Researches on Evaluation Mechanism of Graduate Students Based on the Tutor System

TANG Yongli, YU Jinxia
College of Computer Science and Technology, Henan Polytechnic University, Jiaozuo, Henan, P.R.China, 454003
yltang@hpu.edu.cn

Abstract: In the process of the cultivation of graduate students based on the tutor system, there need to be further studied on how to build the science and fair evaluation mechanism for ensuring and improving the cultivation quality of graduate students. On the basis of research on tutor system, the paper summarizes the evaluation principles of the development of point of view, vertical comparison of their own quality, comprehensive assessment, and establishes evaluation index system of AHP. Compared to traditional methods, the paper discusses characteristics of evaluation mechanism of graduate students of tutor system. The result shows that AHP-based evaluation mechanism of tutor system better reflects the overall quality of graduate students, both exercises capacity for innovation, and improves the training quality.

Keywords: Tutor system, Graduate students, Evaluation mechanism

1 Introduction

Graduate education is a main way to cultivate high-level innovative talents, and it is also the valuable resources for high-level university to take part in science and technology innovation. As a result, the ministry of education launched the creative plan for graduate education so as to enhance the creative ability and improve the cultivating quality of graduate students. With the rapid development of postgraduate education, it increasingly appeared to be inadequate for single tutor to cultivate a certain number of graduate students. However, postgraduate cultivating mode base on tutor system is to create synergies to strengthen the cultivation of graduate students so as to improve their cultivating quality and creative ability. Because the postgraduate cultivation is a complicate systematic project, it plays an important role for the evaluation mechanism of graduate students in quality modification of the graduate cultivation. In the process of the cultivation of graduate students based on the tutor system, there need to be further studied on how to build the science and fair evaluation mechanism for ensuring and improving the cultivation quality of graduate students.

2 Evaluation Principles of Graduate Students Based on the Tutor System

Though the graduate student has passed a variety of assessment before entering into the institution, they are also passed the periodic evaluation such as mid-term assessment so as to ensure the cultivating quality after school. They can enter the next phase to learn only through each stage of the forward evaluation. With such management and elimination mechanism, it plays a role of quality modification of the graduate cultivating. The periodic evaluation mainly includes the following four aspects: evaluation for academic record, evaluation for the political and ideological quality, evaluation for scientific research, and evaluation for comprehensive skills. In the cultivating process of graduate students, it is prerequisite work of mid-term assessment and graduation appraisal to implement science fair evaluation for the comprehensive quality. At the same time, it is also the basis work of measuring and improving the cultivating quality of graduate students. The traditional evaluation is mainly based on the achievements made by graduate students in the past such as grades, papers, and other work, etc. Hence, this traditional mode is only focused on the
discrimination function of the history, one-sided evaluation while ignoring the guidance and encouragement function of the evaluation. For this reason, it has the following evaluation principles for the evaluation mechanism of graduate students based on the tutor system.

(1) Evaluation with development point of view
The purpose of the evaluation is to inspire a graduate student to further develop. Even if a person has made great achievements, it cannot explain that he has reached the pinnacle of work or study. On the contrary, he need continue to progress and to develop. So is the evaluation of graduate students. It can find the existing problems and the gap, or get a sense of achievement by the evaluation of graduate students. As a result, graduate students are able to put more passion to the next step to learning and research. The evaluation of graduate students with the viewpoint of development, both indicates the shortcomings of graduate students, but also show the prospects for further development. For graduate students, they can realize that they are not useless, but can also be successful through the efforts.

(2) Evaluation focused on vertical comparison of individual own quality
It should pay attention on vertical comparison of the individual own quality rather than graduate students horizontal comparison for the evaluation of graduate students. Thus it can weaken the discrimination function and highlight the incentive function. For graduate student of good historical accumulation, it cannot only reflect his historical accumulation, but also the direction and goals for further development. In this way, graduate students can obtain the continued forward momentum from the evaluation. For graduate student of poor historical accumulation, it can discover the advantages of graduate student and timely encourage his progress and tell him the potential for further development. Thus, in the tutor’s encouragement, graduate students can build confidence and redouble their efforts to learn.

(3) Evaluation with comprehensive multi-angle view
With multiple perspectives to evaluate graduate students, they have to explore their potential to promote the progress of historical accumulation. In order to obtain incentive from the evaluation for each graduate, it cannot rely solely on a static view of historical accumulation to evaluate the graduate students. It does not mean that a graduate student is not promising if his historical accumulation is unpleasant. One can not deny the other aspects only because there are obstacles in a certain development period in one respect, but the evaluation should be implemented with a comprehensive multi-angle view. As long as there have been found to make progress in one respect for a graduate student, he should be promptly rewarded. This encouragement will not only make students do better in this respect, but also promote the development of other aspects.

3 Evaluation Indices of Graduate Students Based on the Tutor System
Based on the above principles and combined with the evaluation practice of graduate students, it can obtain the following index system.
The percentage system can be used when it assigns a certain value to each index. At the same time, it needs to provide the appropriate interpretation items to corresponding index score. Specific scores can be transformed by the following table 1, in which course score can be directly calculated into the corresponding value.

<table>
<thead>
<tr>
<th>Standard Values</th>
<th>outstanding</th>
<th>good</th>
<th>pass</th>
<th>fail</th>
</tr>
</thead>
<tbody>
<tr>
<td>Scores</td>
<td>90-100</td>
<td>80-89</td>
<td>60-79</td>
<td>&lt;60</td>
</tr>
</tbody>
</table>

For example, the index score values in scientific research capacity can be assigned in the table 2 as follows.

<table>
<thead>
<tr>
<th>Interpretation Items</th>
<th>Grade</th>
<th>Assigned Scores</th>
</tr>
</thead>
<tbody>
<tr>
<td>With the above of prefectural-level project, achievement, patent, award, or two papers published in the core journal, or a paper published in the authorities journal, or a research monograph</td>
<td>outstanding</td>
<td>90-100</td>
</tr>
<tr>
<td>With school-level project or reward, or a paper published in the core journal</td>
<td>good</td>
<td>80-89</td>
</tr>
<tr>
<td>with project or paper</td>
<td>pass</td>
<td>60-79</td>
</tr>
<tr>
<td>without project and paper</td>
<td>fail</td>
<td>&lt;60</td>
</tr>
</tbody>
</table>

Other items that are difficult to quantify the corresponding assignment values can be explained by the relevant personnel such as teachers and head teacher. That can be firstly established the different grade and then converted to the corresponding scores.
At last, the scores in specific index layer C of each student can be calculated into the evaluation value of overall quality in layer A according to the corresponding weight.

4 Evaluation Characteristics of Graduate Students Based on the Tutor System

The value of overall quality of a graduate student can be calculated by the evaluation mechanism of graduate students based on the tutor system at regular interval. Then the calculated value is compared with that value calculated at the last time, and the increased or reduced percentage is obtained which is as the basis for the evaluation of graduate students based on the tutor system. By contrast with the traditional evaluation mechanism, it has the following characteristics for the evaluation mechanism of graduate students based on the tutor system.

(1) Different focus cultivation with ability classification of graduate students
From the evaluation mechanism of graduate students based on the tutor system, it can be seen that the evaluation mechanism of graduate students based on the tutor system is more focused on the classification evaluation of different ability of graduate students on the basis of the traditional assessment about credit, course score and degree thesis. In the cultivating phase, graduate students can select different research direction according to their own interests and abilities which include theoretical research, engineering application, and project exchange etc. these research directions are respectively corresponding to paper writing, research ability, communication skills, etc. All achievements in different directions will be included in the final comprehensive evaluation system and be reflected using the quantitative approach in the final evaluation of overall quality of graduate students. Therefore, it can be shown in the evaluation mechanism no matter which side is paid attention on the individual development of graduate students. In this way, it let graduate students get favourable exercise and good development opportunities in their interest areas by this evaluation mechanism with comprehensive multi-angle view.

(2) Evaluation paying attention on the cultivation process of graduate students
Traditional evaluation of graduate students belongs to the stage assessment which is mainly to ensure the quality of graduate students in the different stages through the credits, papers, research achievement, etc. This evaluation pays attention to the total historical achievement of graduate students in the previous phase and one-side lays emphasis on its discrimination function. Hence, it ignores the guiding and incentive function so that it cannot grasp the growth process of graduate students. Moreover, because the interval between stages is often longer, it will not be able to discover problems during the cultivation process and cannot timely make a guide for graduate students.
It is more focusing on the investigation of the cultivating process of graduate students for the evaluation mechanism of graduate students based on the tutor system. During the school, every graduate student needs to submit the weekly report of their research, project or papers to their tutor. With these weekly reports, the tutor can lean the dynamic of graduate students per week and find the problem existed in their cultivation process so that graduate students can timely correct their deficiencies.

(3) Attaching importance to vertical comparison of individual own quality
There exists the difference between graduate students. Therefore, it is not suitable for the evaluation mechanism to adopt the “one size fits all” approach to appraise graduate students. For the evaluation mechanism of graduate students based on the tutor system, it takes care of the vertical comparison of their own quality rather than the horizontal comparison among graduate students. In addition for graduate students, it is concern about personal growth and learning ability and focused on evaluating the merits and strengths and reflecting the progress. For graduate students with good foundation, the evaluation using the viewpoint of development cannot only reflect his previous achievements, but also can indicate the progress of every stage in order to avoid the complacency emotions and to encourage
them continue to move forward. For graduate students with poor foundation, the evaluation using the viewpoint of development can discover their advantages and make graduate students aware of their progress in order to let them realize their potential for further development. In the way, graduate students under this evaluation mechanism can acquire the teacher’s encouragement and build confidence and redouble their efforts to learn.

5 Conclusion

On the basis of research on evaluation mechanism of graduate students of tutor system, the paper further studies to how to effectively evaluate the comprehensive quality of graduate students, which can play a mechanism of collective advantages, so that we can strengthen the training of graduate students and improve training to the quality and innovation of graduate students. The paper summarizes the evaluation principles of graduate students based on the tutor system. Then, combined with the practice of comprehensive quality assessment of graduate students, it gave the evaluation index for graduate students. Finally, it discusses the characteristics of the evaluation mechanism of graduate students based on the tutor systems.

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References

