Handling YANG Revisions – Discussion Kickoff

Chairs: Kent Watsen < kwatsen@juniper.net>

Lou Berger < lberger@labn.net>

Revision Problem Statement

- YANG module revision rules limits scope of module changes
- YANG lacks syntax to enable tooling to fully reflect all types of module revisions
 - Non-backwards compatible changes
 - Module replacements, i.e., name changes
 - Non-name associated updates

Current Rules

- RFC7950 Section 11
 - Provides rules on updating a module
 - Calls out specific changes that are permitted
 - States:
 - If the semantics of any previous definition are changed ...then this MUST be achieved by a new definition with a new [module name] identifier"
 - Obsolete definitions MUST NOT be removed from published modules
- General RFC header rules
 - Can identify which RFCs updated and obsoleted

Implications on Major/Minor Changes

- Broken modules can't use the same name (e.g., L3SM)
- No way to remove obsoleted nodes and keep name (e.g., 8022bis)
- No way to indicate which module is being obsoleted when using a new module name
- No way to indicate which revision of a module is being updated
- No way to express when a new module updates an existing module

Goal for the WG

- Objective is to support all types of YANG module revisions
 - Some solutions have been proposed
 - In drafts and e-mail
 - Others may be possible

This session kicks off the WG discussion

Discussion