Practical Teaching Research on the Course "Computer Culture Foundation"

Yehong Han

Institute of Information Science and Engineering, Qilu Normal University, Jinan, China

Email: sdzzhyh@163.com

Abstract: "Computer Culture Foundation" is a course focusing on application and practice. Based on the practical teaching in the colleges and universities, aiming at the problems and shortcomings of the teaching practices, methods of course experimental teaching are discussed. A new set of the teaching method is proposed in order to solve the existing problems in the traditional teaching methods and improve teaching effect.

1. Introduction

Practical teaching plays a very important role in the computer course. But in the colleges and universities at present, both teachers and students reflect many problems in the practical teaching of public computer course. Teachers often say the public computer course is hard to organize and the students are hard to be well managed. The students say they do not know what to do about the course. In short, learning efficiency is not high. Why are there such problems? On the one hand, some schools do not pay attention to the public computer course, and our teachers have ignored the importance of the course. Many computer teachers don't know how to guide the practice for the students of non-computer majors. On the other hand, many students are not interested in and disregard the course "Computer Culture Foundation" due to various factors. In order to improve teaching level of computer common course and solve the problems existing in practical teaching of computer public courses, combined with the actuality of computer public education at present, this article discusses some ideas and practices in practical teaching of the course "Computer Culture Foundation" with a view to discuss with peers and colleagues.

2. Analysis of existing problems

2.1 Teaching attitude

At present, many colleges do not pay attention to the teaching of public computer course, cannot provide good teacher qualifications and hardware conditions. For example, computer rooms and machine configuration are too low to satisfy the public computer teaching. Some institutions have not paid enough attention to the teachers for public computer course. Because of the large number of students and heavy teaching task, in order to complete the task of teaching, some colleges have to hire off-campus teachers with the problem of lack of unified management and Lower teaching effectiveness. On the other hand, Teachers themselves do not attach great importance to the course teaching. In recent years, with the expansion of university enrollment, most computer teachers in this professional have undertaken a large number of teaching tasks [1]. It is difficult to have the energy to further take into account the teaching of computer culture foundation. Therefore, most of the teachers in front of the heavy task of teaching ignore the public computer course, especially the study of public computer teaching. The problems are mainly manifested in the following aspects. Practical teaching objectives are not clear. The managements are not strict. The task sets are not reasonable. The teaching effects are not ideal.

2.2 Organizational management

The most important reason of the problem why it is difficult to organize and manage practical teaching is that students have varying degrees of mastery of computer foundational knowledge. With the development of information technology there are considerable part of the traditional university basic computer education has to teach in primary and secondary schools. But there are still some primary and secondary schools in remote areas that do not have a good IT curriculum due to poor teachers' conditions. Some schools even do not have an IT course. This results in the uneven applicability of computer to newly-admitted college students, and poses a challenge to the organization and management of practical teaching of computer-based public courses. In the face of large gaps of different students' levels, most schools still adopt the traditional teaching mode according to the professional organization of computer teaching [2]. Thus some students with better foundation feel that computer-based practical courses are too simple and boring because of repetition of teaching contents and thus lose interest in computer courses. The other part of the students with poor foundations cannot grasp the basic operation of learning because of teaching progress is too fast. In addition, because of the large number of class students, mostly computer courses adopt the teaching method of large class to carry on the teaching. Teachers cannot cope with different situations of students and cannot devote much time to effective management of students. Due to the above reasons, some students play games and internet chatting in the class, learning enthusiasm of computer knowledge is not high.

2.3 Task settings

Reasonable task sets are the key factor to guarantee the teaching quality of the public practice of computer. However, many teachers have problems in the task setting of practical teaching of computer public courses. Of course, this is caused by many reasons. On the one hand, uneven levels of students bring some difficulties to the teaching management. On the other hand, the quality of students continues to decline. Especially if the teacher can do the deep mining of teaching content, the students cannot complete the task of teaching in a short period of time. Therefore, the current practice teaching is only based on the textbook, in order to complete the examples on the textbook. Mission settings did not reflect the project teaching and mission-driven objectives. Although there are tasks, but the maneuverability of the task is not strong with little effect on the improvement of student skills [3].

2.4 Evaluation methods

There are still a lot of schools who adopt the tradition evaluations methods for computer common class. Most students score according to the theoretical test score. Student achievement only accounts for a small proportion. This way curbs the students' interest in the practice of computerized public class. This way is not good for students Computer skills training and obviously not in line with the teaching purpose of the course "Computer Culture Foundation. In view of the shortcomings of the current assessment methods of computer public courses, many schools have adopted corresponding methods of improvement. Some schools adopt examination of a computer public class in the machine room. The method of evaluation is used to investigate the students' effect on the learning of computer public courses. To a certain extent, these evaluation methods reform written examination evaluation and contribute to the teaching of computer science. But there are also some drawbacks. For example, the purpose of student learning is only for exams. Partly better students lack a higher level of their own requirements [4] [5].

3. Solutions and countermeasures

3.1 Increase computer ability test for new students and organize teaching hierarchically

Computer Public Curriculum Teaching Steering Committee developed "University Computer Public Basic Course Outline". The main contents are covered by the teaching content including computer basics, operating system, office components, and computer network foundation, internet

application. Because freshmen have different degrees of computer knowledge, in order to better organize teaching and improve learning efficiency, it is recommended that a computer proficiency test is organized for freshmen. According to the students' grades, teaching is organized hierarchically. For the students with excellent grades, students can apply for exemption from computer basic courses. Students with good grades can enter basic courses of computer to improve their study in class. For students with poor computer foundation, schools can organize the teaching of basic computer courses according to the traditional teaching methods. At present, many universities carry out English proficiency tests for freshmen and adopt the graded teaching method to achieve the ideal teaching effect. Teaching of computer public courses can also learn from this approach [6]. The specific implementation mode can break the traditional teaching mode that uses classes and majors as teaching units. For different levels of students, you can take different teaching methods. If the teaching conditions permit, you can also separate the various public computers teaching modules for students to choose according to their own actual level.

3.2 Conform practical tasks and pay attention to the realization of teaching objectives

The basic computer education in colleges and universities should not just stay at the level of typing or computer software, but should allow students to focus on the practical documents necessary for future social work based on the operation and programming of commonly used office software Editing and writing, the production and calculation of forms, production of presentations. Therefore, based on the guidance of teachers, the experimental content of computer basic course should take the form of large-scale operations and training exercises for comprehensive training so that students give full play to their talents with the use of resources in life and internet to develop their own creative thinking in order to complete the future of social occupation necessary [7]. In addition, according to the students 'different situations, we can divide the students into different groups according to the different levels of students, the limited number of teachers and some students' practical goals. The students in the same group can help each other in practical courses in order to complete the practical task. In order to stimulate the learning motivation of different study groups, various forms of competitions can also be conducted. This kind of teaching methods can not only help teachers complete teaching tasks, improve the quality of practical teaching, but also can cultivate students' spirit of teamwork [8].

3.3 Build a comprehensive evaluation system to objectively evaluate students' practice ability

The evaluation of student achievement in practical teaching is also a difficult task. Different from the traditional evaluation methods, the teaching purpose of computer-based public courses is to apply. That is to say, the practical courses teach students to use computers and can use computers to serve themselves. If we want students to take the initiative to actively practice and operate the computer, we can make changes in the assessment methods. First, computer skills test can be organized as a result of the examination. Second, the teachers can guide students to engage in some design innovation, show outstanding works between students and share their learning achievements for the purpose of self-education and mutual learning. Third, the organization of skills competitions can encourage students to directly participate in a variety of vocational skills test in order to fully verify their skills. In the practical teaching of computer public courses, teachers should objectively and just look at the students' bright spots and shortcomings. The evaluation should be based on the actual mastery of new knowledge and skills as a standard. At the same time, special attention should be paid to encourage students to think creatively. Teachers should inspire students' excitement and sense of accomplishment so that every student can enjoy the joy of success [9] [10].

4. Conclusion

All in all, computer education is a future-oriented modernization education. Curriculum teaching should pay attention to practice whose purpose is to deepen the understanding of technical theory and develop students' practical ability constantly concerned on student computers operational capacity. Every student can win future work which need foundational information Technology and

have a real practical ability to adapt social development needs.

References

[1] Zhou Z. Integrated Education Model of Information Technology and Financial Accounting [J]. Eurasia Journal of Mathematics, Science and Technology Education, 2017, 13(10): 6767-6777.

[2] JIANG X I N. Research on Computer Courses Teaching Based on PBL [J]. DEStech Transactions on Social Science, Education and Human Science, 2017 (adess).

[3] Sun S, Su Z, Cui S. Study on the continuing education innovative talents training mode of civil engineering major[C]//IOP Conference Series: Earth and Environmental Science. IOP Publishing, 2017, 100(1): 012197.

[4] Li Y, Liu Y, Shu P. Teaching research and practice of blended leaning model based on computational thinking[C]//Frontiers in Education Conference (FIE), 2015 IEEE. IEEE, 2015: 1-8.

[5] ZHANG Y, Yan D. Based on MOOC+ SPOC Teaching Reform and Practice of Computer Basic Course in University [J]. Studies in Sociology of Science, 2016, 7(5): 31-35.

[6] Li F, Song T, Zhao S. A Research on the Fundamentality and Experimental Teaching Methods of the Course of "University Computer"[C]// International Conference on Computer Sciences and Applications. IEEE, 2014:428-430.

[7] Ouyang X, Xiao Y, Zhong J. Research on the Influencing Factors and the Promotion Measures of College Students' Information Literacy[C]//Information Technology in Medicine and Education (ITME), 2016 8th International Conference on. IEEE, 2016: 728-732.

[8] NIU L, ZHANG X. Research on task-driven in the application of "Fundamentals of Computers" [J]. Journal of Fuyang Teachers College (Natural Science), 2012, 1: 027.

[9] Haichun Z, Yanshu W, Minggan Y. Research on College Curriculum Teaching Reform Based on the Concept of" Flipped Classroom" in the Background of MOOC[J]. The Science Education Article Collects, 2015, 1: 014.

[10] Jiali X, Xia S. Discussion and application in the mode of the "Teaching-studying-practicing" in computer basic teaching[C]//Computer Science & Education (ICCSE), 2012 7th International Conference on. IEEE, 2012: 1780-1781.