collectd-nagios: future ideas / directions

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Nagios Workshop 2011 May 23, 2011, Hannover







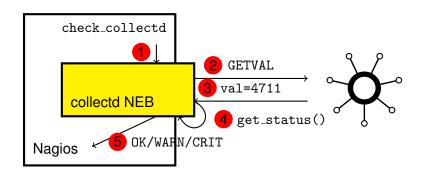
Introduction

collectd-nagios: future ideas / directions

In the following, I propose a few ideas how to improve the interaction between **collect**d and Nagios as introduced at Monitors 2011. The basic idea is to implement a Nagios event broker which communicates with collectd, either using the UNIXSOCK/netcmd interface or the binary network protocol. To provide the most flexibility, it ought to be possible to use the two proposed modes simultaneously in a single instance.



Future ideas: active mode



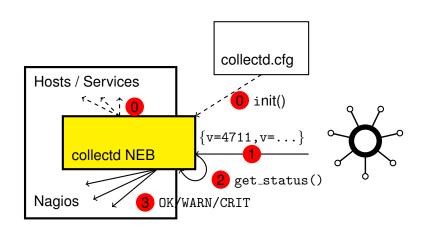


Future ideas: active mode

- "active" event broker: "embedded collectd-nagios"
- automatically detect collectd checks (e.g., using a special command name or custom variables) and handle those in the NEB rather than executing the command
- query collectd using the UNIX socket (unixsock plugin)
- check thresholds according to, e.g., command parameters or custom variables
- pass active check result to Nagios directly
- provides the same functionality as collectd-nagios in a more efficient way, i.e., checks are scheduled and (actively) executed by Nagios
- → the "Nagios way" of embedding collectd



Future ideas: passive mode





Future ideas: passive mode

- "passive" event broker: collectd network client
- configure "interesting" data-sets and thresholds in custom config file (collectd.cfg)
- optionally, create appropriate hosts and services on the fly
- act as server for the collectd network plugin
- check thresholds of "interesting" values, possibly after consolidating some values (30 values × 10 seconds interval → 5 minutes interval)
- pass active/passive check results to the Nagios core
- → "push modell"
- ullet o the "collectd way" of integration into Nagios



Caveats / Notes

- the active mode might block the Nagios process; possibly querying and checking the values should be done asynchronously
- passive mode might benefit from consolidation done on the (collectd) client, e.g., using some filter-chain match taking care of the consolidation and dispatching the consolidated value to the network plugin