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Current Development Status of Lifestyle Medicine Internationally and Domestically and Challenges for Its Sinicization: Postprint

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Abstract

Lifestyle Medicine originated in the 1980s and is an emerging interdisciplinary field involving medicine, nutrition, exercise science, epidemiology, psychology, and other domains. Serving as a critical link between public health promotion and clinical treatment, it represents an important health strategy for the prevention, treatment, and rehabilitation of all diseases. This article systematically reviews the definition and connotation, origin and development, and efficacy evaluation tools of Lifestyle Medicine, finding that Lifestyle Medicine aligns highly with the Traditional Chinese Medicine concept of “preventive treatment of disease.” The development of Lifestyle Medicine as a discipline in China remains in its infancy; although some research achievements have been made in chronic disease management, there is currently still a lack of detailed, quantified, and standardized implementation guidelines, clinical protocols, and evaluation systems for lifestyle interventions. The adaptation of Lifestyle Medicine to the Chinese context still requires integration with local national conditions, increased support from national policies, establishment of a national data monitoring system and decision support system, attention to health equity and optimization of health resource allocation across different regions, and further integration of the characteristic therapies and “simple, convenient, and inexpensive” advantages of Traditional Chinese Medicine, in order to promote the application and dissemination of Lifestyle Medicine in the field of chronic disease prevention and management, and to improve national health levels.

Full Text

Preamble

Title: The Current State of Development and the Challenges of Localization in Lifestyle Medicine both Domestically and Internationally

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Abstract

Lifestyle Medicine, which emerged in the 1980s, is an interdisciplinary discipline involving various fields such as medicine, nutrition, exercise science, epidemiology, and psychology. It serves as a crucial bridge between public health promotion and clinical treatment, representing a significant health strategy for the prevention, treatment, and rehabilitation of all diseases. This paper presents a comprehensive review of the definition, connotation, origin, development, and evaluation tools for assessing the effectiveness of Lifestyle Medicine. The findings reveal that Lifestyle Medicine aligns remarkably well with the principle of traditional Chinese medicine (TCM) regarding disease prevention and treatment. Despite notable research advancements in chronic disease management in China, the field remains at an early stage of development, lacking specific, quantified, and standardized guidelines for implementing lifestyle interventions, as well as clinical protocols and evaluation systems. The localization of Lifestyle Medicine in China must consider local conditions while increasing national policy support to establish a national data monitoring system and decision support system. Emphasizing health equity and optimizing resource allocation across different regions are also essential aspects to be considered. Furthermore, integrating the advantages of TCM, including its characteristic therapies, simplicity, and cost-effectiveness, will promote the application and dissemination of Lifestyle Medicine for preventing and managing chronic diseases, thereby enhancing overall population health.

Keywords: Lifestyle Medicine; Preventive treatment of disease; Health behavior; Health promotion; Disease management; Review

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1. Definition and Connotation of Lifestyle Medicine

Lifestyle Medicine is an emerging medical discipline that integrates medicine, nutrition, exercise science, epidemiology, and psychology. It serves as a critical “bridge” between public health promotion and clinical treatment, promoting physical and mental health through the application of environmental, behavioral, and psychological principles. Similar concepts include preventive medicine, health promotion, and health management; however, Lifestyle Medicine focuses more on individual behavior and lifestyle modification, emphasizing the role of daily life. Preventive medicine encompasses broader strategies such as vaccination and public health policy; health promotion aims to enhance health capacity through education, policy, and environmental improvement; and health management tends toward systematic and personalized health administration, focusing on public and primary health while addressing both “existing disease” and “pre-disease” conditions. Although Lifestyle Medicine overlaps with these fields, its uniqueness lies in emphasizing health goals through daily lifestyle changes, providing not only health monitoring and management but also concrete and feasible pathways for individual health improvement.

Regarding core competencies, the Lifestyle Medicine Global Alliance (LMGA) identifies whole-food or plant-based dietary patterns, physical activity, restorative sleep, stress management, avoidance of risky substances, and positive social relationships as its six core elements. Similar to international definitions, China’s Healthy Lifestyle Medicine Center defines Lifestyle Medicine as an emerging discipline that uses lifestyle interventions—including nutrition, physical activity, sleep, stress management, substance abuse avoidance, and social support—as non-pharmacological treatments to prevent, treat, and rehabilitate chronic diseases based on evidence-based medicine. As the field rapidly develops and healthcare practitioners’ interest grows, the core competencies of Lifestyle Medicine expanded from the original six domains to ten in 2022 [Figure 1: see original paper], aiming to influence nutrition, physical activity, risky substances (tobacco and alcohol), sleep hygiene, health behavior change, emotional and mental health, and connectedness and positive psychology, guided by the science of Lifestyle Medicine and leadership and advocacy. This highlights the scientific nature of Lifestyle Medicine and the leadership role of clinicians in patient health promotion through complex interventions across physical, mental, and psychological dimensions to achieve behavioral change and ultimately transform clinical processes.

Clinical processes in Lifestyle Medicine are systematic and comprehensive, covering prevention, screening, diagnosis, treatment, and monitoring. These processes involve integrating lifestyle indicators (such as diet, exercise, and tobacco/alcohol use) into medical history and physical examinations; implementing evidence-based clinical practice guidelines related to Lifestyle Medicine; com-

paring Lifestyle Medicine effectiveness with pharmacological treatment; screening, diagnosing, treating, and monitoring lifestyle-related diseases while providing guidance; optimizing Lifestyle Medicine consultations; and creating and utilizing electronic health records containing Lifestyle Medicine guidance for clinical decision-making and care. The concept of Lifestyle Medicine was formally proposed by Ernest L. Wynder in 1991, though its connotation was already reflected in traditional medicine over two thousand years ago, showing high consistency with the “preventive treatment of disease” theory. This ancient wisdom, originating from the *Huangdi Neijing*, has a history of more than two millennia and encompasses three aspects: (1) preventing disease before it occurs, (2) preventing disease progression after onset, and (3) preventing recurrence after recovery—all highly compatible with Lifestyle Medicine principles. The *Suwen · Siqu Tiaoshen Dalun* states: “The sage does not treat disease after it has occurred but prevents it before it arises; does not restore order after chaos has begun but maintains it before it starts... To treat after disease has formed or to restore order after chaos has erupted is like digging a well when thirsty or casting weapons when attacked—it is too late.” This established a unique perspective in TCM. Therefore, expressions of Lifestyle Medicine connotation are consistent across domestic and international contexts and ancient and modern times, all emphasizing a “patient-centered” approach to prevent or reverse disease through lifestyle changes, such as modifying diet, daily routines, sleep, and physical activity to achieve longevity and health preservation. With the international development of TCM, Lifestyle Medicine may further incorporate characteristic TCM modules such as medicinal food therapy (medicine-food homology), herbal tea substitutes, medicinal baths, TCM exercises, and massage to promote its sinicization.

2.1 International Origin and Development of Lifestyle Medicine

Reviewing the origin and development of Lifestyle Medicine, the earliest research can be traced to 1988, when Ernest L. Wynder began examining how lifestyle habits affect health while discussing smoking’s impact on lung cancer. In 1991, he formally proposed the concept of Lifestyle Medicine, emphasizing that lifestyle choices such as smoking and dietary habits significantly influence chronic disease morbidity and mortality. These ideas reflected early understanding of Lifestyle Medicine concepts to some extent. In 1993, Finland’s Diabetes Prevention Study (DPS) officially launched, initiating standardized and systematic research on lifestyle intervention. Subsequently, the U.S. Diabetes Prevention Program (DPP) in 1996 further established the important role of Lifestyle Medicine in chronic disease management. Finland’s DPS achieved landmark results in 2001, while the U.S. DPP published 10-, 15-, and 21-year follow-up results in 2009, 2015, and 2022, respectively. These findings played a crucial role in promoting Lifestyle Medicine application in diabetes prevention, treatment, and patient management.

In 1999, James Rippe published the first Lifestyle Medicine monograph, defining it as “the study of how daily habits and behaviors affect disease prevention and treatment, often combined with medication or surgical therapy to provide important adjuncts to overall health.” This publication facilitated public dissemination and popularization of Lifestyle Medicine. In 2004, the American College of Lifestyle Medicine (ACLM) was formally established in the United States, dedicated to clinical and field practice of Lifestyle Medicine. Since then, Lifestyle Medicine interventions have become independent clinical treatment plans, focusing on diet, exercise, sleep, and mental health with specific details on target populations, intensity/dosage, frequency, and duration. In 2005, the U.S. National Institutes of Health (NIH) released Therapeutic Lifestyle Changes (TLC) to improve cholesterol levels and heart health. In 2009, the American College of Preventive Medicine (ACPM) hosted a blue-ribbon panel on Lifestyle Medicine competency development to establish core competencies and ensure physicians possess essential skills for effective lifestyle assessment and intervention development to prevent and manage chronic diseases through evidence-based behavioral changes. In 2015, ACLM launched the Lifestyle Medicine Global Alliance to address growing demand for Lifestyle Medicine solutions in low- and middle-income countries and facilitate communication and coordination among professional organizations worldwide. These academic organizations provided important platforms for global application and promotion of Lifestyle Medicine achievements in chronic disease management and treatment.

In 2017, ACPM noted that the importance of lifestyle change is often neglected in medical education and that introducing Lifestyle Medicine education from medical school could yield greater results in preventing diabetes, hypertension, and other chronic diseases. Therefore, ACPM proposed incorporating “Lifestyle Medicine education and social determinants of health (SDoH)” into undergraduate, graduate, and continuing medical education, covering nutrition, exercise, sleep, and stress management to enhance recognition of Lifestyle Medicine’s role in health maintenance and promote this concept throughout the medical field as a cutting-edge approach rather than a highly specialized domain alone. However, as of 2024, although many organizations and universities such as Harvard Medical School offer Lifestyle Medicine courses and certificates, no degree accreditation exists, limiting the field’s recognition and authority in education. In 2018, the American Association of Medical Colleges (AAMC) defined Lifestyle Medicine Physician as one of five emerging medical specialties, after which Lifestyle Medicine’s status in disease management became increasingly prominent, gradually becoming a key or even primary treatment for preventing and managing various chronic diseases including diabetes, hypertension, and hyperlipidemia.

From 2020 to 2023, international organizations including the European Society of Cardiology (ESC), European Association for the Study of Diabetes (EASD), U.K. National Institute for Health and Care Excellence (NICE), and American Diabetes Association (ADA) published relevant guidelines to further standardize lifestyle interventions and clarify their core role in chronic disease management.

These policy releases and guideline publications facilitated Lifestyle Medicine integration as a complex and independent discipline into education, healthcare, and management. With the establishment of global organizations, Lifestyle Medicine developed rapidly, expanding its core competencies to ten domains in 2022, covering nutrition, exercise, sleep, psychology, and social connections. Thus, through clinical research implementation, academic organization establishment, national policy support, and guideline publication, Lifestyle Medicine has achieved steady international development with continuously enriched core elements and dimensions, gradually applying to multiple fields and medical scenarios including prevention, treatment, and management. Its influence and application scope will further expand as research findings and clinical practice deepen.

2.2 Domestic Origin and Development of Lifestyle Medicine

The development of Lifestyle Medicine in China may be traced to 1986, when medical workers led by Professor Pan Xiaoren recognized that with improving material living standards, chronic diseases such as diabetes would continue to rise in prevalence. They understood that lifestyle change was more critical than medication alone for preventing chronic disease onset and progression, and consequently launched the decades-long China Da Qing Diabetes Prevention Study (CDQDPS). The study achieved significant milestones in 1997, 2008, 2014, and 2019, demonstrating that six years of moderate, simple lifestyle intervention could reduce diabetes incidence by 30%-50%, that exercise and diet had long-lasting effects, and that six years of lifestyle intervention could reduce cardiovascular disease and microvascular complication risks. However, given the difficulty of maintaining lifestyle changes long-term, lifestyle intervention combined with medication might more effectively prevent diabetes. Based on this, China launched CDQDPS Phase II—the China Diabetes Prevention Program (CDPP) in 2017, which in 2023 found that metformin plus lifestyle intervention reduced diabetes risk by 17% compared to lifestyle intervention alone. These high-quality evidence-based research results established the important position of Lifestyle Medicine in diabetes prevention and management.

In 2008, the “Healthy China” strategy marked the widespread dissemination of disease prevention and health improvement concepts. In 2015, China’s Ministry of Science and Technology incorporated “active health” into national key research and development programs, giving Lifestyle Medicine practical significance and implementation subjects. This major initiative promoted whole-population, whole-life-cycle health attention, integrating lifestyle elements into daily life to fully leverage residents’ subjective initiative in preventing and managing chronic diseases such as diabetes, hypertension, and hyperlipidemia. In 2017, the Ministry of Science and Technology, together with the former National Health and Family Planning Commission, General Administration of Sport, China Food and Drug Administration, State Administration of Traditional Chinese Medicine, and Central Military Commission’s Logistic Support

Department, formally included “active health” in the “13th Five-Year Plan for Health and Health Technology Innovation,” further highlighting its important position in public health. In 2018, the “China Lifestyle Medicine and Chronic Disease Reversal Forum” was held in Shanghai, and Shenzhen University Fifth Affiliated Hospital established a Lifestyle Medicine specialty clinic. In 2019, the State Council issued the “Healthy China Action (2019-2030),” explicitly shifting from “disease management” to “health management” and from “treating existing disease” to “preventing disease,” adhering to prevention-first principles and emphasizing lifestyle impacts on health issues. The plan proposed fifteen special actions, prioritizing reasonable dietary actions, national fitness actions, and tobacco control actions to improve public awareness and management capacity for chronic diseases.

In 2020, China held the first “China Lifestyle Medicine Conference,” and the National Center for Cardiovascular Diseases established the country’s first Healthy Lifestyle Medicine Center—two major events marking the formalization and systematization of Lifestyle Medicine in China. That same year, the Chinese Preventive Medicine Association published the first guideline for preventing cardiometabolic diseases through lifestyle management: the “Chinese Guideline for Healthy Lifestyle Prevention of Cardiometabolic Diseases.” In November 2023, China published its first translated Lifestyle Medicine monograph.

Comparing domestic and international development reveals that China initiated standardized clinical research on lifestyle intervention and management for metabolic and respiratory diseases relatively early. However, development in discipline establishment, monograph publication, academic institution formation, and national policy issuance has lagged far behind international progress, particularly in monographs—taking more than 20 years to formally translate and publish relevant works. Additionally, China lags in Lifestyle Medicine education, knowledge dissemination, and popularization (Figure 2 [Figure 2: see original paper]). Despite solid population research foundations and large cohort study achievements, room for improvement remains in development progress and innovation. Since 2008, with national policy support, Lifestyle Medicine concepts have gradually penetrated chronic disease management and guideline development, aligning with international standards while making characteristic adaptations to Chinese conditions. Future clinical practice in China, especially regarding leadership and advocacy in chronic disease management, will continue to strengthen.

Regarding guidelines, domestic publications vary in their specificity on lifestyle intervention implementation. China has issued guidelines including the “Chinese Guideline for Cardiovascular Disease Prevention (2017),” “National Guideline for Primary Care Management of Diabetes with Traditional Chinese Medicine (2022),” “Chinese Guideline for the Prevention and Treatment of Type 2 Diabetes (2020 Edition),” “National Guideline for Primary Care Management of Hypertension (2020 Edition),” and “Chinese Guideline for Blood Lipid Management (Primary Care Edition 2024),” covering diet, physical activity,

sleep, tobacco/alcohol, and psychological dimensions. However, most guidelines only briefly outline lifestyle intervention as part of treatment. For example, the “Chinese Guideline for Blood Lipid Management (Primary Care Edition 2024)” recommends healthy lifestyles including reasonable diet (limiting saturated and trans fatty acids, increasing vegetables, fruits, whole grains, dietary fiber, and fish), moderate physical activity, BMI control, smoking cessation, and alcohol limitation—but without specific implementation details such as food intake amounts, exercise duration/intensity, or specific alcohol consumption limits. Consequently, these guidelines lack sufficient detail, quantification, and standardization. Nevertheless, as Lifestyle Medicine develops, guidelines and consensus for chronic disease management are gradually improving, with some specifying implementation details. The 2024 “Expert Consensus on Lipid Management in Diabetic Patients (2024 Edition)” lists lifestyle intervention as the primary treatment method, clearly defining implementation details for healthy balanced diet, moderate exercise, healthy weight, and smoking/alcohol cessation. Overall, China still lacks standardization in developing lifestyle management guidelines and currently lacks consensus or guidelines specifically targeting lifestyle management for chronic disease prevention and treatment, indicating that Lifestyle Medicine promotion and implementation in China require further development.

Regarding National Natural Science Foundation funding, 43 publicly funded projects with “lifestyle” as the theme were identified through various platforms as of 2023. The first approved project was the 2002 international cooperation and exchange project “Advanced Seminar on Nutrition and Lifestyle Epidemiology” awarded to the Chinese Center for Disease Control and Prevention. Since 2018, the number of awarded projects has increased, primarily general projects and regional science fund projects focusing on non-communicable diseases, malignant tumors, and metabolic diseases (details in Table 1). However, despite Lifestyle Medicine’s multidisciplinary nature and relevance to multiple systemic diseases, current research concentrates on exploring lifestyle impacts and mechanisms on diseases or environments, with insufficient attention to establishing quantified, standardized implementation details and evaluation systems. This indicates that although research coverage is broad, existing studies have not adequately addressed development limitations and bottlenecks. Moreover, Lifestyle Medicine in China remains in its preliminary stage, not yet forming an independent discipline system, often associated with chronic disease management, nursing, and public health. Further policy support and researcher investment are needed to advance this field and discipline.

3. Evaluation Tools for Lifestyle Intervention Efficacy

Scientific and objective lifestyle assessment can effectively measure population health behaviors and evaluate efficacy in improving unhealthy behaviors. However, current lifestyle evaluation primarily uses scales or scores without unified standards. The classically widely used clinical scale is the Health

Promoting Lifestyle Profile (HPLP), developed by Walker et al. in 1987 and revised to HPLP-II in 1997, which remains in use today. HPLP-II comprises 52 items across six dimensions: physical activity, health responsibility, stress management, nutrition, interpersonal relationships, and spiritual growth. Numerous empirical studies have examined the scale's reliability and validity. Research on postmenopausal women found HPLP-II has high internal consistency and test-retest reliability (Cronbach's $\alpha = 0.98$). The Chinese version applied to Chinese community residents also demonstrated high reliability (Cronbach's $\alpha = 0.89$). Considering HPLP-II's many items and lengthy evaluation time, some studies use lifestyle scores directly to assess health status. Qi et al. and Fan et al. evaluated lifestyle health based on six aspects: smoking, alcohol consumption, physical activity, dietary habits, BMI, and waist-to-hip ratio, defining healthy lifestyle as: no smoking; alcohol consumption ≤ 1 time/week or alcohol intake < 30 g/day for men and < 15 g/day for women with non-daily drinking; at least 30 minutes/day of moderate-to-vigorous activity; daily fruit and vegetable consumption; BMI $18.5 - 23.9$ kg/m²; waist-to-hip ratio < 0.90 for men and < 0.85 for women. Sun et al. assessed healthy lifestyle based on five modules (smoking, alcohol consumption, sleep, physical activity, and BMI), defining healthy lifestyle as non-smoking, limited alcohol consumption, regular physical activity, adequate sleep, and BMI 18.5 kg/m².

In 2019, the HeaLIQs4cities project funded by the European Institute of Innovation and Technology organized academic experts in geriatrics, cardiology, sports medicine, neurology, neurobiology, psychology, and nutrition to develop a healthy lifestyle assessment toolkit covering eight components: (1) anthropometric and cardiometabolic parameters; (2) physical activity and exercise; (3) well-being, social cohesion, and individual independence; (4) nutrition; (5) mental health; (6) smoking, alcohol, and prohibited substances; (7) sleep habits and quality; and (8) health and disease—spanning nutrition, exercise, psychology, sleep, and medicine. China has also kept pace internationally in evaluating Lifestyle Medicine efficacy. In November 2023, led by the Healthy Lifestyle Medicine Center of Fuwai Hospital, Chinese Academy of Medical Sciences, and organized by over 50 national experts and scholars, China released the Comprehensive Healthy Lifestyle Index. This composite score evaluates lifestyle health across five dimensions: diet, physical activity, nicotine exposure, sleep, and mental health. Based on this index, a complete set of information application tools will be developed to promote clinical practice application of Lifestyle Medicine.

In summary, domestic and international efforts have focused on objective, quantified, and standardized lifestyle efficacy assessment, but no unified, standardized evaluation system has been established. Existing scales facilitate quantified evaluation but cover broad issues and require substantial time, making them unsuitable for large-scale popularization. Future development of toolkits or electronic scales should consider simplifying evaluation processes and refining relevant items to make Lifestyle Medicine efficacy assessment more convenient and practical.

4.1.1 Status of Ancient Traditional Chinese Medicine “Preventive Treatment of Disease” Thought

The connotation of Lifestyle Medicine was already reflected in the *Huangdi Neijing*. Regarding diet: “carefully harmonize the five flavors,” “grains as nourishment, fruits as assistance, meats as benefit, vegetables as filling,” and “eating meat causes relapse, excessive eating causes lingering—this is prohibited.” As of 2024, the National Health Commission and State Administration for Market Regulation jointly approved 102 medicine-food homology substances [14 were solicited in a 2014 draft, but only 6 were approved in 2019] (Table 2) to ensure safe and scientific integration of medicinal and edible functions to improve public health. Regarding exercise: “prolonged sitting injures flesh, prolonged lying injures qi” and “daoyin eliminates all diseases and prolongs life.” Regarding sleep: “regular daily routines” and “in spring, retire late and rise early... in winter, retire early and rise late.” Regarding emotions/psychology: “all diseases arise from qi” and “when spirit is guarded internally, how can disease occur?”

Beyond traditional theory, recent clinical research provides evidence-based support for the practicality of “preventive treatment of disease” in Lifestyle Medicine, demonstrating its important role in preventing, treating, and rehabilitating chronic diseases such as diabetes and stroke. A meta-analysis of 10 randomized controlled trials (RCTs) showed that Tai Chi and Baduanjin can reduce fall risk in older adults. An RCT of 101 pre-diabetic patients demonstrated that medicinal food buns (containing mulberry, polygonatum, Chinese yam, coix seed, polygonatum odoratum, hawthorn, etc.) could reduce fasting and postprandial blood glucose and improve physical and mental health. A systematic review and meta-analysis of 529 subjects showed Tai Chi promotes early rehabilitation and improves daily living ability in stroke patients. These studies emphasize the possibility of integrating traditional Chinese concepts with Lifestyle Medicine, providing research ideas for preventing and managing chronic diseases through integrated Chinese and Western medicine.

4.1.2 Status of Modern Lifestyle Medicine

With strengthened government health promotion policies and improved public health awareness, Lifestyle Medicine has achieved some accomplishments in China, particularly the Da Qing Study led and completed by Chinese researchers. The first 10-year results showed that six years of lifestyle intervention reduced diabetes incidence by 30%-50%. The second 10-year study confirmed that diet and exercise-based lifestyle interventions could effectively reduce diabetes incidence long-term. The third 10-year study demonstrated that six years of lifestyle intervention significantly reduced cardiovascular disease incidence, all-cause mortality, and diabetes incidence in patients with impaired glucose tolerance (pre-diabetes). The study also found that dietary intervention and combined diet-exercise intervention were significantly more effective than exercise alone. Currently, Da Qing Study results lead the world, provid-

ing high-quality evidence based on Chinese data for clinical practice guidelines and policy formulation, driving rapid progress in Lifestyle Medicine for chronic disease management.

Although Chinese-characteristic Lifestyle Medicine has achieved results—establishing authoritative institutions (e.g., Healthy Lifestyle Medicine Center), successfully holding academic conferences, conducting large-sample high-quality RCTs, and developing lifestyle-related guidelines—it also faces challenges requiring targeted measures.

First, we must address China’s rapidly growing population aging and socialist system characteristics. China’s large population base and rapidly growing elderly population place higher demands on health management systems, particularly for chronic and geriatric diseases. Elderly populations often have multiple coexisting diseases and polypharmacy, increasing treatment complexity and polypharmacy reaction risks. Meanwhile, significant urban-rural differences in resources and health literacy exist. Therefore, better managing the growing elderly population and reducing unnecessary medication is crucial. Lifestyle change represents an important prevention and treatment measure for most elderly chronic diseases (e.g., diabetes, hypertension, hyperlipidemia), providing a significant opportunity for Lifestyle Medicine promotion. However, due to cultural and educational differences, public awareness of this field remains generally low, increasing application difficulty. Potential solutions include: (1) using cutting-edge implementation science theories and methods to promote patient health behavior change; (2) conducting health lifestyle education and promotion activities through communities, television, and media, especially in rural and remote areas, to improve popularity and application rates; (3) leveraging China’s superior socialist system where national policy support can effectively advance health decisions; and (4) utilizing the multi-level diagnosis and treatment model under the medical consortium system and the Chinese and Western medicine-relying medical system to effectively promote public implementation of lifestyle interventions and improve national health levels. However, Lifestyle Medicine development in China remains preliminary, with relatively low public awareness and attention, requiring government legislation and policy support for development. Measures include: incorporating Lifestyle Medicine discipline development as a key component of Healthy China construction; providing financial subsidies for healthy food production, public exercise facilities, or tax incentives related to healthy lifestyles; and developing national-level health promotion plans that integrate Lifestyle Medicine into core public health strategies to ensure long-term, sustained investment. Additionally, although China’s medical insurance system has broad coverage, limitations remain in reimbursement ratios and coverage of drugs and treatment items, potentially affecting Lifestyle Medicine promotion and implementation. In the long term, incorporating simple, low-cost lifestyle management into medical insurance coverage can not only promote Lifestyle Medicine popularization and implementation but also reduce national healthcare burdens and improve comprehensive management efficiency for various diseases, especially chronic diseases.

Second, we must consider regional development imbalances and health equity. Significant differences between eastern and western China, urban and rural areas, and tertiary hospitals versus primary healthcare institutions in economic conditions, medical resources, health knowledge awareness, and education levels collectively affect Lifestyle Medicine implementation efficacy and accessibility. In resource-limited areas such as western remote regions, rural areas, and primary healthcare institutions, patients may not receive timely medical services. However, these areas have large populations and high chronic disease incidence, representing key targets for improving national health. Therefore, exploring how to maximize limited resource utilization is essential. Future prospects include optimizing regional health resource allocation through online/offline academic exchanges and remote medical services to improve medical service quality in remote areas; utilizing township and community grid management channels to conduct health lifestyle education and promotion activities to raise public awareness; and developing and promoting health promotion projects combined with local culture and regional characteristics (e.g., authentic medicinal materials, medicine-food homology) to alleviate medical inequity caused by regional development imbalances and promote balanced Lifestyle Medicine development nationwide.

Third, we must strengthen TCM efficacy evaluation and evidence-based research, integrating TCM with Lifestyle Medicine to fully leverage TCM advantages. In recent years, the Chinese government has issued multiple policies to promote TCM development, including increasing TCM service supply, supporting TCM internationalization, and emphasizing integrated Chinese and Western medicine. These policies provide a solid foundation for TCM application within Lifestyle Medicine. TCM's holistic concept and "preventive treatment of disease" philosophy offer unique insights and methods for adjusting lifestyle habits, diet, and emotions. TCM encompasses medicinal diets, medicinal baths, exercises, acupuncture, massage, and other modalities that provide valuable methods and resources for enriching Lifestyle Medicine's connotation. As Hu Shengshou from the Healthy Lifestyle Medicine Center stated: "Healthy Lifestyle Medicine, inheriting ancient wisdom from traditional Chinese and Western medicine and philosophy, faces new development opportunities under modern technology, offering hope for solving current and future human health problems." Additionally, "medicine-food homology" is a characteristic TCM concept, with numerous substances demonstrating definite efficacy in preventing and treating diabetes, hypertension, obesity, and other chronic diseases, making them suitable for medicinal diets and tea substitutes. These represent important Lifestyle Medicine components with broad application potential. However, current TCM application in Lifestyle Medicine still lacks high-quality evidence-based support, requiring rigorous research design, standardized methodology, reasonable and strict regulatory systems, and high-quality RCTs compliant with international standards. Researchers must also maintain TCM characteristics and emphasize cross-disciplinary integration to maximize TCM advantages in Lifestyle Medicine for preventing, treating, and rehabilitating various diseases,

particularly chronic diseases.

In conclusion, as an emerging interdisciplinary field involving medicine, nutrition, exercise science, epidemiology, and psychology, Lifestyle Medicine is closely related to multiple diseases and offers unique advantages for chronic disease prevention and management. Despite broad application prospects, Lifestyle Medicine in China remains in its infancy, lacking specific, quantified implementation details and standardized evaluation systems that limit its widespread application in clinical practice and public health strategies. Establishing scientific and rigorous evaluation standards and evidence-based research foundations is crucial for advancing Lifestyle Medicine. The sinicization of Lifestyle Medicine must integrate China's rapidly growing aging population and socialist system characteristics, consider regional development imbalances, combine traditional "preventive treatment of disease" concepts, and conduct high-quality clinical research to provide scientific, objective evidence supporting TCM efficacy while fully leveraging its advantages and characteristics. Future development requires national policy support, balanced and optimized regional health resource allocation, and integration of TCM traditional wisdom with modern Lifestyle Medicine research to form culturally characteristic and regionally adaptable lifestyle health management strategies. This will promote sinicized Lifestyle Medicine development, improve comprehensive prevention and control rates for various diseases (particularly chronic diseases), and enhance national health levels.

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