Production results of Kostolac thermal power plants; The reliability justified the investments

Categories : News Serbia Energy

Date : May 20, 2013

The Power Units A1 and A2, with vital plant parts being rehabilitated, have already been operating steadily for several years and they fall into the most reliable units within EPS. – This year overhaul season starts in mid-May, and ends in early July.

In the first three months this year, the power units of Kostolac thermal power plants generated 1.71 billion kWh of electricity in total. For that period, electric power balance of EPS envisages the planned production of 1.78 billion kWh. Realized production is at the level of 95.5% of the planned production, and there are many reasons for this small underachievement in the production of electricity - Mr. Zlatko Zakošek, the director of the Department for electricity generation in “TE-KO Kostolac“.

According to our interviewee, primarily the favorable hydrological situation in the previous period influenced the decrease in thermal power sector production. Due to heavy precipitation, the production of hydropower plants has increased, and thus thermal power capacities, on Central Control Service demand, operated at reduced power. In addition, there were some other technical issues that caused power units downtimes.

"Kostolac A" thermal power plant units have supplied the energy system of Serbia, in the first quarter, a total of 540.75 million kWh. Of this sum, PU A1 produced 158.18 million kWh, while PU A2 produced 382.57 million kWh. The percentage of actual production of these units is 99 %, which means that the production plan has been fully implemented.

- The Power units of Thermal power plant "Kostolac A", besides providing electricity, they supply heat to the district heating system of Kostolac, Požarevac and the surrounding villages. In the first three months, for the heating, the system has been supplied with a total of 161 million kWh of heating energy, which is 104% compared to the planned energy supply for this period - said Mr. Zakošek. - During the heating season, thanks to the technical condition of the equipment in the pump-heat exchanger station and hiring the Supplying Heating Network Service, there was no failure in the heat supply. Power Units (PU) A1 and A2, with vital plant parts being rehabilitated, have already been operating steadily for several years and they fall into the most reliable units within EPS. In the past, apart from the usual ongoing problems of these power units, there were no larger failures.

The thermal power plant "Kostolac B", in the first three months of this year, realized the production of electricity of 1,171 billion kWh and it represents 95 percent of the plan. Out of this, the PU B1 produced 570 million kWh, and/or 93 % of the plan.

- The revitalized B2 PU had slightly higher percentage of plan execution, 97% i.e. it produced a total of 601 million kWh. During the test drive of power unit B2, there were a few delays

due to technical problems at newly installed equipment, and therefore the electricity production is lower than planned - said Mr. Zakošek. - We hope that the shortfall in production of this PU will be compensated by future reliable operation at powers higher than nominal.

This year's overhaul season begins in mid-May and ends in early July. The plan is to perform standard repairs for 30 days, except in the revitalized PU B2 that is planned for short overhaul lasting for 15 days. Currently, the public procurement procedures for the purchase and installation of necessary equipment are in progress. This year, larger overhaul activities will not be run, just the most necessary works will be performed to bring the plant into a state of operational readiness to ensure the reliable operation over the next year. The most important activities are those on the boiler installations, repairs of mills, fans, boiler piping system and the system for combustion products take out.

Maximum engagement

Taking into account that this year, the extended overhauls will not be conducted in either of four power units, the hourly engagement of power units will be maximum. Thus, balance electricity production for this year amounts to 6.6 billion kWh, and at the same time this production represents upper limit of technical capacities of Kostolac Thermal Power Plants. In the following period, we expect the positive effects of completed works to contribute to higher reliability and hourly engagement of production capacities and greater number of produced kWh.