

Analysis of the Learning Mechanism of Science & Technology-Driving Nationwide Enterprise-Starting*

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Abstract This paper reveals the necessity of the learning ability of Science & Technology-driving nationwide enterprise-starting. Through the discussion about the study mechanisms of imitation, timeliness-situated and innovation, it provides methods and foundations for numerous scientific entrepreneurs and has some guidance to promote the development of nationwide S&T-driving entrepreneurship. Play a helpful role in cultivating university students this ability and the current Science & Technology-driving enterprise-starting.

Key words Science; Technology; Nationwide enterprise-starting; Learning mechanism

1 Introduction

Today's society, the pace of nationwide entrepreneurship is speeding up. Under the economic crisis and the employment pressure by economic crisis, more and more people choose to start their own business instead of passive employment. Among the present huge business team, there exists some special business groups, such as scientific researchers, the technical personnel, college graduates, etc. They rely on their systematic professional knowledge, exploring a unique scientific career path. This path is headed by scientific-power, and the goal is to make maximum fortunes with minimum resource. At the same time it is a balanced economic and ecological benefits of sustainable development. S&T-driving enterprise-starting produce High value-added products, therefore, the entrepreneurs in science and technology increased year by year, which make this study about mechanism of learning ability very essential. The following will discuss about it.

Science&Technology-driving enterprise-starting develops rapidly along with the market economy. The deeper research is undertaking on the ability of Science & Technology enterprise-starting. Relevant research focused on: The training of S&T-driving enterprise-starting ability. Hao Fengxia put forward that technical cognitive dimension, the dimension of social organizational system and economic dimension promote or block the ability to nurture S&T-driving enterprise-starting. Han Xiaoxia, Zhao Min Raise the effective ways of improving the ability of university students' innovative undertaking. Mai Yiyuan, Gan Zhilong reveal the factor of entrepreneur environment exerts differentiated influence on entrepreneurial opportunities, entrepreneurial skills as well as entrepreneurial intentions in typical area of china. Liu Guoxin, Tang Zhenpeng, Luo Xianfeng and Tang Bo build the evaluation index system of regional innovation and entrepreneurship abilities, and put forward 3 comprehensive evaluation methods of the regional innovation and entrepreneurship abilities.

Thus, the relevant researches on the ability of S&T-driving enterprise-starting are becoming more and more important. Most of the researches focus on the problem, such as influence factors, the assessment standards of the ability of entrepreneurship and the university students' innovative undertaking. Yet lack of the analysis about the learning mechanism of Science &Technology-driving nationwide enterprise-starting.

2 The Imitation Learning of S&T-Driving Nationwide Enterprise-Starting

Besides some connate strength, the ability of the human is more or less from imitation. Psychologists think: "the imitation is the foundations of the development of the society". Imitation can be divided into conscious and unconscious imitations. Some people who have eager for success, may be conscious or unconscious to imitate some famous successful personage, reference their successful experience which can be used for themselves. This process is called imitation. Nationwide technology-driving entrepreneurship can also be made by imitation. For the one who put foot in a field for the first time, imitate "elder" experience is an important way to success.

Entrepreneurial imitation is a process that depicts first and then imitates. Firstly, entrepreneurs

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should depict the “frame model” of S&T-driving enterprise-starting, which including the contents and methods of entrepreneurship, structure, features and difficulties, etc. Depicting is the basic stage of entrepreneurial imitation, so how to plan it appears very important. Like the building, the contents of entrepreneurship are like bricks, clearly; the mode is like the building exterior, selectively; the structure is like the construction of a building, solidly; the features are like the designs of building, various; the difficulties are like barriers which can be overcome. Only when your project contains all the elements of the above, can we build the ideal technology "building". Once deciding the activities and field, entrepreneurs can make a reference to previous successful experience. This experience, in a sense, can be guidelines to guide the success.

Secondly, on the basis of above, entrepreneurs can enter the next step: imitation. There are 3 different imitate method: (1) Selectively imitation, entrepreneurs can't copy experience completely, but can accept the good and reject the bad, based on their own characteristics. Just like a Chinese saying: choose the right one not the expensive one. (2) The variety of imitation, entrepreneurs may not confine to one pattern or some methods but to collect all kinds of advice, domestic and overseas. (3) Targeted imitation, experience imitation must has a clear aim not blind.

Mimetic learning process is just like oxygen molecules go into “entrepreneurship vessels”. Only the most reasonable “technology entrepreneurship oxygen”, can enter “the outermost layer of vessels”: depiction layer. Through 3 selection to reach the core part: imitation layer. Because of this vessel is infinite, so the mimetic learning process is an infinite and outspread process. As the Figure 1 shown, different arrows represent different experiences:

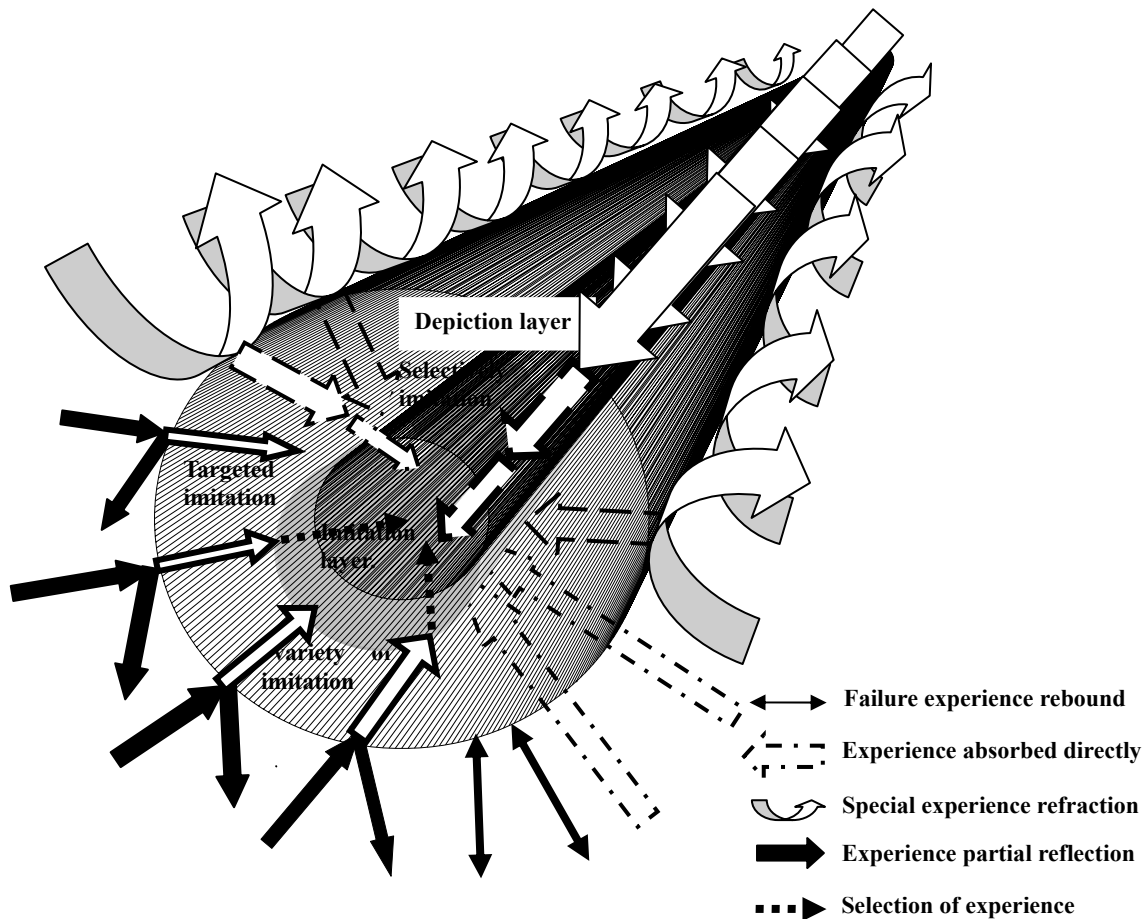


Figure 1 Imitation Learning Mechanism of S&T-Driving Nationwide Enterprise-Starting

3 Science and Technology of National Venture Time Learning Mechanism

What the timeliness-situated means is that you should make your strategy depending on both the time and the by-then situation. Science and technology of national ability of learning needs for different, because of potential. For example, before the opening up policy, individual entrepreneurship is very rare

until nation's working schedules turn to focus on the development of economy, after Third Plenary Session of the 11th Central Committee of the CPC, more and more people choose to start their own business. With the social development, entrepreneurial activity show different characteristics, so the ability to learn should based on the pace of the economy.

In recent years, the strengthening of the competition is the competition of the essence of comprehensive national strength. Countries pay more and more attention to economy, so the development of science and technology, the scientific concept of development, "rejuvenating the strategy of "power" talents, technology driven model for national venture offers guidance. As a new entrepreneur in the period of science and technology, we must know the changes of time, understand the national policy, analyze both the international and domestic markets, create jobs by entrepreneurship, thus promoting economic development. According to this, the learning ability of S&T-driving nationwide enterprise-starting, which is a recycling process, must be forward-looking and timeliness-situated, and must be depending on the social background, market factors, as well as the policy changes. Science and technology of national venture time learning diagram as Figure2 shows:

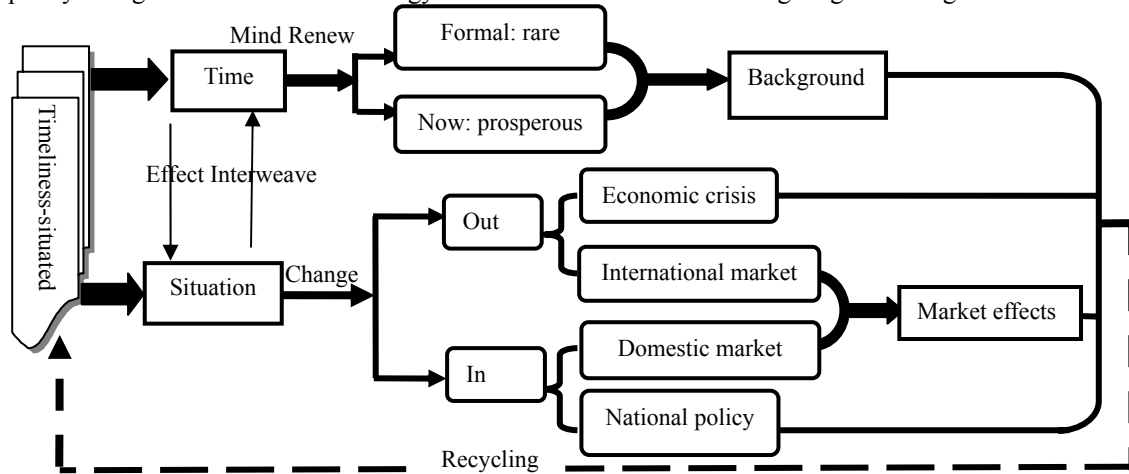


Figure 2 Timeliness-Situated Learning Mechanism of S&T-Driving Nationwide Enterprise-Starting

4 Create Learning Mechanism of S&T-driving Nationwide Enterprise-starting

CREATE is an innovative learning mechanism, consisting of six factors:

4.1 Copy: creative copy

Technology -driving entrepreneurship is so difficult than normal, that we need experience to guide us. But if simply copy the previous experience, its innovative cannot be reflected. Therefore entrepreneurs should inject own thoughts during copy and produce productions with independent Intellectual property and should avoid the effect of "Primary Effect" that decides the development of the enterprise in the first impression. That is to say, creative copy should make new breakthrough in the process of copy. As Newton said, if I have been able to see further, it was only because I stood on the shoulders of giants.

4.2 Resolution: determination of learning

Resolution is the key to success. No matter what type of entrepreneurship, to obtain some achievements, one of the crucial factors is the leadership of leaders. Resolute and determined" is the reflection of leadership as well as the charm. If there's a strong core of leadership in the changeable market, leading entrepreneurs expanding the market, adapting to change and avoid the risk, then entrepreneurs has a clear goal and does further research. By this way, leader's resolution to success will also transfer to subordinates, virtually increased the cohesion and centripetal power.

4.3 Education: the stretch of scientific education

The reason why S&T-driving enterprise-starting can't be widely spread throughout the nation is lack of scientific education. Although our country executes nine-year compulsory education, university graduates increased year by year, the real high-quality technical talents who can control precision instrument or have the system of scientific knowledge are rare and this is just the necessary quality. In fact, as long as the current education system changing a little, there will be an obvious outcome. In this respect we can learn from American. Great amount of American scientists proved the importance of

science and technology education. Also we have got commendation and the reward for technological invention, to encouraging people to create good atmosphere of technology. Moreover supreme state scientific technology, national invention award have been established, by harboring a group of people such as Yuan Longping etc. Countries should use "squeeze-out effect" of the positive role, make this kind of material and spiritual reward become technology entrepreneurs emerge new inventions, also encourage other entrepreneurs driving to walk road of science and technology innovation.

4.4 Active: active innovation

Hope produce will, the desire for success will produce the will to win. Here the will is the activeness for success. Activeness is the powerful weapon to overcome obstacles and the source of scientific creates. With the activeness entrepreneurs can overcome all difficulties from market, management, strategic and risk.

4.5 Teamwork: team spirit

A philosopher said: "you have an apple, I have an apple, we are exchanged, each of us has an apple; but if you have a thought, I have an idea, we are exchanged, and then we have the two ideas." This reveals the power of teamwork. S&T-driving enterprise-starting stress Originality and Heterogeneity, so members of the team can cooperate, learn from each other, and make progress together. Entrepreneurship should pay attention to the power of groups.

4.6 Experience: conclusion of experience

Forgetting the past must repeat. The road of entrepreneurship is full of success and failure. Summarizes the successful experience and sum up the failure ones is the best way to make a progress. To some extent, evaluation of the process is more important than the result.

Overall, six innovation elements are related. Copy is the beginning of Create. After copying, technology entrepreneurs learning business knowledge Actively in the inspiration of Resolution. With the Education extending unceasingly, entrepreneurs sum up Experience and pay more attention to Teamwork. This is a cycle; an ending presupposes a new beginning. As the Figure 3 show:

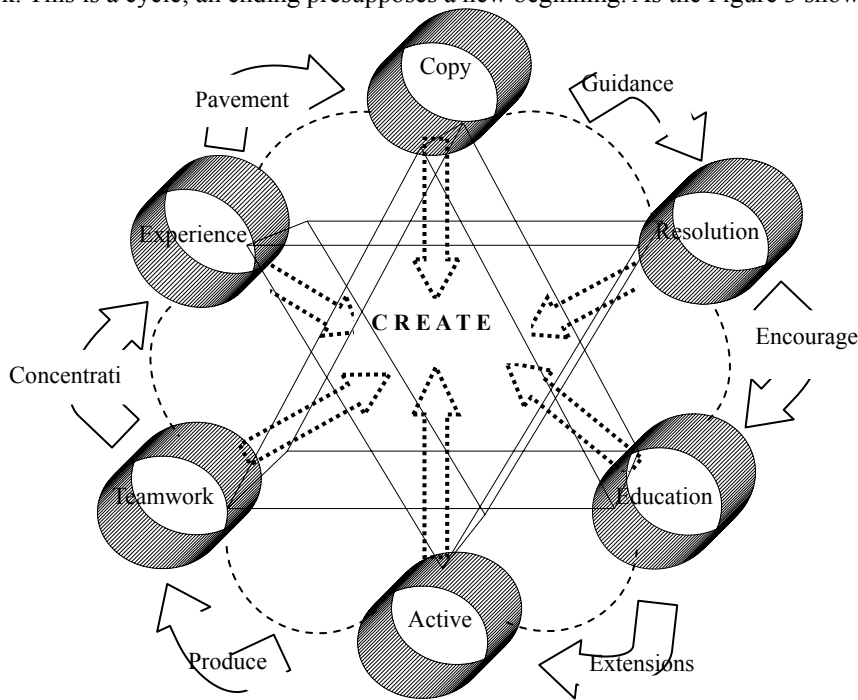


Figure 3 Create Learning Mechanism of S&T-Driving Nationwide Enterprise-Starting

5 Conclusion

Learning ability of S&T-driving nationwide enterprise-starting is a gradual and deepening process. Through imitation study, timeliness-change, creative exertion three learning steps, ability of &T-driving nationwide enterprise-starting can be developed from low to high, shallow to deep. And this process of learning goes through the entire process of S&T-driving entrepreneurship, as well as a sustainable and long-term process. At the same time, learning mechanism, fault mechanism, growth mechanism and locking mechanism constitute the four mechanisms principles of S&T-driving entrepreneurship. With

the help of four mechanisms, ability of S&T-driving nationwide enterprise-starting can be finally formed, and indicate the direction and way for national S&T-driving entrepreneurship.

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