Plan of Colorado School of Mine to develop rapid tunneling technology

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According to the news on the foreign tunnellingjournal.com website (tunnellingjournal.com) on May 5, 2020, the Underground Engineering Research Center of Colorado School of Mines and the US Defense Advanced Research Projects Agency (DARPA) recently signed a contract to develop an unprecedented rapid tunneling technology for its “Excavator” project. The research team will conduct a demonstration of tunneling technology at a speed of 366m/h within 15 months.

It is reported that the goal of DARPA’s “Excavator” project is to develop a technology for excavating tactical underground infrastructure in harsh environments to verify the feasibility of rapid construction of a tactical tunnel network. According to the project leader, the technology will integrate the latest scientific research results in current tunneling, horizontal directional drilling, ground imaging and AI. It will greatly improve the efficiency of tunnel construction and can also be used in the construction of water supply and drainage, highway, and urban tunnels in the future.

Colorado School of Mines will introduce the scientific research project in detail in a short-term training program held on October 19, 2020 and present the final research results within 15 months.

Figure 1. Rapid tunneling test line (Source: https://tunnellingjournal.com/mines-gets-darpa-contract-advance-rapid-tunneling-technology/)

(Source: tunnellingjournal.com website on May 5, 2020)
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