



=> PingListener <=

Interface used by the PingMgr's worker threads to provide notification of an updated state for a host/protocol pair.

=> PingMgr <=

Manages the "pinging" of a set of hosts using the protocols supported by each host. When a host is added to the PingMgr a PingHost entry is created and added to the hosts member. This entry keeps track of the host and the listener to notify when a result is available for that host. The PingMgrThread periodically iterates the hosts member and adds a series of PingTask objects to the tasks member, one for each protocol enabled for each host. A pool of PingMgrWorkerThread objects blocks on entries to be added to the tasks member. Once there are tasks available, the worker threads grab them and proceeds to ping the hosts using the protocols specified by each task. The worker threads pass the task onto their child thread and receive a response back using a pair of blocking queues. This allows the worker to interrupt the child if it takes too long to respond. To ensure that responses from children don't end up going to the wrong parents (i.e. operations times out, parent returns, then the child does finish and submits a response),