## Fortigate debug and diagnose commands complete cheat sheet

NOTE

To enable debug set by any of the commands below, you need to run **diagnose debug enable**. This is assumed and not reminded any further.

NOTE

To disable and stop immediately any debug, run **dia deb res** which is short for **diagnose debug reset**.

## **IPSEC VPN debug**

Table 1. IPSEC VPN Debug

Command	Description
diagnose vpn ike log-filter <parameter></parameter>	Filter VPN debug messages using various parameters:  • list Display the current filter.  • clear Erase the current filter.  • name Phase1 name to filter by.  • src-addr4/src-addr6 IPv4/IPv6 source address range to filter by.  • dst-addr4/dst-addr6 IPv4/IPv6 destination address range to filter by.  • src-port Source port range  • dst-port Destination port range  • vd Index of virtual domain1 matches all.  • interface Interface that IKE connection is negotiated over.  • negate Negate the specified filter parameter.
diagnose debug application ike -1	Enable IPSec VPN debug, shows phase 1 and phase 2 negotiations (for IKEv1) and everything for IKEv2. "-1" sets the verbosity level to maximum, any other number will show less output.
diagnose vpn ike gateway flush name <vpn_name></vpn_name>	Flush (delete) all SAs of the given VPN peer only.

Command	Description
get vpn ipsec tunnel details	Detailed info about the tunnels: Rx/Tx packets/bytes, IP addresses of the peers, algorithms used, detailed selectors info, lifetime.
get vpn ipsec stats tunnel	Short general statistics about tunnels: number, kind, number of selectors, state
get vpn ipsec tunnel summary	Short statistics per each tunnel: number of selectors up/down, number of packets Rx/Tx.
get vpn ipsec stats crypto	Statistics of the crypto component (ASIC/software) of the Fortigate: encryption algorithm, hasshing algorithm.

## NTP debug

 $Table\ 2.\ NTP\ daemon\ diagnostics\ and\ debug$ 

Command	Description
diag sys ntp status	Current status of NTP time synchronization. Shows all NTP peers and their details info: reachability, stratum, clock offset, delay, NTP version.
execute date	Show current date as seen by Fortigate
exec time	Show current time as seen by Fortigate