

====CSRME NEWSLETTER

Vol.4 May 18, 2020

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CHINESE SOCIETY FOR ROCK MECHANICS & ENGINEERING

Video Meeting on Writing the Work Guidelines for Rock Engineering Cases and Design

On April 18, 2020, the Rock Engineering Design Method Branch of Chinese Society for Rock Mechanics & Engineering (CSRME) held a video meeting. More than 40 people attended this meeting, including the CSRME President, Prof. Xia-Ting Feng and other heads of related units.

In order for better writing the Work Guidelines for Rock Engineering Cases and Design, the Rock Engineering Design Method Branch of CSRME composed "100 China's Typical Rock Engineering Cases" in 2018 by organizing design institutes and R&D institutions from China's water conservancy, hydropower, highway, railway, mining, oil and gas and other industries. They also conducted a survey of work guidelines for rock engineering design.

The CSRME president, Prof. Xia-Ting Feng believed that this work was of great significance for summarizing China's rock engineering construction experience, enhancing China's influence in the field of rock mechanics and engineering, and promoting China's transformation from a big country to a strong country in rock engineering. Beyond that, Professor Feng also put forward constructive suggestions for better writing the Work Guidelines for Rock Engineering Cases and Design.

Two Professional Standard Drafts Passed Expert Review

On April 26 and 27, 2020, CSRME organized video meetings to respectively review two professional standard drafts. One is "Technical Specification for Urban Underground Space Network Planning and Design". The other is "Quality Evaluation Criteria of Urban Underground Space".

The review meetings were respectively presided by Professor Xiangsheng Chen and Professor Shucai Li, both of who are academicians of the Chinese Academy of Engineering. The expert group reviewed these drafts in advance. Each of experts was briefed at the video meeting. After inquiry and discussion, all the reviewers confirmed that these two drafts met the requirements of CSRME Group Standard Compilation. They unanimously agreed that these two drafts passed the expert review.

CSRME has launched the work of Group Standard Compilation since 2017. CSRME successfully registered in the management information platform of national group standards in 2017. A total of 52 group standards are currently in preparation. 2 group standards have been officially published. The group standards will play a far-reaching role in China's comprehensive deepening reform, opening up, and innovation-driven development strategy.

Scientific and Technological Achievement Evaluation Meeting Successfully Held by CSRME

From April 25 to 26, 2020, by the Chinese Society for Rock Mechanics & Engineering (CSRME), three scientific and technological achievement evaluation meetings were successfully held.



On April 25, 2020, a video meeting on evaluating the scientific and technological achievements of intelligent tunneling key technology and application of rock tunnel boring machine (TBM) was held. For solving the key technical problems such as rockmachine interaction, multi-source information perception, recognition and evaluation, intelligent driving and decision-making, the project team adopted research methods such as indoor and field tests, artificial intelligence and data mining to carry out systematic and in-depth research and practice, and finally achieved many innovation achievements. All members of the evaluation committee unanimously believe that the research results of the project have reached the international advanced level, among which the TBM multi-system cooperative driving intelligent control and optimization decision-making technology has reached the international leading level.

On April 26, 2020, CSRME organized and held the sci-tech achievements evaluation meeting, namely "Key Technology for Comprehensive Disposal and Safety Control during TBM Passing Through Giant Caverns in Complex Mountain Areas" and "Intelligent Perception Technology in Analyzing Construction Safety Risks Based on 'Cloud Computing Integration'". A total of nine experts were invited to set up the evaluation committee, including Prof. Qian Qihu, an academician of the Chinese Academy of Engineering. Prof. Qian Qihu was selected as the chair of the evaluation committee. After the presentation of the project achievements, the committee members gave a high appraisement to the two projects, and believed that the project achievements have reached the international advanced level, and also reached the international leading level in intelligent perception technology in analyzing construction safety risks based on "cloud computing integration". Personnel safety can be ensured by the real-time positioning and health monitoring developed by these two projects, and key sections can be monitored by using multi-dimensional real-time monitoring, evaluation and early warning.

