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## Analysis of the Problems Existing in the Management of Laboratory Safety Archives and the Key Points of Improving its Safety Management System

Sun Yunfei <sup>1, \*</sup>

<sup>1</sup> Assets and Laboratory Management Office of Qingdao University, Qingdao, Shandong 266071, China.

**Abstract:** This paper deeply analyzes the problems in the safety management of laboratory archives in universities, such as illegal operation, imperfect safety facilities, inadequate safety supervision, imperfect management system, inadequate safety awareness. To handle the corresponding problems, this paper puts forward a series of countermeasures for the safety improvement of laboratory archives management in colleges and universities, and provides a theoretical basis for the safe construction of university laboratory archives management.

Keywords: Colleges; Laboratory archives security; Safety management system

### INTRODUCTION

The main task of university laboratory mainly includes two aspects, that is, national scientific research and school experiment teaching. In terms of national scientific research, it mainly provides a scientific research platform for researchers, and in terms of experimental teaching in schools, it mainly cultivates students' innovative ability and hands-on ability, which is conducive to the continuous improvement and development of science and technology in China. In recent years, China has increased investment in higher education, so the related equipment and personnel of university laboratories have been increased. Under such circumstance, the management difficulty of university laboratories is also increasing, among which the management of university archives security laboratories is the key point [Li, 2019]. The construction of archives safety management system is not only the foundation to ensure the normal operation of university laboratory, but also the premise to protect the personal health of teachers and students, and the property safety of universities. It plays an important role in the stability of university and society, and needs to be paid enough attention to.

# PROBLEMS IN THE SAFETY MANAGEMENT OF UNIVERSITY LABORATORY ARCHIVES

#### Lack of safety education and awareness

Teaching and scientific research is the top priority of university development, and the laboratory is an important part of the university. However, the archives safety management of university laboratory is usually not paid attention to and the lack of corresponding archives safety education, which makes the laboratory prone to various archives safety problems. Compared with enterprises or factories, the laboratory archives security problem in colleges and universities is not so serious, so it usually lacks rigorous archives security awareness, which will lead

to very serious harm. At present, most colleges and universities only pay attention to laboratory safety and conduct laboratory safety training for teachers and students according to professional implementation. However, they often do not pay attention to the archives management of laboratories, and subconsciously think that archives management problems are not easy to occur [Peng, et. al., 2019]. In addition, the laboratory is lack of sound archives safety training and publicity work, so the crisis awareness is insufficient, the lack of prevention awareness is the direct cause of the threat to the laboratory archives safety, so it is particularly important to increase the archives safety education, training personnel safety awareness.

# Lack of well-round archives security management system

Colleges and universities usually develop a lot of archivess for the laboratory archives security management system, but they did not fully investigate the pertinence and feasibility of the system, so that the archives security management system is prone to do not fit with the actual situation, so it will increase the incidence of archives security events. Moreover, in the laboratory, colleges and universities have not formulated strict rules and regulations for archives management, so the archives managers usually have a variety of non-standard operations, which will threaten the safety of laboratory archives [Cui, et. al., 2020]. Regular inspection, maintenance is an important content to ensure the safety of laboratory archives. However, colleges and universities have not formulated the corresponding system, so there are great security risks. Even if some colleges and universities made provisions in the laboratory safety management or laboratory archives management methods, but there are provisions and requirements of narrow scope, the lack of further laboratory safety archives collection scope, archiving requirements and storage period and other specific implementation methods and provisions. Moreover, the unsound management system of laboratory archives in colleges and universities will also lead to problems such as confusion and unclear responsibility of laboratory archives managers, which will lead to the archives security management personnel can not feel at ease to carry out the archives management security work [Wang, 2021].

# The problem of non-standard archives arrangement

In terms of the sorting and archiving of laboratory archives, due to the wide range and fields of laboratory safety archives and various forms, as well as the lack of professional knowledge in archives management and archives compilation and research of laboratory archives managers and safety responsible persons, the safety archives of various laboratories at all levels of colleges and Universities are accumulated, but they are disorganized. On the one hand, the classification of laboratory archives is not clear, which leads to the failure to realize the correct archiving of laboratory archives. On the other hand, most laboratory archives also fail to establish a correct archives index, resulting in the problem of low efficiency in consulting laboratory archives.

### Lack of complete safety facilities

At present, the vast majority of university laboratories have fire access and have prepared corresponding fire-fighting equipment. However, these safety facilities are all aimed at experimental safety, and the corresponding safety facilities are usually not established for archives safety accidents. The main reason is that laboratories usually don't pay attention to this potential danger, mainly because they are unwilling to invest too much resources in things that can't see obvious effects, and this kind of potential threat is usually fatal [Li, et. al., 2019]. The continuously increased government has investment in higher education in recent years, but most of the funds are used for the purchase of laboratory equipment, laboratory construction, education place construction, etc., and usually do not pay attention to the maintenance and construction of laboratory archives security facilities [Du. et. al., 2021]. The above problems lead to the lack of attention to the safety management of laboratory archives.

### Lack of archives safety awareness

Due to the lack of laboratory archives safety education, the archives managers of university laboratories usually lack safety awareness, so it is easy to have non-standard operation, which will easily lead to serious archives safety accidents [Wang, 2021]. Before carrying out the safety management of laboratory archives, relevant archives management workers usually did not study laboratory safety courses, so many managers did not know the basic

safety operation process of laboratory archives management, are not strictly trained according to the correct operation methods, and mainly rely on the archives management personnel to explore the operation methods, which would pose a serious threat to the safety of laboratory archives [Wu, 2020]. The slight negligence of laboratory personnel in the management of archives will lead to the leakage and confusion of archives. In serious cases, there will be major archives safety accidents.

## KEY POINTS OF IMPROVING THE SAFETY MANAGEMENT SYSTEM OF UNIVERSITY LABORATORIES

### Strengthen safety education and awareness

In order to strengthen the consciousness of laboratory personnel, colleges and universities not only need to establish laboratory archives safety education courses, but also to set up comprehensive archives safety management laboratory compulsory courses. Colleges and universities need archives administrators to take archives safety protection as the focus of work, and then improve the level of laboratory archives safety management. Colleges and universities should also carry out relevant archives safety management courses, in which real archives accident cases are introduced to enhance the safety awareness of laboratory archives managers and introduce in detail how to scientifically manage laboratory archives [Wang, 2020]. In the classroom teaching, it is also necessary to explain the theoretical knowledge of archive security, and guide relevant personnel in the laboratory site. If there is a archives management related personnel need to enter the laboratory, it is necessary to give the corresponding archives safety training and safety learning. Only the personnel who passes the examination can be admitted to the laboratory. Colleges and universities also need to compile the archive safety guidance manual, whose content needs to be consistent with the actual situation of the school, so as to facilitate the laboratory archive management personnel to consult it at any time. In addition, colleges and universities also need to carry out propaganda and education work on a regular basis, so that laboratory archivists can regularly participate in publicity activities, expert lectures, video watching, etc., which helps to improve the awareness of archive safety of all teachers and students.

## Improve the safety management system of laboratories

Archives security management system is an important part of university laboratory management, so it needs to be improved and perfected, which is the guarantee and premise for the smooth implementation of archives security work. Therefore, when constructing the laboratory archives security

environment, colleges and universities need to create it according to the actual situation of university laboratory. The formulation of archives management system can not directly copy the old rules. We need to fully investigate the relevant situation of university laboratories, and then discuss and analyze them. On this basis, we can ensure the scientificity and applicability of archives security management system and regulations. When formulating the safety management system of university laboratory archives, its main purpose is to manage the laboratory archives more efficiently and safely, so that the staff can follow the rules and regulations when consulting and archiving the archives. Moreover, colleges and universities also need to formulate corresponding emergency plans for the occurrence of emergencies, and build a complete set of plan system on this basis. In case of emergencies, they can deal with assault events through emergency plans, which can not only ensure the safety of relevant personnel to the greatest extent, but also reduce asset losses to the greatest extent [Li, et. al., 2020]. The implementation of the archives safety management system is inseparable from the clarification of the responsibilities of archives safety management. Therefore, colleges and universities need to establish a special organization to uniformly lead, manage and organize the archives safety work of colleges and universities, and establish a three-level safety management organization of laboratories, deppartments and univeristies. Each safety management link needs to implement the responsibility to people, and relevant personnel need to sign the safety responsibility letter. In order to implement specific regulatory responsibilities in the operation process, it is also necessary to ensure the scope of responsibilities of each staff and avoid functional confusion of staff.

# Strengthen the safety supervision of university laboratory archives

In the safety management of university laboratory archives, safety supervision plays an extremely important role in eliminating the hidden dangers of university laboratory archives. For example, after checking the safety facilities, archiving and management system of university laboratory archives, we can put forward rectification suggestions for adverse phenomena on site, and then carry out safety learning. If the inspection still fails to meet the again, we can make corresponding punishment and a notice in the whole school[12]. Management regulations are an extremely important part of archives safety supervision. Only by formulating corresponding reward and punishment measures can we improve the attention of laboratory personnel.

# Strengthen the development and utilization of efficient laboratory archives

Development and utilization is an important way to realize the value of archives. The value of laboratory safety archives lies not only in reference and records, but also in its excavation and development, so as to turn "dead archives" into "living resources", and continuously inject vitality and source into university laboratory safety work, which can promote the publicity, popularization and popularization of university laboratory safety work, laboratory safety education and laboratory safety archives education.

### Strictly handle illegal operations

University laboratories also need to construct the access system, clarify the requirements for the operation examination of experimental archives, and issue the certificate of operation skills. Only those who pass the examination can enter the laboratory. At the same time, improve the laboratory file query and registration system, warn and circulate a notice of criticism for illegal operations, and appropriately increase the punishment for major damage.

#### **CONCLUSION**

To conclude, the archives security of university laboratories is closely related to the development of scientific research in Colleges and universities. At the same time, it is also the basis for completing scientific research tasks. Therefore, colleges and universities need to improve the archives security management system according to their own actual situation, so as to ensure the safety of laboratory archives, help maintain the safety of university campus and promote the development of scientific research.

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