

# The Integration of Pickleball and The Elderly Care Industry

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**Abstract.** This paper examines the increasing elderly population in China and the potential role of pickleball in transforming elderly care. China's aging demographic is projected to reach 37.4% by 2060, creating an urgent need for effective elderly care solutions. Pickleball, an emerging sport, offers promising benefits for older adults, encompassing improvements in physical and mental health. This study delves into pickleball's characteristics, highlighting its potential to enhance social interaction, physical fitness, and overall quality of life for seniors. The paper also reviews the current state of China's elderly care industry, which, while expanding, struggles to keep pace with the surging demand for services. By integrating pickleball into elderly care frameworks, this research proposes innovative strategies to address the challenges posed by an aging population. The potential benefits of pickleball are discussed in terms of providing new opportunities for engagement and support, ultimately aiming to enrich the lives of the elderly and offer fresh perspectives on elderly care practices. This approach could pave the way for more dynamic and effective care solutions in response to China's demographic shift.

**Keywords:** Silver Economy; Pickleball; Sports Industry; Elderly Care Industry; Industrial Integration.

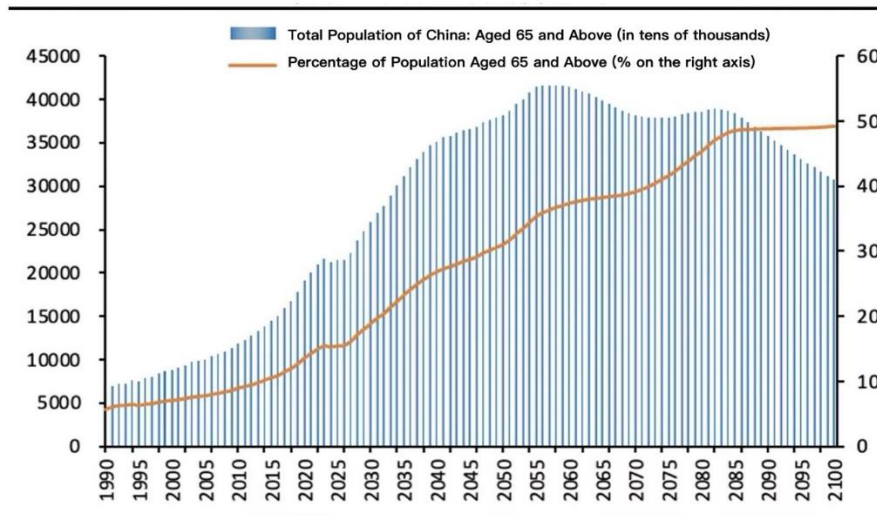
## 1. Introduction

This paper explores the current state of aging in Chinese society and the role of pickleball in promoting the development of the elderly care industry. With the increasing aging of Chinese society, elderly care has become a focal point of public concern. Pickleball, as an emerging sport, not only provides the elderly with a new leisure activity but also plays an important role in promoting their physical and mental health and improving their quality of life. This article will analyze the characteristics of pickleball and its positive impact on the elderly care industry, and discuss how to better integrate pickleball into the elderly care system to offer new ideas and methods for addressing the challenges posed by an aging society.

## 2. Analysis of the Current Situation of China's Aging Society

### 2.1. The Current State of Aging in China

China's level of aging is ranked among the highest globally, with trends of lower birth rates and increased longevity deepening the aging process. In 2000, the proportion of people aged 65 and above exceeded 7%, marking the entry into an aging society. By 2021, this figure had reached over 14%, indicating deep aging. In 2022 and 2023, the proportions of those aged 65 and above were 14.9% and 15.4%, respectively. Comparatively, the global aging rate in 2022 was about 9.8%, with high-income and upper-middle-income economies at 19.2% and 12.2%, respectively. China's aging rate surpasses that of upper-middle-income economies and closely follows that of high-income economies. According to Figure 1, it is predicted that by around 2030, China will enter a "super-aging" society, with the proportion of those aged 65 and above surpassing 20%. This will continue to rise, reaching 37.4% by 2060, and potentially stabilizing around 46% after 2080, meaning nearly half of China's population could be elderly by then.

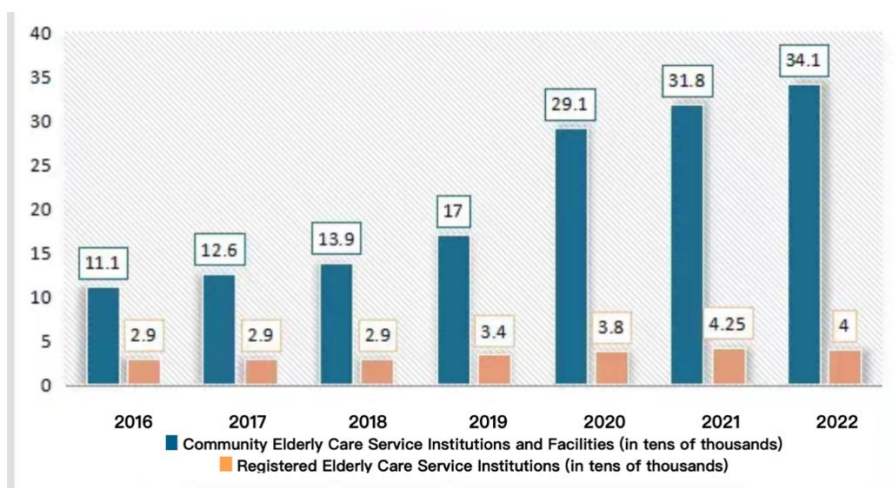


**Figure 1.** The Continuous Deepening of Aging in China [1]

## 2.2. Current Status of China's Elderly Care Industry

The Fifth Plenary Session of the 19th CPC Central Committee elevated the issue of population aging to a national strategy for the first time. The subsequent 14th Five-Year Plan outlined goals to build a comprehensive elderly care system that integrates home, community, and institutional care.

In this environment, China's elderly care industry has grown rapidly in recent years. By 2022, the market size of China's elderly care industry reached RMB 98.52 billion, representing an 8% increase from 2021. As of the end of 2022, there were 381,000 elderly care institutions and facilities in the country, including 40,000 elderly care institutions and 341,000 community-based elderly care service institutions and facilities. With the increase in the number of elderly care institutions, the number of elderly care beds has also grown. By the end of 2022, China had 8.223 million elderly care beds. Although the number of beds has increased, the demand for elderly care beds in China is still vast. As the level of medical services in elderly care institutions improves and pricing models are gradually established, the institutional elderly care market is expected to continue growing rapidly. Figure 2 shows statistics on the changes in the number of elderly care institutions in China from 2016 to 2022.



**Figure 2.** Shows statistics on the changes in the number of elderly care institutions in China from 2016 to 2022, data compiled by Guan Yan Research [2]

## 2.3. How to Respond to an Aging Society

The challenges posed by population aging to economic and social development are mainly reflected in two aspects. On one hand, it increases the economic and social burden. With a shrinking proportion

of the working-age population and a growing proportion of the elderly, spending on elderly care, healthcare, nursing, welfare protection, and infrastructure construction will rise significantly, placing a heavier financial burden on the government. On the other hand, population aging will alter the labor supply structure and impact technological progress, potentially leading China into a "middle-income trap," characterized by labor shortages and insufficient investment in talent and resources related to technological advancement, which may result in sluggish economic growth. Additionally, population aging could affect macroeconomic security, with profound implications for the country's energy structure, industrial structure, and the stability of the financial system. It is projected that from 2015 to 2050, the proportion of societal spending on elderly care, healthcare, nursing, welfare, and infrastructure as a share of GDP will increase from 7.33% to 26.24%, an 18.91 percentage point rise.

The Blue Book of Elderly Health: China Elderly Health Research Report (2018) points out that in the face of such severe aging challenges, China urgently needs to explore a path to healthy aging with Chinese characteristics, which will provide wisdom and experience for other countries that are also experiencing the phenomenon of "growing old before becoming wealthy" [3]. In March 2017, the National Health Commission and 13 other departments jointly issued the 13th Five-Year Plan for Healthy Aging (referred to as "the Plan"), advancing the strategic goal of building a healthy China. The Plan defines healthy aging as: "From a life course perspective, starting from early life, comprehensively and systematically intervening in all factors affecting health, and creating a social support and living environment conducive to elderly health, thereby extending healthy life expectancy, maintaining elderly health functions, and improving elderly health levels."

To achieve healthy aging, the Plan outlines nine key tasks:

- Promoting elderly health education and enhancing elderly health literacy;
- Strengthening public health services for the elderly and improving elderly health management;
- Establishing a comprehensive medical and health service system for the elderly to improve service quality and accessibility;
- Actively promoting the integration of medical care and elderly care services, enhancing resource allocation and utilization efficiency;
- Strengthening the medical insurance system to lay a solid foundation for safeguarding elderly health;
- Leveraging the characteristics of traditional Chinese medicine (and ethnic medicine) to provide diversified elderly health services;
- Promoting the development of the elderly health industry based on the diverse needs of the elderly;
- Advancing the construction of elderly-friendly environments, creating a supportive social atmosphere for aging;
- Strengthening the professional workforce to enhance professionalism and specialization.

The Blue Book emphasizes that promoting healthy aging and active aging is of great significance to the development of the social economy and the realization of the Healthy China strategy. This is both a responsibility of the government and society, as well as an opportunity for development.

Firstly, improving the life expectancy and quality of life for the elderly by providing supportive environments for elderly care, prevention, medical services, rehabilitation, and caregiving can significantly reduce the financial burden on both the government and society through the prevention of diseases and health promotion.

Secondly, the implementation of healthy and active aging measures will lead to an increase in healthy and active elderly individuals, which will reduce the depreciation rate of human capital and contribute to the formation of a second demographic dividend. Currently, China's elderly population is relatively

"young" in structure. On one hand, it can supplement the traditional labor force (ages 15-64) by providing "silver labor" with well-developed skills and extensive experience, continuing to contribute to economic development. On the other hand, the elderly can serve as informal labor by caring for grandchildren, preparing food, and helping with household tasks, thereby reducing the pressure on younger families. Additionally, the elderly can contribute to the economy through taxes, consumption, and asset transfers. Moreover, the low birthrate and aging population structure are freeing more women from child-rearing and traditional household duties, further increasing female labor force participation.

Thirdly, healthy aging and active aging will promote the transformation of economic growth models and the upgrading of industrial structures. As the consumption rate of the elderly population rises, China's economic growth will shift from being driven by investment and exports to being driven by domestic demand. Long-term care and elderly health services will create new job opportunities, and industries related to elderly care products, insurance, and medical-elderly integration will see flourishing development.

Achieving and advancing healthy aging and active aging is the only way for China to respond to the rapid growth of its aging population. It is essential to scientifically understand the aging process, establish a comprehensive policy system that supports elderly health development, fully tap into human resources, promote the integration of medical and elderly care, advance long-term care insurance and service systems, and build an elderly-friendly environment. These efforts will enable the elderly and their families to enjoy a higher quality of life, foster harmonious intergenerational relationships, and work towards sustainable development in the context of an aging society.

### **3. The Positive Role of Pickleball in Achieving "Healthy and Active Aging"**

#### **3.1. Pickleball Statistics**

According to data from the Sports & Fitness Industry Association (SFIA), pickleball has been the fastest-growing sport in the United States for the third consecutive year, with a staggering 158.6% growth over the past three years. CNBC reported that by 2022, the number of pickleball players in the U.S. had surpassed 36 million, meaning that more than one in every ten Americans plays pickleball. In recent years, pickleball has also been gaining popularity in China, becoming one of the emerging fashionable sports. Since 2023, the sport has seen a significant rise in China:

- **Organizational Structure:** At the national level, the Small Ball Sports Management Center of the General Administration of Sport established a Pickleball Committee, the Chinese Tennis Association formed a Pickleball Promotion Committee, and the Chinese Ethnic Sports Association also set up a Pickleball Committee. Provinces, municipalities, and autonomous regions have also established corresponding organizations.
- **Tournaments:** Various national tours, open tournaments, challenges, and regional competitions have been introduced, with events taking place nearly every week.
- **Participation:** Pickleball is currently the fastest-growing sport in China, with middle-aged and elderly individuals making up the majority of participants.

#### **3.2. Characteristics of Pickleball**

**Easy to Learn:** Compared to the higher technical barriers of tennis, badminton, and table tennis, pickleball is relatively simple. People can pick up a paddle, play for a short while, and quickly get the hang of it. The equipment is also straightforward—an entry-level paddle costing just a few dozen yuan and a ball are enough to start playing.

**Low Physical Fitness Requirement:** It is suitable for all ages, particularly the elderly. Due to the small court size, shorter running distances, slower ball speed, and lack of physical contact, this sport does

not require a high level of physical fitness. Whether players are 7 or 70 years old, with practice, players can achieve a high level of performance.

**Highly Enjoyable:** Pickleball is a sport that is easy to pick up and improve at quickly, offering a strong sense of achievement. Whether players are a beginner or an expert, people can find joy in different aspects of the game. The sound of the ball hitting the paddle can even become addictive.

**Strong Social Aspect:** Pickleball was originally invented to foster communication and emotional bonding between family and friends. Players can chat and connect during breaks, and even complete strangers can become familiar with each other after a few rounds.

### **3.3. The Positive Impact of Pickleball on the Elderly's Health**

Studies have From the perspective of human capital theory and the life cycle approach, after the elderly exit the labor market, their basic health status is often not ideal. In their pursuit of a better life, they actively work to maintain and enhance their health-related human capital. Additionally, as their available time increases, shifting from work to home and personal life, they seek new emotional support systems. Participating in sports activities satisfies the dual needs of maintaining health-related human capital and fulfilling social and emotional needs. This serves as the micro-theoretical basis for the integration of the sports industry with the elderly care industry.

Research shows that pickleball can significantly improve the cardiovascular function, balance, and social interaction of the elderly, reducing feelings of loneliness and symptoms of depression (Smith & Jones, 2020). According to Silver Sneakers, nearly 60% of participants are aged 55 or older, with more than 33.7% being over the age of 65. The basic movements of pickleball, which involve squatting and hitting, also engage the core muscles, effectively training cardiovascular endurance and muscle strength, thereby enhancing various physical functions for the elderly [4].

- **Reduced Risk of Heart Disease** Studies have found that middle-aged and elderly individuals who play pickleball for one hour, three times a week, experience improvements in blood pressure, cholesterol levels, and overall cardiovascular health.
- **Reduced Risk of Depression** Research indicates that elderly individuals who participate in pickleball games have a lower risk of developing depression. Those who take the game seriously are better able to fend off the negative emotions that often arise during retirement and later life.
- **Improved Social Integration** Pickleball helps people build social connections. Playing pickleball requires only 10 to 15 minutes of actual playtime, leaving plenty of time to chat with other players, which increases one's sense of achievement and social inclusion. This makes it more appealing than activities like walking or using a treadmill.
- **Enhanced Quality of Life** Studies show that elderly individuals who regularly play pickleball may improve their cognitive abilities, responsiveness, coordination, and balance, thereby enhancing their overall quality of life.

Thus, the integration of pickleball with the elderly care industry and the mutual promotion of both is a new topic that needs to be studied and addressed. The essence of industrial integration is to create new service models and provide suitable products. By deeply integrating the resources of pickleball and elderly care, it is possible to promote the continuous crossover, infiltration, and restructuring of the functions and values of both industries. This approach will maximize the utility of resources and ultimately achieve a healthier and more precise elderly care model, which is the objective [5].

## **4. Current Issues in Integrating Pickleball and Elderly Care**

### **4.1. Awareness**

Many elderly individuals are not familiar with pickleball as a sport. They are often more accustomed to traditional activities such as tai chi, table tennis, or walking, and know little about pickleball, which

is a relatively new sport. Therefore, raising awareness among the elderly about pickleball is the primary task in the promotion process.

#### **4.2. Facilities**

A lack of facilities is also a key issue. Pickleball requires specialized courts and equipment, which are often not adequately available in many communities, especially in rural areas. Building pickleball courts requires both financial investment and space, which can be a challenge for many elderly communities.

#### **4.3. Physical Limitations**

Given the physical condition of elderly individuals, adjusting the rules and training methods to suit their physical abilities is a significant challenge. Pickleball involves moderate intensity and requires a certain level of coordination and reaction speed, which may be demanding for some elderly people. With their generally weaker physical condition, the risk of injury is higher. Therefore, ensuring safety while promoting pickleball requires the development of elderly-friendly safety guidelines and training programs. Additionally, it is necessary to involve qualified social sports instructors and professionals in sports rehabilitation.

Overall, despite these challenges, the increasing societal focus on the physical and mental health of the elderly, along with growing acceptance of new sports, provides ample space and potential for promoting pickleball among older populations.

### **5. Strategies for Integrating Pickleball and Elderly Care**

#### **5.1. Strengthening Leadership and Support**

Governments at all levels should incorporate pickleball into their social development strategic plans, particularly as part of key initiatives to promote healthy and active aging. This should include increasing financial investment to support the growth of pickleball and formulating policies that encourage the participation of middle-aged and elderly individuals in the sport.

#### **5.2. Enhancing Facility Development**

Firstly, it is essential to strengthen the development of the pickleball social sports instructor team by training a group of specialized coaches who understand the physical and psychological characteristics of middle-aged and elderly individuals. These coaches should work within communities and villages to guide elderly pickleball players in engaging in the sport healthily. Relying on community hospitals, a rehabilitation medical team for middle-aged and elderly people should be established to provide scientific fitness guidance and ensure safe exercise. Regular health check-ups and exercise guidance should be offered to participants, along with the creation of safety guidelines specifically for the elderly to minimize risks during activities. Additionally, a dedicated workforce of pickleball organizers for the elderly should be cultivated to promote and expand the sport, continuously growing the community of enthusiasts.

#### **5.3. Promoting Diverse Operations**

Firstly, pickleball courts should be built in communities, villages, elderly care institutions, and other relevant venues to promote the widespread adoption of pickleball among middle-aged and elderly individuals. Secondly, community social sports guidance centers should be established, with funding and subsidies secured to provide a platform for social sports instructors to carry out their work. Thirdly, the construction of pickleball courts should be encouraged through government subsidies and private investment, enabling the organization of high-level pickleball tournaments for the elderly, fostering skill exchange and deeper understanding of the sport.

#### **5.4. Promote Diversified Operations**

Firstly, an incentive mechanism should be established to encourage elderly participation in pickleball. This could include organizing regular tournaments, offering free teaching courses, and setting up reward systems. Secondly, research should be conducted on how to increase the involvement and interest of the elderly's family members through various activities, such as parent-child competitions, family tournaments, or pickleball cultural salons. Thirdly, the economic impact of pickleball on the elderly care industry and related sectors (such as sports equipment and health services) should be analyzed, and efforts should be made to attract investment from relevant companies and introduce products that cater to these needs.

#### **6. Conclusion**

In conclusion, research into the integration of pickleball and the elderly care industry not only offers the elderly a new way to engage in social interaction and physical exercise, but also promotes their physical and mental well-being. The simplicity and low intensity of pickleball make it an ideal choice for older adults to participate in sports activities. By introducing pickleball into elderly care institutions, it can effectively improve the quality of life for seniors, reduce feelings of loneliness and depression, and enhance their coordination and balance.

Moreover, the promotion of pickleball can drive the development of related industries, such as the manufacturing and sale of pickleball equipment, training for professional coaches, and the organization of tournaments and events. This not only injects new vitality into the elderly care industry but also creates more employment opportunities in society. As pickleball becomes more widespread in the elderly care sector, it is reasonable to anticipate that it will become a new force driving innovation and development within the elderly care industry.

#### **References**

- [1] Z.P. Ren, Report on China's Aging, Dev. Research, 40 (2023) 22-30.
- [2] Guanantianxia, China's nursing home industry: the aging process is giving birth to huge demand, and the market has not yet produced a real head enterprise, (2024).
- [3] The Blue Book on the health of the elderly: research and strategies for healthy aging in China, Soft. Sci. He., 34 (2020) 105.
- [4] N.R. Jia, L. Shi, Y.Y. Liu, Feasibility Analysis of Emerging Pickball Exercise in Preventing Falls in the Elderly from the Perspective of Exercise Intervention, Abstract Collection of Papers from the 2nd Shaanxi Provincial Sports Science Conference, Xi 'an Jiaotong University Sports Center, (2024) 229-235.
- [5] H.J. Chen, Theoretical and empirical research on the motive force of the integration of sports industry and endowment industry, J. SD. Inst. Phy. Edu., 38 (2022) 82-90.