WG13 Issues - CIM Issues #6343

[GMDM #7] Convention for use of xxxPhase classes

05/24/2023 09:03 AM - Pat Brown

Status: New

Priority: Normal

Target version:

Author/Contact Info: Pat Brown pat@cimpledata.com Standard(s): 61970-301, 61970-452, 61968-13

Base Release: Version:
Solution to be Clause:

Applied To:

Solution Version: Sub-Clause: Solution Applied By: Paragraph:

Completion Date: Table:

CIM Keywords: 61970-Wires Originally Closed in

Version:

Breaking Change: No Origination Date:

Breaking Change Description:

WG13 Originally Assigned

Groups:

CIM Impacted

Requestor: Pat Brown

Originally Assig

Origination ID:

Description

The question is whether there should be an assumption that a ConductingEquipment is 3-phase if xxxPhase classes are not present. (This does not apply to ACLineSegment or PowerTransformer since they each have their own unique requirements for phase modeling.)

Considerations:

- Given the amount of 3-phase equipment on feeder backbones, not requiring xxxPhase objects could eliminate 'verbosity' in data exchanges. It also appears to match the internal data models of some tools (OpenDSS at least) though not others (Survalent).
- If behaviours can be different among phases of a 3-phase equipment, it is the attributes of the xxxPhase objects which provide that information, so the existence of xxxPhases does not always indicate that an equipment is not 3-phase. (A specific example of this is a 3-phase switch capable of having its individual phases open, which must be modeled with SwitchPhase objects so SwitchPhase.closed can be populated in SSH.)
- Specifically related to switches, there was a desire (on the 61970 equipment side), for an .isGanged attribute. The use of this needs to be factored into the xxxPhase instantiation conventions when they are articulated.

Guidance on the preferred approach should be provided in the form of 'best practice' examples. This guidance belongs in some sort of 'how to use the CIM' document.

History

#1 - 05/24/2023 09:36 AM - Pat Brown

- Requestor set to Pat Brown

04/10/2024 1/1