Russia



Name: Russian Tunnelling Association (RTA)

Type of Structure: Non profit

Number of Members: Total number - 60

ASSOCIATION ACTIVITIES DURING 2019 AND TO DATE

The following were created:

Working Group No. 1 "Assistance in designing and construction of the North Amur tunnel No. 2". Working Group No. 2 "Assistance in information modelling technology implementation, when executing underground development projects".

The following were held:

Scientific and Technical Conference "Cities' underground space development and construction of traffic facilities", Moscow, 21 March 2019.

Scientific and Technical Forum "Trends, problems and growth prospects of underground development", Moscow, 3-5 October 2019.

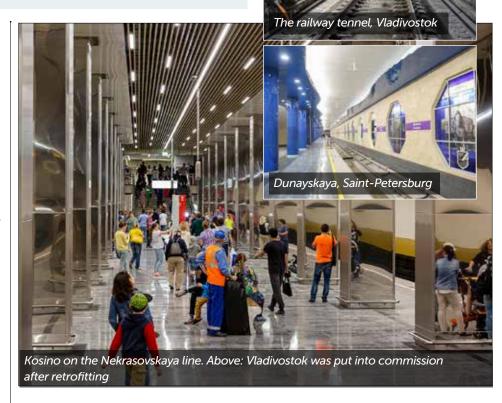
The following professional skills competitions were organized and held:

- S.N. Vlasov Competition "Engineer of the Year of the Russian Tunnelling Association - 2019";
- Competition "For the best application of advanced technologies, when building tunnels and underground constructions";
- Competition of scientific (graduation) papers of students from higher educational institutions.

Trade journal "Metro i tonneli" [Underground and Tunnels] (4 issues of the journal have been published) and 1 news-bulletin of the Russian Tunnelling Association have been issued.

CURRENT TUNNELLING ACTIVITIES

In 2019 according to Moscow's Metro Development Program, eight new Metro Stations were put into commission including Filatov Lug, Prokshino, Olkhovaya, Kommunarka on the Sokolnicheskaya line, and Nekrasovka, Lukhmanovskaya, Ulitsa Dmitrievskogo and Kosino on the Nekrasovskaya line. In Saint-Petersburg, the Prospekt Slavy - Dunayskaya - Shushary section of the Saint Petersburg Metro was put into commission. The main line tunnels in this



section were bored using with 10.6m diameter TBMs.

The railway tunnel in Vladivostok was put into commission after retrofitting. Members of the Russian Tunneling Association are involved in ambitious programs in increasing the capability of the Trans-Siberian Railway and the Baikal-Amur Mainline Railway. The second line of the Baikal tunnel at BAM has been completed and is being prepared for commission.

FUTURE TUNNELLING ACTIVITIES

Works on Moscow's and Saint Petersburg's Metros development continue. The length of Metro lines in Moscow is expected to be 450km by 2022. According to the Saint Petersburg Metro development plan the length of its lines should be increased from 113.6km to 155.5km by 2027. The number of stations will grow from 67 to 85, and the number of metro depots - from 5 to 7. It is planned to resume the construction of Metro in Krasnoyarsk.

There are large-scale projects for the short-term on construction and reconstruction of railway tunnels on the Trans-Siberian Railway and the Baikal-Amur Mainline Railway. Development of technical and economic assessments for the construction of the second line of the North Amur tunnel at Baikal-Amur Mainline Railway is being completed.

Construction of a tunnel for the railway from the mainland to Sakhalin Island may also be adopted.

EDUCATION ON TUNNELLING IN THE COUNTRY

- Moscow State University of Communication Lines (MIIT);
- Moscow State University of Civil Engineering (MGSU);
- Moscow State Mining University (MGGU) of National University of Science and Technology "MISIS";
- National Mineral Resources University "Gorny" (SPGU);
- Saint Petersburg University of Communications (PGUPS);
- Tula State University;
- Ural State Mining University (UGGU);
- Siberian State University of Communications (SGUPS).