Research on disability-prevention service chain under sustainable perspective

DOI: 10.46932/sfjdv3n2-073

Received in: February 15th, 2022
Accepted in: March 1st, 2022

Hu Shiyong
PhD in public administration
Institution: Wuhan University of Technology
Address: School of Law, Humanities and Sociology, Wuhan University of Technology, Wuhan, P.R. China, 430070
E-mail: hsy30@whut.edu.cn

Li Rui
Master in social work
Institution: Wuhan University of Technology
Address: School of Law, Humanities and Sociology, Wuhan University of Technology, Wuhan, P.R. China, 430070
E-mail: 747705492@qq.com

ABSTRACT
Disability prevention is an important measure to enhance the quality of our population. Based on the sustainable theory, the thesis proposes the concept of prevention mechanism, building and working methods. The thesis clarifies the chain of supply chain, object chain, demand chain and service chain relational model which links the service object, service content, service agency, and service stage and constructs the model of disability prevention mechanism. Combined with the model of disability prevention mechanism, the thesis proposed policy support, linkage mode, management mode and other aspects of countermeasures to solve these problems.

Keyword: sustainable theory, disability-prevention service chain, countermeasures.

1 INTRODUCTION
Disability prevention is a kind of fundamental work to improve the population quality and comprehensive competitiveness of a country. It is concerned with survival, health and development of all citizens of a country. To actively promote the disability prevention is the important task to develop the enterprise for the disabled in China. It is the important target of the public health and people’s health, and also the important measure in the new period to improve the population quality in China in the new period. To enhance the intervention of disability prevention and reduce the occurrence of disability, is conducive to reducing the disability rate of newly-born population and improving the living standard and living quality of people. In the meanwhile, the disability prevention reflects the humanitarian spirits. It is an important aspect for the continuous improvement of a country’s social civilization.
Disability prevention is targeted at the hazards leading to disabilities including heredity, traumas, development, diseases, environment and behaviors and so on. To adopt the effective measures and channels, prevent or reduce the occurrence of disabling diseases and injuries, limit or reverse the disabilities caused by diseases and injuries, and prevent the disabilities from becoming physical disabilities after the occurrence of disabilities, are the effective channels to prevent, control and delay the occurrence and development of disabilities. The government of China is always paying high attention to the disability prevention, and always insisting on taking the disability prevention as the important content to develop the enterprise for the disabled, for which, the phased achievements have been made. Cheng Kai has pointed out that the disability prevention in China has been added into the ordinances for China to develop the enterprise for the disabled. The specific projects have been carried out, the disability prevention in the key fields has been enhanced, and the precious work experience has been explored. (Cheng Kai, 2011) From this, it can be seen that since the implementation of the reform and opening-up policy, great progress has been made in the aspect of disability prevention in China, which creates the safe and reliable living environment for the broad masses of the people. However, it is undeniable that there are still problems in the disability prevention mechanism in China, which remains to be further perfected in the aspect of disability prevention mechanism. It still has a long way to go to establish and improve the disability prevention mechanism. As far as the scholars including Zheng Xiaoying and Cui Bin are concerned, the problems including the lack of systematic planning in the measures and strategies of disability prevention; unclear liability subjects; being hard to implement the policy measures and prevention; and scare resources of the government and society used for disability prevention. (Zheng Xiaoying, Cui Bin, 2013) Towards the problems in the disability prevention in China, the scholars including Cui Bin and Chen Gong have presented the corresponding countermeasures in the aspects of establishing disability prevention mechanism, improving disability prevention system, popularizing disability prevention knowledge, carrying out the key intervention of disability prevention, and establishing the support and guarantee environment of disability prevention and so on. (Cui Bin, Chen Gong, 2011)

Above all, at present, the researches of scholars concerning disability prevention are mostly concentrated on the development history of disability prevention, the problems in disability prevention and its countermeasures and so on, and a system perspective is lacked comparatively to analyze and solve the problems of disability prevention. Therefore, in the angle of sustainable theory in the paper, the system analysis is carried out towards the problems in disability prevention mechanism. With the continuous progress development of human society, the level of industrialization and urbanization improves continually. While the human beings enjoy the highly developed material civilization achievements, the
harmonious relationship with nature gradually collapses, and problems in environment and resources emerge in endlessly and become increasingly fierce. The development of human society is in the crossroad concerning the fatal rise and fall constantly. In as early as the beginning of the 20th century, the western scholars have been worried about the issue. In *The Economics of the Coming Spaceship Earth*, Boulding put forward the “economic theory of spaceship”. (Gro Harlem Boulding, 1966) In the *A Blueprint for Survival* (Goldsmith, 1972) written by some scientists led by Goldsmith, the editor-in-chief of *Ecologist*, a British magazine, it revealed that the unharmonious development of human beings makes disastrous impact on natural environment and social environment; and the theory of sustainable development rises in response to the proper time and conditions, and gradually becomes the focus concerned by the various countries in the world.

From incubation to establishment, the concept of sustainable development undergoes a process of continuous exploration and improvement. From the view of ecology, Ridley Ford brought forward that sustainable development maintains fundamental ecological processes and the system of life supply; and makes best use of all kinds of species and ecosystem. (Rogers, 2007) From the view of society, Kuypers came up with the definition that sustainable development not only boosts the economy, but also changes the mode of life in the society. (Lan Moffatt, 2007) Among which, Brundlend’s definition of sustainable development is widely accepted and recognized by the international society, which is “the development satisfying the requirements of contemporaries and not damaging the capacity of the posterity to satisfy their requirements”. (Brundtland, 1987) Sustainable development contains rich theoretical connotations. It supplements and is closely associated with mutual development, harmonious development, equitable development, efficient development and multi-dimensional development. The above aspects supplement and are closely linked to each other. The scholar Niu Wenyuan opened a new path and presented that the understanding of human beings towards the connotations of the theory of sustainable development undergoes the long course from survival to development and then from development to sustainable development. Besides, he put forward the concepts of “external response” and “internal response”, and revealed the essential connotation of sustainable development. (Niu Wenyuan, 2012) In the aspect of specific contents, sustainable development is the harmonious unity of ecological sustainability, economic sustainability and social sustainability. (Tolba, 1990) It requires human beings to focus on ecological sustainability, highlight economic efficiency and pursue for social equity, thus realizing the overall harmonious development of human society. From the above, it can be seen that sustainable development plays an essential role to the development of human beings. Liu Zhongyan and Ji Zhong et al. hold the view that sustainable development can optimize the living space of human beings and provide the foundation for the development of human beings. It can better meet the basic requirements of human
beings and promote the all-round development of human beings. Besides, it can promote the deepening of the understandings of human beings towards their own values and the values of nature, thus obtaining freedom in correctly harnessing the natural forces. (Liu Zhongyan, Ji Zhong, 2005)

In conclusion, sustainable development, after all, is the all-round development of human beings. To be people-oriented is the basic value orientation of sustainable development. As the life expectancy of population lengthens, the risks for people to be disabled gradually increases and the period of disability is also obviously prolonged, which might generate huge consumption of social resources. In the aspect of environment, disability generates many adverse effects on the living environment of human beings. Whether in educational environment or employment environment, the disabled are always in the inferior position, which largely reduces the requirements on their survival and development. In the aspect of material resources, disabilities affect people’s basic requirements on basic necessities of life, and severely limit the disabled in their daily life in different degrees. As for the group with relatively high degree of disabilities, disabilities severely affect the daily behaviors of the disabled. In the aspects human resources, the adverse effects of disabilities on human resources are mainly expressed in the two aspects, i.e. physique and knowledge & skills. Due to the limitations of the disabilities, the disabled are always in the inferior position in living, studying and social interaction; while extremity disabilities further restrict the abilities of the disabled in grasping knowledge & skills, which is also the key factor leading to the low overall quality, low educational level and weak social adaptability of the disabled.

From the above, it can be seen that towards the adverse effects of the disabilities on social resources, the construction of the disability prevention mechanism is of great importance. Scholars at home and abroad put forward that the enterprise for the disabled should be in the perspective of sustainable coordinated development. (Gong Xiao, Wang Pingyi, 2015) Therefore, in the paper, in the perspective of the theory of sustainable development, the research is conducted towards the disability prevention mechanism in the three aspects, i.e. the theory of disability prevention mechanism, systematic disability prevention mechanism, and operational measures of disability prevention mechanism, among which the idea of disability prevention mechanism is the core to build the mechanism. Systematic disability prevention mechanism is the framework to build the mechanism. Operational measures of disability prevention mechanism are the working methods to build the mechanism. In addition, the above three are closely linked to each other.

2 THE CONCEPT OF DISABILITY PREVENTION MECHANISM

Disability prevention is an important content that cannot be ignored in the construction of social security, it is also a kind of construction of ecological system which entails establishing a relationship
with other social systems to acquire a stable and effective network of social resources and guarantee a normal operation of disability prevention mechanism. The Beveridge Report proposed that a social security program with mutual cooperation should be built for forging a good social security environment. (J·R·Hay, 1978) It also pointed out that the social security must be achieved through the cooperation between countries and individuals, it should be the common responsibility and moral duty of individuals, the state and society, it is the manifestation of collaboration among the three pillars: the state, society and individuals. Therefore, we should regard disability prevention as one of the most important aspects of the social security, and we should construct a macro, meso and micro docking system from the national government level, social organization level and individual level, forming a stable ecosystem.

2.1 THE MACRO POLICY LEVEL

The “the 14th Five-Year Plan” period is the key period of building a moderately prosperous society in an all-round way in China. It is also the crucial period of deepening reform and opening-up and accelerating transformation of the mode of economic development. Establishing and perfecting the basic public service system, and promoting the equality of our basic public services become an important national policy of China currently.

Disability prevention shows an urgent entailment of building a harmonious socialist society and maintaining social fairness and justice. It has great bearing on advancing social construction that takes people’s livelihood as its key point and ensuring the most direct and the most realistic interests people concerned about. It is of great significance in social security for the disabled and public service system in China, embodying the happiness and benefit of “healthy community” and “disabled community”. So the important position of disability prevention should be highlighted. Standing on the height of the construction of our national public service system, we should increase the proportion of disability prevention in the construction of national public service system to provide better services for the “healthy community” and “disabled community”.

2.2 THE MACRO MANAGEMENT LEVEL

Disability prevention is a matter concerning such departments as health, family planning, civil affairs, human resources, social security, transportation, safety, environmental protection and the disabled persons’ federation organization. A single department is difficult to carry out disability prevention work effectively. Therefore, a comprehensive leadership coordination mechanism should be established at the government level to coordinate with all parties and forge a disability prevention working committee leadership and new work pattern of each department.
2.3 MEDIUM ORGANIZATION LEVEL

Among China current social organizations, disabled persons federation’s organization form is unique. It composes of the official working committee for the disabled, at the same time, also the semi-official managerial disabled persons’ union, and the civilian association for the disabled. This organization form has its drawbacks and its advantages. The advantage lies in that it can perfectly play a pivotal role, which is defined by the academic circles as a social organization with connecting functions. We should make full use of the disabled persons’ federation, balancing interests among government agencies, social organizations and public concerns, thus better joining all levels of society together.

2.4 DISABILITY PREVENTION SERVICE CHAIN

“Service chain theory” believes that there is a certain relation among the service agencies, like a “chain”. When the service agencies form the “chain” relationship, multiple service chains within an area will form a service system, of which each service chain comprises of nodes to meet the requirements of their own “chain”. Moreover, these service enterprises and institutions make up the nodes on the chain. The nodes on chains provide needed services, thus improving the efficiency and quality of service.

The “service chain” theory supposes that to maximize servers’ satisfaction, all kinds of related enterprises, institutions and social sectors can be organically combined and form a network. Relevant social forces can be incorporated into the network, like the government, enterprises, social groups, non-governmental organizations, etc., and, according to the requirements of the “service chain”, play different roles, and jointly provide needed services.

To apply the theory of “service chain” requires that we should construct a disability prevention service chain, to get the disability prevention service enterprises, social organizations and government parts together which form a mesh structure, that will finally maximize the quality and efficiency of disability prevention work.

3 THE CONSTRUCTION OF SYSTEMATIC DISABILITY PREVENTION MECHANISM

Since the reform and opening-up, China’s disability prevention mechanism has witnessed a boom. However, given the “policy fragmentation” problems and realistic situation in disability prevention, the construction of disability prevention mechanism should be analyzed from systemic perspective. The principles of systemic disability prevention policy mechanism are as follows:
3.1 THE MACRO, MESO AND MICRO DOCKING

According to the concept of disability prevention mechanism, we should embed disability prevention mechanism into the national basic public service system, establish a disability prevention working committee at the government level, take disabled persons’ federation organization as a hub, establish linkage platform and build disability prevention service chain so as to realize the systematic docking of macro policies, macro management, meso social organizations and micro individuals.

3.2 THE DYNAMIC BALANCE

Disability prevention, in terms of its essence, is service for “healthy community” and “disabled community” and a kind of public goods, so there is also a public product life cycle dynamic balance issue, including dynamic balance of the production, delivery, consumption, supply, termination, transfer and improvement of public goods.

3.3 THE DOCKING OF ALL KINDS OF CHAINS

According to the public products’ life cycle, service chain contains service chain, supply chain, object chain and demand chain, etc. Their relationship lies in: service chain organizes related service institutions and offers the consumer a all-around, whole-process and all-the-time service. We can regard disability prevention service chain as a kind of service network, and the supply chain, object chain and demand chain as productive network. Based on the public products’ life cycle, the relationship model of supply chain, object chain, demand chain and service chain is shown in figure 1:

![Figure 1 Based on the Public Products’ Life Cycle, the Relationship Model of Supply Chain, Object Chain, Demand Chain and Service Chain](image)

Figure 1 shows that systemic disability prevention mechanism is the whole process of disability prevention, so disability prevention mechanism also touches upon the management of such kind of public
product. Disability prevention service can be divided into three stages: early service, mid-term service and later service.

The early service refers to the preparation before the delivery of public products, including establishment of public policy, examination and establishment of decision-making body and service institution and needs recognition, etc. The mid-term service refers to public product output, product delivery and consumption, including money, propaganda, examination of service object and service, etc. The later service refers to termination and transfer of public products supply and upgrade according to service requirement assessment. When the effect of disability prevention has been achieved, service supply ends; When disability prevention effect is ordinary, service movement can be achieved by changing service institution. Optimize service effect also can be realized by upgrading service.

According to the concept and principle of disability prevention policy mechanism, combined with public service product cycle, the model of disability prevention mechanism is shown in figure 2:
4 CONCLUSION

By investigating the problems of disability prevention and the reality, from the perspective of the theory of sustainable development, the construction of disability prevention mechanism entails establishment and improvement of the service chain. Positive and effective measures should be carried out to crack down on problems of the mechanism. Promoting operation of the mechanism entails building foundations from such aspects as policy support, linkage mode and the management mode of ramming mechanism.

4.1 POLICY SUPPORT

The central committee of the communist party, on the fifth plenary session of 17, states, “about making the twelfth five year plan for national economic and social development suggestion”. It pointed out that “we ought to support the development of undertakings for the disabled, and improve the service system for them likewise”, and put forward the basic national policy of enhancing China’s public service system for the twelfth five year period, and even longer. By the concept of the disability prevention mechanism, disability prevention work should be incorporated into the national public service system and be the focus of the work. The incorporation into the national public service system’s evaluating index system, and more weight it gets, will lead to more resources and spending for disability prevention efforts.

In addition, disability prevention ordinance should be enacted at the state level. We should guide departments at all levels to strengthen the disability prevention and rehabilitation of organization and leadership, adhere to administrating according to law and earnestly perform their duties by carrying out the ordinance. In addition, we should put forth clear requirements for establishing a perfect service system for the disabled and implementing disability prevention measures.

4.2 THE WAY TO IMPROVE THE ORGANIZATION AND LINKAGE

Along with the continuous development of economy, disability prevention work in China has achieved a lot. However, the big base, large scale and rapid growth of the population of China and serious aging problem have negative impact on the improvement of population quality and our social economy and culture. So the disability prevention work is urgently needed.

For highlighting the principle of the development policy embedded in the concept of disability prevention mechanism, special management institution of disability prevention council should be constructed to realize direct management of disability prevention practice. Meanwhile, with the assistance from national council on disability prevention, we should establish a joint conference system, actively
promoting cooperation of health and family planning, education, civil affairs, public security, transportation, safety, environmental protection and the disabled persons’ federation organization.

Under the guidance of disabled persons’ federation organization, we should fully mobilize social resources, such as social charity organizations, enterprises and social organizations, forming a joint effort to promote the construction of disability prevention mechanism as well as carry out disability prevention work smoothly.

4.3 THE WAY TO IMPROVE THE MANAGEMENT MODE

In the management of disability prevention, we should highlight focused management, adjustments to local conditions and social governing functions.

4.3.1 Focused management

Disability is not a probability event average in social terms. During the course of human life, the likelihood of disability does not scatter evenly, and disability prevention effects also vary widely among respective periods. To improve the effects of disability prevention, the huge database should be set up, tallying up disabilities probability in the life cycle of our population and intervention recovery rates. Based on the statistical results, focus on the most needed group and at the same time work out scientific intervention measures, such as natal defects intervention, elderly disability prevention, etc.

4.3.2 Adjustments to local conditions

The second round data has shown that the disability probability has its regional attributes, and the structure and causes for disabilities vary accordingly. So in setting up policies for disabled people, the one-for-all principle is not eligible. This also requires that, when drawing out disability prevention group and intervention measures, the actual situation of local conditions should be taken into consideration.

4.3.3 The construction of informatization and managerial level

Establish a corresponding database in tune with different types of disability to form a bottom-up information management network, which paves the way for professional management and all-the-way tracking service.

4.3.4 Public awareness and spread of scientific knowledge

Mark out disability prevention as an important part of the public health propaganda, as a vital content of the media’s public welfare propaganda, and none the less, as the indispensable content of spread
of scientific knowledge. Fix the idea of national prevention, lifelong prevention and comprehensive prevention. Ensure the public understand and grasp the basic knowledge of disability prevention.

4.3.5 Scientific research and funds

Increase investment in scientific research over the causes for disability and put forward corresponding preventive measures. Parts of basic public health budget should be directed to disability prevention funds.

4.3.6 Social governing functions

We should give full play to the health, education, social work and various types of social organizations in disability prevention like identification of requirements, performance evaluation, rehabilitation and propaganda. Free social charity groups and enterprises’ role should be played as much as possible in the process of disability prevention on fund-raising, handing-out assistive devices and the public welfare undertakings, etc.

ACKNOWLEDGEMENT

This paper is supported by Chinese National Social Science Fund Project(21BRK028).
REFERENCES


