

RFDA ITER Newsletter

April, 2020

Russia keeps on delivering components for ITER

April 9th, six trucks with electrotecnical equipment for the ITER machine started their way from the Efremov Institute (St. Petersburg, Russia) to the ITER construction site in France. The delivery includes busbars for PF coils, central solenoid, correction coils, as well as supports for the busbars installation, cavins, resistors and supporting equipment. All six trucks arrived to the IO April 23rd.

Three more trucks left the Efremov Institute April 21st. Their arrival to the IO is expected in early May. April 27th, the fourth truck started its way to France.

The equipment is basic for installation of the ITER power supply system.





Planned works on PF1 Magnet done

Early this year, assembly of the Poloidal Field Coil 1 for the ITER machine has started at the facilities of the Sredne-Nevsky Shipyard (SNSZ) in Saint Petersburg.

For the moment, stacking of pancakes and assembly of the Joints have been completed. Assembly of "clean room" is completed, preparation for application of ground insulation is ongoing. Vacuum-Pressure Impregnation of qualification sample "4x2" has been successfully carried out, visual inspection is done. High Voltage tests are being prepared.

Fabrication of the 5th Gyrotron is continued

Russia gains momentum in manufacturing Gyrotrons for ITER. Being fabricated in Nizhny Novgorod by GYCOM Ltd. and the Institute of Applied Physics, Gyrotrons (Russia makes 8 out of 24) should provide 1 MW power at the required 170 GHz in continuous mode.

By now, the testing of the 4th Gyrotron set has been completed and is ready for FAT that is to take place in June, the parameters of Gyrotron satisfy ITER requirements. Manufacturing of the 5th Gyrpotron set for ITER is ongoing. First test will be carried out in September.





Upper Ports are being successfully manufactured

Work continued on the manufacture of the Upper Ports of the ITER Vacuum Vessel, including the PSE 01, PSE 07, PSE 13, PES PSE and PSE 17 Ports and the PE12 extended Port.

MAN Energy Solutions SE, the Upper Ports manufacturing plant, operates on a continuous schedule with partial switching of engineering personnel to remote mode.

For the moment, two Upper Ports have been delivered to Korea and five – to Italy. Shipping of two more Ports to Korea is expected this year.