time	traffic

```
select
  dstcountry,
  sum(bandwidth) as bandwidth
from
  ###(select dstcountry, ebtr_agg_flat(browsetime) as browsetime, sum(bandwidth) as
bandwidth, sum(traffic_in) as traffic_in, sum(traffic_out) as traffic_out from (select
dstcountry, ebtr_agg_flat($browse_time) as browsetime, sum(coalesce(sentbyte, 0)+coalesce
(rcvdbyte, 0)) as bandwidth, sum(coalesce(rcvdbyte, 0)) as traffic_in, sum(coalesce
(sentbyte, 0)) as traffic_out from $log where $filter and (logflag&1>0) and $browse_time is
not null group by dstcountry) t group by dstcountry /*SkipSTART*/order by ebtr_value(ebtr_
agg_flat(browsetime), null, null) desc/*SkipEND*/)### t where $filter-drilldown group by
dstcountry order by bandwidth desc
```

Dataset Name	Description	Log Category
Top-App-By-Bandwidth-Chart	Top applications by bandwidth usage	traffic

```
select
  app_group_name(app) as app_group,
  sum(bandwidth) as bandwidth,
  sum(traffic_in) as traffic_in,
  sum(traffic_out) as traffic_out,
  sum(sessions) as sessions
from
  ###(select appid, app, appcat, apprisk, sum(traffic_in) as traffic_in, sum(traffic_out) as
traffic_out, sum(bandwidth) as bandwidth, sum(sessions) as sessions from ###base(/*tag:rpt_
base_t_top_app*/select dvid, srcip, dstip, epid, euid, coalesce(nullifna(`user`), nullifna
(`unauthuser`), ipstr(`srcip`)) as user_src, appid, app, appcat, apprisk, hostname, sum
(coalesce(rcvddelta, rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as
traffic_out, sum(coalesce(sentdelta, sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as
bandwidth, count(*) as sessions from $log-traffic where $filter and (logflag&(1|32)>0) and
nullifna(app) is not null group by dvid, srcip, dstip, epid, euid, user_src, appid, app,
appcat, apprisk, hostname order by sessions desc)base### t group by appid, app, appcat,
apprisk /*SkipSTART*/order by sessions desc, bandwidth desc/*SkipEND*/)### t group by app_
group having sum(bandwidth)>0 order by bandwidth desc
```

Dataset Name	Description	Log Category
Top-Protocols-By-Traffic	Top applications by bandwidth usage	traffic

```
select
  service,
  sum(bandwidth) as bandwidth
from
  ###(select service, sum(bandwidth) as bandwidth from ###base(/*tag:rpt_base_t_bndwdth_
sess*/select $flex_timestamp as timestamp, dvid, srcip, dstip, epid, euid, coalesce(nullifna
(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src, service, count(*) as
sessions, sum(coalesce(sentdelta, sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as
bandwidth, sum(coalesce(sentdelta, sentbyte, 0)) as traffic_out, sum(coalesce(rcvddelta,
rcvdbyte, 0)) as traffic_in from $log-traffic where $filter and (logflag&(1|32)>0) group by
timestamp, dvid, srcip, dstip, epid, euid, user_src, service /*SkipSTART*/order by timestamp
desc/*SkipEND*/)base### base_query group by service order by bandwidth desc)### t where
$filter-drilldown group by service order by bandwidth desc
```

Dataset Name	Description	Log Category
Top-Web-Sites-by-Sessions	Top web sites by session count	webfilter

```
select
  domain,
  sum(sessions) as sessions
from
  ###(select  coalesce(nullifna(hostname), ipstr(`dstip`)) as domain, count(*) as sessions
from $log where $filter and (eventtype is null or logver>=502000000) group by domain order
by sessions desc)### t group by domain order by sessions desc
```

Dataset Name	Description	Log Category
Top-Attacks-by-Count	Threat attacks by severity	attack

```
select
  attack,
  sum(attack_count) as totalnum
from
  ###(select coalesce(nullifna(`user`), ipstr(`srcip`)) as user_src, attack, (case when
severity in ('critical', 'high') then 1 else 0 end) as high_severity, count(*) as attack_
count from $log where $filter and nullifna(attack) is not null group by user_src, attack,
high_severity order by attack_count desc)### t where $filter-drilldown and attack is not
null group by attack order by totalnum desc
```

Dataset Name	Description	Log Category
Top-Spams-by-Count	User drilldown top spam sources	emailfilter

```
select
  user_src,
  sum(totalnum) as totalnum
from
  ###(select $flex_timestamp as timestamp, coalesce(nullifna(`user`), ipstr(`srcip`)) as
user_src, `from` as mf_sender, `to` as mf_receiver, action, eventtype, count(*) as totalnum
from $log where $filter group by timestamp, user_src, mf_sender, mf_receiver, action,
eventtype /*SkipSTART*/order by timestamp desc/*SkipEND*/)### t where $filter-drilldown and
mf_sender is not null group by user_src order by totalnum desc
```

Dataset Name	Description	Log Category
utm-Top-Virus-Count	UTM top virus	virus

```
select
  virus,
  max(virusid_s) as virusid,
  (
    case when virus like & #039;Riskware%' then 'Spyware' when virus like 'Adware%' then
'Adware' else 'Virus' end) as malware_type, sum(totalnum) as totalnum from ###(select virus,
virusid_to_str(virusid, eventtype) as virusid_s, count(*) as totalnum from $log where
$filter and (eventtype is null or logver>=502000000) and nullifna(virus) is not null group
by virus, virusid_s /*SkipSTART*/order by totalnum desc/*SkipEND*/)### t group by virus,
malware_type order by totalnum desc
```

Dataset Name	Description	Log Category
security-Antivirus-Inspections	Antivirus Inspections	virus

```
select
  action,
  sum(totalnum) as totalnum
from
  ###(select $flex_timestamp as timestamp, coalesce(nullifna(`user`), ipstr(`srcip`)) as
user_src, `from` as mf_sender, `to` as mf_receiver, action, eventtype, count(*) as totalnum
from $log where $filter group by timestamp, user_src, mf_sender, mf_receiver, action,
eventtype /*SkipSTART*/order by timestamp desc/*SkipEND*/)### t where $filter-drilldown and
action is not null group by action order by totalnum desc
```

Dataset Name	Description	Log Category
Top-DLP-by-Count	Email DLP Activity Summary	dlp

```
select
  profile,
  count(*) as total_num
from
  ###(select itime, hostname,`from` as sender, `to` as receiver, profile, action, service,
subtype, srcip, dstip, severity, filename, direction, filesize, (case when
severity='critical' then 'Critical Data Exfiltration' else (case when coalesce(nullifna
(`user`), ipstr(`srcip`)) is not null then 'User Associated Data Loss' else NULL end) end)
as data_loss from $log where $filter /*SkipSTART*/order by itime desc/*SkipEND*/)### t where
$filter-drilldown and profile is not null group by profile order by total_num desc
```

Dataset Name	Description	Log Category
wifi-Top-AP-By-Client	Top access point by client	traffic

```
select
  ap_srcintf as srcintf,
  count(distinct srcmac) as totalnum
from
  (
    select
      coalesce(ap, srcintf) as ap_srcintf,
      srcmac
    from
      ###(select coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_
src, ap, srcintf, srcssid, srcssid as ssid, srcmac, srcmac as stamac, coalesce(nullifna
(`srcname`), `srcmac`) as hostname_mac, max(srcswversion) as srcswversion, max(osname) as
osname, max(osversion) as osversion, max(devtype) as devtype, sum(coalesce(sentbyte,
0)+coalesce(rcvdbyte, 0)) as bandwidth, count(*) as subtotal from $log-traffic where $filter
and (logflag&1>0) and (srcssid is not null or dstssid is not null) group by user_src, ap,
srcintf, srcssid, srcmac, hostname_mac /*SkipSTART*/order by bandwidth desc, subtotal
desc/*SkipEND*/)### t where srcmac is not null group by ap_srcintf, srcmac union all (select
ap as ap_srcintf, stamac as srcmac from ###(select $flex_timestamp as timestamp, stamac,
stamac as srcmac, ap, ssid, ssid as srcssid, user_src, sum(coalesce(sentdelta, 0)) as
sentdelta, sum(coalesce(rcvddelta, 0)) as rcvddelta, sum(coalesce(sentdelta, 0)+coalesce
(rcvddelta, 0)) as bandwidth from (select itime, stamac, ap, ssid, coalesce(`user`, ipstr
(`srcip`)) as user_src, sentbyte-lag(coalesce(sentbyte, 0)) over (partition by stamac order
by itime) as sentdelta, rcvdbyte-lag(coalesce(rcvdbyte, 0)) over (partition by stamac order
by itime) as rcvddelta from $log-event where $filter and subtype='wireless' and stamac is
not null and ssid is not null and action in ('sta-wl-bridge-traffic-stats', 'reassoc-req',
'assoc-req')) as t group by timestamp, stamac, ap, ssid, user_src /*SkipSTART*/order by
bandwidth desc/*SkipEND*/)### t where stamac is not null group by ap, stamac)) t group by
srcintf order by totalnum desc
```

Dataset Name	Description	Log Category
wifi-Top-AP-By-Bandwidth	Top access point by bandwidth usage	traffic

```
select
  ap_srcintf,
  sum(bandwidth) as bandwidth
from
  (
    select
      coalesce(ap, srcintf) as ap_srcintf,
      sum(bandwidth) as bandwidth
    from
      ###(select coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_
src, ap, srcintf, srcssid, srcssid as ssid, srcmac, srcmac as stamac, coalesce(nullifna
(`srcname`), `srcmac`) as hostname_mac, max(srcswversion) as srcswversion, max(osname) as
osname, max(osversion) as osversion, max(devtype) as devtype, sum(coalesce(sentbyte,
0)+coalesce(rcvdbyte, 0)) as bandwidth, count(*) as subtotal from $log-traffic where $filter
and (logflag&1>0) and (srcssid is not null or dstssid is not null) group by user_src, ap,
srcintf, srcssid, srcmac, hostname_mac /*SkipSTART*/order by bandwidth desc, subtotal
desc/*SkipEND*/)### t group by ap_srcintf having sum(bandwidth)>0 union all select ap as ap_
srcintf, sum(bandwidth) as bandwidth from ###(select $flex_timestamp as timestamp, stamac,
stamac as srcmac, ap, ssid, ssid as srcssid, user_src, sum(coalesce(sentdelta, 0)) as
sentdelta, sum(coalesce(rcvddelta, 0)) as rcvddelta, sum(coalesce(sentdelta, 0)+coalesce
(rcvddelta, 0)) as bandwidth from (select itime, stamac, ap, ssid, coalesce(`user`, ipstr
(`srcip`)) as user_src, sentbyte-lag(coalesce(sentbyte, 0)) over (partition by stamac order
by itime) as sentdelta, rcvdbyte-lag(coalesce(rcvdbyte, 0)) over (partition by stamac order
by itime) as rcvddelta from $log-event where $filter and subtype='wireless' and stamac is
not null and ssid is not null and action in ('sta-wl-bridge-traffic-stats', 'reassoc-req',
'assoc-req')) as t group by timestamp, stamac, ap, ssid, user_src /*SkipSTART*/order by
bandwidth desc/*SkipEND*/)### t group by ap having sum(bandwidth)>0) t group by ap_srcintf
order by bandwidth desc
```

Dataset Name	Description	Log Category
wifi-Top-SSID-By-Bandwidth	Top SSIDs by bandwidth usage	traffic

```
select
  srcssid,
  sum(bandwidth) as bandwidth
from
  (
    select
      srcssid,
      sum(bandwidth) as bandwidth
    from
      ###(select coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_
src, ap, srcintf, srcssid, srcssid as ssid, srcmac, srcmac as stamac, coalesce(nullifna
(`srcname`), `srcmac`) as hostname_mac, max(srcswversion) as srcswversion, max(osname) as
osname, max(osversion) as osversion, max(devtype) as devtype, sum(coalesce(sentbyte,
0)+coalesce(rcvdbyte, 0)) as bandwidth, count(*) as subtotal from $log-traffic where $filter
and (logflag&1>0) and (srcssid is not null or dstssid is not null) group by user_src, ap,
srcintf, srcssid, srcmac, hostname_mac /*SkipSTART*/order by bandwidth desc, subtotal
desc/*SkipEND*/)### t where srcssid is not null group by srcssid having sum(bandwidth)>0
union all select ssid as srcssid, sum(bandwidth) as bandwidth from ###(select $flex_
timestamp as timestamp, stamac, stamac as srcmac, ap, ssid, ssid as srcssid, user_src, sum
(coalesce(sentdelta, 0)) as sentdelta, sum(coalesce(rcvddelta, 0)) as rcvddelta, sum
(coalesce(sentdelta, 0)+coalesce(rcvddelta, 0)) as bandwidth from (select itime, stamac, ap,
ssid, coalesce(`user`, ipstr(`srcip`)) as user_src, sentbyte-lag(coalesce(sentbyte, 0)) over
(partition by stamac order by itime) as sentdelta, rcvdbyte-lag(coalesce(rcvdbyte, 0)) over
(partition by stamac order by itime) as rcvddelta from $log-event where $filter and
subtype='wireless' and stamac is not null and ssid is not null and action in ('sta-wl-
bridge-traffic-stats', 'reassoc-req', 'assoc-req')) as t group by timestamp, stamac, ap,
ssid, user_src /*SkipSTART*/order by bandwidth desc/*SkipEND*/)### t group by ssid having
sum(bandwidth)>0) t group by srcssid order by bandwidth desc
```

Dataset Name	Description	Log Category
sdwan-CTAP-Total-Bandwidth-Internal-And-External	CTAP SD-WAN Internal and External Bandwidth	traffic

```
select
  interface,
  bandwidth
```

```
from
  (
    (
      select
        & #039;Internal' as interface, coalesce(sum(bandwidth), 0) as bandwidth from ###
(select $flex_timestamp as timestamp, csf, devid, vd, srccountry, dstintf, srcintf,
srcintfrole, dstintfrole, appid, appcat, app_group_name(app) as app_group, coalesce
(vwlname,vwlservice) as rulename, service, coalesce(nullifna(`srcname`),ipstr
(`srcip`),nullifna(`srcmac`)) as dev_src,  sum(crscore%65536) as crscore, coalesce(nullifna
(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src, sum(coalesce(sentdelta,
sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as bandwidth, sum(coalesce(rcvddelta,
rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as traffic_out, count(*)
as sessions from $log-traffic where $filter and vwlid IS NOT NULL and (logflag&(1|32)>0)
group by timestamp, srccountry, dstintf, csf, devid, vd, srcintf, srcintfrole, dstintfrole,
appid, appcat, app_group, rulename, service, user_src, dev_src order by bandwidth desc)### t
where $filter-drilldown and dstintfrole='lan') union all (select 'External' as interface,
coalesce(sum(bandwidth), 0) as bandwidth from ###(select $flex_timestamp as timestamp, csf,
devid, vd, srccountry, dstintf, srcintf, srcintfrole, dstintfrole, appid, appcat, app_group_
name(app) as app_group, coalesce(vwlname,vwlservice) as rulename, service, coalesce(nullifna
(`srcname`),ipstr(`srcip`),nullifna(`srcmac`)) as dev_src,  sum(crscore%65536) as crscore,
coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src, sum(coalesce
(sentdelta, sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as bandwidth, sum(coalesce
(rcvddelta, rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as traffic_
out, count(*) as sessions from $log-traffic where $filter and vwlid IS NOT NULL and
(logflag&(1|32)>0) group by timestamp, srccountry, dstintf, csf, devid, vd, srcintf,
srcintfrole, dstintfrole, appid, appcat, app_group, rulename, service, user_src, dev_src
order by bandwidth desc)### t where $filter-drilldown and dstintfrole='wan')) t where
bandwidth>0
```

Dataset Name	Description	Log Category
sdwan-CTAP-Total-Bandwidth-External-Business-nonBusiness-Network	CTAP SD-WAN Bandwidth of External Business and nonBusiness	traffic

```
select
  (
    case when appcat not in (
      & #039;Network.Service',
'Mobile','Social.Media','Proxy','Video\/Audio','Game','P2P','unknown') then 'Business' when
appcat in ('Mobile','Social.Media','Proxy','Video\/Audio','Game','P2P','unknown') then
'nonBusiness'when appcat in ('Network.Service') then 'Network Service' end) as app_cat,
coalesce(sum(bandwidth), 0) as bandwidth from ###(select $flex_timestamp as timestamp, csf,
devid, vd, srccountry, dstintf, srcintf, srcintfrole, dstintfrole, appid, appcat, app_group_
name(app) as app_group, coalesce(vwlname,vwlservice) as rulename, service, coalesce(nullifna
(`srcname`),ipstr(`srcip`),nullifna(`srcmac`)) as dev_src,  sum(crscore%65536) as crscore,
coalesce(nullifna(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src, sum(coalesce
(sentdelta, sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as bandwidth, sum(coalesce
(rcvddelta, rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as traffic_
out, count(*) as sessions from $log-traffic where $filter and vwlid IS NOT NULL and
(logflag&(1|32)>0) group by timestamp, srccountry, dstintf, csf, devid, vd, srcintf,
srcintfrole, dstintfrole, appid, appcat, app_group, rulename, service, user_src, dev_src
order by bandwidth desc)### t where $filter-drilldown group by app_cat order by bandwidth
desc
```

Dataset Name	Description	Log Category
sdwan-CTAP-Top-Appcat-Appgroup-By-Bandwidth-Sankey	CTAP SD-WAN Top SD-WAN application by bandwidth usage	traffic

```
select
  & #039;External' as summary, appcat, app_group, sum(bandwidth) as bandwidth from ###
(select $flex_timestamp as timestamp, csf, devid, vd, srccountry, dstintf, srcintf,
srcintfrole, dstintfrole, appid, appcat, app_group_name(app) as app_group, coalesce
(vwlname,vwlservice) as rulename, service, coalesce(nullifna(`srcname`),ipstr
(`srcip`),nullifna(`srcmac`)) as dev_src,  sum(crscore%65536) as crscore, coalesce(nullifna
(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src, sum(coalesce(sentdelta,
sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as bandwidth, sum(coalesce(rcvddelta,
rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as traffic_out, count(*)
as sessions from $log-traffic where $filter and vwlid IS NOT NULL and (logflag&(1|32)>0)
group by timestamp, srccountry, dstintf, csf, devid, vd, srcintf, srcintfrole, dstintfrole,
appid, appcat, app_group, rulename, service, user_src, dev_src order by bandwidth desc)### t
where $filter-drilldown and bandwidth>0 group by appcat, app_group order by bandwidth desc
```

Dataset Name	Description	Log Category
sdwan-CTAP-Business-Apps-Bandwidth	CTAP SD-WAN Business Application with Bandwidth	traffic

```
select
  app_group,
  sum(bandwidth) as bandwidth
from
  ###(select $flex_timestamp as timestamp, csf, devid, vd, srccountry, dstintf, srcintf,
srcintfrole, dstintfrole, appid, appcat, app_group_name(app) as app_group, coalesce
(vwlname,vwlservice) as rulename, service, coalesce(nullifna(`srcname`),ipstr
(`srcip`),nullifna(`srcmac`)) as dev_src,  sum(crscore%65536) as crscore, coalesce(nullifna
(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src, sum(coalesce(sentdelta,
sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as bandwidth, sum(coalesce(rcvddelta,
rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as traffic_out, count(*)
as sessions from $log-traffic where $filter and vwlid IS NOT NULL and (logflag&(1|32)>0)
group by timestamp, srccountry, dstintf, csf, devid, vd, srcintf, srcintfrole, dstintfrole,
appid, appcat, app_group, rulename, service, user_src, dev_src order by bandwidth desc)###
t1 inner join app_mdata t2 on lower(t1.app_group)=lower(t2.name) where $filter-drilldown and
appcat not in ('Network.Service',
'Mobile','Social.Media','Proxy','Video\/Audio','Game','P2P','unknown') group by app_group
order by bandwidth desc, app_group
```

Dataset Name	Description	Log Category
sdwan-CTAP-Cloud-IT-Apps-Bandwidth	CTAP SD-WAN Cloud IT Application Bandwidth	traffic

```
select
  app_group,
  sum(bandwidth) as bandwidth
from
  ###(select $flex_timestamp as timestamp, csf, devid, vd, srccountry, dstintf, srcintf,
srcintfrole, dstintfrole, appid, appcat, app_group_name(app) as app_group, coalesce
(vwlname,vwlservice) as rulename, service, coalesce(nullifna(`srcname`),ipstr
(`srcip`),nullifna(`srcmac`)) as dev_src,  sum(crscore%65536) as crscore, coalesce(nullifna
(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src, sum(coalesce(sentdelta,
sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as bandwidth, sum(coalesce(rcvddelta,
rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as traffic_out, count(*)
as sessions from $log-traffic where $filter and vwlid IS NOT NULL and (logflag&(1|32)>0)
group by timestamp, srccountry, dstintf, csf, devid, vd, srcintf, srcintfrole, dstintfrole,
appid, appcat, app_group, rulename, service, user_src, dev_src order by bandwidth desc)### t
where $filter-drilldown and appcat='Cloud.IT' and bandwidth>0 group by app_group order by
bandwidth desc
```

Dataset Name	Description	Log Category
sdwan-CTAP-Storage-Backup-Apps-Bandwidth	CTAP SD-WAN Storage Backup Application Bandwidth	traffic

```
select
  app_group,
  sum(bandwidth) as bandwidth
from
  ###(select $flex_timestamp as timestamp, csf, devid, vd, srccountry, dstintf, srcintf,
srcintfrole, dstintfrole, appid, appcat, app_group_name(app) as app_group, coalesce
(vwlname,vwlservice) as rulename, service, coalesce(nullifna(`srcname`),ipstr
(`srcip`),nullifna(`srcmac`)) as dev_src,  sum(crscore%65536) as crscore, coalesce(nullifna
(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src, sum(coalesce(sentdelta,
sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as bandwidth, sum(coalesce(rcvddelta,
rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as traffic_out, count(*)
as sessions from $log-traffic where $filter and vwlid IS NOT NULL and (logflag&(1|32)>0)
group by timestamp, srccountry, dstintf, csf, devid, vd, srcintf, srcintfrole, dstintfrole,
appid, appcat, app_group, rulename, service, user_src, dev_src order by bandwidth desc)### t
where $filter-drilldown and appcat='Storage.Backup' and bandwidth>0 group by app_group order
by bandwidth desc
```

Dataset Name	Description	Log Category
sdwan-CTAP-Collaboration-Apps-Bandwidth	CTAP SD-WAN Collaboration Application Bandwidth	traffic

```
select
  app_group,
  sum(bandwidth) as bandwidth
from
  ###(select $flex_timestamp as timestamp, csf, devid, vd, srccountry, dstintf, srcintf,
srcintfrole, dstintfrole, appid, appcat, app_group_name(app) as app_group, coalesce
(vwlname,vwlservice) as rulename, service, coalesce(nullifna(`srcname`),ipstr
(`srcip`),nullifna(`srcmac`)) as dev_src,  sum(crscore%65536) as crscore, coalesce(nullifna
(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src, sum(coalesce(sentdelta,
sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as bandwidth, sum(coalesce(rcvddelta,
rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as traffic_out, count(*)
as sessions from $log-traffic where $filter and vwlid IS NOT NULL and (logflag&(1|32)>0)
group by timestamp, srccountry, dstintf, csf, devid, vd, srcintf, srcintfrole, dstintfrole,
appid, appcat, app_group, rulename, service, user_src, dev_src order by bandwidth desc)### t
where $filter-drilldown and appcat='Collaboration' and bandwidth>0 group by app_group order
by bandwidth desc
```

Dataset Name	Description	Log Category
sdwan-CTAP-Top-Streaming-App-By-Bandwidth	CTAP SD-WAN Top Streaming Application by Bandwidth	traffic

```
select
  app_group,
  sum(bandwidth) as bandwidth
from
  ###(select $flex_timestamp as timestamp, csf, devid, vd, srccountry, dstintf, srcintf,
srcintfrole, dstintfrole, appid, appcat, app_group_name(app) as app_group, coalesce
(vwlname,vwlservice) as rulename, service, coalesce(nullifna(`srcname`),ipstr
(`srcip`),nullifna(`srcmac`)) as dev_src,  sum(crscore%65536) as crscore, coalesce(nullifna
(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src, sum(coalesce(sentdelta,
sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as bandwidth, sum(coalesce(rcvddelta,
rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as traffic_out, count(*)
as sessions from $log-traffic where $filter and vwlid IS NOT NULL and (logflag&(1|32)>0)
group by timestamp, srccountry, dstintf, csf, devid, vd, srcintf, srcintfrole, dstintfrole,
appid, appcat, app_group, rulename, service, user_src, dev_src order by bandwidth desc)### t
where $filter-drilldown and appcat='Video\/Audio' and bandwidth>0 group by app_group order
by bandwidth desc
```

Dataset Name	Description	Log Category
sdwan-CTAP-Top-SocialMedia-App-By-Bandwidth	CTAP SD-WAN Top SocialMedia Application by Bandwidth	traffic

```
select
  app_group,
  sum(bandwidth) as bandwidth
from
  ###(select $flex_timestamp as timestamp, csf, devid, vd, srccountry, dstintf, srcintf,
srcintfrole, dstintfrole, appid, appcat, app_group_name(app) as app_group, coalesce
(vwlname,vwlservice) as rulename, service, coalesce(nullifna(`srcname`),ipstr
(`srcip`),nullifna(`srcmac`)) as dev_src,  sum(crscore%65536) as crscore, coalesce(nullifna
(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src, sum(coalesce(sentdelta,
sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as bandwidth, sum(coalesce(rcvddelta,
rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as traffic_out, count(*)
as sessions from $log-traffic where $filter and vwlid IS NOT NULL and (logflag&(1|32)>0)
group by timestamp, srccountry, dstintf, csf, devid, vd, srcintf, srcintfrole, dstintfrole,
appid, appcat, app_group, rulename, service, user_src, dev_src order by bandwidth desc)### t
where $filter-drilldown and appcat='Social.Media' and bandwidth>0 group by app_group order
by bandwidth desc
```

Dataset Name	Description	Log Category
sdwan-CTAP-App-Risk-Reputation-Top-Devices-By-Scores	Reputation Top Devices By-Scores	traffic

```
select
  coalesce(
    nullifna(`srcname`),
    ipstr(`srcip`),
    nullifna(`srcmac`)
  ) as dev_src,
  sum(crscore % 65536) as scores
from
  $log
where
  $filter
  and (
    logflag&1>0
  )
  and crscore is not null
group by
  dev_src
having
  sum(crscore % 65536)> 0
order by
  scores desc
```

Dataset Name	Description	Log Category
sdwan-CTAP-SB-Top-Sandbox-Files	CTAP SD-WAN Sandbox Top Sandbox Files	virus

```
select
  filename,
  analyticscksum,
  service,
  sum(totalnum) as total_num,
  (
    case fsaverdict when & #039;malicious' then 'Malicious'  when 'high risk' then 'High'
when 'medium risk' then 'Medium'  when 'low risk' then 'Low' else 'Other' end) as risk,
(case fsaverdict when 'malicious' then 5 when 'high risk' then 4 when 'medium risk' then 3
when 'low risk' then 2 else 1 end) as risk_level from ###(select filename, analyticscksum,
service, fsaverdict, dtype, coalesce(nullifna(`user`), ipstr(`srcip`)) as user_src, virus,
virusid_to_str(virusid, eventtype) as virusid_s, count(*) as totalnum from $log where
$filter group by filename, analyticscksum, service, fsaverdict, dtype, user_src, virus,
virusid_s /*SkipSTART*/order by totalnum desc/*SkipEND*/)### t where $filter-drilldown and
filename is not null and dtype='fortisandbox' and fsaverdict not in ('clean', 'submission
failed') group by filename, analyticscksum, risk_level, risk, service  order by risk_level
desc, total_num desc, service, filename
```

Dataset Name	Description	Log Category
sdwan-CTAP-SB-Total-Number-of-Malicious-Suspicious-Files	CTAP SD-WAN Sandbox Malicious Suspicious Files Number	virus

```
select
  (
    case fsaverdict when & #039;malicious' then 'Malicious'  when 'high risk' then 'High'
when 'medium risk' then 'Medium'  when 'low risk' then 'Low' else 'Other' end) as risk,  sum
(totalnum) as total_num  from ###(select filename, analyticscksum, service, fsaverdict,
dtype, coalesce(nullifna(`user`), ipstr(`srcip`)) as user_src, virus, virusid_to_str
(virusid, eventtype) as virusid_s, count(*) as totalnum from $log where $filter group by
filename, analyticscksum, service, fsaverdict, dtype, user_src, virus, virusid_s
/*SkipSTART*/order by totalnum desc/*SkipEND*/)### t where $filter-drilldown and
dtype='fortisandbox' and fsaverdict not in ('clean','submission failed') group by risk order
by total_num desc
```

Dataset Name	Description	Log Category
sdwan-CTAP-Top-Source-Countries	CTAP SD-WAN Top Source Countries	traffic

```
select
  srccountry,
  sum(bandwidth) as bandwidth
from
  ###(select $flex_timestamp as timestamp, csf, devid, vd, srccountry, dstintf, srcintf,
srcintfrole, dstintfrole, appid, appcat, app_group_name(app) as app_group, coalesce
(vwlname,vwlservice) as rulename, service, coalesce(nullifna(`srcname`),ipstr
(`srcip`),nullifna(`srcmac`)) as dev_src,  sum(crscore%65536) as crscore, coalesce(nullifna
(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src, sum(coalesce(sentdelta,
sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as bandwidth, sum(coalesce(rcvddelta,
rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as traffic_out, count(*)
as sessions from $log-traffic where $filter and vwlid IS NOT NULL and (logflag&(1|32)>0)
group by timestamp, srccountry, dstintf, csf, devid, vd, srcintf, srcintfrole, dstintfrole,
appid, appcat, app_group, rulename, service, user_src, dev_src order by bandwidth desc)### t
where $filter-drilldown and nullifna(srccountry) is not null and srccountry <> 'Reserved'
and bandwidth>0 group by srccountry order by bandwidth desc, srccountry
```

Dataset Name	Description	Log Category
sdwan-CTAP-Average-Bandwidth-Day-Hour	CTAP SD-WAN Average Bandwidth by Day of Week and Hour	traffic

```
select
  hourstamp,
  daystamp,
  round(
    sum(bandwidth) / count(*)
  ) as bandwidth
from
  (
    select
      $hour_of_day(timestamp) as hourstamp,
      $HOUR_OF_DAY(timestamp) as hour_stamp,
      $day_of_week(timestamp) as daystamp,
      sum(bandwidth) as bandwidth
    from
      ###(select $flex_timestamp as timestamp, csf, devid, vd, srccountry, dstintf, srcintf,
srcintfrole, dstintfrole, appid, appcat, app_group_name(app) as app_group, coalesce
(vwlname,vwlservice) as rulename, service, coalesce(nullifna(`srcname`),ipstr
(`srcip`),nullifna(`srcmac`)) as dev_src,  sum(crscore%65536) as crscore, coalesce(nullifna
(`user`), nullifna(`unauthuser`), ipstr(`srcip`)) as user_src, sum(coalesce(sentdelta,
sentbyte, 0)+coalesce(rcvddelta, rcvdbyte, 0)) as bandwidth, sum(coalesce(rcvddelta,
rcvdbyte, 0)) as traffic_in, sum(coalesce(sentdelta, sentbyte, 0)) as traffic_out, count(*)
as sessions from $log-traffic where $filter and vwlid IS NOT NULL and (logflag&(1|32)>0)
group by timestamp, srccountry, dstintf, csf, devid, vd, srcintf, srcintfrole, dstintfrole,
appid, appcat, app_group, rulename, service, user_src, dev_src order by bandwidth desc)### t
where $filter-drilldown group by hourstamp, hour_stamp, daystamp) t group by hourstamp,
daystamp order by hourstamp
```

Dataset Name	Description	Log Category
sdwan-CTAP-Average-Log-Rate-By-Hour	CTAP SD-WAN Average Log Rate by Hour	event

```
select
  $hour_of_day(timestamp) as hourstamp,
  cast(
    (
      sum(
        total_trate + total_erate + total_orate
      )
    )/ sum(count)/ 100.0 as decimal(10, 2)
  ) as log_rate
from
  ###(select $flex_timestamp as timestamp, devid, slot, sum(coalesce(trate, 0)) as total_
trate, sum(coalesce(erate, 0)) as total_erate, sum(coalesce(orate, 0)) as total_orate, min
(itime) as first_seen, max(itime) as last_seen, sum(coalesce(mem, 0)) as total_mem, max
(coalesce(mem, 0)) as mem_peak, sum(coalesce(disk, 0)) as total_disk, max(coalesce(disk, 0))
as disk_peak, sum(coalesce(cpu, 0)) as total_cpu, max(coalesce(cpu, 0)) as cpu_peak, max
(coalesce(trate, 0)+coalesce(erate, 0)+coalesce(orate, 0)) as lograte_peak, sum(coalesce
(totalsession, 0)) as totalsession, max(coalesce(totalsession, 0)) as session_peak, sum(cast
(coalesce(split_part(bandwidth, '/', 1), '0') as integer)) as sent, sum(cast(coalesce(split_
part(bandwidth, '/', 2), '0') as integer)) as recv, max(cast(coalesce(split_part(bandwidth,
'/', 1), '0') as integer)+cast(coalesce(split_part(bandwidth, '/', 2), '0') as integer)) as
transmit_peak, sum(coalesce(setuprate, 0)) as cps, max(coalesce(setuprate, 0)) as cps_peak,
count(*) as count from $log where $filter and subtype='system' and action='perf-stats' group
by timestamp, devid, slot order by total_mem desc)### t where $filter-drilldown group by
hourstamp order by hourstamp
```

Dataset Name	Description	Log Category
sdwan-CTAP-CPU-Usage-Per-Hour	Event usage CPU	event

```
select
  $hour_of_day(timestamp) as hourstamp,
  cast(
    sum(total_cpu)/ sum(count) as decimal(6, 2)
  ) as cpu_avg_usage
from
  ###(select $flex_timestamp as timestamp, devid, slot, sum(coalesce(trate, 0)) as total_
trate, sum(coalesce(erate, 0)) as total_erate, sum(coalesce(orate, 0)) as total_orate, min
(itime) as first_seen, max(itime) as last_seen, sum(coalesce(mem, 0)) as total_mem, max
(coalesce(mem, 0)) as mem_peak, sum(coalesce(disk, 0)) as total_disk, max(coalesce(disk, 0))
as disk_peak, sum(coalesce(cpu, 0)) as total_cpu, max(coalesce(cpu, 0)) as cpu_peak, max
(coalesce(trate, 0)+coalesce(erate, 0)+coalesce(orate, 0)) as lograte_peak, sum(coalesce
(totalsession, 0)) as totalsession, max(coalesce(totalsession, 0)) as session_peak, sum(cast
(coalesce(split_part(bandwidth, '/', 1), '0') as integer)) as sent, sum(cast(coalesce(split_
part(bandwidth, '/', 2), '0') as integer)) as recv, max(cast(coalesce(split_part(bandwidth,
'/', 1), '0') as integer)+cast(coalesce(split_part(bandwidth, '/', 2), '0') as integer)) as
transmit_peak, sum(coalesce(setuprate, 0)) as cps, max(coalesce(setuprate, 0)) as cps_peak,
count(*) as count from $log where $filter and subtype='system' and action='perf-stats' group
by timestamp, devid, slot order by total_mem desc)### t group by hourstamp order by
hourstamp
```

Dataset Name	Description	Log Category
sdwan-CTAP-Memory-Usage-Per-Hour	Event usage memory	event

```
select
  $hour_of_day(timestamp) as hourstamp,
  cast(
    sum(total_mem)/ sum(count) as decimal(6, 2)
  ) as mem_avg_usage
from
  ###(select $flex_timestamp as timestamp, devid, slot, sum(coalesce(trate, 0)) as total_
trate, sum(coalesce(erate, 0)) as total_erate, sum(coalesce(orate, 0)) as total_orate, min
(itime) as first_seen, max(itime) as last_seen, sum(coalesce(mem, 0)) as total_mem, max
(coalesce(mem, 0)) as mem_peak, sum(coalesce(disk, 0)) as total_disk, max(coalesce(disk, 0))
as disk_peak, sum(coalesce(cpu, 0)) as total_cpu, max(coalesce(cpu, 0)) as cpu_peak, max
(coalesce(trate, 0)+coalesce(erate, 0)+coalesce(orate, 0)) as lograte_peak, sum(coalesce
(totalsession, 0)) as totalsession, max(coalesce(totalsession, 0)) as session_peak, sum(cast
(coalesce(split_part(bandwidth, '/', 1), '0') as integer)) as sent, sum(cast(coalesce(split_
part(bandwidth, '/', 2), '0') as integer)) as recv, max(cast(coalesce(split_part(bandwidth,
'/', 1), '0') as integer)+cast(coalesce(split_part(bandwidth, '/', 2), '0') as integer)) as
transmit_peak, sum(coalesce(setuprate, 0)) as cps, max(coalesce(setuprate, 0)) as cps_peak,
count(*) as count from $log where $filter and subtype='system' and action='perf-stats' group
by timestamp, devid, slot order by total_mem desc)### t group by hourstamp order by
hourstamp
```

Dataset Name	Description	Log Category
Top-Destination-Addresses-By-Bandwidth-Bar	Top destinations by bandwidth usage	traffic

```
select
  coalesce(
    nullifna(
      root_domain(hostname)
    ),
    ipstr(dstip)
  ) as domain,
  sum(
    coalesce(sentbyte, 0)+ coalesce(rcvdbyte, 0)
  ) as bandwidth,
  sum(
    coalesce(rcvdbyte, 0)
  ) as traffic_in,
  sum(
    coalesce(sentbyte, 0)
  ) as traffic_out
from
  $log
where
  $filter
  and (
    logflag&1>0
  )
  and coalesce(
    nullifna(
        root_domain(hostname)
      ),
      ipstr(`dstip`)
    ) is not null
group by
  domain
having
  sum(
    coalesce(sentbyte, 0)+ coalesce(rcvdbyte, 0)
  )> 0
order by
  bandwidth desc
```

Dataset Name	Description	Log Category
intf-Timeline-Sampling	Interface Utilization Timeline by Data Sampling	event

```
with base_qry as (
  select
    tm,
    rcvdbps,
    ntile(100) over (
      order by
        rcvdbps
    ) as percentile
  from
    (
      select
        (timestamp / 300 * 300) as tm,
        sum(rcvdbps) as rcvdbps,
        300 as interval
      from
        intfstats_billing tb1
        join (
          select
            ti.dvid,
            intfname
          from
            intfinfo ti
            left join devtable td on ti.dvid = td.dvid
          where
            $dev_filter
        ) tb2 on tb1.dvid = tb2.dvid
        and tb1.intfname = tb2.intfname
      where
        $cust_time_filter(timestamp)
      group by
        tm
    ) tmp
),
ref_qry as (
  select
    cast(
      max(rcvdbps)/ 1000000 as decimal(18, 2)
    ) as ref_val
  from
```

```
    base_qry
  where
    percentile = 95
)
select
  from_itime(timestamp) as tmstamp,
  cast(
    rcvdbps / 1000000 as decimal(18, 2)
  ) as rcvdbps,
  ref_val
from
  ref_qry,
  (
    select
      tm as timestamp,
      rcvdbps,
      rank() over(
        partition by (tm / 3600)
        order by
          tm
      ) as r
    from
      base_qry
  ) t
where
  r = 1
order by
  tmstamp
```

Dataset Name	Description	Log Category
intf-Util-Histogram	Interface Utilization Value Distribution	event

```
select
  cast(
    (
      (
        max(max_value) over ()
      )* seq / 100
    ) as decimal(16, 0)
  ) as value,
  cnt
from
  (
    select
      generate_series(0, 100, 2) as seq
  ) t1
  left join (
    select
      perc,
      max_value,
      count(*) as cnt
    from
      (
        select
          WIDTH_BUCKET(
            rcvdbps,
            0,
            (
              max(rcvdbps) over ()
            ) + 1,
            50
          )* 2 as perc,
          max(rcvdbps) over () as max_value
        from
          (
            select
              (timestamp / 300 * 300) as tm,
              sum(rcvdbps) as rcvdbps,
              300 as interval
            from
              intfstats_billing tb1
              join (
                select
                  ti.dvid,
                  intfname
                from
                  intfinfo ti
                  left join devtable td on ti.dvid = td.dvid
                where
                  $dev_filter
              ) tb2 on tb1.dvid = tb2.dvid
              and tb1.intfname = tb2.intfname
            where
              $cust_time_filter(timestamp)
            group by
              tm
          ) tmp
      ) t_bucket
    group by
      perc,
      max_value
  ) t2 on t1.seq = t2.perc
order by
  seq
```

Dataset Name	Description	Log Category
intf-Sorted-Line	Interface Utilization Line Sorted by bps	event

```
with base_qry as (
  select
    rcvdbps,
    ntile(100) over (
      order by
        rcvdbps
    ) as percentile
  from
    (
      select
        (timestamp / 300 * 300) as tm,
        sum(rcvdbps) as rcvdbps,
        300 as interval
      from
        intfstats_billing tb1
        join (
          select
            ti.dvid,
            intfname
          from
            intfinfo ti
            left join devtable td on ti.dvid = td.dvid
          where
            $dev_filter
        ) tb2 on tb1.dvid = tb2.dvid
        and tb1.intfname = tb2.intfname
      where
        $cust_time_filter(timestamp)
      group by
        tm
    ) tmp
),
ref_qry as (
  select
    cast(
      max(rcvdbps)/ 1000000 as decimal(18, 2)
    ) as ref_val
  from
    base_qry
  where
    percentile = 95
)
select
  n_perc,
  cast(
    rcvdbps / 1000000 as decimal(18, 2)
  ) as rcvdbps,
  ref_val
from
  (
    select
      seq as n_perc,
      rcvdbps
    from
      (
        select
          generate_series(0, 100, 1) as seq
      ) t1
      left join (
        select
          max(rcvdbps) as rcvdbps,
          percentile
        from
          base_qry
        group by
          percentile
      ) t2 on t1.seq = t2.percentile
  ) t,
  ref_qry
order by
  n_perc
```

Dataset Name	Description	Log Category
intf-Data-Analysis-Table	Interface Utilization Data Analysis	event

```
with base_qry as (
  select
    rcvdbps,
    interval,
    ntile(100) over (
      order by
        rcvdbps
    ) as percentile
  from
    (
      select
        (timestamp / 300 * 300) as tm,
        sum(rcvdbps) as rcvdbps,
        300 as interval
      from
        intfstats_billing tb1
        join (
          select
            ti.dvid,
            intfname
          from
            intfinfo ti
            left join devtable td on ti.dvid = td.dvid
          where
            $dev_filter
        ) tb2 on tb1.dvid = tb2.dvid
        and tb1.intfname = tb2.intfname
      where
        $cust_time_filter(timestamp)
      group by
        tm
    ) tmp
)
select
  min_mbps,
  low_ref_mbps,
  mean_mbps,
  ref_mbps,
  peak_mbps,
  actual_gb,
  total
from
  (
    select
      cast(
        min(rcvdbps)/ 1000000 as decimal(18, 2)
      ) as min_mbps,
      cast(
        avg(rcvdbps)/ 1000000 as decimal(18, 2)
      ) as mean_mbps,
      cast(
        max(rcvdbps)/ 1000000 as decimal(18, 2)
      ) as peak_mbps,
      cast(
        (
          select
            max(rcvdbps)
          from
            base_qry
          where
            percentile = 5
        )/ 1000000 as decimal(18, 2)
      ) as low_ref_mbps,
      cast(
        (
          select
            max(rcvdbps)
          from
            base_qry
          where
            percentile = 95
        )/ 1000000 as decimal(18, 2)
      ) as ref_mbps,
      cast(
        sum(interval * rcvdbps)/ 8 /(1024 * 1024 * 1024) as decimal(18, 2)
      ) as actual_gb,
      count(*) as total
    from
      base_qry
  ) t
```

Dataset Name	Description	Log Category
intf-Device-Summary	Interface Utilization Device Summary	event

```
select
  devname,
  t1.intfname,
  rcvd_gb
from
  (
    select
      devname,
      ti.dvid,
      intfname
    from
      devtable td
      join intfinfo ti on ti.dvid = td.dvid
    where
      $dev_filter
  ) t1
  join (
    select
      dvid,
      intfname,
      cast(
        sum(interval * rcvdbps)/ 8 /(1024 * 1024 * 1024) as decimal(18, 2)
      ) as rcvd_gb
    from
      intfstats_billing
    where
      $cust_time_filter(timestamp)
    group by
      dvid,
      intfname
  ) t2 on t1.dvid = t2.dvid
  and t1.intfname = t2.intfname
order by
  devname,
  rcvd_gb desc,
  t1.intfname
```

Dataset Name	Description	Log Category
daily-Summary-Traffic-Bandwidth-Line	Daily Summary - Traffic Bandwidth Line	traffic

```
select
  $fv_line_timescale(timescale) as time,
  sum(traffic_in) as traffic_in,
  sum(traffic_out) as traffic_out
from
  (
    union all
      ) t
group by
  time
order by
  time
```

Dataset Name	Description	Log Category
daily-Summary-Top-User	Daily Summary - Top User by Bandwidth	traffic

```
select
  coalesce(
    nullifna(f_user),
    ipstr(srcip),
    & #039;Unknown') as f_user, srcip, sum(bandwidth) as bandwidth FROM  t group by f_user,
srcip order by bandwidth desc
```

Dataset Name	Description	Log Category
daily-Summary-Top-Domain	Daily Summary - Top Domain by Bandwidth	traffic

```
select
  domain,
  sum(bandwidth) as bandwidth
from
  t
where
```

```
  domain is not null
group by
  domain
order by
  bandwidth desc
```

Dataset Name	Description	Log Category
daily-Summary-Top-Appcat-Bandwidth	Daily Summary - Top Application Category by Bandwidth	traffic

```
select
  appcat,
  sum(bandwidth) as bandwidth
from
  (
    select
      t1.*,
      t2.app_cat as appcat
    from
      t1
      left join app_mdata t2 on t1.app_group = t2.name
  ) t
where
  $filter - drilldown
  and appcat is not null
group by
  appcat
order by
  bandwidth desc
```

Dataset Name	Description	Log Category
daily-Summary-Top-App	Daily Summary - Top Application	traffic

```
select
  app_group,
  max(appcat) as appcat,
  (
    case max(d_risk) when 1 then & #039;Low' when 2 then 'Elevated' when 3 then 'Medium'
when 4 then 'High' when 5 then 'Critical' else NULL end) as risk, sum(bandwidth) as
bandwidth, sum(traffic_in) as traffic_in, sum(traffic_out) as traffic_out, sum(session_
block) as session_block, (sum(sessions)-sum(session_block)) as session_pass, sum(sessions)
as sessions from (select t1.*, (case when (d_flags & 1) = 1 then 'Not.Scanned' when t2.app_
cat is null then 'Unknown' else t2.app_cat end) as appcat, (case when t2.risk is null then 0
else t2.risk::int end) as d_risk from  t1 left join app_mdata t2 on t1.app_group=t2.name) t
where $filter-drilldown group by app_group order by max(d_risk) desc, sessions desc,
bandwidth desc
```

Dataset Name	Description	Log Category
daily-Summary-Top-Threats	Daily Summary - Top Threats	traffic

```
select
  threat_s as threat,
  threattype_s as threattype,
  sum(threatweight) as threatweight,
  sum(threat_block) as threat_block,
  (
    sum(threatweight)- sum(threat_block)
  ) as threat_pass,
  sum(incidents) as incidents,
  sum(incident_block) as incident_block,
  (
    sum(incidents)- sum(incident_block)
  ) as incident_pass
from
  (
    union all
      ) t
group by
  threat,
  threattype
order by
  threatweight desc
```

Dataset Name	Description	Log Category
daily-Summary-Top-Compromised-Hosts	Daily Summary - Top Compromised Hosts	traffic

```
select
  epid,
  devid,
  vd,
  srcip,
  devtype,
  fctuid,
  euid,
  bmp_logtype as logtype,
  unauthuser,
  srcmac,
  osname,
  osversion,
  f_user,
  (
    case when epid<1024 then ipstr(srcip) else epname end
  ) as epname,
  threat_num,
  bl_count,
  cs_score,
  cs_count,
  verdict,
  ip_reversed,
  rescan,
  (
    case verdict when 1 then & #039;Low Suspicion' when 2 then 'Medium Suspicion' when 3
then 'High Suspicion' when 4 then 'Infected' else 'N/A' end) as verdict_s,ack_time, ack_
note, last_bl as last_detected_time from (SELECT epid, itime, bl_count, cs_score, cs_count,
threat_num, bmp_logtype, last_bl, verdict, ip_reversed, rescan, srcip, epname, srcmac,
osname, osversion, devtype, fctuid, euid, unauthuser, f_user, ack_note, ack_time, devid, vd,
csf, devname FROM (SELECT tvdt.epid, itime, tvdt.bl_count, tvdt.cs_score, tvdt.cs_count,
tvdt.threat_num, tvdt.bmp_logtype, tvdt.last_bl, tvdt.verdict, tvdt.ip_reversed,
tvdt.rescan, (CASE WHEN tvdt.epid>1024 THEN tep.epip ELSE tvdt.srcip END) as srcip,
tep.epname, tep.mac as srcmac, tep.osname, tep.osversion,tep.epdevtype as devtype,
teu.fctuid, teu.euid, teu.unauthuser, (case when teu.euid<=1024 then ipstr(tvdt.srcip) else
teu.euname end) as f_user, tack.ack_note, (case when (tvdt.ack_time_max=0 or tvdt.ack_time_
min=0) then NULL else tvdt.ack_time_max end) as ack_time,tdev.devid, tdev.vd, tdev.csf,
tdev.devname FROM (SELECT epid, srcip, min(day_st) as itime, array_length(intarr_agg
(threatid), 1) as threat_num, intarr_agg(dvid) as dvid, sum(bl_count) as bl_count, max(cs_
score) as cs_score, sum(cs_count) as cs_count, max(last_bl) as last_bl, max(ack_time) as
ack_time_max, min(ack_time) as ack_time_min, bit_or(bmp_logtype) as bmp_logtype, max
(verdict) as verdict, max(ip_reversed) as ip_reversed, max(rescan) as rescan FROM ((SELECT
epid, srcip, day_st, ack_time, threatid, dvid,bl_count, cs_score, cs_count, last_bl, bmp_
logtype, verdict, (case when ioc_flags&2>0 then 1 else 0 end) as ip_reversed, (case when
ioc_flags&1>0 then 1 else 0 end) as rescan FROM $ADOMTBL_PLHD_IOC_VERDICT /*verdict
table*/WHERE day_st>=$start_time and day_st<=$end_time /*time filter*/) UNION ALL (SELECT
epid, srcip, day_st, ack_time, threatid, dvid,bl_count, cs_score, cs_count, last_bl, bmp_
logtype, verdict, (case when ioc_flags&2>0 then 1 else 0 end) as ip_reversed, (case when
ioc_flags&1>0 then 1 else 0 end) as rescan FROM $ADOMTBL_PLHD_INTERIM_IOC_VERDICT /*verdict
intrim table*/WHERE day_st>=$start_time and day_st<=$end_time /*time filter*/ and
verdict>0)) tvdt_int GROUP BY epid, srcip) tvdt INNER JOIN /*end points*/  $ADOM_ENDPOINT as
tep ON tvdt.epid=tep.epid LEFT JOIN /*end user*/ (select epid, euname, fctuid, euid,
unauthuser from (select epid, eu.euid, euname, fctuid, euname as unauthuser, row_number()
over (partition by epid order by ((case when fctuid is null then 0 else 1 end), lastactive)
desc) nth from $ADOM_ENDUSER eu /*end user*/, $ADOM_EPEU_DEVMAP as map /*epeu dev_map*/
where eu.euid=map.euid and eu.euid>1024) eum where nth=1) teu on tvdt.epid=teu.epid LEFT
JOIN /*ack table*/(SELECT epid, srcip, ack_time, ack_note FROM (SELECT epid, srcip, ack_
time, ack_note, row_number() over (PARTITION BY epid, srcip order by ack_time desc) as
ackrank FROM ioc_ack WHERE adomoid=$adom_oid) rankqry WHERE ackrank=1) tack ON
tvdt.epid=tack.epid and ((tvdt.srcip is null and tack.srcip is null) or
tvdt.srcip=tack.srcip) LEFT JOIN devtable tdev ON tdev.dvid = tvdt.dvid[1] WHERE tvdt.dvid
&& (SELECT array_agg(dvid) from devtable WHERE $filter-drilldown)) tioc) t order by threat_
num desc
```

Dataset Name	Description	Log Category
daily-Summary-Incidents-by-Severity	Incidents by Severity	

```
select
  severity,
  count(*) as incnum
from
  $incident
where
  $filter - drilldown
  and $cust_time_filter(createtime)
group by
  severity
order by
  incnum desc
```

Dataset Name	Description	Log Category
ueba-Asset-Count-by-Detecttype	Asset Count by Detection Type	

```
select
  (
    case detecttype when & #039;by_ip' then 'IP' when 'by_mac' then 'MAC' end) as
```

```
detecttype, count(distinct epid) as count from $ADOM_ENDPOINT t1 where epid>1024 and
$filter-drilldown and lastseen>=$start_time and firstseen<$end_time and detecttype in ('by_
ip', 'by_mac') group by detecttype order by count desc
```

Dataset Name	Description	Log Category
ueba-Asset-Identification	Asset Count by Identification	

```
with qualified_ep as (
  select
    t2.epid,
    t2.euid
  from
    $ADOM_ENDPOINT t1
    inner join $ADOM_EPEU_DEVMAP t2 on t1.epid = t2.epid
  where
    $filter - drilldown
    and lastseen >= $start_time
    and firstseen<$end_time
    and t2.epid>1024
),
identified_ep as (
  select
    distinct epid
  from
    qualified_ep t1
    inner join $ADOM_ENDUSER t2 on t1.euid = t2.euid
  where
    t1.euid is not null
    and t1.euid>1024
    and euname !=& #039;(none)' and euname is not null) (select 'Identified' as type, count
(distinct epid) as count from identified_ep) union all (select 'Unidentified' as type, count
(distinct epid) as count from qualified_ep where epid not in (select * from identified_ep))
```

Dataset Name	Description	Log Category
ueba-Asset-Count-by-HWOS	Asset Count by Hardware OS	

```
select
  osname,
  count(distinct t2.epid) as count
from
  $ADOM_ENDPOINT t1
  inner join $ADOM_EPEU_DEVMAP t2 on t1.epid = t2.epid
where
  $filter - drilldown
  and lastseen >= $start_time
  and firstseen<$end_time
  and osname is not null
  and t2.epid>1024
group by
  osname
order by
  count desc
```

Dataset Name	Description	Log Category
ueba-Asset-Count-by-Device-and-Detecttype	Asset Count by Source and Detection Type	

```
select
  devname,
  (
    case detecttype when & #039;by_ip' then 'IP' when 'by_mac' then 'MAC' end) as
detecttype, count(distinct t1.epid) as count from $ADOM_ENDPOINT t1 inner join $ADOM_EPEU_
DEVMAP t2 on t1.epid=t2.epid inner join devtable t3 on t2.devid=t3.devid where t1.epid>1024
and $filter-drilldown and t1.lastseen>=$start_time and firstseen<$end_time and devname is
not null and detecttype in ('by_ip', 'by_mac') group by devname, detecttype order by count
desc
```

Dataset Name	Description	Log Category
ueba-User-Count-by-Usergroup	User Count by User Group	

```
select
  coalesce(
    eugroup,
    & #039;Unknown') as eugroup, count(distinct t1.euid) as count from $ADOM_ENDUSER t1
inner join $ADOM_EPEU_DEVMAP t2 ON t1.euid=t2.euid where $filter-drilldown and t1.euid>1024
and t1.lastseen>=$start_time and firstseen<$end_time group by eugroup order by count desc
```

Dataset Name	Description	Log Category
ueba-Asset-User-Count-by-Device	Asset and User Count by Device	

```
select
  devname,
  cnt_for,
  sum(count) as count
from
  (
    (
      select
        devname,
        & #039;Endpoint' as cnt_for, count(distinct t2.epid) as count from $ADOM_ENDPOINT t1
inner join $ADOM_EPEU_DEVMAP t2 on t1.epid=t2.epid inner join devtable t3 on
t2.devid=t3.devid where $filter-drilldown and t1.lastseen>=$start_time and
t1.firstseen<$end_time and t2.epid>1024 group by devname order by count desc) union all
(select devname, 'User' as cnt_for, count(distinct t1.euid) as count from $ADOM_ENDUSER t1
inner join $ADOM_EPEU_DEVMAP t2 ON t1.euid=t2.euid inner join devtable t3 on
t2.devid=t3.devid where $filter-drilldown and t1.lastseen>=$start_time and
t1.firstseen<$end_time and euname != '(none)' and epid>1024 and t1.euid>1024  group by
devname order by count desc)) t group by devname, cnt_for order by count desc
```

Dataset Name	Description	Log Category
ueba-Asset-User-Count-by-Device-Interface-and-Detectiontype	Asset and User Count by Source Device Interface and Detection Method	

```
select
  devname,
  srcintf,
  sum(mac_cnt) as mac_cnt,
  sum(ip_cnt) as ip_cnt,
  sum(ep_count) as ep_count,
  sum(eu_count) as eu_count
from
  (
    (
      select
        devname,
        srcintf,
        sum(
          case when detecttype =& #039;by_mac' then count else 0 end) as mac_cnt, sum(case
when detecttype='by_ip' then count else 0 end) as ip_cnt, sum(count) as ep_count, 0 as eu_
count from (select devname, srcintf, detecttype, count(distinct t1.epid) as count from
$ADOM_ENDPOINT t1 inner join $ADOM_EPEU_DEVMAP t2 on t1.epid=t2.epid inner join devtable t3
on t2.devid=t3.devid where t1.epid>1024 and $filter-drilldown and t1.lastseen>=$start_time
and firstseen<$end_time and devname is not null and srcintf is not null and detecttype in
('by_ip', 'by_mac') group by devname,srcintf, detecttype order by count desc) t1 group by
devname,srcintf order by ep_count desc) union all (SELECT devname, srcintf, 0 as mac_cnt, 0
as ip_cnt, 0 as ep_count, count(DISTINCT euid) as eu_count from (select euid, euname,
t3.epid, eugroup, srcintf, devname, devid from (select t1.euid, euname, epid, eugroup,
srcintf, devname, t2.devid from  $ADOM_ENDUSER t1 inner join $ADOM_EPEU_DEVMAP t2 ON
t1.euid=t2.euid inner join devtable t3 on t2.devid=t3.devid where t1.lastseen>=$start_time
and t1.firstseen<$end_time and srcintf is not null ) t3 LEFT JOIN $ADOM_ENDPOINT t4 ON
t3.epid = t4.epid) t5 where euname != '(none)' and epid>1024 and euid>1024 and $filter-
drilldown group by devname, srcintf order by eu_count desc)) t group by devname, srcintf
order by devname, sum(eu_count)+ sum(ep_count) desc
```

Dataset Name	Description	Log Category
ueba-Asset-User-Discovery-by-Time	Asset and User Count by Discovery Time	

```
select
  $flex_timescale(firstseen) as time,
  count(distinct epid) as ep_count,
  count(distinct euid) as eu_count
from
  (
    (
      select
        firstseen,
        t1.epid,
        null as euid
      from
        $ADOM_ENDPOINT t1
        inner join $ADOM_EPEU_DEVMAP t2 on t1.epid = t2.epid
      where
        $filter - drilldown
        and t1.firstseen >= $start_time
        and t1.firstseen<$end_time
        and t1.epid>1024
    )
    union all
```

```
      (
        select
          firstseen,
          null as epid,
          t1.euid
        from
          $ADOM_ENDUSER t1
          inner join $ADOM_EPEU_DEVMAP t2 ON t1.euid = t2.euid
        where
          t1.euid>1024
          and $filter - drilldown
          and firstseen >= $start_time
          and firstseen<$end_time
      )
  ) t
group by
  time
order by
  time
```

Dataset Name	Description	Log Category
dns-Security-Domain-Count-by-Threat-Level	Domain Count by Threat level	dns

```
select
  threat_level,
  total_num
from
  (
    select
      (
        case when tdtype in (
          & #039;infected-domain', 'infected-ip', 'infected-url') then 'critical' when is_
botnet or catdesc in ('Malicious Websites', 'Phishing', 'Spam URLs') then 'high' when
catdesc in ('Newly Observed Domain', 'Newly Registered Domain', 'Proxy Avoidance','Unrated')
or catdesc LIKE '%Dynamic DNS%' then 'medium' end) as threat_level, sum(total_num) as total_
num from  ###(select dvid, qname, coalesce(nullifna(`user`), nullifna(`unauthuser`)) as f_
user, dstip, srcip, catdesc, level, tdtype,  (botnetdomain is not null or botnetip is not
null) as is_botnet, min(nanosec_to_sec(eventtime)) as first_seen, max(nanosec_to_sec
(eventtime)) as last_seen, count(*) as total_num from $log-dns where $filter group by dvid,
qname, f_user, dstip, srcip, catdesc, level, tdtype, is_botnet order by total_num desc)### t
group by threat_level order by total_num desc) t where threat_level is not null order by
total_num desc
```

Dataset Name	Description	Log Category
dns-Top-Queried-Domain-Bar	Top Queried Domain	dns

```
select
  qname,
  count(*) as total_num
from
  $log
where
  $filter
  and qname is not null
group by
  qname
order by
  total_num desc
```

Dataset Name	Description	Log Category
dns-Security-Top-Visited-Domain-Categories	Top Visited Domain Categories	dns

```
select
  catdesc,
  sum(total_num) as total_num
from
  ###(select dvid, qname, coalesce(nullifna(`user`), nullifna(`unauthuser`)) as f_user,
dstip, srcip, catdesc, level, tdtype,  (botnetdomain is not null or botnetip is not null) as
is_botnet, min(nanosec_to_sec(eventtime)) as first_seen, max(nanosec_to_sec(eventtime)) as
last_seen, count(*) as total_num from $log-dns where $filter group by dvid, qname, f_user,
dstip, srcip, catdesc, level, tdtype, is_botnet order by total_num desc)### t where catdesc
is not null group by catdesc order by total_num desc
```

Dataset Name	Description	Log Category
dns-Security-Top-Visited-High-Risk-Domain-Categories	Top Visited High Risk Domain Categories	dns

```
select
  catdesc,
  sum(total_num) as total_num
from
  ###(select dvid, qname, coalesce(nullifna(`user`), nullifna(`unauthuser`)) as f_user,
dstip, srcip, catdesc, level, tdtype,  (botnetdomain is not null or botnetip is not null) as
is_botnet, min(nanosec_to_sec(eventtime)) as first_seen, max(nanosec_to_sec(eventtime)) as
last_seen, count(*) as total_num from $log-dns where $filter group by dvid, qname, f_user,
dstip, srcip, catdesc, level, tdtype, is_botnet order by total_num desc)### t where
level>='warning' and catdesc is not null group by catdesc order by total_num desc
```

Dataset Name	Description	Log Category
dns-Security-Top-Domain-with-Botnet-CC-Detected	Top Domain with Botnet C&C Detected	dns

```
select
  qname,
  sum(total_num) as total_num
from
  ###(select coalesce(botnetdomain, ipstr(botnetip)) as domain, qname, cast('Botnet C&C' as
char(32)) as malware_type, (case when action='block' then 'Blocked' when action='redirect'
then 'Redirected' else 'Passed' end) as action, srcip, (CASE WHEN level IN ('critical',
'alert', 'emergency') THEN 5 WHEN level='error' THEN 4 WHEN level='warning' THEN 3 WHEN
level='notice' THEN 2 ELSE 1 END) as sevid, coalesce(botnetdomain, ipstr(botnetip)) as
sources_s, count(*) as total_num from $log where $filter and (botnetdomain is not null or
botnetip is not null) group by domain, qname, action, srcip, sevid order by sevid desc)### t
where qname is not null group by qname order by total_num desc
```

Dataset Name	Description	Log Category
dns-Security-FortiGate-with-Top-Domain-Visited-by_Source-IP	FortiGate with Top Domain Visited by Source IP	dns

```
select
  devname,
  srcip,
  qname,
  category,
  total_num
from
  (
    select
      devname,
      srcip,
      qname,
      category,
      total_num,
      row_number() over (
        partition by devname,
        srcip,
        qname
        order by
          total_num desc,
          qname
      ) as rank
    from
      (
        select
          devname,
          srcip,
          qname,
          max(catdesc) as category,
          sum(total_num) as total_num
        from
          ###(select dvid, qname, coalesce(nullifna(`user`), nullifna(`unauthuser`)) as f_
user, dstip, srcip, catdesc, level, tdtype,  (botnetdomain is not null or botnetip is not
null) as is_botnet, min(nanosec_to_sec(eventtime)) as first_seen, max(nanosec_to_sec
(eventtime)) as last_seen, count(*) as total_num from $log-dns where $filter group by dvid,
qname, f_user, dstip, srcip, catdesc, level, tdtype, is_botnet order by total_num desc)###
t1 inner join devtable t2 on t1.dvid=t2.dvid where qname is not null and srcip is not null
group by devname, srcip, qname order by total_num desc) t) t where rank=1 order by devname,
srcip, qname
```

Dataset Name	Description	Log Category
dns-Security-Top-Domain-Lookup-Failure-by-Count	Top Domain Lookup Failures by Count	dns

```
select
  qname,
  count(*) as total_num
from
  $log - dns
where
```

```
  $filter
  and qname is not null
  and (
    action =& #039;block' or logid_to_int(logid)=54200) group by qname order by total_num
desc
```

Dataset Name	Description	Log Category
dns-Security-Top-Source-IP-by-Destination-Count	Top Source IP by Destination Count	dns

```
select
  srcip,
  count(distinct dstip) as total_num
from
  ###(select dvid, qname, coalesce(nullifna(`user`), nullifna(`unauthuser`)) as f_user,
dstip, srcip, catdesc, level, tdtype,  (botnetdomain is not null or botnetip is not null) as
is_botnet, min(nanosec_to_sec(eventtime)) as first_seen, max(nanosec_to_sec(eventtime)) as
last_seen, count(*) as total_num from $log-dns where $filter group by dvid, qname, f_user,
dstip, srcip, catdesc, level, tdtype, is_botnet order by total_num desc)### t where srcip is
not null and dstip is not null group by srcip order by total_num desc
```

Dataset Name	Description	Log Category
dns-Security-Top-Destination-IP-by-Source-Count	Top Destination IP by Source Count	dns

```
select
  dstip,
  count(distinct srcip) as total_num
from
  ###(select dvid, qname, coalesce(nullifna(`user`), nullifna(`unauthuser`)) as f_user,
dstip, srcip, catdesc, level, tdtype,  (botnetdomain is not null or botnetip is not null) as
is_botnet, min(nanosec_to_sec(eventtime)) as first_seen, max(nanosec_to_sec(eventtime)) as
last_seen, count(*) as total_num from $log-dns where $filter group by dvid, qname, f_user,
dstip, srcip, catdesc, level, tdtype, is_botnet order by total_num desc)### t where srcip is
not null and dstip is not null  group by dstip order by total_num desc
```

Dataset Name	Description	Log Category
dns-Security-Severity-by-High-Risk-Source-IPs-Count	Severity by High Risk Source IPs Count	dns

```
select
  (
    CASE sevid WHEN 5 THEN & #039;Critical' WHEN 4 THEN 'High' WHEN 3 THEN 'Medium' WHEN '2'
THEN 'Info' ELSE 'Low' END) as severity, count(distinct srcip) as total_num from (select
srcip, (CASE WHEN level IN ('critical', 'alert', 'emergency') THEN 5 WHEN level='error' THEN
4 WHEN level='warning' THEN 3 WHEN level='notice' THEN 2 ELSE 1 END) as sevid, count(*) as
total_num from ###(select dvid, qname, coalesce(nullifna(`user`), nullifna(`unauthuser`)) as
f_user, dstip, srcip, catdesc, level, tdtype,  (botnetdomain is not null or botnetip is not
null) as is_botnet, min(nanosec_to_sec(eventtime)) as first_seen, max(nanosec_to_sec
(eventtime)) as last_seen, count(*) as total_num from $log-dns where $filter group by dvid,
qname, f_user, dstip, srcip, catdesc, level, tdtype, is_botnet order by total_num desc)### t
where level>='warning' and srcip is not null group by srcip, sevid order by total_num desc)
t group by severity having sum(total_num)>0 order by total_num desc
```

Dataset Name	Description	Log Category
dns-Security-Top-DNS-High-Risk-Source-IP	Top DNS High Risk Source IP	dns

```
select
  srcip,
  sum(
    case when sevid = 5 then total_num else 0 end
  ) as num_cri,
  sum(
    case when sevid = 4 then total_num else 0 end
  ) as num_hig,
  sum(
    case when sevid = 3 then total_num else 0 end
  ) as num_med,
  sum(total_num) as total_num
from
  (
    select
      srcip,
      (
        CASE WHEN level IN (
          & #039;critical', 'alert', 'emergency') THEN 5 WHEN level='error' THEN 4 WHEN
level='warning' THEN 3 WHEN level='notice' THEN 2 ELSE 1 END) as sevid, count(*) as total_
num from ###(select dvid, qname, coalesce(nullifna(`user`), nullifna(`unauthuser`)) as f_
user, dstip, srcip, catdesc, level, tdtype,  (botnetdomain is not null or botnetip is not
null) as is_botnet, min(nanosec_to_sec(eventtime)) as first_seen, max(nanosec_to_sec
(eventtime)) as last_seen, count(*) as total_num from $log-dns where $filter group by dvid,
qname, f_user, dstip, srcip, catdesc, level, tdtype, is_botnet order by total_num desc)### t
where level>='warning' and srcip is not null group by srcip, sevid order by total_num desc)
t group by srcip having sum(total_num)>0 order by total_num desc
```

Dataset Name	Description	Log Category
dns-Security-Top-Infected-Domain-by-Count	Top Infected Domain by Count	dns

```
select
  qname,
  count(distinct srcip) as total_num
from
  ###(select dvid, qname, coalesce(nullifna(`user`), nullifna(`unauthuser`)) as f_user,
dstip, srcip, catdesc, level, tdtype,  (botnetdomain is not null or botnetip is not null) as
is_botnet, min(nanosec_to_sec(eventtime)) as first_seen, max(nanosec_to_sec(eventtime)) as
last_seen, count(*) as total_num from $log-dns where $filter group by dvid, qname, f_user,
dstip, srcip, catdesc, level, tdtype, is_botnet order by total_num desc)### t where qname is
not null and tdtype='infected-domain' group by qname order by total_num desc
```

Dataset Name	Description	Log Category
dns-Security-Top-Blocked-Domains-by-Reason	Top Blocked Domains by Reason	dns

```
select
  qname,
  msg,
  count(*) as total_num
from
  $log
where
  $filter
  and qname is not null
  and msg LIKE & #039;Domain was blocked%' group by qname, msg order by total_num desc
```

Dataset Name	Description	Log Category
dns-Security-Top-Users-by-Infected-Domain-Visits	Top Users by Infected Domain Visits	dns

```
select
  coalesce(
    f_user,
    ipstr(`srcip`)
  ) as user_src,
  count(distinct qname) as total_num
from
  ###(select dvid, qname, coalesce(nullifna(`user`), nullifna(`unauthuser`)) as f_user,
dstip, srcip, catdesc, level, tdtype,  (botnetdomain is not null or botnetip is not null) as
is_botnet, min(nanosec_to_sec(eventtime)) as first_seen, max(nanosec_to_sec(eventtime)) as
last_seen, count(*) as total_num from $log-dns where $filter group by dvid, qname, f_user,
dstip, srcip, catdesc, level, tdtype, is_botnet order by total_num desc)### t where qname is
not null and tdtype='infected-domain' and (f_user is not null or srcip is not null) group by
user_src order by total_num desc
```

Dataset Name	Description	Log Category
dns-Security-Top-Users-and-Infected-Domain-by-Visit-Count	Top Users and Infected Domain by Visit Count	dns

```
select
  coalesce(
    f_user,
    ipstr(`srcip`)
  ) as user_src,
  qname,
  sum(total_num) as total_num
from
  ###(select dvid, qname, coalesce(nullifna(`user`), nullifna(`unauthuser`)) as f_user,
dstip, srcip, catdesc, level, tdtype,  (botnetdomain is not null or botnetip is not null) as
is_botnet, min(nanosec_to_sec(eventtime)) as first_seen, max(nanosec_to_sec(eventtime)) as
last_seen, count(*) as total_num from $log-dns where $filter group by dvid, qname, f_user,
dstip, srcip, catdesc, level, tdtype, is_botnet order by total_num desc)### t where qname is
not null and (f_user is not null or srcip is not null) and tdtype='infected-domain' group by
user_src, qname order by total_num desc
```

Dataset Name	Description	Log Category
dns-Security-Top-Users-by-Visited-Domain-Category-Count	Top Users by Visited Domain Category Count	dns

```
select
  coalesce(
    f_user,
    ipstr(`srcip`)
  ) as user_src,
  count(distinct catdesc) as total_num
from
  ###(select dvid, qname, coalesce(nullifna(`user`), nullifna(`unauthuser`)) as f_user,
dstip, srcip, catdesc, level, tdtype,  (botnetdomain is not null or botnetip is not null) as
is_botnet, min(nanosec_to_sec(eventtime)) as first_seen, max(nanosec_to_sec(eventtime)) as
last_seen, count(*) as total_num from $log-dns where $filter group by dvid, qname, f_user,
dstip, srcip, catdesc, level, tdtype, is_botnet order by total_num desc)### t where catdesc
is not null and (f_user is not null or srcip is not null) group by user_src order by total_
num desc
```

Dataset Name	Description	Log Category
dns-Security-Top-Users-and-Visited-Domain-Category-by-Count	Top Users and Visited Domain Category by Count	dns

```
select
  coalesce(
    f_user,
    ipstr(`srcip`)
  ) as user_src,
  catdesc,
  srcip,
  sum(total_num) as total_num
from
  ###(select dvid, qname, coalesce(nullifna(`user`), nullifna(`unauthuser`)) as f_user,
dstip, srcip, catdesc, level, tdtype,  (botnetdomain is not null or botnetip is not null) as
is_botnet, min(nanosec_to_sec(eventtime)) as first_seen, max(nanosec_to_sec(eventtime)) as
last_seen, count(*) as total_num from $log-dns where $filter group by dvid, qname, f_user,
dstip, srcip, catdesc, level, tdtype, is_botnet order by total_num desc)### t where catdesc
is not null and (f_user is not null or srcip is not null) group by user_src, catdesc, srcip
order by total_num desc
```

Dataset Name	Description	Log Category
dns-Security-Top-Newly-Detected-Domain-by-Count	Top Newly Detected Domain by Count	dns

```
select
  qname,
  sum(total_num) as total_num
from
  ###(select dvid, qname, coalesce(nullifna(`user`), nullifna(`unauthuser`)) as f_user,
dstip, srcip, catdesc, level, tdtype,  (botnetdomain is not null or botnetip is not null) as
is_botnet, min(nanosec_to_sec(eventtime)) as first_seen, max(nanosec_to_sec(eventtime)) as
last_seen, count(*) as total_num from $log-dns where $filter group by dvid, qname, f_user,
dstip, srcip, catdesc, level, tdtype, is_botnet order by total_num desc)### t where last_
seen>=$start_time and first_seen<$end_time and tdtype is not null and qname is not null
group by qname order by total_num desc
```

Dataset Name	Description	Log Category
dns-Security-Top-Newly-Detected-Domain-and-Source-IP-with-First-Seen-and-Last-Seen	Top Newly Detected Domain and Source IP with First Seen and Last Seen	dns

```
select
  qname,
  srcip,
  from_itime(
    min(first_seen)
  ) as first_seen,
  from_itime(
    max(last_seen)
  ) as last_seen,
  sum(total_num) as total_num
from
  ###(select dvid, qname, coalesce(nullifna(`user`), nullifna(`unauthuser`)) as f_user,
dstip, srcip, catdesc, level, tdtype,  (botnetdomain is not null or botnetip is not null) as
is_botnet, min(nanosec_to_sec(eventtime)) as first_seen, max(nanosec_to_sec(eventtime)) as
last_seen, count(*) as total_num from $log-dns where $filter group by dvid, qname, f_user,
dstip, srcip, catdesc, level, tdtype, is_botnet order by total_num desc)### t where last_
seen>=$start_time and first_seen<$end_time and tdtype is not null and qname is not null
group by qname, srcip order by total_num desc
```

Dataset Name	Description	Log Category
360-degree-security-Application-Visiblity-and-Control-Summary	Application Visibolity and Control Summary	app-ctrl

```
select
  appcat,
  count(distinct app) as total_num
from
  ###(select appcat, app from $log where $filter and app is not null and appcat is not null
group by appcat, app)### t group by appcat order by total_num desc
```

Dataset Name	Description	Log Category
360-degree-security-Threats-Detection-and-Prevention-Summary	Threat Prevention	app-ctrl

```
select
  threat_name,
  count(distinct threats) as total_num
from
  (
    ###(select cast('Malware & Botnet C&C' as char(32)) as threat_name, app as threats,
count(*) as total_num from $log-app-ctrl where $filter and lower(appcat)='botnet' group by
app order by total_num desc)### union all ###(select cast('Malware & Botnet C&C' as char
(32)) as threat_name, virus as threats, count(*) as total_num from $log-virus where $filter
and nullifna(virus) is not null group by virus order by total_num desc)### union all ###
(select cast('Malicious & Phishing Sites' as char(32)) as threat_name, hostname as threats,
count(*) as total_num from $log-webfilter where $filter and cat in (26, 61) group by
hostname order by total_num desc)### union all ###(select cast('Critical & High Intrusion
Attacks' as char(32)) as threat_name, attack as threats, count(*) as total_num from $log-
attack where $filter and severity in ('critical', 'high') group by attack order by total_num
desc)###) t group by threat_name order by total_num desc
```

Dataset Name	Description	Log Category
360-degree-security-Data-Exfiltration-Detection-and-Prevention-Summary	Data Exfiltration Summary	dlp

```
select
  data_loss,
  count(*) as total_num
from
  ###(select itime, hostname,`from` as sender, `to` as receiver, profile, action, service,
subtype, srcip, dstip, severity, filename, direction, filesize, (case when
severity='critical' then 'Critical Data Exfiltration' else (case when coalesce(nullifna
(`user`), ipstr(`srcip`)) is not null then 'User Associated Data Loss' else NULL end) end)
as data_loss from $log where $filter /*SkipSTART*/order by itime desc/*SkipEND*/)### t where
$filter-drilldown and data_loss is not null group by data_loss order by total_num desc
```

Dataset Name	Description	Log Category
360-degree-security-Endpoint-Protection-Summary	Endpoint Protection	fct-traffic

```
select
  blocked_event,
  count(*) as total_num
from
  (
    select
      (
        case utmevent when & #039;antivirus' then 'Malware Deteced and Blocked' when
'appfirewall' then 'Risk Application Blocked' when 'webfilter' then (case when coalesce
(nullifna(`user`),  ipstr(`srcip`)) is not null then 'Web Sites Violation Blocked' else 'Non
User Initiated Web Visits' end) else NULL end) as blocked_event from $log where $filter and
utmaction in ('blocked', 'quarantined')) t where blocked_event is not null group by blocked_
event order by total_num desc
```

Macro Reference List

The following table lists the available predefined macros that can be used in a report layout to display the log data as text (XML format) dynamically.

Macro Name	Description	Dataset Used	Log Category
Application Category with Highest Session Count	Application category with the highest session count	App-Sessions-By-Category	Traffic
Application with Highest Bandwidth	Application with the highest bandwidth usage	Top-App-By-Bandwidth	Traffic
Application with Highest Session Count	Applications with the highest session count	Top-App-By-Sessions	Traffic
Attack with Highest Session Count	Attack with highest session count	Utm-Top-Attack-Source	Attack
Botnet with Highest Session Count	Botnet with the highest session count	Detected-Botnet	Traffic
Destination with Highest Bandwidth	Destination with the highest bandwidth usage	Top-Destinations-By-Bandwidth	Traffic
Destination with Highest Session Count	Destination with the highest session count	Top-Destinations-By-Sessions	Traffic
Highest Bandwidth Consumed (Application) Category	Highest bandwidth consumed by application category	App-Risk-App-Usage-By-Category	Traffic
Highest Bandwidth Consumed (Application)	Highest bandwidth consumed by application	Top-App-By-Bandwidth	Traffic
Highest Bandwidth Consumed (Destination)	Highest bandwidth consumed by destination	Top-Destinations-By-Bandwidth	Traffic
Highest Bandwidth Consumed (P2P Application)	Highest bandwidth consumed by P2P application	Top-P2P-App-By-Bandwidth	Traffic
Highest Bandwidth Consumed (Source)	Highest bandwidth consumed by source	Top-Users-By-Bandwidth	Traffic
Highest Bandwidth Consumed ()Web Category)	Highest bandwidth consumed by website category	Top-Web-Category-by-Bandwidth	Web Filter
Highest Bandwidth Consumed (Website)	Highest bandwidth consumed by website	Top-Web-Sites-by-Bandwidth	Web Filter
Highest Risk Application with Highest Bandwidth	Highest risk application with the highest bandwidth usage	High-Risk-Application-By-Bandwidth	Traffic
Highest Risk Application with Highest Session Count	Highest risk application with the highest session count	High-Risk-Application-By-Sessions	Traffic

Macro Name	Description	Dataset Used	Log Category
Highest Session Count by Application Category	Highest session count by application category	App-Sessions-By-Category	Traffic
Highest Session Count by Application	Highest session count by application	Top-App-By-Sessions	Traffic
Highest Session Count by Attack	Highest session count by attack	Utm-Top-Attack-Source	Attack
Highest Session Count by Botnet	Highest session count by botnet	Detected-Botnet	Traffic
Highest Session Count by Destination	Highest session count by destination	Top-Destinations-By-Sessions	Traffic
Highest Session Count by Highest Severity Attack	Highest session count by highest severity attack	Threat-Attacks-By-Severity	Attack
Highest Session Count by P2P Application	Highest session count by P2P application	Top-P2P-App-By-Sessions	Traffic
Highest Session Count by Source	Highest session count by source	Top-User-Source-By-Sessions	Traffic
Highest Session Count by Virus	Highest session count by virus	Utm-Top-Virus	Traffic
Highest Session Count by Web Category	Highest session count by website category	Top-Web-Category-by-Sessions	Web Filter
Highest Session Count by Website	Highest session count by website	Top-Web-Sites-by-Sessions	Web Filter
Highest Severity Attack with Highest Session Count	Highest severity attack with the highest session count	Threat-Attacks-By-Severity	Attack
P2P Application with Highest Bandwidth	P2P applications with the highest bandwidth usage	Top-P2P-App-By-Bandwidth	Traffic
P2P Application with Highest Session Count	P2P applications with the highest session count	Top-P2P-App-By-Sessions	Traffic
Source with Highest Bandwidth	Source with the highest bandwidth usage	Top-Users-By-Bandwidth	Traffic
Source with Highest Session Count	Source with the highest session count	Top-User-Source-By-Sessions	Traffic
Total Number of Attacks	Total number of attacks detected	Total-Attack-Source	Attack
Total Number of Botnet Events	Total number of botnet events	Total-Number-of-Botnet-Events	Traffic
Total Number of Viruses	Total number of viruses detected	Total-Number-of-Viruses	Traffic
User Details	User details of traffic	Traffic-User-Detail	Traffic
Virus with Highest Session Count	Virus with the highest session count	Utm-Top-Virus	Traffic

Macro Name	Description	Dataset Used	Log Category
Web Category with Highest Bandwidth	Web filtering category with the highest bandwidth usage	Top-Web-Category-by-Bandwidth	Web Filter
Web Category with Highest Session Count	Web filtering category with the highest session count	Top-Web-Category-by-Sessions	Web Filter
Website with Highest Bandwidth	Website with the highest bandwidth usage	Top-Web-Sites-by-Bandwidth	Web Filter
Website with Highest Session Count	Website with the highest session count	Top-Web-Sites-by-Sessions	Web Filter

Change Log

Date	Change Description
2022-06-02	Initial release.

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