

Wellness Policy Series

**Wellness
Policy
Toolkit:
Physical
Activity**

April 2023



**GLOBAL WELLNESS
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EMPOWERING WELLNESS WORLDWIDE

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About the Authors

About the Global Wellness Institute

The Global Wellness Institute (GWI), a 501(c)(3) non-profit organization, is considered the leading global research and educational resource for the global wellness industry and is known for introducing major industry initiatives and regional events that bring together leaders and visionaries to chart the future. GWI positively impacts global health and wellness by advocating for both public institutions and businesses that are working to help prevent disease, reduce stress, and enhance overall quality of life. Its mission is to empower wellness worldwide.

www.globalwellnessinstitute.org

About the Authors

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Preface: About the *Wellness Policy Series*

Why is GWI releasing a *Wellness Policy Series*?

Since its inception, the Global Wellness Institute (GWI) has embraced the vision of “empowering wellness worldwide.” Even as we study and advocate for the multi-trillion dollar wellness economy, we also recognize that the private wellness market and consumer action alone cannot bring about wellness for all. Widespread adoption of preventive approaches and healthy lifestyles is essential if we are to address our mounting global health crises and spiraling economic costs. And yet, not everyone has the resources, motivation, knowledge, or enabling environment to do so. Public policy is essential to fill these gaps. This realization is the genesis of GWI’s *Wellness Policy Series*.

Who is the *Wellness Policy Series* for?

When we talk about policy, the implication is that we are speaking to governments, but this series is not just for government stakeholders. **Policies to advance the cause of wellness for all require the attention, participation, and cooperation of public, private, and nonprofit/community stakeholders.** In fact, the separate development streams and “siloes” across consumer/business wellness, public health systems, and preventive health/medicine have impeded us from making greater strides toward this goal.

GWI’s *Wellness Policy Series* was created to support anyone who would like to leverage policy as a tool to promote better human health and well-being. Whether you are a **government leader, policymaker, public servant, private business, nonprofit, or concerned citizen**, this series will provide you with cross-cutting and actionable ideas for policies, programs, collaborations, and advocacy efforts to address gaps, meet the needs of different population groups, and expand access to wellness for all.

What is covered in the *Wellness Policy Series*?

The *Wellness Policy Series* is a compilation of nine reports, which aim to define wellness policy, articulate why it is needed, and provide a framework and set of strategies for implementing wellness policies across many domains of wellness. The series includes the following reports:

- *Defining Wellness Policy* (November 2022)
- *Health, Happiness, and the Wellness Economy: An Empirical Analysis* (January 2023)
- *Seven Wellness Policy Toolkits* (2023-2024)
 - Healthy Eating
 - Physical Activity
 - Mental Wellness
 - Traditional & Complementary Medicine
 - Wellness in the Built Environment
 - Wellness at Work
 - Wellness in Tourism

What are the *Wellness Policy Toolkits*?

The *Wellness Policy Toolkits* are a core part of GWI's *Wellness Policy Series*. The toolkits focus on seven domains of wellness (see *table below*). Each toolkit addresses both the **why** and **how** of wellness policy: What is the rationale and need for wellness policy action in each domain? How can stakeholders (governments, businesses, communities, nonprofits) take action to address important issues and gaps?

Wellness Policy Domains Covered in GWI's <i>Wellness Policy Toolkits</i>	
Wellness Activities and Lifestyles	Wellness-Supporting Environments
<ul style="list-style-type: none">• Healthy Eating• Physical Activity• Mental Wellness• Traditional & Complementary Medicine	<ul style="list-style-type: none">• Wellness in the Built Environment• Wellness at Work• Wellness in Tourism

Some of the domains covered in the toolkits already have a massive body of research, literature, strategies, and action plans behind them (e.g., physical activity, healthy eating), while other domains do not (e.g., mental wellness, wellness in tourism). A major new contribution of the *Wellness Policy Toolkits* is to consolidate and codify all of the domains and policy actions that fall under the large umbrella of “wellness policy.” In addition, the toolkits emphasize the numerous areas of intersection across the seven wellness domains and how policy actions in one domain can have impacts across other areas. For example, policies focusing on the built environment can affect our individual behaviors related to physical activity, mental wellness, and healthy eating. Policies that encourage physical activity can have an impact on mental wellness.

The *Wellness Policy Toolkits* are intended to spark thinking, conversations, analyses, advocacy, and concrete efforts that will promote access to wellness modalities and deliver well-being outcomes for people across all demographic groups and regions. The toolkits are designed to be modular and general enough that they can be applied across many different political, geographic, and demographic contexts. They are a starting point that provides a menu of possible actions and can be used in many different ways.

- Some readers may use the toolkits as inspiration for developing their own comprehensive strategy or action plan to target the specific wellness needs of their city, region, or country.
- Some readers may use the toolkits to identify one or two very specific areas where they can contribute or take action within their own job, professional field, or organization.
- Those who are not already immersed or working in these wellness domains can use the toolkits as a quick-start guide to understanding the issues, opportunities, and where to find more information.
- Wellness industry stakeholders can use the toolkits to spark new ideas on building partnerships to expand wellness offerings, as well as advocacy efforts to encourage governments to prioritize wellness services/businesses as essential public services.

- Business leaders can use the toolkits to identify areas where they can take action and contribute to improving wellness for their employees, clients, constituents, communities, and stakeholders (without waiting for the government to mandate it).
- Individuals can use the toolkits to lobby their government leaders for specific policies and programs that expand access to wellness in their own communities, cities, and countries.

Much more work needs to be done in wellness policy to ensure that it is embedded in all policymaking and government investment decisions, and to help us understand which kinds of policies are most effective across different settings and populations. We hope that this *Wellness Policy Series* will spark a wellness policy movement that can be championed by any interested stakeholder groups. We invite all stakeholders in the public, private, nonprofit, and academic communities to join in this movement.

Background: What Is Wellness Policy?

Note that the content presented in this section is condensed from GWI's November 2022 report, *Defining Wellness Policy* (the first report in the *Wellness Policy Series*).

For a more in-depth discussion of these topics, see:

<https://globalwellnessinstitute.org/industry-research/2022-defining-wellness-policy/>.

Defining wellness.

To understand wellness policy, we must first understand wellness. The Global Wellness Institute (GWI) defines wellness as: **the active pursuit of activities, choices, and lifestyles that lead to a state of holistic health.**

There are two important aspects to this definition. First, wellness is not a passive or static state, but rather an “active pursuit” that is associated with intentions, choices, and actions as we work toward an optimal state of health and well-being. Second, wellness is linked to holistic health – that is, it extends beyond physical health and incorporates many different dimensions that should work in harmony (see figure).

Wellness is often confused with terms like health, well-being, and happiness. While there are common elements among them, wellness is different in that it is not associated with a static state (i.e., being happy, in good health, or a state of well-being), but rather an active process of being aware and working toward optimal holistic health and well-being.

Wellness Is Multidimensional



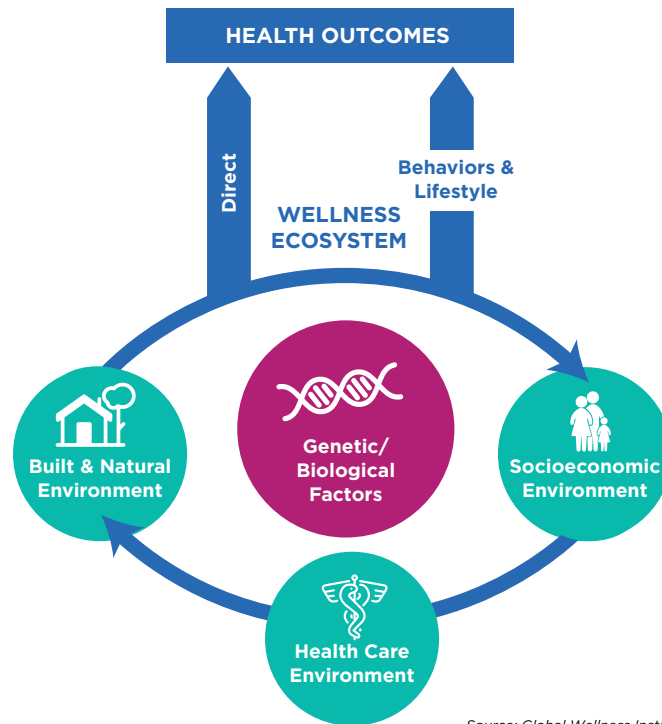
Wellness is both behavioral and environmental.

Wellness is an individual pursuit based on self-responsibility, but it is also significantly influenced by the physical, social, and cultural environments in which we live. Research on the determinants of health indicates that environmental, socioeconomic, and lifestyle factors can account for 80-90% of our disease risks and health outcomes.¹ Those who are very young, elderly, disabled, or poor are particularly vulnerable to these external factors.²

¹ Magnan, S. (2017). Social Determinants of Health 101 for Health Care: Five Plus Five. *NAM Perspectives*. Washington, DC: National Academy of Medicine. <https://nam.edu/social-determinants-of-health-101-for-health-care-five-plus-five/>. See also: Hood, C.M., et al (2016). County health rankings: Relationships between determinant factors and health outcomes. *American Journal of Preventive Medicine*, 50(2), 129-135. <https://doi.org/10.1016/j.amepre.2015.08.024>.

² See: 1) Braveman, P., et al (2011). *Issue Brief #8: Neighborhoods and Health*. Robert Wood Johnson Foundation. <http://www.rwjf.org/en/library/research/2011/05/neighborhoods-and-health-.html>. 2) Institute of Medicine and National Research Council (2013). *U.S. Health in International Perspective: Shorter Lives, Poorer Health*. Washington, DC: The National Academies Press. <https://doi.org/10.17226/13497>.

Up to **80-90%** of our health outcomes depend upon the external and environmental factors in our wellness ecosystem



Source: Global Wellness Institute

A complex web of factors (access to healthcare, socioeconomic factors, and our natural and built environments) form a “**wellness ecosystem**” that can augment or mitigate our genetic disposition for disease. **Our wellness ecosystem has a *direct* effect on our health by transmitting communicable and environmental diseases. It also *indirectly* affects our health by influencing our behaviors and lifestyles, which can lead to noncommunicable diseases.**

Public policies shape our wellness ecosystems.

Governments and public policies exert enormous influence on our wellness ecosystem - from economic and social policies, to urban planning and transportation infrastructure, to environmental regulations, and much more. They can create wellness-supporting environments, establish incentives for adopting healthy behaviors and lifestyles, reduce costs, and expand access to wellness modalities and facilities for underserved populations. In these areas, wellness policy fills critical gaps and complements existing healthcare systems and public health policies. Wellness policy is essential to help us stay physically and mentally well, to stave off preventable disease, to become resilient, and to move us closer to the goal of wellness for all.

Defining wellness policy.

The Global Wellness Institute defines wellness policy as follows:

Wellness policy is a set of cross-cutting actions that encourage healthy lifestyles and create supportive environments for human health and well-being.

Wellness is a lens through which we can reshape public policy and work toward improving human health, happiness, and well-being outcomes. Wellness policy complements and supports health, public health, and happiness/well-being policies, but it is not the same thing.

Levels of action for wellness policy.

Public policies can be formulated to shape our wellness at three levels (*see further discussion in the Toolkit section of this document*):

- 1. Micro-level wellness policy:** Encouraging individuals to proactively make healthy choices, establish healthy habits, and live healthy lifestyles.
- 2. Meso-level wellness policy:** Creating living environments that support and encourage healthy behaviors and lifestyles.
- 3. Macro-level policy:** Reshaping all policies related to our wider society and economy, with the aim of improving human health and well-being.

In many cases, macro-level policies such as reducing poverty, stopping armed conflicts, or addressing climate change will have a greater impact on our health and well-being than the meso- and micro-level policies targeting individual behaviors and community environments. Macro-level policies – covering the entire range of public policy action – are vitally important to human health and well-being. Addressing these issues is critical, but it requires long-term, systemic changes, as well as political will and compromises, which can be difficult to achieve.

In GWI's *Wellness Policy Series*, we focus primarily on actions at the micro- and meso-levels. Wellness policies at the micro- and meso-levels complement national-level well-being policy efforts. They can be implemented and have benefits for people immediately, even while we wait for the glacial progress in solving our long-term macro crises and shifting our overarching policy priorities toward well-being.

Seven wellness domains covered in GWI's *Wellness Policy Toolkits*.

As noted above, we have identified seven domains in which wellness policy can **encourage healthy behaviors and lifestyles** and that **create wellness-supporting environments**. These seven domains do not function independently from one another. They are closely interrelated, and policy actions within one domain can have impacts across other areas. For example, policies focusing on the built environment can affect our individual behaviors related to physical activity, mental wellness, and healthy eating. Policies that encourage physical activity can have an impact on mental wellness. Each *Wellness Policy Toolkit* will address these areas of intersection wherever they appear. We also address the wellness needs of specific populations and lifespan groups, including underserved and vulnerable groups such as children and older adults, wherever relevant. Stakeholders working in many government functions, industry sectors, and communities can take action across these domains, in both large and small ways, to spearhead bringing wellness to all.

Wellness Policy Domains Covered in GWI's *Wellness Policy Series*

Wellness Activities and Lifestyles

Healthy Eating	Expanding access to nutritious diets and encouraging everyone to make healthy eating choices.
Physical Activity	Supporting people of all ages to engage in the recommended levels of physical activity to stay healthy.
Mental Wellness	Improving individual and community resilience, especially to address stress and loneliness.
Traditional & Complementary Medicine	Increasing the safety, quality, and efficacy of T&CM; expanding consumer access; and protecting T&CM resources.

Wellness-Supporting Environments

Wellness in the Built Environment	Creating physical environments that support all dimensions of wellness and encourage healthy lifestyles.
Wellness at Work	Enabling everyone to work in an environment that improves rather than reduces their health and well-being.
Wellness in Tourism	Ensuring that all tourism is wellness-enhancing for visitors, destinations, and local communities.

Wellness Policy Toolkit: **Physical Activity**

Wellness Policy Toolkit: Physical Activity

Wellness Policy Toolkit: Physical Activity takes a deep dive into physical activity as a domain of wellness policy. It provides the rationale for why wellness policy in physical activity is necessary, and it outlines different types of policy actions that can support people to engage in sufficient physical activity to stay healthy, both in their daily lives and during their leisure time. It discusses the many challenges that contribute to high and rising levels of physical inactivity, and it examines specific ways in which new policies, government resources, and cross-sector partnerships can address those gaps and constraints.

We recognize that physical activity is a field with a massive body of research and literature behind it. Numerous strategies and action plans have been formulated all over the world to address the global crisis of inactivity. A unique contribution of this toolkit is that it situates physical activity policies within the broader context of wellness policy, and it identifies opportunities for policies that can simultaneously address multiple dimensions of health and well-being (e.g., physical activity and mental wellness). **This toolkit will provide a starting point for readers not already immersed in this field – to understand the wide range of issues and policy options to address them, to consider what role you might play in supporting physical activity, and to know where to look for more information and potential partners.**

In the final section of this toolkit (see *Key Resources*), we identify a variety of other research reports, guides, and action plans that drill-down on specific topics discussed in the toolkit and/or provide more details on research evidence, case studies, and strategies related to physical activity promotion. In addition, GWI's 2019 report, *Move to be Well*, provides extensive examples, across every region of the world, of strategies and initiatives that are being used to encourage physical activity and expand access. For more information, see: <https://globalwellnessinstitute.org/industry-research/global-economy-physical-activity/>.

Who should use the physical activity toolkit?

This toolkit supports anyone who would like to use policy tools to promote physical activity as an important pathway to good health. Anyone – policymaker or public servant, private business, nonprofit, or a concerned citizen – can become a champion for using public resources and public policy actions to increase physical activity, among all population groups, and in all settings (such as schools, communities, workplaces, and public places and institutions). The policy actions described here are not confined to the government bodies that are typically associated with fitness and physical activity (e.g., national sports authorities or departments of parks and recreation). They are cross-cutting and require multi-sectoral support to be implemented. Whether you are a fitness entrepreneur, an educator, an urban planner, an architect, a physician, an employer, or a human resource director, there are opportunities to advocate for policies that increase physical activity in your community, and we hope this report will be useful to assist in your endeavor.

Making the case for wellness policy: Physical activity.

Physical activity is intrinsic to wellness. As advocated by physicians and public health authorities around the world, a regular and adequate level of physical activity is vital to our health and well-being in all aspects. Physiologically, physical activity can lower the risks of many chronic diseases (hypertension, coronary heart disease, stroke, diabetes, various types of cancer); improve cardiorespiratory fitness and bone health; manage weight; improve sleep and energy; and maintain balance, agility, and mobility as we age. Recent studies have found that cardiovascular exercise may help reduce the mortality risk of COVID-19 patients.ⁱ The mental benefits of physical activity are also well-established,ⁱⁱ helping us to relax and de-stress, bringing a sense fun and joy, improving our mental resilience, and preventing cognitive decline. Where and how we exercise can produce additional rewards. For example, when we play sports or attend class with other people, we build vital social connections. Likewise, when we exercise outdoors, we get the added mental and emotional benefits of being in nature. To receive these benefits, our engagement in physical activity needs to be regular, consistent, and sustained – not intermittent, only during holidays, or only when we want to lose weight or can find the time.

According to the WHO, physical activity is not only important for individual health and well-being, but also brings many societal, economic, and environmental benefits. It helps alleviate burdens on healthcare systems and “contributes to social inclusion, gender equity, employability and education.” Recreational physical activities support critical global agendas, “including COVID-19 recovery, improving socio-economic development, reducing inequalities, addressing climate change, and contributing to the sustainable development agenda.”ⁱⁱⁱ

What Is Physical Activity?

The World Health Organization (WHO) defines physical activity as **“any bodily movement produced by skeletal muscles that requires energy expenditure...including during leisure time, for transport to get to and from places, or as part of a person’s work.”** The WHO recommends 60 minutes of moderate- to vigorous-intensity physical activity daily for children and adolescents, and 150-300 minutes of moderate-intensity physical activity, or 75-150 minutes of vigorous-intensity physical activity, for adults on a weekly basis in order to maintain good health.^{iv}

We are not getting enough physical activity to stay healthy. Over the past few decades, physical activity rates have been on the decline in many countries around the world (especially higher-income countries),^v to the extent that sedentary behavior has been called a “global pandemic.”^{vi} An estimated 27.5% of the world’s adult population is physically inactive based on WHO standards, and there has been no improvement in global levels of physical activity since 2001.^{vii} Research shows that women and girls tend to be less active than men and boys,^{viii} and adults become less active as they age. Adolescents are also less active than adults. A WHO study covering 146 countries and territories found that more than 80% of those aged 11-17 years have insufficient physical activity.^{ix}

Recent studies indicate that overall physical activity levels declined further during the COVID-19 pandemic, along with reduced participation in recreational and leisure-time physical activities. This was especially true during the peak of COVID-related shutdowns, but for many people has endured as the pandemic has continued.^x The pandemic has exacerbated the constraints and inequities that prevent many populations and communities from being physically active, while simultaneously emphasizing how essential physical activity is for good health. There are many challenges that contribute to physical inactivity, which can be addressed through targeted policy actions (summarized in the table below and discussed further in the rest of this Toolkit).

Summary: Key gaps and constraints leading to physical inactivity.

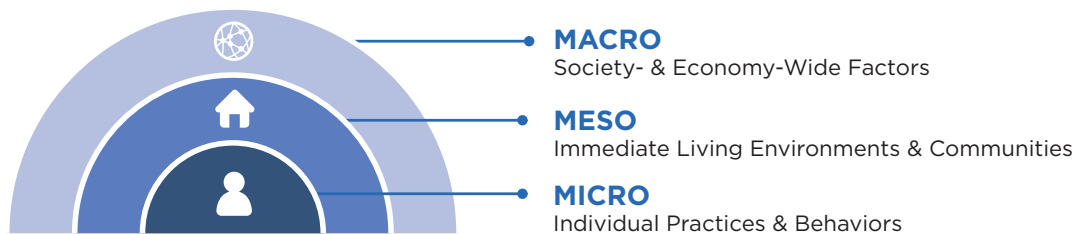
- 1.** Our modern built environment discourages physical activity.
- 2.** Our modern lifestyles are increasingly sedentary, and we lack the time to exercise.
- 3.** The private fitness industry often leaves out marginalized populations who are at higher risk for physical inactivity (e.g., women/girls, older adults, rural, lower-income populations).
- 4.** The health system is disconnected from the physical activity sector, while people who have physical and chronic conditions (e.g., chronic disease, disabled, elderly) face many barriers to exercising.
- 5.** Youth are increasingly sedentary, are not engaging in sufficient physical activity, and are not building lifelong habits for exercise.
- 6.** The nature and demands of our jobs are a major driver of sedentary behaviors.

Our lack of physical activity has many costs, both individual and societal. Physical inactivity is a key lifestyle risk factor that directly contributes to the rise of chronic or noncommunicable diseases (including heart disease, stroke, cancer, diabetes, chronic lung disease, etc.), which are collectively responsible for 74% of deaths worldwide every year.^{xi} Across the world, physical inactivity is the fourth leading cause of death, responsible for more than 5 million preventable deaths annually.^{xii} The COVID-19 pandemic has increased sedentary behavior across the world, and there is growing public health concern that it may reduce our resilience to fight the disease now, and to ward off other chronic and infectious diseases in the future.^{xiii}

Beyond the human and societal costs of disease, disability, and premature deaths, physical inactivity also imposes major economic costs, due to health expenditures and productivity losses. The WHO's most recent estimates indicate that physical inactivity will cause 500 million new cases of preventable NCDs and \$300 billion in treatment costs alone from 2020-2030, if the current rates of inactivity do not change. If these estimates were broadened to incorporate productivity losses, the cost burden of physical inactivity would be even greater.^{xiv} Conversely, increasing physical activity rates would have significant potential benefits. One study estimates that if everyone met the WHO's recommended level of physical activity, it would increase global GDP by \$314-446 billion annually, adding \$6.0-8.6 trillion cumulatively to global GDP from 2020-2050 (in 2019 prices).^{xv}

Three levels of policy action: Physical activity.

Public policy can address the many constraints and factors that influence our interest and ability to engage in regular physical activity – some of which are in our control, and others of which are not. These policies can be formulated to enable and support physical activity at three different levels (see *figure below*).



Source: Global Wellness Institute

- **Micro-level policies:** As individuals, we make a daily choice about engaging in various types of physical activity. Many barriers can affect our behaviors, including a lack of time, motivation, interest, convenient facilities, and/or energy, as well as physical or health conditions.^{xvi} These barriers can be addressed through policies that help make physical activity more convenient and accessible for different populations.
- **Meso-level policies:** Environmental factors (including built environment, natural environment, and social environment) have a major influence on our ability to engage in physical activity. Public policies and investments can support infrastructure and facilities for both recreational physical activity and natural movement. Such infrastructure is especially critical for the poor, marginalized, and underserved populations and regions that are largely ignored by the mainstream fitness and exercise industry.
- **Macro-level policies:** There are many broad, macro-level factors that influence individuals' levels of physical activity or inactivity, including: socioeconomic status or wealth, education or literacy level, gender and gender-related discrimination, crime and safety, war and conflict, and so on. Policies, programs, and initiatives addressing these macro-level factors will also have an important influence on physical activity participation.

We acknowledge that macro-level policies – covering the entire range of public policy actions – are vitally important to human health and well-being. In many cases, macro-level policies (such as reducing poverty, stopping armed conflicts, or addressing climate change) will have a greater impact on physical activity/inactivity than the meso- and micro-level policies targeting individual behaviors and community environments. Top-down policy approaches are critical, but they require long-term, systemic changes, as well as political will and compromises, which can be difficult to achieve. In this toolkit, we focus primarily on micro- and meso-level policies, which can be implemented and have benefits for people immediately, even while we wait for the glacial progress in solving our long-term macro issues.

Who can champion wellness policy for physical activity.

Promoting physical activity is not just a function of governments. While many policy actions may require government leadership, funding, or mandates, the participation of the private and nonprofit sectors is also essential. Many actors and stakeholders must work in parallel and in partnership in order to increase levels of physical activity, expand access to wellness for all, and improve our health and well-being. It is important to recognize that the responsibility for spearheading and implementing these policies rests with many different agencies, businesses, organizations, professions, and stakeholders who probably do not even see themselves as playing a role in facilitating physical activity and wellness.

If you are a national/regional government leader or policymaker:

Opportunities (and responsibilities) for promoting physical activity cut across many different government departments and functions. Depending on each country's political structure, these functions may sit at the national, regional, and/or city levels. For far too long, the design of cities, neighborhoods, and buildings has been driven by efficiency and convenience, with little regard to how such priorities encourage sedentary behavior and have adverse impacts on our health and resilience. Leaders and policymakers involved with **urban planning, transportation, infrastructure, and housing** can help people be physically active by designing and building neighborhoods and cities in a way that makes movement a default in daily life. Those involved in **regulation** of construction/development must ensure that regulatory policies (zoning, building codes, etc.) encourage movement-friendly built environments. Policymakers working in **parks and recreation, sports, and youth affairs** can adopt a "sports for all" framework and can focus on expanding recreational physical activity facilities and programming that are free and accessible to all (but especially targeting youth and underserved populations). **Health** policymakers should explore how to adopt an "exercise is medicine" platform and interventions within the healthcare system. Public leaders who shape **education policy** should ensure that children are engaging in sufficient movement each day and are building healthy, lifelong interests in physical and recreational activities. **Tax and fiscal policies** can be deployed in many ways - to subsidize recreational activities for individuals/families; to incentivize the development of movement-friendly built environments; to encourage the development of facilities/programs for underserved populations; and to expand important research/data collection on physical activity participation and program outcomes.

If you are a local/community leader or nonprofit organization:

Many of the most important regulatory and investment decisions that affect physical activity participation are driven by city- and regional-level decisionmakers, including planning and prioritization of major infrastructure projects, and regulations related to zoning, building codes, etc. It is critical that local planners and policymakers recognize their role in shaping their citizens' health and well-being, and that they prioritize active transit, physical activity, and wellness across all infrastructure and development projects. Local government planners, schools, churches, and community organizations are also in the best position to create and maintain public recreational infrastructure for exercise, such as playgrounds, outdoor gym equipment, swimming pools, community recreation centers, sports facilities, walking/biking paths, hiking trails, etc. Public

physical activity infrastructure is especially critical for those living in poor and marginalized areas – where populations are more vulnerable to inactivity, poor health, and infectious and chronic diseases, and are largely ignored by the mainstream fitness and exercise industry.

Community leaders and organizations can help to promote active lifestyles by sponsoring regular free and low-cost activities and events (e.g., exercise classes, social dances, walking/running clubs), especially targeting older adults, lower-income groups, and people with health and physical conditions. Religious and community facilities can be a safe and nurturing space for people who are intimidated by exercise and gyms. Social connections and a sense of community are typically the greatest motivators for people to exercise; camaraderie can turn exercise into a fun and popular activity. Community organizations that work with children and youth can develop sports and active recreation programs, but should also ensure that these programs are fun, inclusive, and not overly competitive. Community organizations can also build movement into regular events and gatherings, so that being physically active and feeling strong in our bodies becomes part of the local culture and the norm in the community.

If you are a business leader or employer:

All private companies can play a role in supporting physical activity, both for their employees and for the communities in which they operate. Workplace culture, workplace design, and workplace wellness programming can all be shaped to encourage employees to engage in more movement throughout the workday – and these offerings can improve employee satisfaction/retention as well as employee health/productivity. Companies can build local partnerships to support physical activity facilities and initiatives in the communities where they do business, as part of corporate social responsibility (CSR) efforts. In addition, companies in specific industries and sectors play other direct roles in encouraging physical activity for all:

- **Companies in building/real estate/development** can ensure that their projects incorporate features that support physical activity.
- **Companies in healthcare, caregiving, exercise/fitness, and related areas** can integrate physical activity into the healthcare system (e.g., exercise prescriptions/referrals, medical fitness centers, training health/exercise professionals on exercise for those with health conditions or risks, etc.).
- **Industry/occupational organizations** can ensure that educational curricula and credentialing requirements incorporate physical activity literacy for key professions such as: built environment professions (e.g., urban planners, architects, etc.), transportation planners and engineers, health professions/caregivers, and schoolteachers.
- **Fitness, sports, and other physical activity-related companies** can expand their offerings to reach a wider target population, and they can educate governments on the critical role they play in supporting population health and well-being.

If you are a member of the media:

Members of the press and media can play a pivotal role in educating the public about the benefits of physical activity, showcasing fitness and recreational events and venues, and disseminating the latest evidence-based research. At the same time, journalists need to take responsibility for what they write about and promote, being careful to highlight evidence-based practices for physical activity that are relevant for all populations, and not constantly hyping the latest short-lived or expensive fitness fad. Community leaders and nonprofit organizations can partner with local media to enhance their message, increase support, and encourage participation.

If you are a member of the research community:

The research community (in academia, government entities, or nonprofit organizations), can have a significant impact on physical activity policy, programs, and practices. Ongoing research about the benefits of physical activity, as well as the amount/types of exercise needed for different health benefits, has an important influence on fitness and recreational products, services, and spaces. Research findings on the most cost-effective physical activity policies and programs can help local agencies in making program design and implementation choices. The research community can also contribute to further educating the public by disseminating research findings, engaging with the media, and engaging in advocacy with local government and community groups.

Policy actions for physical activity.

This section of the toolkit outlines a wide array of policy actions that different stakeholders can pursue in order to promote physical activity participation and access. For each item, we describe the objective or “problem” it is trying to address, elaborate on the different policy actions that can be deployed, and provide a list of sample policy tools. Our aim in this toolkit is to address some of the most pressing issues hampering physical activity participation; the policies and actions discussed are wide-ranging but not exhaustive. The *Key Resources* section, at the end of this report, will provide readers with other detailed resources on policies, strategies, case studies, and research evidence related to physical activity promotion.

Summary of key policy objectives and actions: Physical activity.

POLICY OBJECTIVES		ACTIONS
1	Encourage physical activity via the built environment.	<p>Action 1: Design cities, neighborhoods, and buildings to facilitate natural movement and active transit.</p> <p>1.1. Use urban/regional planning to encourage walking and cycling as transport.</p> <p>1.2. Incorporate active design into real estate developments.</p>
2	Make recreational physical activity accessible, convenient, and affordable.	<p>Action 2: Invest in recreational physical activity infrastructure, facilities, and programs.</p> <p>2.1. Treat recreational physical activity as an essential public service.</p> <p>2.2. Establish a “sports for all” policy framework or physical activity action plan.</p> <p>2.3. Create more free and accessible public spaces for outdoor recreation and exercise.</p> <p>2.4. Sponsor free exercise classes, programs, and educational campaigns.</p> <p>2.5. Invest in subsidized and public-private fitness facilities.</p>
3	Improve access to physical activity for underserved populations.	<p>Action 3: Target physical activity infrastructure investments to increase access and reduce cost barriers for high-risk populations and underserved communities.</p> <p>3.1. Develop safe and comfortable spaces for women and girls to exercise.</p> <p>3.2. Support fitness options for older adults.</p> <p>3.3. Make physical activity accessible to persons living with disabilities.</p> <p>3.4. Address racial and ethnic disparities in physical activity.</p>

POLICY OBJECTIVES		ACTIONS
4	Integrate physical activity into the health system.	<p>Action 4: Incorporate physical activity into prevention and treatment protocols, working in cooperation with the health system.</p> <p>4.1. Implement exercise as medicine and exercise prescription initiatives.</p> <p>4.2. Develop medical fitness centers.</p>
5	Encourage youth to build lifelong habits for physical activity.	<p>Action 5: Increase opportunities for youth to learn and participate in a variety of physical activities through schools and sports.</p> <p>5.1. Ensure that all children receive physical education (PE) classes regularly in school.</p> <p>5.2. Encourage movement throughout the school day.</p> <p>5.3. Put the “play” back into youth sports.</p>
6	Encourage adults to be physically active during the workday.	<p>Action 6: Realign company benefits and culture to reduce sedentary behavior and increase opportunities for physical activity during the workday.</p> <p>6.1. Provide opportunities for physical activity during the workday.</p> <p>6.2. Reduce sitting during the workday.</p>

1

Encourage physical activity via the built environment.

This policy action is cross-posted in the Built Environment Toolkit.

Issue 1: Our modern built environment discourages physical activity.

Our modern built environment encourages sedentary behavior and makes it difficult to stay active. Around the world, economic development has brought rapid urban growth and the mounting pressures of crowding, congestion, traffic, and sprawl. In response, urban planning has increasingly prioritized vehicular traffic flow over pedestrians and public transit, leading to widening of roads, stripping of sidewalks, increases in speed, and other auto-centric features that make it more difficult, less attractive, and even dangerous for people to walk or ride bicycles. Too many people automatically drive short (and walkable) distances, from work to school to errands, simply because there are no sidewalks, or no easy ways to cross a highway on foot or to walk from one shopping center or office park to another. In dense and sprawling urban areas, many people do not have access to parks, green spaces, or sports/recreational facilities near their homes. Some people live in areas where crime and safety concerns discourage them from being active outdoors. Some stay indoors because of poor air quality and pollution. And indoors, most modern buildings have been designed for efficiency and comfort, rather than encouraging movement – for example, placing elevators prominently in lobbies, while hiding narrow and dark stairways. All those missed opportunities to move in our daily lives (short distances not walked, flights of stairs eschewed, etc.) have now become the “steps” that we need to make up each day in order to meet our daily requirements for physical activity.

Action 1: Design cities, neighborhoods, and buildings to facilitate natural movement and active transit.

1.1 Use urban/regional planning to encourage walking and cycling as transport.

The physical attributes of our neighborhoods and cities have a strong impact on our level of physical activity.^{xvii} An important way to engage more people in physical activity is by making movement a default in daily life, through infrastructure, design, and convenient amenities. During the 2020 COVID-19 shutdowns, many city-dwellers turned to walking and cycling both for exercise and for essential travel, exposing the inadequacy of active transit infrastructure across every metropolitan area. City governments around the world took action to help people move around more easily – for example, closing streets to vehicular traffic to make room for pedestrians/cyclists (New York, Seattle, Brussels); lowering speed limits (Milan); providing free access to bike sharing systems (London, Glasgow, Chicago); expanding bike lanes (Bogota, Mexico City, Berlin, Paris, Milan, Washington, D.C.); widening sidewalks (London); and making automated pedestrian crossing signals “touch-free” (Sydney, Auckland, Boston). In many of these places, cities were able to fast-track active transit plans that were in place for the longer-term, and many are now making the pandemic changes permanent.^{xviii} In spite of these shifts, current efforts are far from sufficient. The WHO reports that only 42% of countries have a national policy (and only 15% have subnational/regional policies) to encourage walking and cycling as transport.^{xix}

Over the last couple of decades, numerous planning frameworks and design approaches have emerged that provide comprehensive and detailed guidance to policymakers on how to make physical movement the more convenient, attractive, and default/preferred way to go from place to place – including New Urbanism, Form-Based Codes, Traditional Neighborhood Development principles, Active Design Guidelines, Complete Streets policies, Smart Growth policies, the 15-minute city concept, and so on.^{xx} Key approaches include “complete street” design (e.g., wide sidewalks, accessible crosswalks, pedestrian signals, narrower vehicle lanes, separated bike lanes); attractive and people-friendly streetscapes (e.g., street/shade trees, lighting, benches, wayfinding signs); and movement-friendly urban planning and zoning (e.g., higher density buildings, mixed-use development). Examples and best practices of how communities have improved walkability and bikeability exist across every country and region around the world. These features help add natural movement back into daily life and can go a long way towards helping people meet the daily requirement of moderate physical activity.

1.2 Incorporate active design into real estate developments.

In addition to broad-scale urban planning, individual buildings and real estate developments can also be planned in a way that encourages physical movement. A growing number of residential, commercial/office, medical, hospitality, and other types of buildings are prioritizing physical activity in their design, with amenities such as walking/biking paths, swimming pools, recreation centers, exercise facilities, parks, playgrounds, bike parking/storage, and more. The more these features are convenient and are located right within people’s homes, neighborhoods, and workplaces, the more likely people will access them regularly to be active. Interior design features that encourage movement include attractive and well-located stairways (and signage) that steer people away from elevators, as well as attractive and accessible common areas, corridors, and amenities that encourage circulation and walking from place-to-place. Outside, buildings should be situated to maximize connectivity to sidewalks, public transit, parks, plazas, and open spaces.^{xxi}

While real estate developments and buildings are primarily the domain of the private sector, public policy can play a role in encouraging active design through tax and fiscal incentives and regulations (e.g., zoning, building codes, land use regulations) that encourage movement-friendly developments. Governments can lead by example, by incorporating active design features into publicly funded facilities (including schools, government agencies, hospitals, military installations, parks/recreation/tourism facilities, prisons, etc.). The public sector also has a critical role to play in encouraging the use of active design in affordable/subsidized housing, schools, and community facilities in underserved and high-risk areas.^{xxii} This can be accomplished via partnerships among municipal and public housing authorities, nonprofits, and private developers, as well as via incentive programs for developers. For example, in 2017, the U.S. government-sponsored mortgage securitization corporation (“Fannie Mae”) introduced the Healthy Housing Rewards™ program, which provides a variety of financial incentives for borrowers who incorporate active design and health-promoting features into newly constructed or rehabilitated affordable multifamily rental properties. Properties are qualified by meeting or exceeding minimum standards of the Fitwel™, WELL, or Enterprise Green Communities certification systems.^{xxiii}

Action 1: Sample policies to encourage physical activity via the built environment.

- Invest in infrastructure features that encourage active transit: complete streets, better connectivity, attractive streetscapes, multi-use trails/greenways, car-free zones, traffic calming/reduction measures, public transit, bike-sharing, etc.
- Prioritize building projects located near walking/cycling routes and public transit.
- Adjust zoning, building codes, and land use regulations to encourage higher density, mixed-use, and other health-promoting features.
- Create regional master plans and dedicated budgets for active transit and physical activity.
- Conduct health impact assessments for infrastructure and real estate development projects.
- Expand research on outcomes from infrastructure investments to promote physical activity.
- Tax incentives for commuters using active/public transit.
- Grants, tax incentives, and special lending instruments for developers incorporating active transit, active design, and other health-promoting features in their projects, especially in high-risk and underserved communities.
- Incorporate training on active transit/active design/physical activity into the curricula for professions that plan the built environment (e.g., urban planners, civil engineers, architects, etc.).

This is a sample of policies that can be used to encourage physical activity, but not an exhaustive list. Please see Key Resources, at the end of this report, for more details on policies, strategies, case studies, and research evidence related to physical activity promotion.

2

Make recreational physical activity accessible, convenient, and affordable.

Issue 2: Our modern lifestyles are increasingly sedentary, and we lack the time to exercise.

For most of human history, physical movement was not done for exercise but for survival. We were hunters and gatherers, farmers and fishermen, building our own houses, carrying water, and washing clothes by hand. But today, our modern lifestyles and livelihoods require much less physical exertion than those of previous generations. With urbanization, new technologies, and the rise of the service economy, a growing share of people work in jobs that require sitting for most of the day. At home, physical chores such as cooking and cleaning have been greatly eased by modern appliances and industrialized food production. Meanwhile, the digital revolution has enabled us to shop, socialize, and consume news and entertainment without leaving our homes or even our sofas.

As essential physical tasks steadily disappear in our daily lives, they have not been replaced by other types of built-in movement. Physical activity has become less natural and more structured and intentional. Systematic reviews of data for adults in wealthier countries find that work-related physical activity and use of active transit have been decreasing over time, while leisure-time physical activity (e.g., fitness and sports) has been increasing.^{xxiv} In many countries, fewer children are walking or biking to school.^{xxv} In order to stay active, we now have to schedule time to exercise, and we increasingly have to spend money to do so. However, with long working hours, long commutes, dual income families, and other pressures of modern life, many simply cannot find time to exercise during their limited leisure hours. Others may find it unaffordable or inconvenient to do so. GWI research found that only 35.6% of the world's population participated in recreational/leisure physical activities or exercise on a regular basis in 2019, and this rate fell to 31.6% in 2020, due to pandemic-related facility shutdowns, stay-at-home orders, etc.^{xxvi} GWI's review of surveys and studies across over 60 countries revealed that the biggest barrier for both adults and adolescents to engage in physical activity is a lack of time, followed by lack of interest (adults), and lack of convenient facilities near home (children and teens).^{xxvii}

Action 2: Invest in recreational physical activity infrastructure, facilities, and programs.

Public investments in parks, playgrounds, trails, sporting/exercise facilities, mass recreation events, free classes, and other recreational amenities and programming can play a major role in making leisure-time physical activities convenient, easy to access, and low-cost (or free). Although the global fitness and exercise industry has expanded rapidly in recent decades, it is only meeting the needs of a very small share of the world's population (i.e., those with the time, money, and ability to access these services). Around the world, recreational physical activity participation rates tend to be the highest in the places where governments have adopted “sports for all” approaches and aggressively invest in such infrastructure for the public.

2.1 Treat recreational physical activity as an essential public service.

To encourage widespread participation in recreation and exercise, governments need to treat physical activity as an essential public service, and they can even partner with the nonprofit and private sectors to deliver high-quality, low-cost facilities. Too often, physical activity infrastructure is treated by governments as a nice-to-have leisure amenity, and not as an essential public good. This view was clearly demonstrated during the pandemic, in terms of which businesses and services faced shutdowns and which were allowed to remain open. Unfortunately, the physical activity sector (including for-profit and nonprofit gyms, community sports and recreation centers, sports leagues, etc.) was among the first to shut down and the last to reopen in many countries. Exercise facilities were treated as places of leisure, like bars and restaurants, and not as essential services that support physical activity, mental wellness, and other wellness needs that are vital to maintaining good health. Governments need to change their perception of physical activity from an optional leisure pursuit to an integral part of protecting and promoting public health, and thereby give the physical activity sector greater recognition, priority, support, and investments. This shift in viewpoint does not simply mean special treatment for private gyms, but rather embracing a very broad definition of the physical activity sector (i.e., encompassing all private, nonprofit, and community-based fitness and exercise facilities; youth/adult/amateur sporting facilities, teams, and leagues; active recreation activities like martial arts and dance; outdoor recreation; and public infrastructure like parks, playgrounds, and trails).

2.2 Establish a “sports for all” policy framework or physical activity action plan.

In most countries, public funding and programs for sports have historically focused on training a pipeline of elite athletes for the Olympics and other high-level competitions, as a matter of national pride and reputation. This narrow focus has started to change with the growing awareness of the rising health crisis stemming from physical inactivity. In recent decades, many countries – especially in Europe and Latin America – have shifted their national policy focus toward “sports for all” approaches, which aim to increase sports, active recreation, and physical activity participation across the population (rather than channeling resources to elite sports and high-prestige events). A national “sports for all” policy (starting with the national Ministry of Sports or agency responsible for sports/recreation/leisure) will help to guide limited resources toward investments, facilities, and programs that will benefit the entire population, and will also encourage public/private/community

collaborations to reach diverse and underserved groups. A 2018 WHO survey of 28 EU countries found that all of them had at least one sports-for-all or health-enhancing physical activity (HEPA) action plan, with a total of 148 physical activity promotion policies in place across these countries.^{xxviii} For example, the United Kingdom's Sport England focuses on reducing inactivity by offering programs designed to get a wider group of people moving, and it has redefined "sport" to encompass many forms of physical activity (such as table tennis, walking and dance) that are eligible for financial support.

Looking globally, only 38% of countries have a standalone national physical activity strategy or action plan that is currently operational (and most of these are higher income countries). In addition, only 30% of countries have national guidelines for physical activity across all age groups, and only 27% of countries gather data on physical activity participation across all age groups (under 5, children/adolescents, and adults).^{xxix} Establishing a national agenda or strategy for physical activity is critical because it provides a mandate for public policy action, for allocating resources to address it, and for gathering data to track progress.

2.3 Create more free and accessible public spaces for outdoor recreation and exercise.

Physical activity does not require specialized facilities and equipment, and it does not have to cost anything to exercise. Governments, especially at the local and municipal level, can create more outdoor infrastructure to increase their citizens' access to various recreation and exercise options. There are more than 23,000 free outdoor gyms worldwide (also known as "biosaludables," "senior playgrounds," and calisthenics parks), which offer pull-up bars, metal bikes and elliptical machines, and other simple equipment.^{xxx} These are particularly popular across Latin America, Europe, and some parts of Asia (China, South Korea, India, Singapore); many are located in developing countries without a robust sector of private gyms, and many target older adults (see *Action 3*). For example, in New Delhi, India, members of parliament have used local development funds to install 1,700 open-air gyms in parks throughout the city since 2016, and hundreds more are in development, each costing about US\$10,000 to install.^{xxxi} Other outdoor public infrastructure that is critical for supporting physical activity includes parks, playgrounds, running/biking paths, greenways, and sports courts/fields. Numerous studies have shown that conveniently located and well-designed neighborhood parks are often associated with higher levels of physical activity, especially for older adults, children, and disadvantaged populations.^{xxxii}

Physical activity infrastructure can be as simple as well-designed, accessible, and safe open spaces and green spaces. Public spaces such as parks and public squares are widely used venues for exercise and recreation activities in urban areas, especially in countries that are not well-served by private fitness and sports facilities. In many African countries, people living in both rural and urban communities gather before and after work to exercise in parking lots and stadiums, on beaches, in the streets, and even in cemeteries. In China, older men and women gather daily in public parks to do tai chi, while millions of people, mostly women, meet in urban plazas and squares to do "plaza dancing." Simple greening interventions – such as adding street trees and greening public plazas – can support spontaneous outdoor exercise, especially when designed with input from community groups and potential users, and when done in conjunction with social engagement activities and programs to promote usage (see *Action 2.4 below*).^{xxxiii}

2.4 Sponsor free exercise classes, programs, and educational campaigns.

Programming, education, and engagement of stakeholders is just as important as infrastructure in promoting physical activity. In fact, systematic reviews have found that public investments in outdoor infrastructure (parks, trails, and greenways) are more effective at increasing physical activity when they are combined with programming, community engagement, public awareness activities, and access enhancements (e.g., expanded hours of operation).^{xxxiv} According to the WHO, community education and communication campaigns are a highly cost-effective approach for promoting physical activity on multiple levels. They not only raise knowledge and encourage behavior change among individuals, but also can stimulate community discussions and influence policy agendas toward more access and support for physical activity infrastructure/programming. And yet, the WHO reports that only 52% of countries have implemented a physical activity communication campaign in the last two years.^{xxxv}

These activities can take many forms. Some regions have developed campaigns and incentive-based promotions to educate the public and encourage exercise, often working in partnership with the private sector. For example, in Singapore, ActiveSG and the Singapore Health Promotion Board (HPB) run a variety of national challenges and events to encourage residents to walk and get more exercise, and some of these offer cash incentives and prizes (such as free fitness trackers). Singapore's annual GetActive! Singapore Festival includes hundreds of run, walk, and sporting events sponsored by communities, schools, and corporate partners.^{xxxvi} In the United Kingdom, the ParkLives program (which ran from 2014-2019 as a collaboration between Coca-Cola GB and ten local municipalities) offered free exercise and recreation activities in local parks and green spaces, reaching over 500,000 unique attendees.^{xxxvii} A similar program in Australia, called "Live Life Get Active," offers free daily fitness classes in outdoor spaces in over 100 communities across the country, operating as a partnership among nonprofits, governments, health networks, and commercial organizations.^{xxxviii}

Governments across numerous Latin American countries (e.g., Mexico, Chile, Ecuador, Colombia, Brazil) activate their existing public spaces by sponsoring free and low-cost exercise classes and sports activities in community centers, public parks, plazas, shopping malls, and city streets, serving millions of people each year. City-sponsored open streets, "car free" days, and mass recreation events (following the model of Bogotá's Ciclovía) are another low-cost and high-impact way for governments to make walking, running, biking, and outdoor recreation accessible to all. These kinds of public facilities and programs play a major role in boosting physical activity participation across Latin America. National surveys conducted in Brazil, Mexico, Argentina, and Chile all indicate that two-thirds to three-quarters of people who participate in sports and recreational physical activities do these activities in public or free facilities that require no payment for access.^{xxxix} Free and mass-participation events can be highly effective at engaging large numbers of people in exercise, engaging those who are not regularly active, providing opportunities for people to try out new physical activities, and fostering local partnerships.

2.5 Invest in subsidized and public-private fitness facilities.

In a smaller number of countries (mostly higher-income regions), governments provide subsidized and low-cost public gyms and community recreation centers for their citizens – either for free or for a nominal fee. Community centers with basic workout areas, fitness classes, walking tracks, swimming pools, and sports facilities are common in communities across the United States (typically run by municipal parks and recreation departments), and city-run gyms, leisure centers, and sports/recreation centers are also abundant in the Nordic countries, Japan, Singapore, and Hong Kong. In Western European countries, such as Germany and Austria, governments fund and subsidize a massive network of nonprofit sporting clubs (found in nearly every town, large or small), which provide competition and training for millions of children and adults across all segments of the population. Fees to join these clubs are very affordable for most people (often just \$50-100 per year), and lower-income children/families can get government support or waivers for the fees.

Governments can partner with the private fitness industry to develop and run their public fitness and recreation facilities. The United Kingdom, Ireland, and Australia use a public-private model in which gyms and leisure centers are subsidized by national and local governments but often operated by private contractors. The facilities and services in these centers can sometimes rival those of higher-end commercial gyms, and the private outsourcing helps keep the quality of facilities high when public budgets are under pressure. In the United Kingdom, public expenditures on these kinds of recreational and sporting facilities and services topped \$4.6 billion in 2021/2022,^{xi} while in Finland municipalities spend over \$700 million per year subsidizing fitness and sports facilities and clubs.^{xii} While there have not been extensive, rigorous studies on the impacts of subsidized and free fitness facilities, one study in the northwest of England found that introducing universal free access to leisure facilities, alongside outreach activities, led to “an increase in swimming and gym attendances at these facilities, an increased proportion of the population participating in swimming or gym activity and increased overall physical activity levels. The increases in participation were greatest in the most disadvantaged socioeconomic group—decreasing inequalities.”^{xiii}

As more nations implement “national fitness and exercise” and “sports for all” plans, public investments in such infrastructure, programs, and activities will likely increase, expanding accessibility to more people and also competing with fitness businesses operating at the lower end of the market.

Action 2: Sample policies to treat recreational physical activity as an essential public service.

- Establish and implement a “sports for all” framework/plan or a national physical activity strategy, in order to prioritize resources/initiatives for programs that increase physical activity for all.
- Invest in community-based exercise/sports/recreation infrastructure that is low-cost or free and accessible to all (e.g., public-access and subsidized fitness/sports/recreation facilities; outdoor gyms; walking/biking paths; etc.).
- Develop public-private partnerships to build and operate community facilities for physical activity.
- Sponsor free/low-cost exercise classes in public spaces.
- Launch “open streets” and mass recreation events that encourage physical activity.
- Organize public awareness campaigns, special events, and/or “challenges” to catalyze interest in physical activity (e.g., national fitness week, national fitness challenge with incentives/prizes).
- Expand government data collection efforts on physical activity participation rates.
- Expand research on the factors influencing physical activity participation and the outcomes of different interventions and investments for different populations.
- Improve and expand training/credentialing of physical activity professionals/sports coaches for those working in community/public facilities and programs.
- Offer tax incentives for people’s out-of-pocket expenditures on physical activities.
- Offer tax incentives to promote development of community/public spaces and facilities for physical activity programs.

This is a sample of policies that can be used to encourage physical activity, but not an exhaustive list. Please see Key Resources, at the end of this report, for more details on policies, strategies, case studies, and research evidence related to physical activity promotion.

3

Improve access to physical activity for underserved populations.

Issue 3: The private fitness industry often leaves out marginalized populations who are at higher risk for physical inactivity.

Physical activity participation is not evenly distributed across all groups. For example, rates of physical activity tend to drop from youth to adolescence and adulthood, and often fall further among people ages 60+. Women and girls tend to be more inactive than men and boys. Globally, an estimated 23.4% of men are physically inactive, while 31.7% of women are inactive, and this disparity is even greater in certain countries and regions (e.g., South Asia).^{xliii} According to the WHO, “women, minority ethnic groups, disadvantaged communities, and people living with disability and chronic disease are more likely to be inactive in all countries.”^{xliiv}

There is a large and growing divide between the people who have access to private facilities and public infrastructure that enable them to be physically active, and those who do not. The Covid-19 pandemic has made those inequities more obvious and more alarming from both a personal wellness and public health perspective. Although the global fitness sector has been fast growing, these businesses primarily target those who are more able and likely to exercise – the educated, more affluent, younger demographics, and those living in major urban centers and wealthy suburban areas.^{xlv} According to GWI research, the fitness industry serves just 3-4% of the world’s population, while the entire recreational physical activity sector (encompassing fitness, sports and active recreation, and mindful movement modalities like yoga) is only engaging about one-third of the world’s population.^{xlvi} Recent analysis of the “geography of fitness” found that the availability of fitness and recreational facilities across the United States tracks closely with key socioeconomic indicators (e.g., higher incomes, education levels, and “creative class” and high-tech occupations).^{xlvii} If this kind of analysis could be conducted on a global level, the disparities would likely be even more stark. The reality is that participating in exercise remains a privilege that is not accessible for many people around the world.

Another major reason for the lower rates of physical activity among women and girls in many countries is that gender and social norms can discourage female participation in sports and outdoor recreation, prevent activities in co-ed settings, or prohibit physical activity for females in general. In surveys, women often cite personal safety and being uncomfortable at a gym as reasons for not exercising. For example, in one study in Central America, girls reported multiple barriers, such as: lack of access to fields and facilities; lack of equipment; lack of money; lack of parental permission; lack of clothing; and safety. In the same study, boys rarely mentioned these as constraints, and they regarded the lack of time as their most important barrier.^{xlviii}

Action 3: Target physical activity infrastructure investments to increase access and reduce cost barriers for high-risk populations and underserved communities.

Global minority populations – which can be defined by ethnic and cultural background, race, gender identification, religious affiliation, disability status, and other factors – face many types of discrimination and bias that can lead to higher-than-average rates of physical inactivity, putting them at higher risk for chronic disease. To stay active, these populations need public recreational spaces and amenities that are affordable, safe, convenient, welcoming/accessible, and culturally relevant. It does not have to cost anything to be physically active, if people can access public infrastructure, parks, green spaces, running and biking paths, outdoor gyms, and recreational facilities and programs. All of the policy initiatives proposed in *Action 1* and *Action 2* of this toolkit (e.g., active transit, active design in real estate, sports for all initiatives, free and accessible public spaces for outdoor recreation, free exercise classes and programs, subsidized and public-private fitness facilities, etc.) should be targeted at the marginalized and underserved communities and populations that are at the highest risk for physical inactivity, to improve accessibility and lower cost barriers for them.

In addition, other policy steps can be taken to specifically support these underserved populations:

3.1 Develop safe and comfortable spaces for women and girls to exercise.

In some countries, social/religious norms and government regulations can prevent women and girls from being physically active – for example, societal pressures against women exercising in public, and religious policies that prohibit mixed gender facilities/classes and certain types of exercise/movement. However, as governments recognize the inactivity crisis and its ramifications, especially among women, they are implementing policy changes to support greater female participation in physical activity. For example, in the Middle East, some countries are lifting laws that prohibit physical activities for women and facilitating the development of segregated, women-only facilities. Women across Iran, Saudi Arabia, and Oman have gone from using men’s gyms at off-peak (ladies’) hours to having their own dedicated gyms and outdoor venues to exercise. In 2017, Saudi Arabia started granting licenses for boutique women-only gyms for the first time (although these must be specifically for fitness, and women-only competitive sports facilities are still not allowed). Women have been flocking to these new facilities, and some companies are converting their existing male-only gyms into women’s gyms to meet demand.

In some places, the fear of harassment and even violence can greatly discourage women and girls from exercising outdoors. In these cases, governments can take the lead in creating dedicated public parks to provide a safe place for women to engage in outdoor recreation and exercise, or simply to get some fresh air, without being accompanied by male family members. For example, in 2012, the city of Lahore, Pakistan opened its first “women only” park in a four-acre space secured behind 7-foot-high walls, with its own jogging track, gymnasium, and badminton court.^{xlix} Women-only parks have also been developed in India, Saudi Arabia, and Iran. Iran’s parks have also received widespread criticism, however, because they were designed by men, are largely located in secluded suburban locations that can be difficult to access, and are seen as perpetuating the segregation and second-class status of women.^l

3.2 Support fitness options for older adults.

Rising life expectancies and the associated rise in chronic disease mean that it is increasingly important to stay active as we age. And yet, many older adults – especially those with health conditions or limited mobility – do not feel comfortable or safe exercising at conventional private gyms and fitness studios, or they may need a lot of support to do so. Many older adults face transportation constraints, have limited access to exercise facilities, or cannot afford gym memberships. Public and nonprofit fitness facilities (in addition to medical fitness centers, see Action 4) can help fill this gap for the older segment of the population. In the UK, publicly supported leisure centers offer discounted or free memberships and classes for older adults. In the United States, community centers and nonprofit YMCAs make concerted efforts to serve this population, offering lower-cost classes and memberships; providing accessible equipment, classes, and programming; and generally creating a welcoming and inclusive atmosphere for this demographic. Also in the United States, certain types of Medicare (government-sponsored health insurance for ages 65+) include SilverSneakers, a program that offers free access to 14,000 recreation centers, exercise classes, and other fitness amenities across the country. Studies of this program have demonstrated many positive impacts on older adults' physical, emotional, and social health, as well as a reduction in healthcare expenses for participants.ⁱⁱ

The availability and cost of fitness centers are not the only barriers for older adults; the exercise offerings also need to be tailored toward what older adults want and need when they exercise. A study in the UK identified older adults as a significant growth driver for the public leisure sector, while revealing that older clients tend to feel more self-conscious when exercising in public and, as a result, work out less often than other age groups.ⁱⁱⁱ An extensive 2021 study by the ukactive Research Institute outlined a variety of strategies for attracting more older adults to public and private fitness centers, including: the structure, range, and frequency of offerings targeting older adults; categorizing offerings by ability and intensity rather than age; having a welcoming atmosphere for older adults; the knowledge and skill of instructors in teaching older adults; and opportunities for social interaction and intergenerational mixing.^{liii} During the pandemic, the UK also launched a country-wide “10 today” radio campaign (modeled on the popular radio calisthenics in Japan) as an experimental approach to make exercise convenient, accessible, and fun for older adults with transportation constraints.^{liv}

In countries with a less well-developed fitness sector, outdoor recreation infrastructure can play an important role in serving the older population. As mentioned in *Action 2*, there are thousands of outdoor gyms worldwide, many of which were installed to target older adults. In China, over 600,000 pieces of equipment have been installed in neighborhood parks (e.g., jungle gyms, pull-up bars, ping pong tables, metal bikes, elliptical machines, exercise pavilions, etc.) to facilitate outdoor exercise among the older population, many of whom do not have the space or equipment at home, nor the means to pay for a fitness club membership. In fact, parks across China are primarily used by older adults, and their design and equipment typically target older users rather than youth. This concept of “senior playgrounds” first originated in China in the 1990s, but quickly spread in Asia (Taiwan, Japan), Europe, and North America. In Europe and North America, senior playground facilities tend to be co-located with children's playgrounds (so grandparents can exercise while minding their grandchildren) or designed as multigenerational spaces.^{lv} Exercising in public spaces provides other benefits, such as regular social interactions for older adults who are susceptible to loneliness and social isolation.

3.3 Make physical activity accessible to persons living with disabilities.

About 19% of the world's population (1.5 billion people) lives with a physical, mental, sensory, or intellectual disability. While there is very little data available to measure or track physical activity participation among this population, *The Lancet* has estimated that persons with disabilities are 16-62% less likely to meet recommended levels of physical activity than those without disabilities, putting them at higher risk for poor physical and mental health.^{lvi} Persons with disabilities face many obstacles to being physically active, including personal barriers (e.g., self-confidence, self-consciousness about exercising in public, physical strength/symptoms, pain, perception of exercise being too difficult), environmental barriers (e.g., lack of accessible facilities/equipment, lack of transportation), institutional barriers (e.g., untrained staff, lack of accessible classes/programs, discriminatory practices), and social barriers (e.g., family support, stereotypes). The disabled population is largely ignored by the private exercise/recreation industry and has been long overlooked and underfunded in terms of all aspects of physical activity (research/data collection, support, programming, etc.). Very few of the public policy initiatives, strategies, communications/educational campaigns, and infrastructure projects focusing on physical activity and active living have put a priority on accommodating persons with disabilities.^{lvii} In the UK, ukactive and Sport England have recently launched what may be the only national, sector-wide initiative to support disabled persons in being more active. The “Everyone Can” task force is focused on improved data collection, examining the physical activity landscape for the disabled, and enhancing the service and facilities offered for this population across the sector and country.^{lviii}

Keep in mind that this is a very large, diverse group of people in terms of types of disabilities, levels of function, barriers/concerns, etc., so there are no one-size-fits-all solutions. Also, while there is clearly a need for more dedicated funding and adapted services/facilities targeting the disabled population, all physical activity programs should be made more inclusive for those with disabilities, through universal design, adaptability, and mainstreaming.^{lix} Disability inclusion in physical activity is a very large field of inquiry, too broad to be covered thoroughly in this toolkit, but some of the key issues are summarized below.^{lx}

- **Education/communication:** Raise awareness of the physical activity inequities experienced by persons with disabilities. Ensure that communications campaigns on physical activity avoid ableist language and accommodate persons with disabilities.
- **Environment/infrastructure:** Ensure that physical activity infrastructure, facilities, equipment, and services are accessible and inclusive for those with disabilities, and/or use universal design principles. Ensure that active transit infrastructure is accessible.
- **Programming:** Ensure that all community-based physical activity programs offer disability-specific accommodations and adaptations. Invest in physical activity programs that specifically target people with disabilities (e.g., parasports/adaptive sports).
- **Training/staff:** Improve training for all professionals who are involved with physical activity to ensure they understand how to meet the needs of those with disabilities (e.g., physical education teachers, staff in public/private fitness facilities, sports coaches, staff in rehab/care centers, etc.). Include dedicated disability support staff in physical activity programs and facilities.

- **Partnerships:** Ensure that persons with disabilities and disability service organizations are involved in the development of programs targeting them.
- **Research:** Expand research and data collection on all aspects of physical activity and disability (participation rates, barriers, guidelines, etc.) to inform better policy solutions and interventions.

3.4 Address racial and ethnic disparities in physical activity.

In countries around the world, racial and ethnic minority populations tend to have lower rates of physical activity participation. These populations often reside in lower-income and resource-poor urban and rural areas with fewer opportunities and facilities for physical activity.^{lxvi} Other obstacles include a lack of disposable income and insufficient leisure time, in addition to unsafe environments, cultural norms, discrimination, and language differences.^{lxvii} All of these factors have led to measurable differences in physical activity rates, comparatively shorter lifespans, and higher rates of NCDs for racial and ethnic minorities.^{lxviii} These disparities have a ripple effect across all facets of a nation's economy and society.

To reduce these disparities and improve health outcomes, racial and ethnic minority populations need physical activity policies that specifically support them, including: educating targeted populations about the need for physical activity and ways to engage in it; increasing their access to safe and affordable exercise opportunities; and mandating funding for more inclusive programs. There are a variety of different approaches that have been successful in meeting the needs of these populations:

- **Targeted programs:** Local governments and community organizations can design and promote programs with the specific goal of disparity reduction. For example, the Race Equality First (REF) program in Wales focuses on achieving equal opportunities and participation in sport and physical activity for Black and minority ethnic communities, especially Muslim women and girls. A variety of free events targeting these populations are offered in different regions across Wales, including women's yoga, fitness, and walking groups; family and women-only swimming sessions; and more.^{lxix}
- **Cultural relevance:** In order to improve effectiveness, combat stigma, and increase engagement, these types of targeted physical activity programs and policies should be culturally relevant, incorporating particular groups' social norms, languages, and customs.^{lxx} For example, in Singapore, government agencies have partnered with mosques, temples, and other religious organizations to design community-based physical activity programs targeted towards specific ethnic groups, and they have disseminated educational materials about physical activity in four different languages.^{lxxi} Studies have shown that, in addition to creating language-specific information and learning opportunities, focusing on the specific social norms and family systems of ethnic and racial minorities will help to reduce the physical activity disparities found in these communities. For example, exercise initiatives that incorporate families and community events, such as group cultural dances or exercise in public places, can have greater success for some targeted populations.

- **Geographic relevance:** Creating physical activity opportunities for indigenous populations that are easily adaptable to rural settings (e.g., outdoor ball games) can also encourage participation in some targeted communities. For example, the Pan American Health Organization, recognizing the disparities faced by its ethnic and racial minorities (i.e., indigenous and Afro-descendent), emphasizes an intercultural policy approach that seeks to incorporate different traditions, value systems, and social systems into physical activity program design and implementation.^{lxvii}

Lack of representation in the program and policy design process often leads to unequal access and poorly targeted initiatives. Community leaders, local gyms, and policymakers can collectively shape physical activity opportunities and community messaging for these populations. Groups representing marginalized minority populations can partner with local governments and policymakers to assess the quality and accessibility of physical activity opportunities and to identify areas for improvement and possible solutions. Stakeholders can seek out groups already operating in specific racial and ethnic communities to increase the likelihood of program success. The Inter-American Development Bank has used such partnerships to bring sports programs and physical activity to almost 90,000 people in 18 of its member nations across Latin American and the Caribbean.^{lxviii} One of its programs, “A Ganar,” partners with companies and development organizations to bring sports programs to marginalized youth, such as indigenous and ethnic communities in Brazil and Ecuador.

Action 3: Sample policies to improve access to physical activity for underserved populations.

- Prioritize underserved populations and regions for investments in active design and active transit infrastructure (see Action 1).
- Establish dedicated budgets and initiatives targeting underserved populations within existing sports and recreation policies/programs and “sports for all” plans (see Action 2).
- Prioritize underserved populations and regions for investments in community-based exercise/sports/recreation infrastructure (e.g., outdoor gyms for older adults, women-only facilities) and free/low-cost exercise classes and programs (see Action 2).
- Ensure that members of underserved communities are involved in designing the physical activity programs that target them.
- Promote laws and regulations designed to decrease physical activity disparities, such as drafting local government regulations requiring the provision of equal quality services, parks, and recreation facilities for all neighborhoods.
- Establish joint-use agreements for community members to use school-based sports/recreation facilities in regions that do not have other public-access facilities.
- Provide free access to community-funded exercise/sports/recreation facilities and programs (or subsidized access to private facilities) for youth, older adults, and other underserved populations.
- Ensure that public exercise/sports/recreation facilities and programs are accessible for persons with disabilities.
- Ensure that programs targeting racial and ethnic minority populations are culturally relevant and language specific.
- Support people of diverse backgrounds to become trained physical activity professionals.
- Educate physical activity professionals on addressing biases, in order to better serve underserved populations.
- Improve training of physical activity professionals to work with older adults and persons with disabilities.
- Support/train caregivers and staff in assisted living/nursing facilities and rehab centers to deliver movement programs safely for these populations.
- Expand research on physical activity for persons with disabilities, including participation rates, guidelines, barriers/constraints, health benefits, and effective interventions.
- Promote data collection, research, and information dissemination on the disparities, pressing needs, and factors affecting physical activity participation for racial and ethnic minorities.

This is a sample of policies that can be used to encourage physical activity, but not an exhaustive list. Please see Key Resources, at the end of this report, for more details on policies, strategies, case studies, and research evidence related to physical activity promotion.

4

Integrate physical activity into the health system.

Issue 4: The health system is disconnected from the physical activity sector.

According to the WHO, “primary health and other health and social care professionals are at the forefront of direct, face-to face patient assessment and are ideally positioned to provide effective interventions on physical activity for the prevention and management of chronic diseases and mental health.”^{lxxix} Promoting physical activity as part of routine patient care is especially important for the least active people and for those at risk of chronic disease and related disabilities. Currently, only 40% of countries report having evidence-based national protocols or standards for addressing physical inactivity within primary care, and even within those countries, the protocols are not being applied at the majority of primary health care facilities.^{lxxx}

Within the fitness and exercise sector, the activities and facilities that exist today mainly serve people who are already active or are capable of physical activity. GWI’s review of surveys and studies across over 60 countries found that one of the top barriers for adults not engaging in regular physical activity is physical conditions such as poor health/illness and disability.^{lxxxi} They may feel uncomfortable in a mainstream fitness facility, where the staff are not trained to support or instruct those with physical/health conditions, or they may be unsure how to exercise on their own safely given their physical/health issue. This means that many individuals are not engaging in regular exercise that may help to alleviate their symptoms, improve mobility, and slow the progression or even help to eliminate a chronic health condition.

Action 4: Incorporate physical activity into prevention and treatment protocols, working in cooperation with the health system.

4.1 Implement exercise as medicine and exercise prescription initiatives.

Public health authorities and publicly funded healthcare systems can be leaders in prescribing exercise as part of patient care for those whose health conditions are partly caused or exacerbated by a lack of physical activity. The WHO has developed a toolkit to support countries in developing protocols for addressing physical activity within primary care, and it is developing a free online training course for policymakers and healthcare providers (via the WHO Academy, expected to launch in 2023 or 2024).^{lxxxii} *Exercise is Medicine* (or EIM, co-launched by the American College of Sports Medicine and the American Medical Association in 2007) is an international initiative that provides a framework for the inclusion of people in any health or physical condition in the delivery and support of physical activity. EIM advocates for physical activity to be included as a standard part of medical treatment and the patient care process, with physicians providing assessments, counselling, a prescription for exercise where appropriate, and a referral to available resources. Having a physician prescribe exercise as part of a treatment plan can give patients a powerful nudge, especially to those who had been prevented by their health condition from being physically active in the past.

However, appropriate resources – including accessible facilities and trained professionals – need to be available to serve their needs. Many countries are experimenting with different approaches to exercise referrals or “prescriptions” and to building collaborations between the health sector and community/private service providers:

- The United Kingdom is a leader in social prescribing, and specifically in prescribing exercise as a part of medical treatment. The United Kingdom’s National Health Service (NHS) has a well-established exercise referral scheme, whereby patients are referred to government-funded public leisure centers to access appropriate exercise and activity programs and can access these services for free.^{lxxiii} In 2022, NHS England launched a 3-year pilot program in 11 local authority areas to experiment with social prescriptions for walking and cycling (developed in coordination with infrastructure improvements for walking/cycling). The scheme is a first-ever partnership between the health sector and transport officials and is part of a broader national action plan for improving active transit.^{lxxiv}
- In Australia, “accredited exercise physiologists” (AEPs) have been recognized as an allied health profession and integrated into clinical guidelines for major chronic diseases since 2006. AEPs deliver services for people with acute or chronic conditions throughout the national health system (including public and private hospitals, primary care facilities, rehab facilities, and specialist clinics), and patients can receive a referral from their primary care provider and have these services covered by the national Medicare system. The AEP referral system has shown to be cost effective for treating chronic conditions – for example, one study estimated savings of US\$3,900 per patient with type 2 diabetes who goes through an AEP-led exercise intervention.^{lxxv}
- Singapore, part of the EIM global network, has launched Active Health Labs as a collaboration between Sports Singapore and other public health institutions. Active Health Labs conduct assessments and take referrals from physicians in order to prescribe and implement appropriate physical activity for patients, in order to treat, manage, and prevent common chronic health conditions.
- France is piloting schemes whereby physician prescribed fitness/exercise can be partially reimbursed by social security.

4.2 Develop medical fitness centers. Chronic health conditions, illness, and injury can discourage many people of all ages from physical activity, and when they do so, they need to proceed with supervision and care.

In the United States, medical fitness centers – typically established by, or in partnership with, hospital systems – have emerged to bridge this gap and provide a continuum of care, from rehabilitation and physical therapy, to physician-supervised exercise, to recovery and prevention. Medical fitness centers, which have grown steadily and exceed 1,400 in 2018, are helping to reach an important demographic that is not well served by the commercial fitness market. According to the Medical Fitness Association, 40-50% of individuals who join a medical fitness center have never been a member of any type of fitness center before; 60-70% of participants in transitional/specialized medical/fitness programs will become full fitness club members. Members of medical fitness centers also tend to be older, averaging 49.3 years old, versus 37 years for traditional multipurpose gyms.^{lxxvi}

In 2016, the UK launched a public-private partnership between ukactive/Sport England and the National Health Service to transform its publicly funded leisure centers into “community wellness hubs” that combine exercise/sport/recreational facilities with primary healthcare centers, libraries, and other public services. Co-locating physical activity and health services under one roof makes it easier for physicians to prescribe exercise for patients with chronic conditions and connect them with the right services. It also enables these centers to better serve the inactive population, older adults, and those with disabilities.^{lxxvii} A separate pilot initiative is creating musculoskeletal (MSK) health hubs at community leisure centers, swimming pools, and gyms across the UK, as a partnership between ukactive, Orthopaedic Research UK, and other organizations. The program aims to provide individualized exercise, rehab, and education to patients before and after surgery for persons with arthritis, knee replacements, and other MSK conditions, which are the primary cause of disability among older adults and often cause them to enter nursing care homes early. The MSK program launched at 15 sites in 2022 and is expanding to 85 additional leisure centers and swimming pools in 2023.^{lxxviii} Both programs in the UK are examples of how the fitness sector can partner with the health system to expand value-added services, address health inequities, improve quality of life, and reduce burdens on acute healthcare facilities and social services.

As another approach to meet the needs of these populations, Florida’s Orlando Health is partnering with CrossFit coaches to adapt workouts for patients with spinal cord injuries, with the goal of creating an inclusive, non-intimidating, and safe community where patients can continue their rehabilitation and build their strength in a mainstream gym setting. There are many opportunities for publicly supported healthcare systems to partner with the private sector to implement medical fitness centers and programs, with the potential for reducing health expenditures and positively impacting patients. One of the first long-term studies of medical fitness centers in Canada found that membership in a medical fitness center was associated with a 60% lower risk of all-cause mortality and a 13% lower risk of hospitalization as compared to non-members.^{lxxix}

Action 4: Sample policies to integrate physical activity into the health system.

- Adopt an “Exercise is Medicine” platform within the health system.
- Make physical activity a key “vital sign” that health professionals monitor and discuss with patients, and integrate physical activity promotion into clinical guidelines.
- Develop exercise referrals/prescription programs (e.g., as a partnership between health systems and public/community/nonprofit exercise facilities and programs).
- Develop medical fitness centers and/or co-locate physical activity and healthcare facilities.
- Fund or subsidize people’s exercise activities through the health system or health insurance.
- Expand research on the outcomes and cost effectiveness/ROI of promoting physical activity for those with chronic conditions or specific health risks.
- Train health professionals on how to counsel patients and integrate physical activity into patient care (e.g., include this training in medical school curricula, licensing/certification exams, etc.).
- Train exercise professionals to work in the context of healthcare and exercise referral systems for patients with medical conditions.
- Train caregivers (e.g., assisted living/nursing homes, rehab facilities, home-based care, etc.) on how to deliver movement programs safely for these populations.

This is a sample of policies that can be used to encourage physical activity, but not an exhaustive list. Please see Key Resources, at the end of this report, for more details on policies, strategies, case studies, and research evidence related to physical activity promotion.

5

Encourage youth to build lifelong habits for physical activity.

Issue 5: Youth are increasingly sedentary and are not engaging in sufficient physical activity.

Like adults, many children and teens are not meeting the WHO's recommended levels of physical activity to stay healthy. Studies show that the rates of physical activity tend to start falling when children reach school age, and then decline further in the teenage years – and girls are typically less active than boys. While the availability of comparable cross-country data on youth physical activity is limited,^{lxxx} the WHO recently conducted a pooled analysis of cross-sectional survey data covering 146 countries and territories, and found that more than 85% of girls and 78% of boys ages 11-17 years have insufficient physical activity.^{lxxxii} These trends are alarming not only because physical inactivity impairs the healthy physical and mental/emotional growth of adolescents, but also because physically inactive youth often become inactive adults, raising the risks of chronic diseases and poor mental/emotional health throughout their lifespans.^{lxxxii} There are many factors behind these trends:^{lxxxiii}

- Both at home and at school, children and teens are spending more time indoors, looking at screens, and doing sedentary activities, and too little time doing active play.
- Parents are a major influence, and some studies have found that the rates of physical activity among families are correlated^{lxxxiv} – inactive parents may be more likely to have inactive children, and so the rise in adult inactivity is also likely to reduce youth activity levels.
- Use of active transit (walking, biking) by youth has been declining in many countries, and fewer children walk or bike to/from school each day. For example, in the United States, the share of children who walk or bike to school fell from 48% in 1969 to only 13% in 2009.^{lxxxv}
- For many children, physical education offerings in schools are insufficient and too infrequent, especially for girls and for adolescents/teens (*see further discussion below*).
- While organized sports should provide an important opportunity for youth to be active, in many places these activities are overly competitive, scheduled, and privatized, to the detriment of unstructured active play. Many youth drop out of sports in their teen years, and in many regions, youth simply do not have the resources or opportunities to participate in organized sports at all. For example, in the United States there is a growing “physical divide”: children from high-income families are twice as likely to participate in sports as those from families living in poverty (70% participation rate versus 31%, respectively^{lxxxvi}) (*see further discussion below*).

Action 5: Increase opportunities for youth to learn and participate in a variety of physical activities through schools and sports.

All of the policy initiatives proposed in *Action 1* and *Action 2* of this toolkit (e.g., active transit, active design in real estate, sports for all initiatives, free and accessible public spaces for outdoor recreation, free exercise classes and programs, subsidized and public-private fitness facilities, etc.) can be used to encourage increased physical activity among children and teens. These initiatives also capitalize on family influences, in the sense that physically active parents help encourage physically active children. In addition, there are a number of policy initiatives specifically targeting youth that can be implemented in schools and youth sports/recreation programs.

5.1 Ensure that all children receive physical education (PE) classes regularly in school.

Physical education (PE) classes in schools are recognized as essential for helping children build awareness, skills, and lifelong habits of physical activity; they also contribute to better mental wellness, social development, academic performance, and school outcomes. According to a global study by UNESCO, 97% of countries have legal or de facto requirements for some provision of PE in schools. But in spite of these official commitments, actual provision of and access to school-based PE is lacking in many places, and in 29% of countries, PE is not being delivered in accordance with national requirements or expectations. This gap is due to many factors, including prioritization of academic subjects, financial constraints, a lack of qualified teachers, and inadequate facilities and equipment.^{lxxxvii} For example, in Asia, the culture of academic achievement and testing often relegates PE to a lower status than academic subjects, thereby giving PE a lower priority in terms of teacher training, funding, facilities, and consistency of holding classes. The quality of PE facilities is reportedly inadequate in 40% of the Asian countries surveyed by UNESCO. In 2022, only 69% schools in India had a playground on the school premises, and 80-83% had any sports equipment available at all.^{lxxxviii} Even in the United States, the outdoor athletic facilities and playgrounds are considered to be in fair to poor condition in one-quarter to one-third of public schools.^{lxxxix}

It is also important to ensure gender equity and inclusion in physical education, as some regions do not allow girls to participate or have significant inequities in the amount, quality, and content of PE programs at school.^{xc} In many places, the PE curriculum focuses on performance- and competition-based high-skill sports, which can be intimidating for many children and do not necessarily build useful lifestyle skills. In addition, PE requirements are typically lower in secondary schools than in primary schools, tapering off just at the age when youth physical activity levels start to decline and become more alarming. For example, in Myanmar, the PE requirements drops from 100 minutes per week in primary school to 25 minutes in secondary school. For children and teens who do not have access to PE classes at school, the only way to formally learn physical skills would be through private sporting clubs and schools, which are unaffordable for many people around the world.

As governments in many countries start to become alarmed about the crisis of physical inactivity, obesity, and chronic disease, many are putting a new focus on the provision of PE in schools. One region where PE has been in the spotlight is the Middle East. In 2017, Saudi Arabia lifted its ban on physical education and sports programs for girls in public schools,

while in 2018, Egypt’s president called for mandated PE in schools (currently Egyptian public schools only pay lip service to PE classes; it is not a priority for schools or parents, and both staffing and facilities are considered to be abysmal). There is extensive research and analysis available on good practices in school-based physical education. Given that many children and teens do not have access to private sporting clubs and activities, placing more emphasis on PE and investing more resources in the public education system may be one of the most broad-based ways to increase physical activity among youth and to build lifelong habits.

5.2 Encourage movement throughout the school day.

School-based physical education classes alone do not provide a sufficient level of physical activity for children. On average, schools around the world allocate 97-99 minutes per week to physical education,^{xcii} which is far less than the one hour of activity per day recommended for children by the WHO. As time for PE and recess has decreased in schools across many regions, some are experimenting with ways to incorporate movement and play into the classroom and throughout children’s school days, and most of these efforts are easily accessible for schools with very limited financial resources. Getting away from the tradition of children sitting quietly at desks, teachers are encouraging more movement around the classroom, developing active and play-based lessons, scheduling movement breaks, and incorporating activity-based equipment and active seating into the classroom (e.g., balance balls, pedal desks, yoga mats, balance boards). In the United States, the Active Schools initiative (launched in 2013 as part of Michelle Obama’s Let’s Move! campaign) is a public-private partnership working with more than 23,000 schools around the country to integrate 60 minutes of movement and play into the day for every K-12 student.^{xciii} Finland’s government launched its national Finnish Schools on the Move (“Liikkuva Koulu”) initiative in 2010, aiming to build a culture of movement throughout the school day. Today, 90% of municipalities and comprehensive schools are involved in the program, which focuses on efforts such as: non-traditional, movement-based teaching methods; more time during the school day for PE and recess; encouraging active transit to school; and empowering and educating children (e.g., training students to be “recess activators” and encourage active games and play).^{xciii} The Daily Mile initiative, first conceived by a Scottish teacher in 2012, is an initiative that has primary school students take a 15 minute break every school day (outside of formal PE classes) to run or jog outside. The initiative has been lauded for its simplicity and inclusiveness, helping children get exercise and fresh air without any special equipment, funding, or training required of the schools and teachers. More than 9,300 schools across 66 countries now take part in the Daily Mile, involving over 1.9 million children, and research has shown significant health benefits for participants.^{xciv} Some regions in Europe are focusing on encouraging children to use active transit to/from school. For example, Portugal’s “CicloExpresso do Oriente” program, launched in 2015, organizes a “bike train” of groups of students cycling to school, accompanied by a supervising parent.^{xcv} The “walking school bus” concept, first developed in Japan several decades ago, organizes groups of children to walk to school along a set route, with designated “bus stops” and “pick up times” similar to a regular school bus. In the last 20 years, the concept has spread to hundreds of schools across the United Kingdom, Australia, New Zealand, Europe, and North America. Public schools can be a leader in sponsoring new models such as these to help children develop habits of incorporating movement into their daily lives.

5.3 Put the “play” back into youth sports.

Outside of formal physical education in schools, sports are the most important access point for children to learn physical skills and build a lifelong habit and love of being active. Anyone, anywhere can play sports like soccer, rugby, or cricket with just an empty lot or field and a ball or some simple equipment; they also do not require specialized instruction, as basic skills and rules can easily be learned from other players. In developing countries and lower-income regions, youth sports are typically not a business and do not require any money (outside of training programs for elite athletes) – they are simply a fun, informal activity that children do in their free time. In wealthier regions, and especially across Europe and North America, youth sports are typically more formalized, more expensive, and competition-focused, and they are organized through sporting clubs and leagues (and also in secondary schools in some countries, such as the United States, United Kingdom, and Australia). However, the high-skill, high-pressure, highly specialized, highly competitive, and increasingly privatized trajectory that youth sports have taken in some places, notably the United States, is not the most effective way of keeping large numbers of kids involved and active. One study found that 70% of U.S. children drop out of organized sports by age 13. Meanwhile, the high participation costs, parental time commitments, lack of transportation, and lack of access to facilities can all be major barriers for lower-income and minority children (who have lower sports participation rates than wealthy and white children in the United States).^{xcvi} While informal sports play has largely become a thing of the past in many middle- and upper-income communities, research has found that free/unstructured play can produce higher levels of physical activity than organized sports (because children spend less time sitting/waiting to play). One study in the United States found that youth were inactive 43% of the time during formal sports practices.^{xcvii}

In the United States, the Aspen Institute’s Project Play initiative, launched in 2013, is working in communities throughout the country to bring “fun” and free play back to youth sports, reduce attrition rates, and raise sports participation rates among disadvantaged populations. The project has developed eight strategies that can help parents, coaches, and communities to make sports a more accessible and enjoyable experience for all children.^{xcviii} Elsewhere in the world, the approach to youth sports that is most often lauded for its effectiveness is the model in the Nordic countries, which approach youth sports as a major public health and welfare concern. In Norway, for example, sports participation rates at all ages (children, teens, adults) are among the highest in the world, and the participation gap between girls and boys is smaller or nonexistent. Many factors account for this, including the high popularity of lifestyle and outdoor sports that can be done at all ages (organized walking, jogging, skiing) over organized team sports, as well as a high level of government investment in sporting facilities throughout the country.^{xcix} Organized sports clubs and teams abide by policies established by the 1987 “Children’s Rights in Sport” doctrine, which prohibits high-level competition before ages 11-13, prohibits publishing scores or rankings for younger children, puts high value on children’s participation in planning and execution of their sporting activities/training, emphasizes fun and friendship, and keeps costs low.^c These policies result in more children playing more sports for fun, more free play, overall higher levels of physical activity among youth, and a higher persistence of sports involvement into adulthood.

Action 5: Sample policies to encourage youth to build lifelong habits for physical activity.

- Establish a youth sports/physical activity plan to prioritize resources/programs for youth physical activity promotion.
- Invest in school-based physical education, recreation, and sports infrastructure, facilities, equipment, and programming.
- Incorporate active design into schools and childcare centers.
- Provide youth (especially in disadvantaged populations/regions) with free or subsidized access to community exercise/sports/recreation facilities and programs.
- Provide youth with free access to school-based sports/recreation facilities during school holidays and vacation periods.
- Increase funding for community-based and extracurricular school-based youth sports and exercise programs (especially in underserved areas).
- Maintain/expand physical education as a compulsory subject in school, with sufficient minutes dedicated each day/week.
- Expand “recess” time during the school day.
- Integrate movement/exercise as a priority in national/regional curriculum guidelines.
- Develop “walking school bus” or bike-to-school programs.
- Expand training for school-based physical education teachers.
- Train schoolteachers on physical literacy, active play, and increasing movement during the school day.
- Expand training for youth sports coaches, physical activity professionals, and school staff on how to offer safe, inclusive, developmentally/culturally appropriate, and positive physical activity and sports programs (e.g., focus on fun, multi-sport play, sport sampling, etc.).

This is a sample of policies that can be used to encourage physical activity, but not an exhaustive list. Please see Key Resources, at the end of this report, for more details on policies, strategies, case studies, and research evidence related to physical activity promotion.

6

Encourage adults to be physically active during the workday.

This policy action is cross-posted in the Wellness at Work Toolkit.

Issue 6: The nature and demands of our jobs are a major driver of sedentary behaviors.

As discussed in *Action 2*, our modern lifestyles require far less physical exertion than those of previous generations. For adults, one of the biggest impediments to engaging in enough physical activity is the nature and demands of our jobs. In higher-income countries, shrinking agricultural and industrial work and the simultaneous rise of service jobs have contributed to the overall decline in adult physical activity since the mid-20th century.^{ci} Research in the United States found that in 1960, 48% of private industry jobs required at least moderate-level physical activity; by 2008, less than 20% of jobs required that level of activity. This means that over 80% of jobs largely require sitting and sedentary behavior. During this same time period, job-related energy expenditure declined by 124-140 calories for women and men, respectively.^{cii}

The rise of sedentary jobs is a major concern, not only because it reduces our opportunities for work-related physical activity, but also because sitting for prolonged periods increases our risks of heart disease, diabetes, cancer, and premature death, *regardless of whether we exercise regularly or not.*^{ciii} We can counteract some (but not all) of the health risks of too much sitting by engaging in more physical activity on a regular basis. For the large and growing number of workers in sedentary jobs, that means we need to find time to exercise in our leisure hours. But the demands of our always-on work cultures are working against us in this regard. With long working hours, long commutes, dual income families, work-life balance pressures, childcare issues, and so on, many of us simply cannot find time to exercise during our limited leisure hours. GWI's review of surveys and studies across over 60 countries found that the biggest barrier for adults to exercise is a lack of time.^{civ}

Action 6: Realign company benefits and culture to reduce sedentary behavior and increase opportunities for physical activity during the workday.

The rise of sedentary jobs alongside insufficient physical activity is a major threat to our individual and collective health and well-being. An important way to address this crisis is to re-insert movement back into our workplaces and workdays, where many of us spend at least half of our waking hours. This policy area is unique from others in this toolkit because it depends upon companies and employers voluntarily taking action, rather than policy mandates from government. But governments still have important roles to play in this arena, such as providing incentives and support for workplace-based physical activity initiatives, as well as supporting research on effective practices. In addition, the public sector is a very large employer in most regions, and governments can be best practice examples by implementing the actions discussed below for government employees/workplaces.

The workplace-based physical activity initiatives described below are increasingly common in large and multinational corporations; however, the majority of workers in the world are employed in small- and medium-sized enterprises (SMEs). Most SMEs have very limited resources to offer these types of benefits and programs to their employees, or even to access support or advice on how to implement them. In 2021-2022, the United Kingdom's ukactive and Sport England partnered with the Confederation of British Industry and Federation of Small Business to conduct the first-of-its-kind national research on this very issue. The resulting report, *The Active Workforce*, provides specific recommendations on how SMEs, the government, the health sector, and the fitness/physical activity sector can all play a role in getting SME employees moving more during the workday.

It is also important to keep in mind that the majority of the world's workers do not work in secure jobs at companies at all (whether large or small). GWI estimates that in 2020, only 38% of the world's workers were in "permanent contract" jobs, while the rest were in informal, temporary, contract, gig, and family-based jobs that would not offer any types of benefits.^{cv} The physical activity initiatives discussed below can be very impactful for a certain class of workers, but they have limited reach. The rest of the workforce will continue to depend upon public investments in community-based and low-cost/free physical activity infrastructure to exercise during their leisure time (as discussed in the rest of this toolkit).

6.1 Provide opportunities for physical activity during the workday.

Employers increasingly recognize that unhealthy employees can be bad for their bottom lines, not only due to higher healthcare costs, but also due to reduced productivity, higher absentee rates, higher turnover, and other costs. Many workplace wellness programs provide amenities and "perks" that encourage employees be more physically active, such as employer-subsidized gym memberships, corporate gyms, free on-site fitness and yoga classes, free subscriptions to fitness apps, free fitness bands, workplace running clubs, employee fitness challenges, and cycle/walk to work incentives. While these kinds of programs do reflect some level of commitment and investment by companies in encouraging employees to exercise, it is also important to note that there is insufficient evidence that such programs are actually effective at inducing long-term behavior change or improving health outcomes. Workplace wellness programs suffer from many challenges, including low participation rates among employees, as well as selection bias (i.e., participating employees are often those who are already physically active or healthy).^{cvi} In addition, many workers cannot even take advantage of free fitness classes and on-site gyms because the hours/demands of their jobs do not give them the time. While we are not suggesting that these programs are always "bad" or should not be implemented, they need to be formulated with care in order to be effective. Even the most well-meaning exercise programs can pose some unique challenges in workplace environments: Are they inclusive and respectful of workers with different health concerns, mobility issues, and disabilities? How can they avoid embarrassment or body shaming (whether overt or indirect)? Do workers feel coerced into participating? Are there penalties for non-participation? Are workers expected to participate during their personal time? How can these programs accommodate the needs of remote, offsite, part-time, temporary, and shift workers? How will participation in such programs be kept separate from workers' job performance?

The best workplace wellness programs are grounded in a holistic company culture of care for employees' well-being, and a strong commitment and model from management, rather than off-the-shelf programs, financial rewards, or "carrots and sticks." Some companies are working to incorporate exercise and movement directly into their employees' workdays in a more holistic and organic way – for example, allowing for exercise during paid work hours, providing flex-time for workers to participate in fitness and outdoor recreation, encouraging casual attire that is conducive for movement, installing banks of treadmill and stationary bike desks, and designing movement-friendly workplaces (e.g., open/attractive stairwells). Employers in Nordic countries are often noted for their progressive policies on physical activity, with support from their governments. For example, most companies in Sweden and Finland subsidize their employees' gym memberships, sporting activities, and active recreation with a tax-free allowance (known as "friskvårdsbidrag" in Sweden, often in the range of \$100-\$600 or more per year).^{cvi} Many companies actively encourage employees to exercise during the workday, even providing one hour per week of paid work time for working out. In addition, the employee-friendly company cultures, emphasis on work-life balance, and social benefits system in Nordic countries also help support people in maintaining their exercise habits. In fact, social benefits and policies on breaks, time off, flexible scheduling, work outside of non-work hours, etc. can have a huge impact on employees' ability to exercise and to take advantage of the exercise benefits that may be offered to them.

6.2 Reduce sitting during the workday.

It is much easier for companies to address the amount of time employees spend sitting during the workday, because they have direct control over workplace functions, design, and culture (rather than trying to influence workers' personal exercise habits outside of work). As discussed above, these measures are important – especially in companies with a large number of desk-/office-based jobs – because sitting is its own health risk factor (separate from exercise). Some approaches involve simple and no-cost shifts to company culture and workplace habits, such as doing standing/walking meetings, providing regular/scheduled breaks for stretching and walking, encouraging employees to walk to colleagues' desks instead of phoning, and encouraging employees to use the stairs rather than the elevator. Companies can also invest in workplace equipment, design, and infrastructure changes that are conducive to more movement and less sitting during the workday, such as: offering standing workstations and treadmill desks, providing hands-free devices and headsets for standing/walking calls, and designing movement-friendly workplaces (e.g., open/accessible stairways, attractive walking routes inside/outside buildings). As with other workplace wellness programs, these initiatives are more likely to be successful if they are embraced and modeled by leadership as an authentic part of company culture, rather than prescriptively forced on employees.

Action 6: Sample policies to encourage adults to be physically active during the workday.

Employers can:

- Provide employees with wellness benefits such as free/subsidized/onsite exercise facilities and classes, cycle/walk to work incentives, and related programs that encourage physical activity (working in partnership with physical activity/fitness providers).
- Provide employees with guilt-free/flexible time to exercise during their workday.
- Adjust company practices and habits to reduce time spent sitting during the workday (e.g., standing/walking meetings, scheduled breaks for stretching/walking, etc.).
- Invest in workplace design that encourages movement during the workday (e.g., standing or treadmill desks, movement-friendly workplace facilities).
- Educate employees on the health risks of prolonged sitting during the workday.
- Ensure that wellness programs are a positive, authentic part of company culture and care for employees, and are modeled and embraced by management.
- Ensure that employee benefits and policies on breaks, time off, flexible scheduling, work outside of non-work hours, etc. support employees' work-life balance and ability to engage in exercise outside of work hours.

Governments can:

- Be best-practice employers by implementing physical activity initiatives/benefits in public sector workplaces.
- Provide tax incentives for companies to offer physical activity programs/benefits to employees.
- Provide targeted resources and support to SMEs for implementing physical activity programs/benefits for their employees.
- Expand public health messaging on the health risks of sedentary jobs.
- Ensure that nationwide social benefits related to time off, breaks, childcare, and related issues support workers' work-life balance and ability to engage in exercise outside of work hours.

This is a sample of policies that can be used to encourage physical activity, but not an exhaustive list. Please see Key Resources, at the end of this report, for more details on policies, strategies, case studies, and research evidence related to physical activity promotion.

Key Resources: Physical Activity

There are dozens of guides, resources, and frameworks outlining policy approaches for encouraging physical activity at the local, national, and global levels. Below are some comprehensive and high-quality resources that describe evidence-based approaches and that go into greater detail on key policy topics covered in this report.

Active Living Research: Promoting activity-friendly communities, <https://activelivingresearch.org/>.

Active Living Research (2017). *Open Streets: Trends and Opportunities*. <https://www.880cities.org/images/880tools/openstreets-policy-brief-english.pdf>.

American College of Sports Medicine, *Exercise is Medicine*, <https://www.exerciseismedicine.org/>.

Aspen Institute, *Project Play*, <https://www.aspenprojectplay.org/>.

Centers for Disease Control and Prevention (2022, March 24). *Active People, Healthy Nation: Strategies to Increase Physical Activity*. <https://www.cdc.gov/physicalactivity/activepeoplehealthynation/strategies-to-increase-physical-activity/index.html>.

City of New York, Department of City Planning (2010). *Active Design Guidelines: Promoting Physical Activity and Health in Design*. <https://www.nyc.gov/site/planning/plans/active-design-guidelines/active-design-guidelines.page>.

City of New York and Center for Active Design (2013). *Active Design: Affordable Designs for Affordable Housing*. <https://www.nyc.gov/site/hpd/services-and-information/active-design.page>.

Duncan, S., et al (2013). *Active Design: Shaping the Sidewalk Experience*. Department of City Planning, City of New York, NY. <https://www1.nyc.gov/site/planning/plans/active-design-sidewalk/active-design-sidewalk.page>.

Yeung, O., and Johnston, K. (2019). *Move to be Well: The Global Economy of Physical Activity*. Miami, FL: Global Wellness Institute. <https://globalwellnessinstitute.org/industry-research/global-economy-physical-activity/>.

Johns Hopkins Center for Injury Research and Policy, NYC Department of Health and Mental Hygiene, and Society for Public Health Education (2013). *Active Design Supplement: Promoting Safety, Version 2*. <https://www1.nyc.gov/assets/doh/downloads/pdf/environmental/promoting-safety.pdf>.

John W. Brick Mental Health Foundation (2022). *Move Your Mental Health: A Review of the Scientific Evidence on the Role Exercise and Physical Activity in Mental Health*. <https://www.johnwbrickfoundation.org/move-your-mental-health-report/>.

Open Streets Project, <https://openstreetsproject.org/>.

Physical Activity Alliance, *Move With Us*, <https://paamovewithus.org/>. See also: *U.S. National Physical Activity Plan* (2016), <https://paamovewithus.org/national-physical-activity-plan/>.

ukactive has the most extensive roster of country-level research and strategies on promoting physical activity, including a focus on different population groups (older adults, children, etc.) and also partnerships among the private fitness sector, public sector, and healthcare. For example, see the following reports:

- *Leading the Change: Social Prescribing Within the Fitness and Leisure Sector* (2022), <https://www.ukactive.com/reports/leading-the-change/>.
- *Empowering Communities* (2018), <https://www.ukactive.com/reports/empowering-communities-capital-investment/>.
- *Going the Distance: Exercise professionals in the wider public health workforce* (2018), <https://www.ukactive.com/reports/going-the-distance-exercise-professionals-in-the-wider-public-health-workforce/>.
- *Physical Activity: A Social Solution* (2017), <https://www.ukactive.com/reports/physical-activity-a-social-solution/>.
- *ukactive's Blueprint for an Active Britain* (2015), <https://www.ukactive.com/reports/ukactives-blueprint-for-an-active-britain/>.
- *Physical Activity in the Workplace: The Active Workforce* (2022), <https://www.ukactive.com/reports/the-active-workforce/>. See also Sport England's Active Employee Toolkit (2021), <https://www.sportengland.org/funds-and-campaigns/active-employee-toolkit>.
- Physical Activity and Aging: 1) *Life In Our Years* (2022), <https://www.ukactive.com/reports/life-in-our-years/>. 2) *Reimagining Aging* (2018), <https://www.ukactive.com/reports/reimagining-ageing/>. 3) *Moving More, Ageing Well* (2017), <https://www.ukactive.com/reports/moving-more-ageing-well/>.
- Physical Activity and Children: 1) *Generation Inactive 2* (2018), <https://www.ukactive.com/reports/generation-inactive-2/>. 2) *Generation Inactive 1* (2017), <https://www.ukactive.com/reports/generation-inactive-1/>.
- Physical Activity and Disabilities: *Everyone Can*, <https://www.ukactive.com/news/ukactive-launches-everyone-can-task-force-as-sector-leaders-unite-to-drive-improvement-in-physical-activity-for-disabled-people/>, and <https://everyonecan.ukactive.com/>.

UNESCO (2014). *World-wide Survey of School Physical Education*. Paris: UNESCO. <https://unesdoc.unesco.org/ark:/48223/pf0000229335>.

Urban Land Institute (2015). *Building Healthy Places Toolkit: Strategies for Enhancing Health in the Built Environment*. Washington, DC: Urban Land Institute. <http://uli.org/wp-content/uploads/ULI-Documents/Building-Healthy-Places-Toolkit.pdf>. See also: <https://bhptoolkit.uli.org/>.

Urban Land Institute (2016). *Active Transportation and Real Estate: The Next Frontier*. Washington, DC: Urban Land Institute. <http://uli.org/wp-content/uploads/ULI-Documents/Active-Transportation-and-Real-Estate-The-Next-Frontier.pdf>.

- Urban Land Institute (2016). *Building Healthy Corridors: Transforming Urban and Suburban Arterials into Thriving Places*. Washington, DC: Urban Land Institute. <https://uli.org/wp-content/uploads/ULI-Documents/Building-Healthy-Corridors-ULI.pdf>.
- World Cancer Research Fund International, *MOVING Framework* (<https://www.wcrf.org/policy/policy-databases/moving-framework/>), and *MOVING Policy Database* (<https://policydatabase.wcrf.org/>).
- World Health Organization (2018). *Global Action Plan on Physical Activity 2018-2030: More Active People for a Healthier World*. Geneva: WHO. <https://apps.who.int/iris/bitstream/handle/10665/272721/WHO-NMH-PND-18.5-eng.pdf>.
- World Health Organization (2021). *Fair Play: Building a strong physical activity system for more active people*. Geneva: WHO. <https://www.who.int/publications/i/item/WHO-HEP-HPR-RUN-2021.1>.
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- World Health Organization (2022). *Global Status Report on Physical Activity 2022*. Geneva: WHO. <https://www.who.int/publications/i/item/9789240059153>.
- WHO Regional Office for Europe (2017). *Urban Green Space Interventions and Health: A review of impacts and effectiveness*. Copenhagen, Denmark: WHO. <https://www.who.int/europe/publications/m/item/urban-green-space-interventions-and-health--a-review-of-impacts-and-effectiveness.-full-report>.

ENDNOTES

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