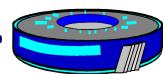




CA Gateway Update

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Overview



- As well CA server as CA client
- Usually runs on workstation with multiple network interfaces
- Connects and separates networks in terms of CA connections
- May use channel aliases (e.g. prefixes)
- Caches data
- Keeps connections alive
- Watchdog mode restarts on core dump



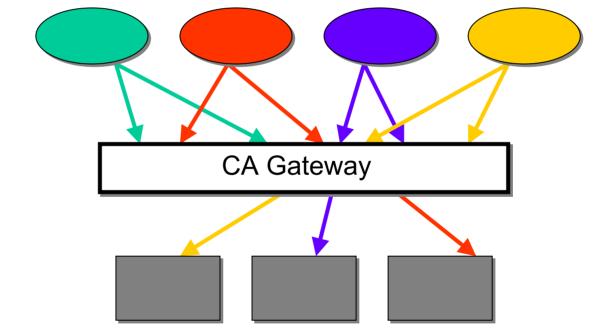


CA Proxy Gateway



Allows CA between networks – configurable through regular expression filters and CA access security.

CA Clients



CA Servers





CA **Proxy** Gateway



Clients point to one proxy that distributes the data with minimal impact on the private parts.

CA Clients

CA Gateway

CA Servers





Caveats



- The Gateway always introduces a nonscalable bottleneck.
- A heavily loaded Gateway is a CPU and memory consuming application that usually will add overhead to the system.
- Bad configuration (too loose) may put more load on the precious side instead of shielding the IOCs.





Recent Developments



- ✓ Port to standard off-the-shelf 3.14 Base is complete and working.
- More status PVs.
- ✓ Some commands (stop, do report, re-read access security file) available through PVs.
- ✓ Builds on Linux, WIN32, HPUX, and Solaris.
- ✓ GNU Regex is now an EPICS extension.

BUT...

 Some performance problems are seen on Solaris – this needs to be taken care of.





Plans



- New hierarchical configuration file format to improve performance (XML format?)
- New configurable watchdog (steal from Channel Archiver)
- Better code documentation (using Doxygen?)
- User manual
- CMLOG interface
- Provide some tabular usage and statistics info as web page
- Use Data Access (new data object) instead of gdd

