Research on the Logical Path of Talent Calculating in China's High Level Vocational Colleges based on Grounded Theory

Yongning Li

Abstract: This paper takes the logical path based on grounded theory as the theoretical framework to study the logical path construction of talent cultivation in China's high-level vocational colleges. Through literature review and practical case analysis, this paper discusses the concept and characteristics of high-level vocational talent calculating and the application of Grounded theory in talent calculating. Research has found that the cultivation of high-level vocational talents requires attention to practical teaching and practical ability cultivation, advocating for students' subjectivity and self-directed learning, and building a diversified practical environment and resource support. Collaboration with enterprises and industries is one of the key factors, and evaluation and continuous improvement are also necessary links. Teacher calculating and development play an important role in talent cultivation. The main contribution of this study is to put forward the enlightenment of the logical path based on grounded theory on the cultivation of high-level vocational talents. These inspirations include emphasizing practical teaching, advocating for student autonomy and self-directed learning, building a diversified practical environment and resource support, strengthening cooperation with enterprises and industries, emphasizing evaluation and continuous improvement, and teacher calculating and development. These inspirations provide important guidance for improving the quality and adaptability of high-level vocational talent cultivation. In summary, the findings of this study provide useful inspiration and guidance for the cultivation of high-level vocational talents in China, and also provide reference and reference for the cultivation of vocational talents in other countries and regions. By continuously improving and optimizing the calculating mode, more high-quality talents can be trained to meet social needs, promoting the rapid development of vocational education.

Keywords: Talent Cultivating in High-level Vocational Colleges; Grounded Theory; Logical Path; Practical Teaching; Student Subjectivity.

1. Introduction

The cultivation of high-level higher vocational talents is one of the important directions of China's education reform and development. In order to implement the spirit of the National Education Conference and vigorously run vocational education in the new era, in January 2019, the State Council explicitly stated in the Implementation Programme for National Vocational Education Reform (hereinafter referred to as the "20 Articles on Vocational Education") that "by 2022, we will build 50 high-level higher vocational schools and 150 backbone majors (clusters)."[1] On March 29, the Ministry of Education and the Ministry of Finance issued the Opinions on the Implementation of the Plan for the Construction of High-Level Higher Vocational Schools and Specialties with Chinese Characteristics (hereinafter referred to as the "Double-High Plan"), which puts forward the proposals of strengthening the Party's construction, building a highland for cultivating technical and skilled talents, creating a platform for technical and skilled innovation and service, creating a high-level group of specialities, creating a high-level double-teacher team, improving school-enterprise cooperation and building a high-level professional team. Dual teacher team, improve the level of school-enterprise cooperation, improve the level of service development, improve the level of school governance, improve the level of informationization and other ten aspects of the "reform and development tasks".[2] On December 10, 2019, 56 high-level vocational school construction units were officially announced, including 10 in Class A, 20 in Class B, and 26 in Class C.[3] The first type of high-level school construction units (A-grade) of the "Double-High Plan" is the leader of national high-level institutions, with a total of 10, distributed in 8 provinces and cities, including Jiangsu, Zhejiang (2 each, Shandong, Guangdong, Beijing, Tianjin, Shaanxi, Henan (1 each). The second category of high-level school construction units (B grade) is also a typical representative of the development level of China's higher vocational education, mainly located in Guangdong, Yangtze River Delta, Beijing, Tianjin, Hebei and Shandong, Chongqing and other regions. The third category of high-level school construction units (C-grade) has a more balanced distribution across the country, with the vast majority of provinces having one C-grade higher vocational institution.[4]

The goal of high-level vocational education is to cultivate technical and skilled talents who can adapt to the needs of economic and social development, so as to provide strong support for promoting economic transformation and upgrading, and meeting the needs of industrial upgrading and human resources. However, at present, China's high-level vocational calculating still faces some challenges and problems, such as single calculating mode, disconnected teaching and practice, and poor calculating quality. Therefore, it is necessary to explore a scientific path and effective method suitable for the cultivation of high-level vocational talents in China. Under the background of the national reform and implementation program of vocational education, we take the construction of China's high-level vocational schools and professions as the research perspective, apply the grounded
theory, select the "double-high" construction programs of some vocational colleges and universities in the east, middle and west of the country as the research samples, and construct a theoretical model of the path of high-level vocational talent cultivation, so as to provide the basis for the construction of the nation's high-quality. It is of great practical significance to build high-quality vocational schools and professional clusters in China, to lead higher vocational education to serve the national strategy, to integrate with regional development, to promote industrial upgrading, and to build a strong education country and a strong talent country.

As a qualitative research method and analytical framework, grounded theory has important theoretical and practical value. The grounded theory, based on in-depth field research and theoretical construction, can help us understand the actual situation of China's high-level vocational talent calculating, and reveal the internal logic and key elements. The significance of this study is to introduce the grounded theory into the field of high-level vocational talent calculating in China, and explore the logical path based on the grounded theory to promote the quality and effect of high-level vocational talent calculating. Specifically, this study has the following significance:

Firstly, it helps to improve the adaptability and pertinence of high-level vocational talent cultivation. Through the application of grounded theory, we can deeply understand the needs and challenges of each link in the calculating of high-level vocational talents, so as to adjust the calculating program according to the actual situation and improve the pertinence and adaptability of talent calculating. Secondly, this study can provide theoretical guidance and practical experience for the cultivation of high-level vocational talents. Through field research and data analysis, the grounded theory can reveal practical problems and solutions in the calculating of high-level vocational talents, provide theoretical guidance and practical experience for high-level vocational colleges and relevant educational institutions, and promote the improvement of talent calculating quality. Thirdly, this study also has positive significance in promoting the development of higher vocational education in China. The cultivation of high-level vocational talents is an important component of higher vocational education, and its quality and effectiveness are directly related to the reputation and social recognition of higher vocational education. By studying the logical path based on Grounded theory, we can provide reference and enlightenment for the reform and development of China's higher vocational education, and promote its development towards a more scientific and higher quality direction.

2. Literature Review

2.1. Relevant Concepts and Principles of Grounded Theory

As a qualitative research method, the Grounded theory was proposed by American sociologists Strauss and Glaser in 1967.[5] It is mainly based on empirical data. Its research approach includes generating theories from data; Maintain sensitivity to theory; A method of continuous comparison; The method of theoretical sampling; Flexible use of literature and theoretical evaluation in six aspects. Category and coding process are the core of grounded theory, and three types of open coding, axial coding and selective coding have emerged.[6] The research method of the project utilizes computer-aided software MAXQDA for systematic qualitative text analysis.

Importance of context Grounded theory believes that phenomena can only be understood in a specific context. Therefore, researchers need to have a deep understanding of the social, cultural, and historical background of the research object in order to understand the significance and influencing factors of the phenomenon.

Interaction between theory and data Grounded theory advocates that theory and data are intertwined. Through continuous analysis and theoretical construction of field data, mutual feedback and adjustment are made to gradually form a theoretical explanation of the phenomenon. Theory is not predetermined from the beginning, but rather derived through data analysis and induction.

Immersion and comparison Grounded theory emphasizes researchers' immersive research, that is, long-term field observation and in-depth interviews to obtain rich data. At the same time, by comparing the commonalities and differences between different cases and situations, we can gain a deeper understanding of the inherent logic of phenomena.

Validation and reliability Grounded theory believes that the reliability and validation of research results need to be conducted through multiple channels. By cross validation through repeated observation and interviews, joint participation of multiple researchers, and careful consideration of the subjective impact of researchers, the reliability and credibility of research results are ensured.

Theoretical saturation Grounded theory puts forward an important principle, namely theoretical saturation. When researchers no longer discover new information during the process of analyzing data, they reach theoretical saturation, meaning that the theoretical explanation is sufficient and complete, and no additional data is needed. The related concepts and principles of grounded theory provide an important method and framework for in-depth understanding of social phenomenon. Through grounded theory, researchers can go deep into the field and close to reality, reveal the internal logic and key elements behind the phenomenon, and provide a profound understanding and explanation of social phenomenon (see Figure 1).[7]

Figure 1. Flow chart of data analysis based on grounded theory

2.2. Research Status of Grounded Theory in Professional Talent Calculating

In terms of undergraduate engineering education, Lu and others, with the help of grounded theory, took the 2016 annual reports of 40 "excellence plan" pilot schools as examples, and through in-depth analysis, constructed a theoretical model of the path of excellent engineering talents calculating, and proposed that the implementation path of "deep linkage between schools and enterprises under the protection of internal and external policies" must be adhered to in the calculating of outstanding engineering talents.[8] In terms of classroom teaching in higher vocational education, the qualitative research results of He and others on the effectiveness of classroom teaching in higher vocational education using the grounded theory show that the reasons for
the differences in teaching effects among teachers are teaching design, teachers’ experience, teaching reflection, teaching expectations, teachers' professional ability, teachers' empathy and other internal influencing factors of teachers, among which teachers' empathy is the factor with greater differentiation; Course types, leadership, and teaching supervision are also important external factors that lead to differences in teaching effectiveness. Students are more willing to participate in practical and practical courses, and attending classes will make teachers and students more engaged in classroom teaching.[9] In terms of Preschool teacher 'learning, Cai and Meng analyzed the influencing factors of preschool teacher' learning community based on grounded theory, focusing on six core categories: communication environment, institutional guarantee, personal quality, common vision, coworking, and flat structure. It is believed that preschool teacher, driven by individual factors (personality quality, autonomy, subject status), community social capital factors (common vision, coworking, flat structure) and kindergarten environment factors (system guarantee and communication environment), stimulate common vision, generate interpersonal interaction, and enter community learning.[10] In terms of new kindergarten teacher calculating, Feng Song, Zhang et al. adopted the grounded theory method, selected the typical practice cases of "Internet plus teacher calculating" as the research object, carried out three-level coding based on a large number of qualitative data such as text materials, constructed the "Internet plus" teacher calculating NEI model, refined four needs for teacher calculating, and seven key elements that affect calculating effectiveness The three components of the "Internet plus" environment that supports teacher calculating, discussed the relationship between the core genera and the characteristics and enlightenment of this model.[11] In college English teaching, Zhou and Wan explored how to design and use evaluation criteria for oral reports to promote teaching by taking Grounded theory as the basis of teaching design. In-depth research and docking with the industry, we can deeply understand the actual problems and seek solutions. In the cultivation of high-level vocational talents, the integration of theory and practice is essential. Combining Curriculum theory with practical operation, students' practical ability and innovation ability are cultivated through practical practice and project cases.

3. The Application of Grounded Theory in the Calculating of High-Level Vocational College Talents

3.1. Relationship Between the Logical Basis of Grounded Theory and the Cultivation of High Level Vocational Talents

As a qualitative research method and theoretical framework, grounded theory emphasizes to reveal the internal logic and key elements behind the phenomenon through in-depth field research. Its logical foundation is closely related to the talent cultivation of high-level vocational colleges in China. The following are the connections between its logical foundation and the cultivation of high-level vocational talents:

- **Understanding background and needs**: Grounded theory emphasizes the importance of context and requires researchers to have a deep understanding of the social, cultural, and historical background of the research object. For the cultivation of high-level vocational talents, it is necessary to understand the current socioeconomic development, industry demand, and labor market background in order to better grasp the direction and goals of talent cultivation.

- **Demand analysis and positioning**: Grounded theory encourages researchers to deeply understand the needs and problems of the research object, and conduct analysis and research from the perspective of demand. In the cultivation of high-level vocational talents, it is crucial to analyze and position the needs of the industry or professional field. Through in-depth research and docking with the industry, we can understand the structure and characteristics of talent needs, thereby providing accurate positioning and goals for talent cultivation.

- **Integration of theory and practice**: Grounded theory advocates that theory and practice are intertwined. Through the analysis of field data and theoretical construction, mutual feedback and adjustment are made to gradually form a theoretical explanation of the phenomenon. In the calculating of high-level vocational talents, the integration of theory and practice is essential. Combining Curriculum theory with practical operation, students' practical ability and innovation ability are cultivated through practical practice and project cases.

- **Industry university cooperation and the solution of practical problems**: Grounded theory emphasizes the interaction and cooperation between researchers and research objects. Through field observation and in-depth interviews, we can deeply understand the actual problems and seek solutions. In the cultivation of high-level vocational talents, close cooperation with the industry and the integration of industry and academia are important. Through cooperation with enterprises and industries, students can understand practical problems and needs, provide practical opportunities, and cultivate problem-solving abilities.

- **Verification and reliability of research results**: Grounded theory believes that the verification and reliability of research results need to be carried out through multiple channels, through repeated observation and cross validation of interviews, and the joint participation of multiple researchers, to ensure the reliability and reliability of research results. In high-level vocational talent cultivation, assessment and feedback on the effect of talent cultivation are necessary to ensure the quality and credibility of the effect of talent cultivation through multifaceted assessment tools and multi-party participation.

3.2. Practical Case Analysis of Grounded Theory in High Level Higher Vocational Talent Calculating

3.2.1. The Talent Calculating Model of W High Level Vocational Colleges

As one of the models of China's higher vocational education, W high-level higher vocational college adheres to the basic principles of Grounded theory, constantly explore and innovate, and are committed to cultivating high-quality
talents with professional skills, practical ability and innovative spirit. This paper will take the college as a case to explore the practical application of its talent calculating model, so as to show the specific application and effectiveness of Grounded theory in high-level vocational colleges.

Background and demand analysis The college is located in an economically developed region and faces rapidly changing social and industry development requirements of China. Based on this background, the college adheres to the principle of Grounded theory, and has a deep understanding of industry needs and students' professional development needs. Through research and close cooperation with industry enterprises, we have learned about the new requirements of technological progress and industry development for talents, including practical ability, innovative thinking, and team cooperation.

Integration of theory and practice The college applies the principle of Grounded theory to the design of talent calculating mode, combines Curriculum theory with practical operation, and focuses on the cultivation of students' practical ability and innovation ability. In professional courses, theoretical knowledge is combined with practical cases to guide students to apply the learned theories to practical problem-solving through project practice and internship calculating. Cultivate students' comprehensive qualities and ability to solve complex problems through interdisciplinary teaching models.

Industry university cooperation and practical problem-solving The university actively promotes cooperation with enterprises and industries, and establishes a talent cultivation model that combines industry university research. By collaborating with enterprises in projects, industrial base calculating, and other means, students are exposed to real work scenarios and faced with practical problems and challenges. Students participate in industry projects, collaborate closely with corporate professionals, solve practical problems, improve practical skills, and innovate thinking.

Verification and reliability of research results The college focuses on the verification and reliability of research results, and ensures the credibility of the quality and effectiveness of talent cultivation through various evaluation methods and participation methods. Regularly evaluate students, teachers, and enterprises to quantify and analyze the effectiveness of talent cultivation. The employment rate and quality of students after graduation have become important indicators for measuring the achievements of talent cultivation, and comprehensive evaluation of students' comprehensive qualities and abilities is also conducted.

3.2.2. Practice of Cultivating High Level Vocational Talents in the J Industry

As a qualitative research method and theoretical framework, Grounded theory is applicable to talent cultivation practice in different fields. This paper will take a certain industry as a case to explore the practical application of grounded theory in the cultivation of high-level vocational talents in this industry, so as to show its specific contributions and achievements to this industry.

Industry background and demand analysis This industry is an electromechanical industry with important economic status and influence nationwide. The industry is facing rapidly changing market demands and challenges of technological innovation. Based on this background, the industry has a more urgent demand for high-level vocational talents, requiring them to possess professional knowledge, skills, and practical abilities in the industry. The application of Grounded theory can help the industry understand the internal logic and key elements of talent cultivation, and provide targeted solutions for talent cultivation.

The importance of context The industry emphasizes a deep understanding of industry context in talent development. By collaborating with industry associations and enterprises, understand industry development trends, technological innovation, and market demand. This information provides important references for the goal positioning and curriculum design of high-level vocational talent cultivation.

Integration of theory and practice In the process of talent cultivation, the industry organically combines theoretical knowledge with practical operations. While learning theoretical knowledge, students participate in industry projects and practical internships, collaborate with enterprises to solve practical problems, improve practical skills and innovative thinking. Practical courses and project cases have become important components of student development, enabling them to better adapt to industry requirements.

Industry university cooperation and practical problem-solving The industry actively promotes industry university cooperation with enterprises, and closely cooperates with enterprises through industry projects, calculating bases, and other means. Students participate in practical projects, collaborate with enterprise professionals to solve practical problems, and cultivate high-quality talents that match industry needs. Through cooperation with enterprises, students can better understand the operational mechanisms of the industry, enhance professional skills and practical abilities.

Verification and reliability of research results The industry attaches great importance to the verification and reliability of research results, and through regular evaluation and research, understands the actual effectiveness of talent cultivation. Through cooperation with industry enterprises, regular comprehensive evaluations are conducted on students, including professional knowledge, practical ability, and innovation ability. These evaluation results are of great significance for optimizing talent cultivation plans and improving teaching methods.

4. Analysis of the Logical Path of Talent Calculating in China's High Level Vocational Colleges based on Grounded Theory

4.1. The Logical Elements of Talent Cultivation in High Level Vocational Colleges

As one of the important issues in current education reform, talent cultivation in high-level vocational colleges in China needs to be effectively implemented based on scientific theories and practical models. As a qualitative research method and theoretical framework, Grounded theory provides the guidance of logical elements for talent cultivation in high-level vocational colleges. Based on the Grounded theory, this paper will explore the logical elements of talent cultivation in China's high-level vocational colleges.

Understanding the context, The first logical element of talent cultivation in high-level vocational colleges is a deep understanding of the current social, economic, and industry background. Understanding national development strategies, socioeconomic needs, and industry development trends can
help clarify the direction and goals of talent cultivation. Through cooperation and research with the industry, understanding the needs and changes of the industry can better provide students with calculating programs that meet their actual needs.

**Analysis of student needs**
The second logical element of talent cultivation in high-level vocational colleges is the analysis of student needs. By deeply understanding students' backgrounds, interests, and career plans, we can understand their learning needs and development goals. In addition, it is also necessary to pay attention to students' practical abilities, innovative thinking, and team cooperation needs to meet the personalized development requirements of students.

**The integration of teaching and practice**
The third logical element of talent cultivation in high-level vocational colleges is the organic integration of teaching and practice. Classroom teaching should be combined with practical operations, emphasizing the practical application of theoretical knowledge. Provide calculating for students' practical and innovative abilities through project practice, internship calculating, and industry university cooperation. Cultivate students' comprehensive qualities and ability to solve practical problems, enabling them to adapt to complex and ever-changing professional environments.

**The promotion of industry university research cooperation**
The fourth logical element of talent cultivation in high-level vocational colleges is to promote industry university research cooperation. Cooperation with enterprises and industries is one of the important ways to cultivate high-quality talents. Through cooperation projects with enterprises and industrial base calculating, students are provided with practical opportunities to better understand the industry operation mechanism, master practical skills, and work closely with enterprise professionals to solve practical problems.

**Feedback and improvement of research results**
The last logical element of talent cultivation in high-level vocational colleges is to continuously optimize the calculating mode through feedback and improvement of research results. Understand the effectiveness and shortcomings of talent cultivation through regular evaluations and feedback from students and teachers. On this basis, adjust and improve teaching methods and course content to continuously improve the quality and effectiveness of talent cultivation.

### 4.2. Logical Path Construction of Talent Cultivation in High Level Vocational Colleges based on Grounded Theory

Logical path construction of talent cultivation in high level vocational colleges in China based on grounded theory should include four phases (see Figure 2).

**4.2.1. Phase 1: Requirements Analysis and Positioning**
The cultivation of high-level vocational talents is one of the important fields of China's education reform. In order to meet the demand for high-quality talents in social and economic development and industry needs, scientific demand analysis and positioning are needed. Based on the Grounded theory, this paper will discuss the demand analysis and positioning of the construction of the logical path of high-level vocational talent calculating, so as to achieve the accuracy and effectiveness of talent calculating.

**Analysis of social and economic background**
The demand analysis and positioning of high-level vocational talent cultivation first require in-depth analysis of the current social and economic background. Understand the development trends of national development strategy, industrial structure adjustment, and technological innovation, and grasp the structure and characteristics of talent demand. Through cooperation with relevant stakeholders such as government departments, industry associations, and enterprises, information on the development needs and talent gaps of the industry is obtained, providing scientific basis for the cultivation of high-level vocational talents.

**Identification of industry needs**
The analysis and positioning of the needs for cultivating high-level vocational talents requires a deep understanding of the industry's needs. Through cooperation and in-depth research with industry enterprises, analyze the characteristics of the industry in terms of technological innovation, industrial upgrading, market demand, and other aspects. Identify the industry's needs for talent's professional knowledge, skills, practical ability, innovation ability, and other aspects, understand the future development trend of the industry, and provide accurate basis for the positioning of high-level vocational talent cultivation.

**Research and analysis of student needs**
The analysis and positioning of the needs for cultivating high-level vocational talents still need to pay attention to the needs and characteristics of students. Understand students' backgrounds, interests, career plans, and development goals through questionnaire surveys, in-depth interviews, and student group discussions. Explore students' needs for professional knowledge, practical abilities, innovative thinking, teamwork, and other aspects to meet their personalized development and growth needs.

**Clarification and positioning of talent cultivation goals**
Based on demand analysis, determine the goals and positioning of high-level vocational talent cultivation. Clarify the direction and goals of talent cultivation based on socioeconomic needs, industry characteristics, and student needs. Determine the focus of talent cultivation in terms of professional fields, professional knowledge, skill requirements, practical ability, innovation ability, etc. At the same time, based on the levels and stages of talent cultivation, formulate different levels of talent cultivation goals to provide clear direction and guidance for high-level vocational talent cultivation.

**Construction of talent cultivation path**
Based on demand analysis and positioning, construct a logical path for high-level vocational talent cultivation. Design a curriculum system, practical links, and innovation platform based on the characteristics of the discipline, practical requirements, and industry needs to ensure the comprehensiveness and effectiveness of talent cultivation. Provide calculating for students' practical and innovative abilities through project practice, internship calculating, industry university research
cooperation, and other means. At the same time, emphasis should be placed on interdisciplinary teaching models and the cultivation of comprehensive qualities to adapt to the diversified development of the industry.

*Continuous evaluation and feedback mechanism* The process of requirement analysis and positioning requires the establishment of a continuous evaluation and feedback mechanism. Understand the effectiveness and shortcomings of talent cultivation through regular evaluations and feedback from students and teachers. On this basis, adjust and improve teaching methods and course content, continuously optimize talent cultivation paths, and ensure that the trained talents can meet the needs of society and the industry.

4.2.2. Phase 2: Calculating Objectives and Program Design

The calculating objectives and program design of high-level vocational personnel calculating is the core content of the logical path construction based on Grounded theory. By clarifying calculating objectives and formulating corresponding calculating plans, it is possible to ensure the pertinence, effectiveness, and effectiveness of talent cultivation. Based on the grounded theory, this paper will discuss the importance and methods of calculating objectives and program design of high-level vocational personnel calculating.

*Setting of calculating objectives* Based on the grounded theory, the primary task of cultivating high-level vocational talents is to clarify the calculating objectives. The calculating objectives should comprehensively consider the needs of the industry, students, and society. Industry needs include professional knowledge, skill requirements, as well as comprehensive qualities such as innovation ability and teamwork. Students need to consider their interests, career plans, and development goals. Social needs consider the requirements of market employment and social development. Clear calculating objectives are the foundation for formulating calculating plans.

*Curriculum and teaching method design* Based on the calculating objectives, the next step in cultivating high-level vocational talents is to design curriculum and teaching methods. The curriculum should meet the needs of the industry and students, covering the cultivation of professional knowledge, practical skills, and comprehensive qualities. The curriculum should be based on the characteristics of the subject and practical needs, including basic courses, professional courses, and practical internship links. The design of teaching methods should adopt diversified teaching methods, including case analysis, project practice, experimental teaching, etc., to promote students' practical ability and innovative thinking.

*Practice teaching and combination of production, learning and research* Based on the Grounded theory, the cultivation of high-level vocational talents emphasizes the combination of practice teaching and production, learning and research. Practical teaching is an important link in cultivating students' practical and innovative abilities. Through internships, industry projects, and industrial base practices, students can apply their knowledge to practical problem-solving. Collaboration with enterprises and industries is an important support for practical teaching. Through collaborative projects with enterprises, joint research between industry, academia, and research, students are provided with practical opportunities to solve practical problems.

*Calculating environment and resource support* The success of cultivating high-level vocational talents cannot be achieved without a good calculating environment and resource support. The calculating environment includes the construction and management of facilities such as laboratories, calculating bases, and innovation and entrepreneurship centers. Resource support includes the construction and cultivation of teacher teams, the allocation and management of teaching resources, and the integration of enterprise cooperation resources. By providing high-quality calculating environment and resource support, we aim to provide students with better learning and practical conditions, and promote their comprehensive development.

4.2.3. Phase 3: Integration of Teaching and Practice

The success of cultivating high-level vocational talents largely depends on the effective integration of teaching and practice. The Grounded theory provides a theoretical framework, which helps to guide the organic combination of teaching and practice in the cultivation of high-level vocational talents. Based on the Grounded theory, this paper will explore the integration of teaching and practice in the construction of the logical path of high-level vocational talent calculating.

*Combination of theory and practice* In the cultivation of high-level vocational talents, theoretical knowledge and practice should be combined and complement each other. The teaching process should combine the teaching of theoretical knowledge with practical operations, so that students can apply the theoretical knowledge they have learned to solve practical problems. Teachers can guide students to apply theoretical knowledge to solve practical problems through case analysis, problem-oriented learning, and discussion, and cultivate students' practical operation and practical abilities through practical links.

*Setting of practical courses* In the cultivation of high-level vocational talents, the setting of practical courses is crucial. Practical courses should be tailored to the actual needs of the industry, with practical projects and tasks set up to enable students to carry out practical operations in real situations. These practical courses can include practical calculating courses, internship practices, industry projects, etc. Through contact and operation with actual situations, students' practical abilities and problem-solving abilities are cultivated.

*Promoting the integration of industry and education* The integration of teaching and practice can be achieved through the integration of industry and education. In the cultivation of high-level vocational talents, cooperation with enterprises and industries is crucial. Through collaborative projects with enterprises and industrial base practices, students can be exposed to the actual work environment, participate in actual projects, and collaborate with enterprise professionals. This cooperative relationship can provide students with practical opportunities, enabling them to better understand the industry's operational mechanisms, improve practical skills,
and innovative thinking.

Evaluation and feedback of practical achievements The integration of teaching and practical links also requires the establishment of effective evaluation and feedback mechanisms. By evaluating students' performance in practical activities, including project results, internship reports, and practical abilities, it is possible to promptly understand students' practical level and development situation. At the same time, teachers evaluate and provide feedback on students' practical achievements, provide guidance and suggestions, and help students improve their practical and problem-solving abilities.

Transformation of the role of teachers The integration of teaching and practice also requires the transformation of the role of teachers. Teachers are no longer just imparters of knowledge, but should also serve as guides for students' learning and practical guidance. Teachers should guide students to actively participate in practice, cultivate their practical abilities and innovative thinking. At the same time, teachers can also stimulate students' learning interest and practical motivation through practical cases, experience sharing, and other methods.

4.2.4. Phase 4: Establishment of Evaluation and Feedback Mechanism

Evaluation and feedback are important links in the cultivation of high-level vocational talents, which can help understand the implementation effect and problems of the calculating plan, and make timely adjustments and improvements. Based on the Grounded theory, the establishment of an effective evaluation and feedback mechanism can improve the quality and effect of calculating, and ensure the pertinence and effectiveness of talent calculating. Based on the Grounded theory, this paper will discuss the establishment of evaluation and feedback mechanism in the construction of the logical path of high-level vocational talent calculating.

Setting evaluation indicators, The establishment of evaluation and feedback mechanisms first requires clear evaluation indicators. The evaluation indicators should comprehensively consider the requirements of calculating objectives, curriculum design, practical links, and students' comprehensive qualities. Evaluation indicators can include multiple dimensions such as academic performance, practical achievements, practical ability, innovation ability, and teamwork ability, comprehensively evaluating the effectiveness of students' cultivation.

Multilevel evaluation method Based on the Grounded theory, the evaluation and feedback mechanism of high-level vocational personnel calculating should adopt multi-level evaluation methods. It can include multiple levels of evaluation methods such as classroom assessment, practical assessment, and comprehensive assessment. Classroom assessment can assess students' mastery of theoretical knowledge through exams, assignments, and classroom performance. Practical evaluation can evaluate students' practical abilities through internship reports, project achievements, and practical ability assessments. Comprehensive evaluation can comprehensively consider academic performance, practical achievements, and students' overall quality, and evaluate the overall development of students.

Timely feedback and guidance The evaluation and feedback mechanism should focus on timely feedback and guidance. Provide timely evaluation results and feedback to students, help them understand their strengths and weaknesses, and provide corresponding improvement suggestions. Teachers can communicate with students individually through interviews, comments, and suggestions to help them clarify their development direction and formulate learning plans. At the same time, teachers can also provide learning resources and guidance materials to guide students in self-directed learning and self-improvement.

Student participation and self-evaluation The evaluation and feedback mechanism should also encourage student participation and self-evaluation. Students can participate in the evaluation process and provide their own feedback and suggestions through questionnaire surveys, group discussions, and other means. At the same time, encourage students to conduct self-assessment and have them comprehensively evaluate their learning and development. This kind of student participation and self-evaluation can enhance students' initiative and sense of responsibility, promote their self-development and improvement.

Continuous improvement and adjustment The establishment of evaluation and feedback mechanisms still requires continuous improvement and adjustment. Through regular analysis of evaluation results and collection of feedback, timely identification of problems and improvement opportunities. Teachers and managers should communicate and exchange ideas with students, enterprises, and industries, understand their needs and suggestions, and adjust and improve calculating plans in a timely manner. Continuous improvement and adjustment are important links in the evaluation and feedback mechanism, which can continuously improve the quality and effectiveness of talent cultivation.

5. Argumentation and Discussion

5.1. Effect and Influencing Factors of Grounded Theory in High-Level Vocational Talent Calculating

The Grounded theory provides a theoretical framework for the cultivation of high-level vocational talents, emphasizing the combination of practice and theory to cultivate students' practical ability and innovative thinking. This paper will discuss the effect and influencing factors of Grounded theory in the calculating of high-level vocational talents, aiming to improve the quality and effectiveness of calculating.

5.1.1. The Effect of Grounded Theory in the Calculating of High-Level Vocational Talents

Improvement of practical ability Grounded theory emphasizes the combination of practice and theory, so that students can apply the theoretical knowledge they have learned to solve practical problems. Through the design of practical links and participation in practical projects, students can exercise their practical abilities, improve their problem-solving and innovation abilities.

Cultivation of innovative thinking Grounded theory encourages students to find problems from practice, and cultivate students' innovative thinking through reflection and summary. Students face various challenges and difficulties in practice, and through analysis and thinking, can cultivate problem-solving abilities and innovative awareness.

Cultivation of professional quality Grounded theory emphasizes the importance of practical teaching and industrial cooperation, which can cultivate students' professional quality. Students learn about industry operation
mechanisms through collaborative projects and internship practices with enterprises, and cultivate professional qualities such as teamwork, communication, and coordination. 

Promotion of employment competitiveness Grounded theory focuses on the cultivation of students' practical ability and innovation ability, which can improve students' employment competitiveness. Employers are more inclined to recruit high-level vocational talents with practical experience and innovative ability. Students trained by Grounded theory have these advantages and can better meet the needs of career development.

5.2. Factors Influencing Grounded Theory in the Cultivation of High-Level Vocational Talents

Teacher role and teaching philosophy Teachers play an important guiding and promoting role in the cultivation of high-level vocational talents. Teachers should have Grounded theory ideas and methods, and be able to give full play to the role of guiding students to practice and innovate. At the same time, teachers' teaching philosophy and practice style will also affect students' acceptance and application of Grounded theory.

Teaching environment and resource support The cultivation of high-level vocational talents requires the provision of a good teaching environment and resource support. The construction and management of practical teaching facilities, industry university research cooperation platforms, practical projects, etc. can provide students with opportunities and resource support for practice, and promote the application of Grounded theory in practice.

Students' own characteristics and learning attitudes Students' own characteristics and learning attitude have an important impact on the application of Grounded theory. Students need to have a proactive learning attitude and be willing to participate in practice and innovation. At the same time, students' basic knowledge and practical experience will also affect the application effect of Grounded theory.

Industrial cooperation and social support The cultivation of high-level vocational talents requires close cooperation with enterprises and industries. Collaboration projects with enterprises, industrial base practices, and other methods can provide students with opportunities to interact and participate in the actual work environment. At the same time, social support and recognition can also promote the application of Grounded theory.

In short, the Grounded theory has significant effect and influence in the calculating of high-level vocational talents. By improving students' practical ability, cultivating innovative thinking, cultivating professional quality and improving employment competitiveness, Grounded theory can effectively promote the quality and effectiveness of high-level vocational talent calculating. Factors such as teacher roles and teaching concepts, teaching environment and resource support, students' own characteristics and learning attitudes, as well as industrial cooperation and social support will all affect the application of Grounded theory in the calculating of high-level vocational talents. In order to better achieve the goal of cultivating high-level vocational talents, it is necessary to pay attention to the comprehensive consideration and coordination of these factors, and continuously improve and enhance the calculating mode and strategy.

5.3. The Enlightenment of the Logical Path based on Grounded Theory on the Cultivation of High-Level Vocational Talents in China

The cultivation of high-level vocational talents in China is facing challenges of rapid development and improved adaptability. The logic path based on Grounded theory provides a theoretical framework for the cultivation of high-level vocational talents, emphasizing the combination of practice and theory, the construction of students' subjectivity and practice environment. This paper will explore the enlightenment of the logic path based on Grounded theory on the cultivation of high-level vocational talents in China, aiming to improve the quality and adaptability of calculating.

Emphasizing on practical teaching and cultivation of practical ability The logic path based on Grounded theory emphasizes the combination of practice and theory, requiring students to master and apply the knowledge they have learned in practice. This inspires us to pay attention to the design and implementation of practical teaching in the cultivation of high-level vocational talents, providing students with more practical opportunities and environment. Cultivate students' practical and innovative abilities through internships, industry projects, and industrial base practices, so that they can better adapt to the needs of career development.

Advocating students' subjectivity and autonomous learning: the logical path based on Grounded theory emphasizes students' subjectivity and autonomous learning, and encourages students to actively explore and find problems in practice. This inspires us to cultivate students' self-directed learning and problem-solving abilities, making them proactive and creative in learning and practice. Teachers should play the role of guides and facilitators, stimulating students' interest and motivation in learning, guiding them to learn and explore independently, thereby improving students' learning effectiveness and ability development.

Building a diversified practice environment and resource support the logical path based on Grounded theory requires building a diversified practice environment and resource support to provide students with rich learning and practice conditions. This inspires us to pay attention to the construction of practical teaching facilities and calculating bases, and provide advanced practical equipment and tools. At the same time, cooperation with enterprises and industries is an important support. Collaborative projects with enterprises, joint research between industry, academia, and research can provide students with practical opportunities and resource support, helping them better understand industry development trends and market demands.

Focusing on evaluation and continuous improvement the logical path based on Grounded theory requires that emphasis be placed on evaluation and continuous improvement to ensure the quality and effect of talent calculating. This inspires us to establish an effective evaluation and feedback mechanism, timely understand the implementation effectiveness and problems of the calculating plan, and adjust and improve the calculating plan in a timely manner. Evaluation can include assessments of students' learning outcomes, teachers' teaching quality, industry employment rates, and employment quality. Continuous improvement is an important means to maintain the adaptability and innovation of talent cultivation.

Strengthening the construction of teaching staff and
teacher calculating the logical path based on Grounded theory requires teachers to have corresponding theoretical knowledge and teaching methods, and can guide students to practice and innovate. This inspires us to strengthen the construction of high-level vocational teaching staff and teacher calculating, and improve teachers’ disciplinary and teaching abilities. Through calculating, research and exchange, teachers can improve their teaching level and educational philosophy, so that they can better apply the ideas and methods of Grounded theory.

6. Conclusion

Based on the logic path of Grounded theory, this study discusses the related issues of China’s high-level vocational talent calculating. Through comprehensive analysis of relevant literature and study of practical cases, the following main findings are obtained:

6.1. The Logical Path of Grounded Theory has Important Value in the Cultivation of High-Level Vocational Talents

Grounded theory focuses on the combination of practice and theory, which can improve students' practical ability and innovative thinking, and cultivate high-quality talents with professional quality and employment competitiveness.

6.2. The Cultivation of High-Level Vocational Talents Requires Emphasis on Practical Teaching and the Cultivation of Practical Abilities.

Through the design of practical links and participation in practical projects, students can exercise their practical abilities, improve their problem-solving and innovation abilities. The full utilization of practical teaching facilities and resources can provide students with opportunities and support for practical teaching.

6.3. Student Subjectivity and Autonomous Learning are Important Characteristics of Cultivating High-Level Vocational Talents

Encourage students to actively explore and discover problems in practice, cultivate self-directed learning and problem-solving abilities, and make them active learners and creators of learning.

6.4. Cooperation with Enterprises and Industries is a Key Factor in Cultivating High-Level Vocational Talents

Through collaborative projects with enterprises, joint research between industry, academia, and research, students can understand the operational mechanisms of the industry, improve their teamwork and communication coordination abilities, and enhance their employment competitiveness.

6.5. Evaluation and Continuous Improvement are Necessary Links in the Cultivation of High-Level Vocational Talents

Establish an effective evaluation and feedback mechanism, timely understand the implementation effectiveness and issues of the calculating plan, and make adjustments and improvements. Meanwhile, continuous improvement and adjustment can maintain the adaptability and innovation of talent cultivation.

Acknowledgments

This work was supported by a grant from General Research Project of Zhejiang Provincial Education Department of China “Research on the Logical Path of Cultivating High level Higher Vocational Talents in China Based on Grounded Theory” (Item No: Y201942926).

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