

Internal Information

Temelín's Unit 2 restored electricity production

On Saturday operators connected Temelín's Unit 2 to the transmission grid. It happened at 50% reactor rated thermal power. The Unit should work at full power at the beginning of next week. At Unit 1, the planned outage for refueling continues.

Temelín NPP has not produced electricity since the end of August, when Unit 1 was shut down for refueling. Unit 2 delivered shortly electricity to the transmission grid in early September but then it was shutdown because of necessary modifications in the turbine and in the non-nuclear part of the steam generators. "Consumers were not touched by this. Electricity supplies were secured from other sources. It is why the outages are planned off the winter season, when electricity consumption is highest," said Temelín's Director Bohdan Zronek.

Before reaching full power, the reactor stays for several hours at 80% power for the so-called power ascension tests to verify e.g. power distribution in the reactor core. "Especially at the start from the outage, we have to monitor the equipment very carefully and check that the parameter changes are within the permissible limits," Zronek added. For example, the water temperature in the reactor was around 35 °C and the pressure 1.4 MPa during the outage. Subsequent operating parameters are approximately ten times higher. Temelín's Unit 2 should achieve full power at the beginning of next week.

Unit 1 is as planned shut down for refueling since the end of August. Currently, it is the week 7 of the outage. All 163 fuel assemblies are unloaded from the reactor and checked. Four containers with spent fuel have been brought to the storage on the power plant site. In parallel, inspections of the turbine and safety systems continue. Unit 1 should resume electricity production in the middle of November.

From the beginning of the year, Temelín Power Plant produced 10,025 billion kilowatts-hours of electricity.

Temelín nuclear power plant produced its first electricity in December 2000. It is currently the largest source of electricity production in the Czech Republic. It covers a fifth of the Czech electricity consumption by its safe and emission-free operation. In 2015, the plant produced 14.23 billion kWh of electrical energy. With a Temelín's annual production, South Bohemia would last out almost 4.5 years and, for all Czech households, it would be enough for one whole year.