

## **Grand Coulee Governor Replacements G1 – G18**

This project will replace the existing Woodward governors for all 18 generators in the Left and Right Powerhouses. The mechanical actuator cabinets will be replaced with digital controls. Hydraulic pumps and select mechanical components will also be replaced. The governors are original design and are 70 years old, again presenting maintenance and obsolescence issues. As with exciters, the modern governors will be more responsive and enhance power system stability as well as increasing reliability for the generating units.

This investment is part of a set of investments (including windings, exciters and transformers) that represents a systematic replacement and upgrade of the electrical equipment in the Left and Right Powerhouses. The work will be scheduled in a series of six-month outages where the units are taken out of service one-by-one to perform this capital work as well as scheduled maintenance work. This approach is far more efficient and less costly than taking outages for individual component replacement contracts.