Discussion on the Safety of Municipal Engineering Construction Technology

Minghui Lu

Tianjin Jizhou New Town Construction Investment Corporation Limited, Tianjin 301900

Abstract:

With the continuous development of the economy, the construction and management of municipal engineering are getting more and more attention. It is not only related to the development process of the whole society but also can effectively improve the living standard of the people. At present, the level of infrastructure construction in China is seriously inconsistent with the living standard of the people, and the contradiction is prominent. If the construction technology management of municipal engineering is not strengthened, it is likely to affect the healthy and sustainable development of urban construction.

Keywords:

municipal engineering; construction technology; safety

1. The content of municipal engineering construction technology safety

1.1 Emphasizing engineering quality

Quality assurance is the basis of project safety. Improving project quality and project safety is the focus of municipal engineering supervision. It is necessary not only to establish the quality consciousness of the staff, but also to cultivate the responsibility of the construction personnel in order to ensure a good foundation for social development. Not only that, the staff of municipal departments should establish the consciousness of serving the people, and should not affect the quality of the whole project because of personal dereliction of duty.

1.2 Establishing a sense of responsibility for engineering tasks

Compared with other projects, the main characteristic of municipal engineering is that it is more complex and involves more departments. In order to ensure the smooth progress of municipal projects, it is necessary to establish a sense of responsibility among the staff. A system of responsibility allocation should be implemented in all aspects of task execution and distribution to avoid unclear authority and responsibility.

1.3 Functional analysis of engineering-related units

Due to the diverse, integrated and complex nature of municipal projects, a municipal project requires the cooperation of many different departments. For example, a project may require the cooperation of civil, electric and government personnel. Relevant personnel should strengthen the audit, clarify the functions of the relevant units of the municipal project, and improve the structure of the municipal project.

2. The significance of municipal engineering construction technology safety

2.1 Enhancing the quality of municipal works

Many municipal engineering constructions still follow the traditional construction technology and old management mode, which is not in line with the development trend of the times, hindering the efficient management of municipal engineering construction. Therefore, in order to improve the construction efficiency of the project and ensure the quality of the project, it is particularly important to strengthen the construction technology and construction safety management of municipal engineering. Through the optimization of municipal engineering construction technology and safety management, not only can we innovate

the process and improve the construction efficiency, but also improve the efficiency of project management from all aspects, so as to achieve the expected goals. Therefore, it is particularly important to strengthen the construction technology and safety management of municipal engineering.

2.2 Promoting the development of our municipal engineering industry

With the diversification of construction technology and innovative management mode of application, practitioners' research gradually focuses on the study of new technologies, not only to bring more changes to the various industries, but also to make more new construction technology in the construction process widely used to improve the level of construction of China's municipal industry and promote the rapid development of the municipal industry.

2.3 Creating a healthy market environment

As municipal projects are more complex than other projects, the departments involved are more complex and many contractual leases are unclear, leading to uneven levels of construction technology and management in municipal projects and unevenness in the industry. In order to ensure the healthy development of the construction market, it is necessary to maintain the market order, standardize the quality testing procedures, and send professionals to supervise and manage the market behavior.

2.4 Optimizing the profitability of economic investments in the enterprise

The construction process is very complex and involves many fields. At present, the staff structure is very complex, and the level of professional knowledge is uneven, resulting in the progress of municipal engineering and construction cycle is affected, which is not conducive to the enterprise to improve economic and social benefits. If we actively use the advanced management mode and construction technology, not only can the construction staff fully understand the construction progress, but also can optimize the enterprise's investment structure, reduce unnecessary expenditure, and ensure that all funds are fully utilized.

2.5 Improving the quality of the living environment

Municipal engineering is based on the needs of urban development, the construction of relevant buildings to enhance the comprehensive strength of the city. Strengthening the quality inspection of municipal engineering can ensure the safety of residents, enhance the influence of the government in a certain sense, and lay a solid foundation for the development of China's construction industry.

3. Municipal engineering construction technology problems

3.1 Insufficient construction quality management

Due to the extensive management process involved in the construction of municipal engineering, it is easy to appear the phenomenon of mismanagement. Municipal engineering is mostly an underground project, the relevant supporting works are very complex, and the complexity and diversity of China's terrain, there are many safety hazards in the construction, many managers do not realize its importance. Due to the difficulty of cultivating complex talents, there is a lack of professional supervision in the construction process. If not taken seriously, it may lead to safety accidents.

3.2 Safety hazards in construction management

Due to the construction enterprise's relevant management system is not perfect, the management process is not standardized, the management personnel is not professional, the practitioners in the work of safety awareness is not strong, the site of the construction safety management there are a lot of hidden dangers. Not only that, due to the diversity, complexity and comprehensiveness of municipal engineering construction, it is also very easy to cause safety accidents in the construction process because of some safety management problems.

3.3 Problems with construction materials

The quality of construction materials directly affects the effectiveness of the whole project. In the construction process, the quality of materials is very important. At present, it is easy to have various problems in material procurement, which affects the quality of materials. For example, in the procurement process, many staff do not plan well in advance, and will not be in

accordance with the material standards for procurement, resulting in the quality of materials can not be effectively controlled, resulting in a waste of resources. At the same time, due to the relevant departments did not establish a perfect material management system, arbitrary stacking of materials, resulted in wasteful loss of materials.

3.4 Poor safety of municipal works

The main reason for the poor safety of the municipal engineering construction site is that the relevant management personnel do not play a functional role, some staff lack of safety awareness, do not pay attention to standardized operation in the construction process, which ultimately leads to the occurrence of safety accidents. At present, many construction personnel have lower comprehensive quality and poorer ability to react on the spot, resulting in the construction site safety is not guaranteed.

4. Effective strategy to improve the safety of municipal engineering construction technology

4.1 Optimizing the quality management of municipal engineering construction

In order to strengthen the quality management of municipal engineering site construction and improve the corresponding management system, the relevant departments can learn from the advanced construction technology and management standards at home and abroad to ensure that the quality of the project is controlled. As the quality of municipal engineering directly affects the quality of life of residents and the use of experience, once a problem occurs, it is likely to cause safety accidents. Such as municipal sewage projects, if you do not pay attention to the pipeline problem, it is likely to cause pipeline blockage, and water flow, and ultimately lead to underground drainage system blockage, contrary to the original intention of the municipal project. Therefore, at the construction site, the relevant departments should establish a professional team to supervise the construction process and ensure quality. After the completion of each step, the construction department should check itself and pass before proceeding to the next process. Construction personnel should also strengthen their business ability abide by professional ethics, and should not neglect the quality of the project because of the schedule.

4.2 Municipal Engineering Construction Technology Optimization Strategies

In order to ensure that the construction technology of the municipal engineering project is reasonable, the drawings should be checked before construction and the construction process should be standardized. For the difficult points in the construction process, appropriate construction technology should be selected according to the actual situation in order to achieve the expected goals of the municipal engineering project.

4.3 Improving the comprehensive quality of municipal construction personnel

In the construction process, not only to control the quality and quantity of materials but also to improve the comprehensive quality of construction management personnel. Strengthening the training of construction personnel is not only conducive to improving the management awareness of managers but also conducive to cultivating their comprehensive ability. Municipal engineering technology update speed, we should often organize construction personnel to learn new technologies, new norms, and management systems, which is very important to improve the comprehensive quality of construction personnel. The construction effect of the scene, to take an effective assessment and evaluation system, which can not only enhance the sense of responsibility of the managers but also enhance the enthusiasm of the construction personnel, improve the municipal engineering site management level, to ensure the construction quality to lay a good foundation.

4.4 Emphasis on the optimization of technology and management models

Municipal construction enterprises should realize the importance of on-site construction management and construction technology, the leadership should pay attention to the technical improvement and on-site management of the investment, and reasonable configuration of on-site technical personnel and management personnel. At the same time to develop clear construction goals, according to the construction goals and the actual situation to optimize the construction technology and management mode. Establish a reward and punishment mechanism to reward projects with reasonable application, effective

quality improvement and efficient management, and impose internal penalties on projects with safety accidents, affecting project progress and causing adverse effects. This is conducive to promoting internal competition, improving management capabilities, and enhancing the comprehensive strength of enterprises.

4.5 Strictly formulate the construction plan

In the process of construction, a questionnaire survey is done according to the characteristics of municipal projects, and a perfect construction program is made by combining the work of the staff. In the process of project planning, it should be analyzed according to the safety monitoring management system to ensure that it is scientific and reasonable. After determining the complete program, it shall not be changed arbitrarily during construction. In case of an emergency, the plan should be appropriately adjusted in consultation with relevant departments. For quality supervision, a strict monitoring system has been established.

5. Conclusion

In summary, in order to effectively improve the quality of the project and enhance the comprehensive competitiveness of the city, it is necessary to do a good job of municipal engineering construction, optimize a series of effective measures for construction technology, analyze and summarize the current problems, and put forward the solution to achieve the goal of project management and promote the healthy development of China's municipal industry.

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