

Application And Exploration of Smart Platform in Alleviating Psychological Problems of The Elderly

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Abstract. This article delves into the psychological adaptation issues faced by the elderly population in the context of rapid development of digitalization, artificial intelligence, and big data technologies. Research has shown that the intelligent elderly care model has a double-edged sword effect. On the one hand, it provides convenient life services and medical care for the elderly, but on the other hand, it also brings significant psychological challenges. The psychological adaptation problems of elderly people mainly stem from four dimensions: cognitive conflicts between traditional concepts and emerging technologies, increased loneliness caused by shrinking social circles, unfamiliarity and alienation caused by the use of smart devices, and discomfort caused by changes in lifestyle habits. Based on the perspective of elderly care institutions, this article proposes five systematic response measures: establishing a progressive intelligent technology training system to help the elderly gradually master new technologies; Build a social support network that combines online and offline activities to alleviate feelings of loneliness; Develop intelligent products and services that are suitable for aging and lower the threshold for use; Provide professional psychological counseling services and intervene in psychological problems in a timely manner; Establish a support mechanism for family community institution linkage and form a comprehensive care system. These suggestions not only help alleviate the psychological adaptation pressure of the elderly population, but also provide practical guidance for optimizing the services of elderly care institutions in China, and have important reference value for promoting the sustainable development of smart elderly care.

Keywords: Public health; psychology of the elderly; intelligent platform.

1. Introduction

With the rapid development of science and technology, there are many easy-to-use and easy-to-use applications in the field of intelligent elderly care. These applications not only greatly enrich the lifestyle of the elderly, but also significantly improve their life convenience and well-being, which has a positive impact on the psychology of the elderly. First, with the help of diversified digital means, intelligent elderly care technology has greatly simplified the daily lives of the elderly. Innovative projects such as intelligent elderly care apps and applets upgrade the traditional elderly care service intelligently so that the elderly can easily maintain real-time communication with their families online. The family can adjust the care plan remotely and can efficiently complete several daily care tasks without visiting in person. This flexible and convenient service mode not only makes the life of the elderly more relaxed and comfortable but also provides them with more independent choice and decision-making space, which further improves the convenience of life. More importantly, intelligent pension technology is not only limited to the convenience of life but also has a significant positive effect on the mental health of the elderly by providing emotional support and promoting social interaction.

Through smart devices, the elderly can enjoy a full range of emotional support services, maintain regular communication with their families, and feel the warmth of their families. At the same time, intelligent AI technology can also help the elderly recognize the emotional changes at home, give early warnings and intervene in time, and effectively alleviate psychological problems [1]. In addition, at the community level, the application of intelligent elderly care provides more convenient social and interactive opportunities for the elderly. For example, intelligent home robots can help participate in community activities, record and share life with residents, and enhance neighborhood relations. These technologies also create more comfort and a sense of belonging for the elderly.

Smart pension is not only the application of technology but also shows a new concept of pension. It emphasizes the realization of health management, life convenience, psychological care, and external social interaction of the elderly through scientific and technological means. The change of this concept makes the elderly gradually change from the traditional passive acceptance of pension services to active participation and control of their pension life. However, despite the significant progress made in technology and the concept of smart elderly care, the problem of the elderly's psychological adaptation has gradually become prominent. To sum up, intelligent elderly care technology, with convenient life services, emotional support, and social interaction, has brought a full range of happiness to the elderly and provided a new direction for the transformation of the concept of elderly care. This paper aims to explore the problems and reasons for the psychological maladjustment of the elderly under the development of smart pensions and will put forward suggestions to solve this problem.

2. The Problem of Elderly Psychological Maladjustment and Its Causes

2.1. The Influence of Traditional Ideas

Although the smart pension model provides many conveniences for the elderly, many elderly people find it difficult to adapt to this new way of pension psychologically. The following are some common psychological maladjustment problems and their causes. In Chinese traditional culture, family pension has been regarded as the most ideal and ethical way of pension [2]. Since ancient times, the concept of "raising children to prevent old age" has been deeply rooted in the hearts of the people. The elderly generally hopes to live together with their children at home and enjoy the happiness of their family. This concept is rooted in the core values of "filial piety" in Confucian culture and emphasizes the maintenance obligations and responsibilities of children to their parents. However, with the development of society and the progress of science and technology, the smart pension model is gradually rising. Under this model, the elderly often needs to live in pension institutions or meet their daily needs through smart devices, which conflict with the traditional concept. Many elderly people feel frustrated and anxious about this and even have a feeling of resistance. They worry that leaving the familiar environment will reduce or lose their close ties with their families, fear that technology and equipment will replace the company of their children and worry more about losing their self-worth and dignity in an unfamiliar environment. Such emotional struggles and difficulties not only affect the mental health of the elderly but also bring new challenges to dealing with family relations and maintaining family harmony. Therefore, while respecting traditional culture, should effectively integrate modern science and technology to provide the elderly with a way of providing for the aged that can adapt to both traditional values and modern life. Therefore, when promoting the smart pension mode, need to explore a pension mode that can meet the emotional needs of the elderly and adapt to the development of modern science and technology based on respecting traditional culture.

2.2. Increased Loneliness

With the popularity of the smart pension model, the elderly's sense of isolation in social life has gradually intensified [3]. This phenomenon not only stems from the convenience of digital technology but also reflects the impact of intelligent pension mode on traditional social relations. First, the intelligent elderly care platform reduces the face-to-face interaction between the elderly and their children. Although smart devices can share information and exchange feelings in real time, the interaction is cold and fuzzy, which makes the emotional connection between the elderly and their relatives and friends sparse and reduces the emotional connection. At the same time, face-to-face communication and interaction are an important part of the traditional social connection. After the popularization of intelligent elderly care technology, the frequency of face-to-face emotional communication has decreased, and the elderly are forced to use information transmission to alleviate loneliness. Second, with the development of the digital society, people tend to face the screen and use

voice communication. Intelligent devices can indeed provide emotional support in real time. However, the elderly often cannot make good use of the intelligent platform due to the large difference in information, cumbersome operation, and physical degradation (such as vision and hearing loss) between the elderly and young people, resulting in increased loneliness among the elderly. Third, from the perspective of psychology, the popularity of digital technology has reduced the emotional connection and interaction frequency of the elderly, and emotional expression has changed in the digital environment, which is not conducive to emotional connection and makes the emotional communication of the elderly more single and isolated. According to a survey, 29.42% of the subjects had different degrees of depressive symptoms; 70.05% of the subjects had loneliness; and 31.98% of the subjects showed different degrees of cognitive impairment. However, the incidence of depression and loneliness of the elderly in this survey is lower than that of relevant studies at home and abroad. In a survey in Jinan, more than 70% of the elderly are not satisfied with their smart devices [4]. Therefore, from the overall perspective, with the promotion of the smart pension model, the loneliness of the elderly is indeed undergoing a profound change. This change not only comes from the convenience improvement brought by digital technology but also reflects the dependence of modern society on the traditional relationship network and the fracture of emotional connection in the digital era [5].

Unfamiliar environment and changes in living habits many elderly people's lives have changed significantly after they moved into pension institutions. They not only need to adapt to the new living environment but also must adjust their living habits developed over the years. This great change in life is often accompanied by psychological discomfort and trouble. Smart elderly care institutions generally adopt modern design and intelligent management modes. From house layouts to daily facilities, they are mostly different from the familiar life scenes of the elderly. For example, the operation of the smart door lock is more complex, and the elderly often face inconvenience due to forgetting the password or misoperation; The automatic lighting system is designed to provide convenience, but its sensing mechanism often confuses the elderly. Therefore, intelligent temperature control equipment, voice assistants, and other high-tech equipment have brought many conveniences to life, but for the elderly, mastering these technologies has become an arduous task. Many elderly people feel frustrated due to difficulties in operation and even have psychological resistance to the smart pension model. The conflict between the application of this new technology and the traditional living habits of the elderly not only affects the quality of their daily life but also raises questions about the smart pension model. Therefore, to fully consider the actual needs and use habits of the elderly while promoting the process of intelligent pension mode has become an important issue to be solved in the field of intelligent pension. Therefore, while improving the convenience of the smart elderly care model, also need to pay attention to the needs of the elderly's emotional communication to avoid aggravating loneliness due to technical isolation.

3. Lack of Physical Function and Autonomy

With the growth of age, the physical function of the elderly will inevitably decline. The decline of physical function is particularly prominent when using smart devices. For example, the elderly with poor eyesight often have difficulty seeing the contents of the screen when facing the dense text and icons on the intelligent device or when encountering a small screen, which brings invariance to life; The elderly with hearing loss may miss important voice prompts and cannot accurately understand the information conveyed by the equipment, causing unnecessary trouble. The inconvenience caused by the lack of physical function has greatly reduced their quality of life, and virtually increased their psychological burden, resulting in a weak sense of belonging. In addition, with the help of various advanced technologies, the smart pension model has certain benefits for the elderly to achieve a full range of management services, but it also has disadvantages. For example, the health monitoring system can track the physical indicators of the elderly in real-time, detect health risks, and help them carry out health management. On the contrary, the elderly is constantly monitored and may feel that

their lives are over-monitored, as if their every move is closely watched, resulting in a strong sense of freedom and bondage, leading to a lack of autonomy.

Economic pressure and insufficient family support, the cost of some smart elderly care equipment is high, which is difficult for many elderly people to bear. For example, smart home devices and health monitoring systems require a certain amount of economic investment in the early stages. For some elderly people with poor economic conditions, this economic pressure may lead to rejection of the smart pension model. Therefore, due to economic pressure, the intelligent pension model is unsustainable. Although the smart pension model emphasizes the application of technology, family support is still an important factor for the mental health of the elderly. However, many families are unable to provide adequate companionship and support for the elderly due to busy work or other reasons. This lack of family support may aggravate the psychological maladjustment and loneliness of the elderly.

4. Case Analysis of the Elderly With a Good Mental State

Although many elderly people feel psychological maladjustment under the smart pension mode, some elderly people can well adapt to this new pension mode and maintain a good psychological state. For example, after the elderly in a certain area use the smart pension mode, they can skillfully use smart devices to keep in touch with their families, making their daily lives more convenient. He said that the smart elderly care model makes life more convenient for the elderly and makes them feel safer and more secure [3]. This case shows that the psychological state of the elderly in the smart pension mode depends not only on technology but also on their positive attitude and support [5].

To help the elderly maintain a good psychological state under the smart pension mode, this paper puts forward the following suggestions. First, pension institutions should pay attention to the design of the environment and try to create a warm and comfortable living space for the elderly. For example, soft and warm lights, comfortable furniture, and familiar decorative styles can be used to reduce the strangeness of the elderly. Second, family support is an important factor in the mental health of the elderly. Pension institutions should regularly invite family members to visit and accompany the elderly to help them alleviate their loneliness. For example, a "family day" can be set up to encourage family members to spend time with the elderly. Third, pension institutions should provide technical support to help the elderly skillfully use smart devices. For example, training courses can be offered to teach the elderly how to use smart appliances, health monitoring systems, and other equipment. At the same time, the design of intelligent devices should also consider the special needs of the elderly, such as large font, high-volume voice prompts, and other functions [6]. Fourth, the staff of pension institutions should receive good training and have professional nursing skills and psychological care ability. For example, employees should learn how to communicate with the elderly, how to identify and alleviate their psychological problems and be patient with the elderly. Fifth, pension institutions should regularly organize colorful cultural and recreational activities to help the elderly maintain a positive attitude. For example, calligraphy, painting, dance, chess, and other activities can be regularly organized to make the elderly feel fun and relaxed in their participation.

5. Conclusion

This paper explores how the elderly will face the psychological problems caused by the rapid development of digitization, artificial intelligence, and big data. With the rapid development of science and technology, the rapid development of smart pension mode is a double-edged sword, which has both advantages and disadvantages. The psychological problems of the elderly are mostly caused by traditional concepts, loneliness, strange relief, changes in living habits, and other factors. Solve these problems, this paper puts forward five measures to solve the above problems from the perspective of pension institutions, such as environment, focusing on creating a familiar environment; In terms of support, the elderly should be given family care and financial support; In terms of

employees, pay attention to the training of employees' professional quality; As well as cultural and recreational activities, cultural and recreational parties are held to carry out recreational activities, to make the elderly physically and mentally healthy. Provide a reference for pension institutions.

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