



TRI-STATE G&T

A Touchstone Energy[®]
Cooperative



GE PSLF v22.03

Performance Slowdown

May 17, 2022



Background

- Installed PSLF v22.03
- Testing a new generator model (Crossing Trails, 72719)
- Performed flat, ringdown, clearance faults at POI, Windtalker 230 kV (72715)
- During the ringdown simulation observed a significant slowdown in computational speed
 - Ringdown simulation was a bolted 3-phase fault at bus 72715 with 5-cycle clearing. No lines were tripped after fault clearing.



Background

- Typically see simulation runs complete in 8-11 minutes
- Ringdown simulation took 2 hours to complete
 - Slowdown started ~2 seconds after fault clearing and lasted ~6 seconds after fault clearing
- Ringdown was performed in v21.10 and v22.01 with no slowdown
- GE recommended setting the following parameter:
$$\text{dypar}[0].\text{cmpldw_adjcap} = 0$$