

Construction of the Curriculum System of Financial Management Undergraduate Based on XBRL

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Abstract—XBRL is widely used in many fields such as corporate management, auditing, corporate credit rating, securities market, trade and taxation, and financial administration, both listed companies and some state-owned enterprises are required to submit XBRL-based financial accounting reports. However, the education and training of XBRL lag behind the development of XBRL practice; many financial executives are ignorant or poorly know about XBRL, not to mention using the XBRL tools for financial reporting and financial analysis, etc. Therefore, it is the general trend to integrate the XBRL curriculum into the financial management professional curriculum system. This paper puts forward the XBRL professional quality of undergraduate students of financial management major, mapping out the corresponding curriculum system, and they are analyzed and discussed in the paper.

Keywords—XBRL; financial management; curriculum system

I. INTRODUCTION

XBRL (Extensible Business Reporting Language) is a cross-platform, cross-system, cross-language computer language based on the Internet. It can be used for collecting, exchanging and processing unstructured data, realizing one-time input of financial data and multi-party sharing, alleviating the repeated processing of financial data, and meeting the different needs of users of financial data [1]. The Ministry of Finance has issued XBRL technical specifications and classification standards, and actively participated in the exchanges and cooperation of XBRL international organizations. At present, listed companies and some large state-owned enterprises are required to submit financial and accounting reports based on XBRL, and gradually promote the application to other enterprises [2]. Therefore, XBRL will become a necessary skill for financial accountants. However, since the XBRL application system is not yet fully open, most of the XBRL books that can be collected on the market are introductions to theory and principles. Few systematic guidelines for practical exercises based on XBRL applications make XBRL a high-end knowledge in the field of accounting informationization. Only financial personnel of listed companies or large state-owned enterprises or teachers of accounting information specialty in Colleges and universities have the opportunity to actually contact the XBRL processing system, which is not conducive to the promotion and

application of XBRL. Therefore, colleges and universities shouldering the heavy responsibility of personnel training have become the main base of XBRL teaching, and building a scientific and reasonable curriculum system of financial management based on XBRL is the most critical part of personnel training [3].

II. ANALYSIS OF THE CURRENT SITUATION OF XBRL TALENTS TRAINING

A. XBRL is not Promoted Enough

In October this year, the research team conducted a survey among undergraduates of Guangdong University of Science and Technology, Dongguan Institute of Technology, Dongguan City College and Dongguan Enterprise Finance Staff. 1000 questionnaires were distributed and 968 valid questionnaires were retrieved. The survey results showed that 11.36% of the people knew the concept of XBRL, and 88.64% of the people said they had never heard of XBRL. Of the 11.36% of the staff, only 3.64% have studied XBRL related courses or books. In the survey of teachers majoring in financial accounting in these three universities, 58.30% of teachers are not very familiar with XBRL, 33.01% of teachers have only heard of XBRL, and 8.69% of teachers have taught XBRL or participated in XBRL course training, and in fact have contacted XBRL classification standards and grammatical norms. The main reason for this situation is that at present, few colleges and universities in China actively set up XBRL and related courses. Even in Colleges and universities that are involved in XBRL courses, the introduction of XBRL mainly focuses on the concept and principle of XBRL, and lacks a complete XBRL curriculum system.

B. Lack of Financial Management Professionals Proficient in XBRL

XBRL is a computer markup language, which involves knowledge of database, programming, network and financial accounting. It is comprehensive and challenging for teachers of financial accounting background, while teachers of computer specialty do not know financial business knowledge. Therefore, it is not easy to find teachers who are proficient in both professional fields. Moreover, there is a tendency for university teachers to attach more importance to scientific research than to practice. The main evaluation criteria for scientific research are how many articles have been published in core journals and how many scientific research projects have been concluded.

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All these work have affected teachers' enthusiasm in learning applied technology such as XBRL, and they are unwilling to devote more time and energy to XBRL teaching.

C. High Learning Costs of XBRL

As a computer application technology, XBRL only learns the theoretical knowledge of XBRL technical specifications and classification standards. Without practical XBRL application software, it is difficult to truly understand and master the application skills and principles of XBRL. However, the XBRL system launched by various software companies is not expensive at present, which will inhibit the motivation of financial personnel to learn.

III. UNDERGRADUATE TALENT TRAINING OBJECTIVES OF FINANCIAL MANAGEMENT MAJOR BASED ON XBRL

The talent training program and curriculum system construction in Colleges and universities should be carried out around the goal of talent training, which is an important prerequisite for the success of talent training[4]. The talents of XBRL can be divided into three levels: junior XBRL talents, intermediate XBRL talents and senior XBRL talents. The junior XBRL talents are located in the operators of XBRL system. They need to master the basic knowledge of computer, financial accounting and XBRL basic principles, understand the functional framework of XBRL system, master the generation mode of XBRL financial report, and complete the preparation and submission of XBRL financial report. Intermediate XBRL personnel are positioned as maintainers of XBRL system. They need to be able to apply XBRL to the business field comprehensively, eliminate the faults in the daily operation of XBRL system, ensure the normal operation of the system and data security, and make use of the financial statements generated by XBRL for financial analysis and financial management. Senior XBRL talents are positioned as XBRL system analysts. They can objectively verify and evaluate the process of risk management and internal control system of XBRL system, make financial decisions using XBRL information and serve company strategy. The training objective of undergraduate financial management majors should be aimed at training intermediate XBRL talents. Therefore, the curriculum system and evaluation criteria should be set around this goal.

IV. BUILD AN UNDERGRADUATE COURSE SYSTEM BASED ON XBRL FINANCIAL MANAGEMENT

Intermediate XBRL personnel should have professional background in financial accounting. In addition, they should have a solid computer foundation, master 1-2 programming languages, use database products such as SQL or MySQL, and have a deeper understanding of XBRL. Compared with the traditional undergraduate course system of financial management, the new course system should be added: *JAVA Language, Database Management System, Software Engineering, XBRL in Finance* (Conditional colleges and universities can divide this course into four courses: *XBRL Language Rules, XBRL Classification Standards, XBRL Technical Specification* and *XML Technology*) and other related courses. Here, only the course Application of XBRL in Finance is discussed. The course Application of XBRL in

Finance can include the following contents: the basic concepts, advantages, current situation and working principle of XBRL, XML grammar rules, XBRL technical specifications, general classification standards of enterprise accounting standards, XBRL software tools, XBRL financial reporting, XBRL data display and analysis, XML development technology based on Excel, XBRL development technology based on Excel, etc. A total of 72 hours are required, of which no less than 40 hours are required for practical operation. In addition to the new specialized information technology courses, we should also be good at embedding XBRL into the traditional financial accounting courses, integrating XBRL with the traditional financial accounting courses, so that students can naturally learn XBRL knowledge in the course of financial accounting. For example, when teaching accounting principles, students will be introduced to the concept of XBRL, original intention, role, application and promotion of the status quo, so that students have a perceptual understanding of XBRL. When teaching intermediate financial accounting, we can add XBRL classification standards and technical specifications, so that students can have a better sense of accounting standards and understand the reason that accountants must act in accordance with the standards. In the course of teaching traditional manual financial accounting report preparation, the method and technology of XBRL financial report preparation should be interpolated appropriately so that students can master the process and method of XBRL financial report preparation. They can prepare XBRL financial report, analyze XBRL financial report and convert XBRL financial report to meet the needs of the actual work of enterprises.

In addition to the integration of XBRL system into theoretical courses, XBRL practice teaching is needed, and XBRL production, teaching and research training base is built in cooperation with XBRL software suppliers, equipped with XBRL software system and related hardware equipment [5]. Students should be allowed to use XBRL tools to deal with the actual accounting business of enterprises, and mark financial information, financial data and financial analysis indicators through XBRL examples, so that students can understand the generation process of XBRL financial reports, master the preparation method of XBRL financial reports, and improve students' hands-on operation ability. Accounting society, schools and enterprises work out a talent training program to improve the job pertinence, practicability and foresight of the talent training program. Accounting societies and enterprises can sort out and refine the XBRL financial report preparation process in real work into living typical cases for teaching use, even publication and distribution. It is also possible to further optimize educational resources, hire experienced CPAs to attend academic lectures or part-time internships, and share their experiences and experiences in using XBRL to prepare financial reports. At the end of the semester, students will also be guided to the successful enterprise practice learning of XBRL system application, so that students can have an immersive experience of XBRL.

V. DEVELOP XBRL VOCATIONAL TRAINING

The promotion of XBRL is still insufficient only by school education, and its audience is limited. It can not cover the whole society's accountants. Therefore, organizing multi-level,

flexible and diverse XBRL non-academic training courses is the necessary supplementary form of XBRL promotion and application, and also becomes the gospel of accountants who like XBRL [7]. On the other hand, colleges that undertake XBRL training can take this opportunity to increase their social visibility and give play to the functions of colleges and universities. Teachers can also get corresponding remuneration in this process, and have the opportunity to contact the front-line financial personnel of enterprises, understand the confusion of enterprise finance or taxation, and help financial personnel solve practical problems [8]. In this way, schools and enterprises can complement each other in resource advantages and get what they need. The training course can be organized by the Finance Bureau or the Accounting Society and entrusted to colleges and universities to implement the social training of XBRL. This is also a good platform for industry associations, enterprises and universities to interact and exchange learning.

VI. CONCLUSION

Although financial robot is a hot topic in the development of accounting information, the application of XBRL in finance is more urgent and practical than it. XBRL has been rapidly promoted and applied in the business community. However, in the academic palace of higher talent gathering, the response to this new technology has lagged behind seriously for many reasons. For example, the division of traditional subject system considers that XBRL is a computer technology with strong specialty and does not need to be incorporated into the curriculum system of financial accounting specialty. However, XBRL is not included in the education system of computer specialty. On the other hand, XBRL is a new technology. At present, it is only applied in the financial reporting level of listed companies and large state-owned enterprises. Some technologies are immature, and so on. Whatever the reason, since XBRL has been promoted and applied in most countries around the world, we should popularize XBRL knowledge for all financial accountants in the whole society and make full use

of the mobile Internet platform and carry out hierarchical teaching so that XBRL enthusiasts so that users and researchers can easily obtain the XBRL trial system and the latest technical information of XBRL. You may even consider adding the necessary XBRL knowledge and operational skills to the accounting title examination, the outline of the CPA and tax account examinations, and the designated materials. At the same time, XBRL is also included in the accounting staff follow-up education system. Only when a number of initiatives go hand in hand can we really promote the popularity and application of XBRL.

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