Operational State Questions

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- Operational state data is a set of data that has been obtained by the system at runtime and influences the system's behavior similar to configuration data. In contrast to configuration data, operational state is transient and modified by interactions with internal components or other systems via specialized protocols.
Data modeling aspects

• Is operational state just another conceptual data store?

• If so, does it have the same data model as the configuration data store?

• If not, how to deal with (overlapping) data models?
Protocol aspects

• How to retrieve operational state? The <get/> operation operation returns a mixture of configuration state and operational state, which is not very useful since data may overlap and is not clearly marked as config state or operational state data.

• Do we retrieve operational state by introducing a new operation (say <get-operational/>) or a new conceptual datastore (say <get><source>operational</source></get>)?
Protocol aspects

• Does it make sense to write operational state data? If so, how does this differ from writing the <running/> configuration datastore?

• Do we identify the source of operational state? It is useful to know which control or configuration protocol is "responsible" for a certain piece of operational state. Does this apply to all data or only to data marked at model design time?

• If we track the source of operational state, how do we send information about it over the wire? Introducing XML attributes to carry meta-data?