

# Research on the Training Model of Military College Postgraduate with the Development of Weaponry

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**Abstract.** With the continuous development of weaponry development, military college postgraduate training faces new opportunities and challenges. According to the development characteristics of weaponry, this paper analyzes the talent demand of military equipment development for military college postgraduate, analyzes the problems existing in military college postgraduate training, and puts forward the preliminary idea of military college postgraduate training mode to meet the development needs of weaponry, in order to improve the quality of military postgraduate training. Provide some reference and practical value.

**Keywords:** weaponry; military college; postgraduate; talent training; teaching mode.

## 1. Introduction

Under the conditions of information local warfare in the future and the integration of various combat forces, means, and high-tech weaponry, the overall integrity and comprehensiveness of combat confrontation is more significant than ever before [1]. The military responds to multiple security threats and completes the diversified military tasks and puts forward new and higher requirements for the high-level military postgraduate training. Seriously sorting out the achievements and problems of military postgraduate training, thinking about further improving the training of military postgraduate, it is of reality significance for adapting to the construction of information-based military and winning local wars under the conditions of accelerating the development of military postgraduate training [2].

## 2. The Characteristics of Weaponry Development.

The best combination of man and equipment is a necessary condition for the formation and improvement of combat effectiveness. The leaping development of equipment has laid the material foundation for the improvement of combat effectiveness. However, in order to truly achieve the level of combat effectiveness and the simultaneous development of equipment, there must be a large number of commands, technical and management personnel. In recent years, the state has invested more and more in the development and construction of the military, and our military equipment construction has been greatly developed. From the development history of our military equipment in the past decades, the development of weaponry has the following characteristics [3]:

### 2.1 The Proportion of New Weaponry is Increasing.

With the continuous deepening of military struggle equipment, the pace of development of our military's weaponry has obviously accelerated, and a large number of new weaponries have been equipped with troops [4]. The proportion of high-tech equipment in our military's weaponry system is increasing. Especially since the 1990s, the scale structure of our military equipment has undergone major changes. The proportion of three generations of equipment represented by three generations of combat aircraft, new radars, and new ground-to-air missile weapon systems has been increasing.

### 2.2 The Updating Speed of Weaponry is Fast.

The remarkable performance of weaponry development is the upgrading of equipment. With the continuous deepening of preparations for military struggle and the development of equipment

technology, many new types of equipment with advanced technology and excellent performance are constantly emerging, and the speed of equipment replacement is getting faster and faster.

### **2.3 The Development Model of Weaponry is Diverse.**

The development of equipment is guided by the preparations for military struggle. It is subject to funding, scientific research and development cycle. The development of our military's weaponry mainly includes independent research and development, foreign introduction, imitation and other forms. On the one hand, it shortens the development cycle of equipment construction. On the other hand, it has also caused a situation in which our military equipment has many models and low generalization.

## **3. The Demands of Weaponry Development for Talent**

With the development of our military's weaponry, the demand for high-quality and high-level management and technical talents has also been greatly improved, as shown in:

### **3.1 An Urgent need for a Large Number of Equipment Management Personnel**

First, focusing on the continuous construction of equipment, there is an urgent need for a large number of equipment management personnel. The development of weaponry has many influencing factors and long cycle. The level of equipment management is one of the important factors that restrict equipment construction, and it directly hinders or promotes equipment construction. In recent years, with the continuous development of weaponry, many new situations and new problems have been encountered in the equipment management work. To realize the scientific development of equipment construction, it is necessary to properly handle bottlenecks such as planning, communication, coordination, command and control encountered in equipment construction based on efficient management. The solution of these problems depends on high-level management talent.

### **3.2 An Urgent need for a Large Number of Professional and Technical Personnel**

The second is to focus on the leading role of the military, and it is urgent to have a large number of professional and technical personnel. The defense industry sector is the main unit of weaponry development, but the military plays a leading role in the development of weaponry. To strengthen the military's dominant position in equipment development, it is necessary to strengthen the management and control of equipment demand demonstration, quality supervision, test verification, etc. These works are highly professional and technical, and require corresponding personnel to have strong business capabilities and professional skill level.

## **4. The Requirement of Weaponry Development for Military Postgraduate Training.**

The postgraduate training of military academies plays a central role in the cultivation of new military talents. It is responsible for cultivating high-level military personnel who meet the needs of post, innovative and comprehensive quality. Due to the links, departments and positions involved in the development of weaponry, the needs of the military departments and positions for talents are the same [5]. Therefore, higher requirements are put forward for the postgraduate training of military academies.

From the training objectives of postgraduate in military academies and their subsequent positions, they have both professional and academic attributes.

### **4.1 Professional Attribute**

For the management positions of equipment organs, military equipment supports jobs, and military representative agencies, the performance of supervision posts mainly highlights their professional

characteristics, focusing on training postgraduate to find and solve practical problems in equipment management, procurement, maintenance and other management.

#### **4.2 Academic Attribute**

The ability of teaching and research units, such as colleges and research institute, mainly highlights its academic characteristics, which is focused on the development of postgraduates' ability to innovate and develop.

Therefore, we must focus on the development needs of weaponry and personnel training requirements, taking into account the dual attributes of academic and professional, not only to cultivate new theoretical and new methods, to have high-level academic talents with strong innovation ability, but also to cultivate strong management capabilities and High-level applied talents who are good at finding problems and solving problems, and adapting to the management positions of equipment agencies, teaching and research positions of the institutes, equipment support jobs, and military representative institutions to fulfill supervision and post needs.

### **5. The Problems in the Military Postgraduate Training**

While fully affirming the great achievements in military postgraduate training, it should also be noted that with the increasing number of military postgraduate degree authorization points, military postgraduate training has also exposed some problems that cannot be ignored in the actual school practice. These problems are certain. To a certain extent, it restricts the further development of postgraduate training.

#### **5.1 The Quality of the Source needs to be Improved.**

Postgraduate training is based on undergraduate education. The degree of development of undergraduate education has a direct quality impact on postgraduate education. Due to some objective reasons of history and reality, the military postgraduate is in urgent need of improvement. On the one hand, the training of the former colleges and universities in our military is mainly based on junior colleges, and the basic starting point is low. Although the military has accelerated the reform of college education in recent years, undergraduate education has developed greatly, but in the concept of education and practical education. There is not enough innovation at the level, and the connection with graduate education needs to be strengthened. On the other hand, more importantly, the current military does not have regulations on the use of postgraduate cadres, and some units are too particular about the use of cadres, which has made it difficult for some postgraduate to get suitable positions after graduation. This has led to some Excellent undergraduate cadres with the ability and experience of the unit are reluctant to enroll in further studies, or the unit does not hold outstanding undergraduate cadres for further study. These have affected the quality of enrollment in the postgraduate training of our military.

#### **5.2 The Applied Culture needs to be Strengthened.**

The transition from academic training to applied training is the basic trend of military postgraduate training, but there are still many problems in practical work. From the actual situation of postgraduate training in the whole military, the main problem is that the training of general-purpose disciplines is too large, which has caused the phenomenon of talent training and actual demand disjointed. For example, military postgraduate, most of the students graduated in these years are good at the academic talents of theoretical research and the application-oriented talents suitable for military work are obviously in short supply, which makes them more concentrated in the work of teaching units and scientific research units after graduation, especially for some postgraduate who are admitted to the local and local areas due to the lack of grassroots units. Work experience, it is difficult to accurately understand and grasp the basic tasks of the current army building, and even after graduation, unable to adapt to the needs of the troops.

### **5.3 The Training Mode is too Singular.**

Postgraduates adopt a unified mode of training, killing some of the postgraduates' high ability to develop. Postgraduate training belongs to "elite education". Each tutor can bring several to more than a dozen postgraduate, and it is possible to implement "peer-to-peer education". However, the current graduate training system restricts the realization of this goal. The current education system adopts the model of unified training, unified examination, unified requirements, and unified graduation. It does not reflect the individual differences of postgraduate as a highly educated talent group. Many instructors are aware of this, but the efforts of individuals have been ineffective.

## **6. Preliminary Thoughts on the Training Mode of Military Postgraduate**

### **6.1 Reforming the Graduate Curriculum System**

The goal of undergraduate education is: What talents are needed by the troops, and what talents should be cultivated; the training objectives of postgraduate should be: What talents are needed for the development of the troops, and what talents should be cultivated. at present, more and more new types of weaponry are put into use by the troops, and the speed of upgrading and upgrading of equipment is accelerating. These put forward higher requirements for military schools to train high-quality and high-level management and technical personnel. Therefore, the postgraduate curriculum should be closely linked to the use of new weapons and new equipment. While ensuring basic compulsory courses, increase the proportion of elective courses, such as increasing the curriculum related to new weaponry, broaden the training of postgraduates, and optimize the curriculum structure; Have a certain forward-looking, track the latest achievements and development trends of weaponry, and provide research courses such as cutting-edge and interdisciplinary subjects; to open up barriers between departments and professions, and to pay attention to the dynamics of the graduate curriculum system. Build a flexible curriculum structure.

### **6.2 Give Full Play to the Subjective Initiative of Graduate Tutors.**

In the process of cultivating postgraduates, individual differences between postgraduates should be recognized and recognized. Each postgraduate has its own characteristics, or is active, or quiet, or can be a text, or can be a military; even the same professional postgraduates, because of their own characteristics, need different training methods. If a postgraduate is very quiet and can concentrate on academic research, then he should be allowed to get more exposure to new discoveries and new achievements in related fields, so that he can participate in topics or experiments everywhere, but it will affect his achievements; However, if the characteristics of postgraduates are active, then he should be allowed to participate in topics and experiments, so that he can read quietly, but there is no result. This requires the instructor to develop different training plans for each student's individual differences and be responsible for the growth of each postgraduate. Only in this way can we cultivate talents with high academic qualifications and high abilities.

### **6.3 Create Test Conditions for Equipment Technology.**

The ability training and development of postgraduates has an intrinsic connection with the accumulation of knowledge. When cultivating and developing the ability of postgraduates, we should not only consider book knowledge and classroom teaching, but also focus on the hands-on ability of postgraduates, increase the demonstration and verification of weaponry, establish a weaponry laboratory, fully mobilize the enthusiasm of postgraduates, and give full play to the creativity of postgraduates. Providing adequate opportunities and guidance for graduate competency training is a more effective way to strengthen postgraduate competence.

### **6.4 Strictly Grasp the Topic of Graduate Thesis.**

The topic of graduate thesis is not that the instructor gives the student a topic or a direction, but a process and a link. It is not isolated and is closely related to other aspects of the postgraduate training

process. Therefore, the topic should be closely related to the development of new weapons, new weaponry, and must be scientific and innovative. It must have both theoretical analysis and experimental verification. As a mentor, we should strictly control the selection of postgraduates, fully mobilize the independent selection and innovation ability of postgraduates, guide students to access literature materials, and understand the frontier dynamics of the disciplines, to lay a good foundation for postgraduates to engage in relevant scientific research work.

## **7. Conclusion**

The development of weaponry puts higher demands on talent demand and training. The training of military college postgraduates as the main source to meet the needs of the high-level talents of the military must make appropriate adjustments in terms of curriculum development, training mode, and experimental conditions in order to improve the quality of military college training, in view of the development characteristics of weaponry and the demand for talents. Improve the talent guarantee for the sustainable development of military equipment construction.

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