**Where is the fulcrum for seizing the “right to control intelligence”?**

Source: Liberation Army Daily

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2020-02-20

<https://www.cssn.cn/jsx/jsx_gfsk/__deleted_2022.12.31_12.53.48__gfsk_jsxxh/202208/t20220803_5450879_1.shtml>

**Cognitive confrontation based on brain-computer interaction**

　　Whether it is tangible combat domains such as land, sea, air, and space, or intangible combat domains such as electromagnetic and network, the space of fighting is material. But the world is not only material and objective, but also conscious and cognitive. War is not only fought and fought in the objective material world, but also in the subjective cognitive space. The concepts, decisions, emotions, will and other struggles in the subjective cognitive space are no less. The changes in the commander's cognition, such as deviation, confusion, and mistakes, have a direct and decisive impact on the behavior and results of the material space. Cognitive confrontation has existed since ancient times, mainly reflected in the command confrontation on the level of strategic plans, and the psychological confrontation on public opinion and differentiation and disintegration. These confrontations are only conceptual, indirect, and auxiliary. With the development of artificial intelligence technology groups represented by brain-computer interconnection, a new, independent, and parallel cognitive space battlefield will be opened up on the basis of traditional command confrontation and psychological confrontation.

　　Brain-machine interconnection allows consciousness to control the operation of machines through brain waves in a wired or wireless manner, but this also means that machines can feedback information to the brain through brain waves and establish cognitive images for the brain. The separation of people and bodies and the integration of brain and machine, using the human brain to remotely control unmanned combat equipment, makes the backstage human brain and the front-stage machinery become one, becoming a heterogeneous "re-created person", greatly improving the autonomy, adaptability and accuracy of unmanned combat equipment. As early as 2012, the Advanced Research Projects Agency of the US Department of Defense implemented a scientific research program called "Avatar", aiming to create a "biological machine army" remotely controlled by the human brain like in the movie "Avatar". However, while using brain-machine interconnection to create a "biological machine army", it also exposes the cerebral cortex to radio waves, which buries concerns for direct cognitive confrontation. The Internet of Things extends to the brain, and the "Internet of Things" evolves into the "Internet of Brains". While developing "brain control" weapons, it also faces the threat of "brain control" by opponents. The opposing sides not only carry out psychological warfare against people's senses, but also modify memories, implant concepts, disrupt thinking, manipulate emotions, and paralyze the will in the brain. They implement more practical, direct, and efficient cognitive confrontations to achieve "mind control" and achieve "defeating the enemy without fighting."

**Chip countermeasures based on electromagnetic energy**

　　In the intelligent battlefield, the combat forces include both natural persons and robots controlled by people in the background, or human-machine composite "electronic people" directly controlled by people wearing mechanical exoskeletons in the foreground. Unmanned combat equipment has become the main killing target on the battlefield. Moreover, the size of unmanned combat equipment is getting smaller and smaller, the speed is getting faster and faster, and it is becoming more and more difficult to find. For example, the representative of intelligent weapons on the modern battlefield, the drone, is small and flexible, and its actions are elusive. Traditional radar and air defense weapons are difficult to deal with it. How to effectively implement anti-drone operations has become a prominent problem in modern warfare. Faced with more and more "unmanned, invisible, and silent" combat targets, when traditional guidance tracking, firepower strikes, and physical confrontations seem powerless, the use of electromagnetic energy to confront the "heart" of the unmanned combat platform, the silicon-based chip, will be very effective.

　　Chip confrontation based on electromagnetic energy does not directly kill and destroy intelligent combat platforms, but uses electromagnetic energy to interfere, suppress, block, and burn electronic chips embedded in intelligent combat platforms, so that the "brain" and "nerve" of intelligent combat platforms lose their "blood supply mechanism", and then lose their counterattack and combat capabilities, becoming "deaf", "blind", and "foolish", no different from scrap metal. The intelligent combat system built on the basis of "Internet of Everything, Silicon-based Awakening" has also collapsed. The chip confrontation means in the intelligent era mainly include electromagnetic pulse weapons, which convert the huge energy generated at the moment of explosion into electromagnetic energy and emit it to kill and destroy the electronic chips of intelligent equipment; laser weapons, which emit laser beams at the target, use the heat energy generated by the laser and the secondary electromagnetic field generated around the target to damage the chip; particle beam weapons, which emit a strong stream of directional particles such as protons and neutrons at the speed of light or near the speed of light to the target, generate a strong electromagnetic field and rays around the target, and burn and destroy the chip. The common characteristics of these methods are fast speed, high precision, long distance, low interference, rapid action transfer, and effective against unmanned combat platforms. They are new creations and developments of traditional electromagnetic confrontation and network confrontation in the form of intelligent warfare. In the future, guns and artillery will not only fire bullets and bombs, but also electromagnetic flow, photon flow, and particle flow.