The Growing Face of China's Civil-Military Integration Initiative

OE Watch Commentary: China has long been labeled a copy-cat nation, reverse-engineering, stealing and copying technology from other nations in an effort to try to catch up. However, China has been changing its strategy as it has recognized the value of innovation to the economy, industries, and the military. One way to accomplish this is through civil-military integration, an initiative that has been elevated to a national priority.

The National Defense Science and Technology Innovation Research Institute, a subordinate of the newly restructured Academy of Military Sciences, is viewed as an important institution for carrying out the civil-military integration initiative. The accompanying excerpted articles give some insight into this organization. According to the first article, published by *Sohu*, in September 2017, Guangzhou University announced that it was joining forces with the National Defense Science and Technology Innovation Research Institute to start "in-depth cooperation around some priority areas in civil-military integration collaborative innovation." The areas mentioned included next-generation robot operating system application, artificial intelligence, and cutting-edge technology research and development.

In addition to joining forces with the civilian sector, according to the second article, published by *Tencent*, the National Defense Science and Technology Innovation Research Institute has been drawing in new top-quality recruits. These recruits are said to be hand-picked from across the country. They are a select group of professionals in fields such as navigation guidance and control, control science and engineering, electronic science and technology, and power electronics and motor drives. Their average age is less than 34 years old and 80 percent of them possess "985 college degrees" (There are 39 universities that fall under Project 985 and these are considered China's top-ranked universities).

The 2015 white paper on China's Military Strategy was notable for recognizing a number of changes going on around the world and in an effort to end up on the leading edge of the next revolution in military affairs, China has been busy putting into place key research institutions, policies, personnel, and benchmarks to ultimately push itself into a leading role. In line with military reforms and a massive reorganization effort that has been taking place since the beginning of 2016, the Chinese People's Liberation Army created a new set of policies and procedures to advance the development of defense science and technology. **End OE Watch Commentary (Hurst)**

"Having advanced technology means having the initiative on the battlefield. Whoever has first-class scientific research personnel will have the advantage and leading power of technological innovation."

Source: "我校与国防科技创新研究院共建军民融合智能制造工程协同创新中心 (Our School and The National Defense Science and Technology Innovation Research Institute To Jointly Build a Collaborative Innovation Center for Civil-Military Integration Intelligent Manufacturing Engineering)," *Sohu*, 27 September 2017. http://www.sohu.com/a/195053712_667940

The newly-restructured Academy of Military Science of the Chinese People's Liberation Army is a military scientific research institution under the direct leadership of the Central Military Commission. Its subordinate National Defense Science and Technology Innovation Research Institute is an important institution for carrying out civil-military integration innovation. According to the cooperation agreement, our school and the National Defense Science and Technology Innovation Research Institute will start in-depth cooperation around some priority areas in civil-military integration collaborative innovation. These collaboration areas include next-generation robot operating system application, artificial intelligence cutting-edge technology research and development, and the joint venture between corresponding businesses in Guangdong, Hong Kong, and Macau to carry out typical demonstration applications in concerned emerging industries such as next-generation robots and intelligent unmanned systems. The cooperation will break through the barriers between traditional disciplines and industries, achieve complementary advantages and civil-military integration, and build a world-class integrated innovation platform for intelligent manufacturing cutting-edge common technology research and interdisciplinary collaborative development. According to the agreement, our school and the National Defense Science and Technology Innovation Research Institute of the AMS will give full play to our respective resources and advantages to jointly establish a collaborative innovation center for civil-military integration intelligent manufacturing engineering on the Guangzhou University campus, jointly conduct research and development of new-generation robot operating systems and artificial intelligence cutting-edge technologies, and collaborate with businesses to carry out typical demonstration applications in corresponding emerging industries. The two sides will also jointly train graduate students, bring in international high-end talents, and carry out technical, skills, and entrepreneurship training.

Source: "军事科学院引进120多名高端人才 (Academy of Military Sciences Introduces over 120 Top-Quality Personnel)," *Tencent*, 13 April 2018. https://new.qq.com/omn/20180413/20180413A1IXI6.html

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The newly formed National Defense Science and Technology Innovation Research Institute mainly focuses on cutting-edge technologies such as artificial intelligence, unmanned systems, and cutting-edge crossover technologies. Its core mission is aimed at defense technology innovation.

When selecting the recruits, the institute searched across the whole military for specialty professionals in fields such as navigation guidance and control, control science and engineering, electronic science and technology, and power electronics and motor drives in accordance with the needs of scientific research positions. The cadres were selected based on merit after considering their background, including academic qualifications, age, experience, ability, and achievements.