



RUTE SANTOS

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Diretora-adjunta | Programa Nacional de Promoção da Atividade Física | DGS

Investigadora Coordenadora | Centro de Investigação em Atividade Física e Saúde | FADEUP



ERICEIRA
WSR+10

ERICEIRA WORLD SURFING RESERVE

RUTE SANTOS



EWSR & Desporto e Atividade Física. Da saúde individual à ética ambiental: o *Surfing* como prática desportiva

Painel 3 | As políticas de *Green Sport* e o *surfing*



ERICEIRA
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ERICEIRA WORLD SURFING RESERVE



Saúde, Atividade Física e Sustentabilidade



Make physical activity a part of daily life during all stages of life



<p>6 OUT OF 10</p>  <p>people in the European Union over the age of 15 never or seldom exercise or play sports</p>	<p>Every year in the WHO European Region, physical inactivity causes an estimated</p> <p>1 MILLION DEATHS</p>	<p>WHO recommendations for moderate- to vigorous-intensity physical activity:</p> <p>150 minutes per week (adults)</p> <p>60 minutes per day (children)</p>
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REGULAR PHYSICAL ACTIVITY THROUGHOUT THE LIFE-COURSE ENABLES PEOPLE TO LIVE BETTER AND LONGER LIVES



Benefits of School-Based Physical Activity

Regular physical activity in childhood and adolescence is important for promoting lifelong health and well-being and preventing a variety of health conditions. Schools are in a unique position, regardless of learning mode, to help students attain the recommended 60 minutes of moderate-to-vigorous physical activity daily.

A Comprehensive School Physical Activity Program (CSPAP) can increase physical activity opportunities before, during, and after school.



Increasing youth physical activity:

Before and After School

- Walking or biking to and from school
- Intramural sports and clubs
- Extended day programs

In Physical Education

- Standards-based curricula
- Motor skills development
- Physical fitness

During School

- Classroom physical activity breaks
- Active lessons
- Daily recess

Through Staff Involvement

- Role models for wellness
- Classroom participation
- Professional development programs

With Community Engagement

- Shared use of recreational facilities
- Opportunities for physical activity when school is out of session
- Environments for safe travel to and from school



Benefits everyone:

The Students

- Improved attention*
- Better mood and memory*
- Improved bone health
- Healthier weight
- Better heart health
- Lower risk of depression
- Better grades

The Teachers

- More students on task*
- Improved classroom behaviors*
- Students getting better grades
- Fewer absences

The Community

- Lower health care costs
- Expanded school partnerships
- More access to activity-friendly spaces

*Immediate benefit from a single physical activity session

To learn more, visit: <https://www.cdc.gov/healthyschools/physicalactivity>



Physical activity benefits for adults and older adults

- BENEFITS HEALTH**
- IMPROVES SLEEP**
- MAINTAINS HEALTHY WEIGHT**
- MANAGES STRESS**
- IMPROVES QUALITY OF LIFE**

REDUCES YOUR CHANCE OF

Type II Diabetes	-40%
Cardiovascular Disease	-35%
Falls, Depression and Dementia	-30%
Joint and Back Pain	-25%
Cancers (Colon and Breast)	-20%

What should you do?

For a healthy heart and mind		To keep your muscles, bones and joints strong		To reduce your chance of falls	
Be Active		Sit Less		Build Strength	
VIGOROUS	MODERATE				
RUN	WALK	TV	GYM	DANCE	
SPORT	CYCLE	SOFA	YOGA	TAI CHI	
STAIRS	SWIM	COMPUTER	CARRY BAGS	BOWLS	
MINUTES PER WEEK		BREAK UP SITTING TIME		2 DAYS PER WEEK	
75 OR 150					
VIGOROUS INTENSITY (BREATHING FAST DIFFICULTY TALKING)	MODERATE INTENSITY (INCREASED BREATHING ABLE TO TALK)				
OR A COMBINATION OF BOTH		<p>Something is better than nothing. Start small and build up gradually: just 10 minutes at a time provides benefit. MAKE A START TODAY: it's never too late!</p>			

UK Chief Medical Officers' Guidelines 2011 **Start Active, Stay Active: <http://bit.ly/startactive>**

Health Benefits of Physical Activity for Adults



IMMEDIATE

A single bout of moderate-to-vigorous physical activity provides immediate benefits for your health.

LONG-TERM

Regular physical activity provides important health benefits for chronic disease prevention.



- Sleep**
Improves sleep quality
- Less Anxiety**
Reduces feelings of anxiety
- Blood Pressure**
Reduces blood pressure
- Brain Health**
Reduces risks of developing dementia (including Alzheimer's disease) and reduces risk of depression
- Heart Health**
Lowers risk of heart disease, stroke, and type 2 diabetes
- Cancer Prevention**
Lowers risk of eight cancers: bladder, breast, colon, endometrium, esophagus, kidney, lung, and stomach
- Healthy Weight**
Reduces risk of weight gain
- Bone Strength**
Improves bone health
- Balance and Coordination**
Reduces risks of falls

Emerging research suggests physical activity may also help boost immune function.
 Nieman, "The Compelling Link," 201-217.
 Jones, "Exercise, Immunity, and Illness," 317-344.

ACTIVE PEOPLE, HEALTHY NATION
 CREATING AN ACTIVE AMERICA, TOGETHER

Source: *Physical Activity Guidelines for Americans*, 2nd edition

To learn more, visit: <https://www.cdc.gov/physicalactivity/basics/adults/health-benefits-of-physical-activity-for-adults.html>

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Review

Position Statement on Active Outdoor Play

Mark S. Tremblay^{1,2,3,*}, **Casey Gray**¹, **Shawna Babcock**^{4,†}, **Joel Barnes**¹,
Christa Costas Bradstreet^{5,†}, **Dawn Carr**^{6,†}, **Guylaine Chabot**⁷, **Louise Choquette**^{8,†},
David Chorney^{9,†}, **Cam Collyer**^{10,†}, **Susan Herrington**^{11,†}, **Katherine Janson**⁵, **Ian Janssen**^{12,†},
Richard Larouche¹, **William Pickett**^{13,†}, **Marlene Power**^{14,†}, **Ellen Beate Hansen Sandseter**^{15,†},
Brenda Simon^{16,†} and **Mariana Brussoni**¹⁷

Position



Access to active play in nature and outdoors—with its risks—is essential for healthy child development. We recommend increasing children’s opportunities for self-directed play outdoors in all settings—at home, at school, in child care, the community and nature.

Review

Position Statement on Active Outdoor Play

Mark S. Tremblay ^{1,2,3,*}, Casey Gray ¹, Shawna Babcock ^{4,†}, Joel Barnes ¹,
Christa Costas Bradstreet ^{5,†}, Dawn Carr ^{6,†}, Guylaine Chabot ⁷, Louise Choquette ^{8,†},
David Chorney ^{9,†}, Cam Collyer ^{10,†}, Susan Herrington ^{11,†}, Katherine Janson ⁵, Ian Janssen ^{12,†},
Richard Larouche ¹, William Pickett ^{13,†}, Marlene Power ^{14,†}, Ellen Beate Hansen Sandseter ^{15,†},
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“Access to active play in nature and outdoors—with its risks— is essential for healthy child development. We recommend increasing children’s opportunities for self-directed play outdoors in all settings—at home, at school, in child care, the community and nature.”

Position



Access to active play in nature and outdoors—with its risks—is essential for healthy child development. We recommend increasing children’s opportunities for self-directed play outdoors in all settings—at home, at school, in child care, the community and nature.

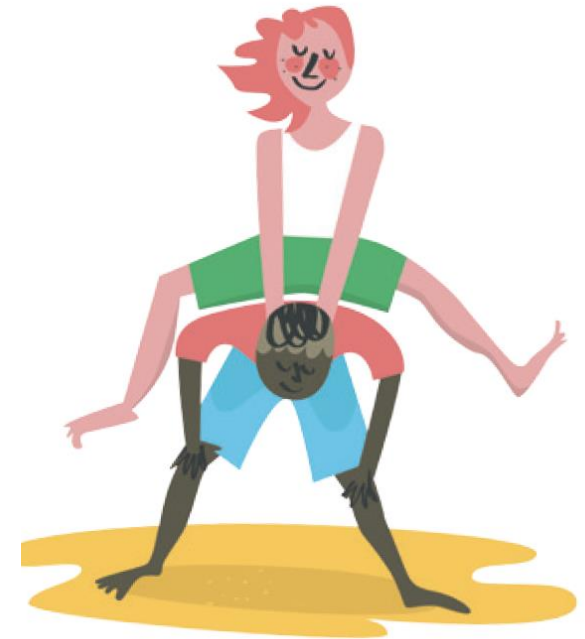
» **When children are outside they move more, sit less and play longer³⁻¹² — behaviours associated with improved cholesterol levels, blood pressure, body composition, bone density, cardiorespiratory and musculoskeletal fitness and aspects of mental, social and environmental health.¹³⁻²²**

» Outdoor play is safer than you think!

- o The odds of total stranger abduction are about 1 in 14 million based on RCMP reports.²³ Being with friends outdoors may further reduce this number.
- o Broken bones and head injuries unfortunately do happen, but major trauma is uncommon. Most injuries associated with outdoor play are minor.²⁴⁻³¹
- o Canadian children are eight times more likely to die as a passenger in a motor vehicle than from being hit by a vehicle when outside on foot or on a bike.³²⁻³⁴

» There are consequences to keeping kids indoors—is it really safer?

- o When children spend more time in front of screens they are more likely to be exposed to cyber-predators and violence, and eat unhealthy snacks.³⁵⁻³⁹



Position



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» **Children are more curious about, and interested in, natural spaces than pre-fabricated play structures.⁶⁹⁻⁷⁹ Children who engage in active outdoor play in natural environments demonstrate resilience, self-regulation and develop skills for dealing with stress later in life.⁸⁰⁻⁹⁸**

» **Outdoor play that occurs in minimally structured, free and accessible environments facilitates socialization with peers, the community and the environment, reduces feelings of isolation, builds inter-personal skills and facilitates healthy development.^{4,59,70,76,83,99-103}**



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SYSTEMATIC REVIEW



Climate Change, Physical Activity and Sport: A Systematic Review

Paquito Bernard^{1,2}  · Guillaume Chevance³  · Celia Kingsbury^{1,2}  · Aurélie Baillot^{4,5}  ·
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Climate Change, Physical Activity and Sport: A Systematic Review

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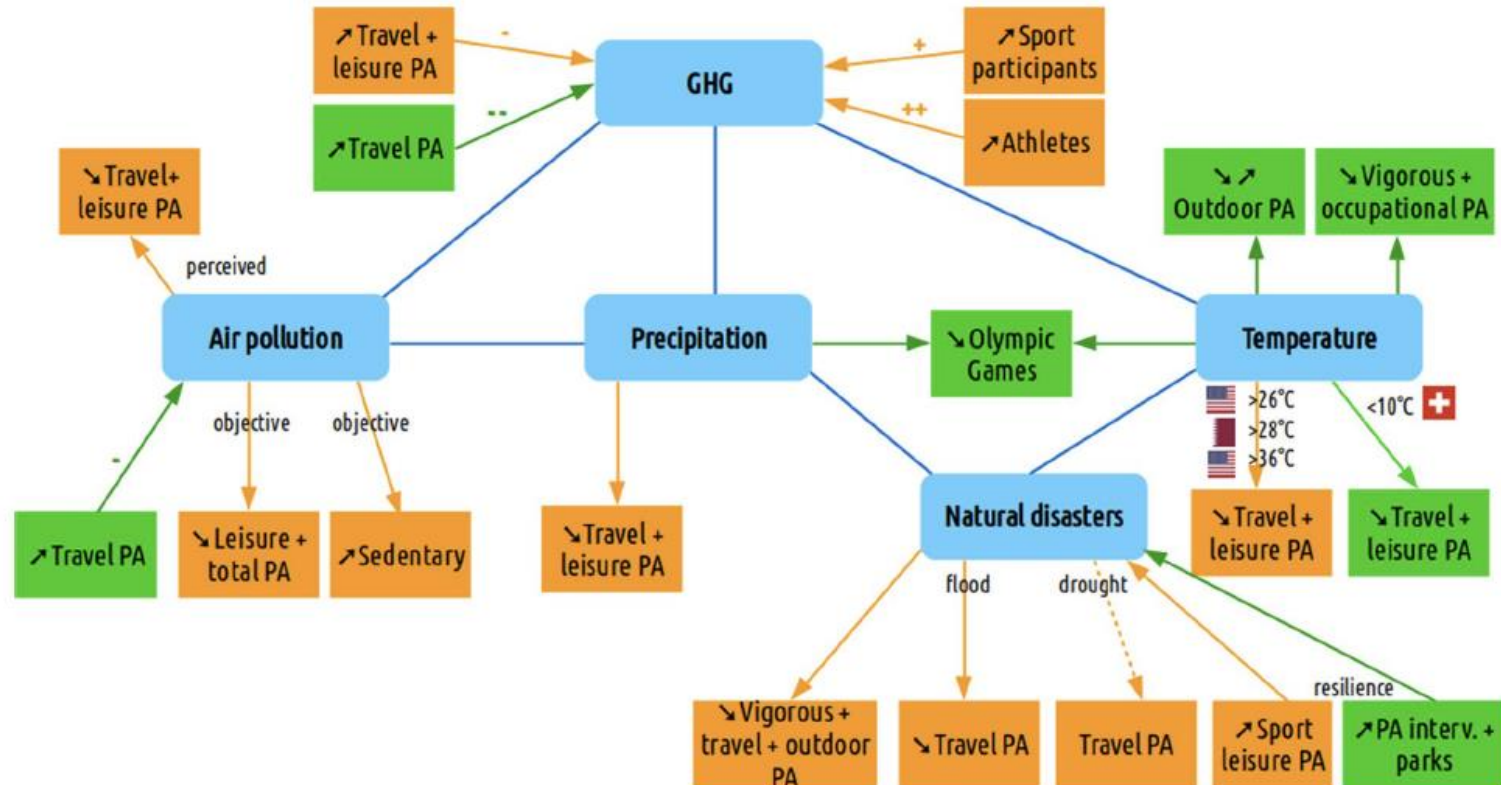


Fig. 3 Framework of associations between climate change and physical activity behaviors. *Green boxes* associations based on computerized simulations, *Orange boxes* associations based on empirical data, *PA* physical activity, *GHG* greenhouse gas emissions, *Arrow dash* no significant association, *-* negative association, *--* more nega-

tive association, *+* positive association, *++* more positive association, *↘/↗* geographical/seasonal variations, *interv.* intervention. Active travel frequency decreased for different temperature thresholds in US, Qatar and Switzerland (see flags)



GLOBAL ACTION PLAN ON PHYSICAL ACTIVITY 2018-2030

MORE ACTIVE PEOPLE FOR A HEALTHIER WORLD



LET'S **Be active**
International Day of Physical Activity



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<h2>1 CREATE ACTIVE SOCIETIES</h2> <h3>SOCIAL NORMS AND ATTITUDES</h3> <p>Create a paradigm shift in all of society by enhancing knowledge and understanding of, and appreciation for, the multiple benefits of regular physical activity, according to ability and at all ages.</p> 	<h2>2 CREATE ACTIVE ENVIRONMENTS</h2> <h3>SPACES AND PLACES</h3> <p>Create and maintain environments that promote and safeguard the rights of all people, of all ages, to have equitable access to safe places and spaces, in their cities and communities, in which to engage in regular physical activity, according to ability.</p> 
<h2>3 CREATE ACTIVE PEOPLE</h2> <h3>PROGRAMMES AND OPPORTUNITIES</h3> <p>Create and promote access to opportunities and programmes, across multiple settings, to help people of all ages and abilities to engage in regular physical activity as individuals, families and communities.</p> 	<h2>4 CREATE ACTIVE SYSTEMS</h2> <h3>GOVERNANCE AND POLICY ENABLERS</h3> <p>Create and strengthen leadership, governance, multisectoral partnerships, workforce capabilities, advocacy and information systems across sectors to achieve excellence in resource mobilization and implementation of coordinated international, national and subnational action to increase physical activity and reduce sedentary behaviour.</p> 

2018 - 2030 - Plano de Ação Global (OMS) para a Atividade Física

CREATE ACTIVE ENVIRONMENTS

ACTION 2.1.

Strengthen the integration of urban and transport planning policies to prioritize the principles of compact, mixed-land use, at all levels of government as appropriate, to deliver highly connected neighbourhoods to enable and promote walking, cycling, other forms of mobility involving the use of wheels (including wheelchairs, scooters and skates) and the use of public transport, in urban, peri-urban and rural communities.

ACTION 2.2.

Improve the level of service¹ provided by walking and cycling network infrastructure, to enable and promote walking, cycling, other forms of mobility involving the use of wheels (including wheelchairs, scooters and skates) and the use of public transport, in urban, peri-urban and rural communities, with due regard for the principles of safe, universal and equitable access by people of all ages and abilities, and in alignment with other commitments (37, 39, 49–53).

¹“Level of service” refers to the attributes of safety, quality, connectedness and completeness; assessment instruments for walking and cycling are available in many countries.



ACTION 2.3.

Accelerate implementation of policy actions to improve road safety and the personal safety of pedestrians, cyclists, people engaged in other forms of mobility involving the use of wheels (including wheelchairs, scooters and skates) and public transport passengers, with priority given to actions that reduce risk for the most vulnerable road users in accordance with the safe systems approach to road safety, and in alignment with other commitments (37, 49–54).

ACTION 2.4.

Strengthen access to good-quality public and green open spaces, green networks, recreational spaces (including river and coastal areas) and sports amenities by all people, of all ages and of diverse abilities in urban, peri-urban and rural communities, ensuring design is consistent with these principles of safe, universal, age-friendly and equitable access with a priority being to reduce inequalities and in alignment with other commitments (39).

ACTION 2.5.

Strengthen the policy, regulatory and design guidelines and frameworks, at the national and subnational levels, as appropriate, to promote public amenities, schools, health care, sports and recreation facilities, workplaces and social housing that are designed to enable occupants and visitors with diverse abilities to be physically active in and around the buildings, and prioritize universal access by pedestrians, cyclists and public transport.



SUSTAINABLE DEVELOPMENT GOALS

17 GOALS TO TRANSFORM OUR WORLD





THE BANGKOK DECLARATION ON PHYSICAL ACTIVITY FOR GLOBAL HEALTH AND SUSTAINABLE DEVELOPMENT

THE 6th ISPAH INTERNATIONAL
CONGRESS ON PHYSICAL ACTIVITY
AND PUBLIC HEALTH

Bangkok, Thailand
16- 19 November 2016



THE 6th ISPAH INTERNATIONAL CONGRESS ON PHYSICAL ACTIVITY AND PUBLIC HEALTH
Bangkok, Thailand
16 - 19 November 2016

Declaração de Bangkok sobre a Atividade Física para a Saúde Global e Desenvolvimento Sustentável



PHYSICAL ACTIVITY HAS MULTIPLE HEALTH, SOCIAL AND ECONOMIC BENEFITS

AND CAN CONTRIBUTE TO ACHIEVING THE 2030 SUSTAINABLE DEVELOPMENT GOALS (SDGs).

Policy action on physical activity is interconnected with 13 SDGs



Working in partnership and investing in policy actions to promote walking, cycling, sport, active recreation and play can promote community well-being and quality of life for all.



Quem somos?



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| 20



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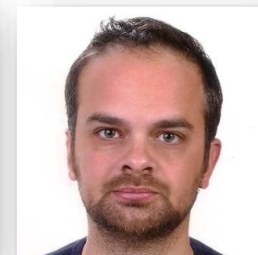
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Climate Change, Physical Activity and Sport: A Systematic Review

Paquito Bernard^{1,2} · Guillaume Chevance³ · Celia Kingsbury^{1,2} · Aurélie Baillet^{4,5} · Ahmed-Jérôme Romain^{2,6} · Virginie Molinier⁷ · Tegwen Gadais¹ · Kelsey N. Dancause¹

- More studies on occupational physical activities and studies in low- and middle-income countries
- Physical activity or adapted sport interventions as development tools should be used in line with recent knowledge from “Sport for development” and “Sustainable Development Goals” to promote social integration and help climate refugees to cope with post-natural disaster health consequences.
- Prospective studies to examine how infected individuals recover from infection diseases depending on their physical activity level.
- More studies to identify the consequences of rising sea levels or thawing ice on physical activity practices and to quantify the carbon footprint of (inter)national sport competitions, and leisure sport practices
- The model developed in the present article should be extended to a computational model



Recommendations



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Ahmed-Jérôme Romain^{2,6} · Virginie Molinier⁷ · Tegwen Gadais¹ · Kelsey N. Dancause¹

1. Future physical activity guidelines should present the risks and possible benefits for physical activity related to climate change.
2. Climate change impacts and adaptation/mitigation roles of physical activity should be systematically included in kinesiology/ sport sciences courses.
3. Physical activity and sport communities should be involved in regional preparedness plans for natural disasters.
4. A thorough revision of transport modes related to leisure sport practices and professional sports needs to be developed. (Inter)national competitions must be reorganized to significantly decrease the carbon footprint of athletes.
5. As climate change is transforming physical activity practices and communities. In this vein, the definition of physical activity definition should be revised to include climate change perspectives and consequences.



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The climate change mitigation impacts of active travel: Evidence from a longitudinal panel study in seven European cities

Christian Brand ^{a,*}, Thomas Götschi ^b, Evi Dons ^{c,d}, Regine Gerike ^e, Esther Anaya-Boig ^f, Ione Avila-Palencia ^{g,h}, Audrey de Nazelle ^f, Mireia Gascon ^{g,i,j}, Mailin Gaupp-Berghausen ^k, Francesco Iacorossi ^l, Sonja Kahlmeier ^{m,n}, Luc Int Panis ^{c,d,s}, Francesca Racioppi ^o, David Rojas-Rueda ^{g,q}, Arnout Standaert ^c, Erik Stigell ^r, Simona Sulikova ^a, Sandra Wegener ^p, Mark J. Nieuwenhuijsen ^{g,i,j}



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The climate change mitigation impacts of active travel: Evidence from a longitudinal panel study in seven European cities

Christian Brand^{a,*}, Thomas Götschi^b, Evi Dons^{c,d}, Regine Gerike^e, Esther Anaya-Boig^f, Ione Avila-Palencia^{g,h}, Audrey de Nazelleⁱ, Mireia Gascon^{g,h,j}, Mailin Gaupp-Berghausen^k, Francesco Iacorossi^l, Sonja Kahlmeier^{m,n}, Luc Int Panis^{c,d,s}, Francesca Racioppi^o, David Rojas-Rueda^{g,q}, Arnout Standaert^c, Erik Stigell^t, Simona Sulikova^a, Sandra Wegener^p, Mark J. Nieuwenhuijsen^{g,h,j}

- changes in active travel have significant lifecycle carbon emissions benefits, even in European urban contexts with already high walking and cycling shares
- an average person cycling 1 trip/day more and driving 1 trip/day less for 200 days a year would decrease mobility-related lifecycle CO2 emissions by about 0.5 tonnes over a year, representing a substantial share of average per capita CO2 emissions from transport.



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Worldwide trends in insufficient physical activity from 2001 to 2016: a pooled analysis of 358 population-based surveys with 1.9 million participants

Regina Guthold, Gretchen A Stevens, Leanne M Riley, Fiona C Bull

- Prevalência da inatividade física no mundo: **27,5%**.
- Portugal: **11ª posição dos países com maior prevalência de inatividade física**, estimando-se que 43% da população adulta não atingia níveis de atividade física compatíveis com as recomendações internacionais (38% nos homens, 49% nas mulheres).

PORTUGAL

PHYSICAL ACTIVITY

FACTSHEET 2018



Total population
10 309 573

Median age
44.4 YEARS

GDP per capita
16 900 €

% of GDP for health: **5.9**
% of GDP for education: **4.9**
% of GDP for sports: **0.3**



Population **MALE** **47.4%**
Population **FEMALE** **52.6%**



Life expectancy **MALES** **78.1** YEARS
Life expectancy **FEMALES** **84.3** YEARS

Sources: Eurostat (2016)

Success story

The "**U-Bike Portugal**" project promotes active transport in academic communities through cycling. The Institute for Mobility and Transport coordinates the project, which rents bicycles to students and staff at academic institutions for a semester or a full academic year. The project encourages regular physical activity while reducing energy consumption and air pollution. <https://www.u-bike.pt>



MONITORING AND SURVEILLANCE

National recommendations on physical activity for health

TARGET GROUPS INCLUDED



Children (<5 years)



Children and adolescents (5-17 years)



Adults (18-64 years)



Older adults (>65 years)



Frail and very elderly adults (>85 years)



Pregnant and breastfeeding women



People with disabilities



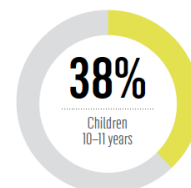
People with chronic diseases



National recommendations on physical activity are being developed in the framework of the Government coordination and leadership of promoting health-enhancing physical activity, with several academic and scientific bodies. They will provide guidelines for all age groups and for specific populations.

Level of physical activity

ESTIMATED PREVALENCE OF SUFFICIENT PHYSICAL ACTIVITY LEVELS



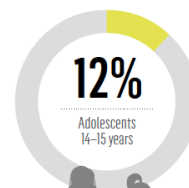
53%

Boys



23%

Girls



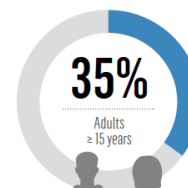
19%

Boys



5%

Girls



Overall



Data on levels of physical activity were obtained from the 2018 Eurobarometer survey (QB1827). Exercise, sport or other physical activity is performed almost daily by 9% and a few times a week by 26% of the population. Additional data on children and adolescents were collected in 2010 by the Portuguese Institute of Sports and Youth.

Monitoring and surveillance of physical activity

SECTORS WITH SURVEILLANCE SYSTEMS



Health



Education



Sports



Transport



Physical activity levels in Portugal are monitored by the Portuguese Institute of Sports and Youth (National Physical Activity and Sports Monitoring System), by the Directorate-General of Health (Physical Activity as a Vital Sign in primary health care) and by the Directorate-General of Education (FITescola programme). The Institute for Mobility and Transport operates a terrestrial transport observation system, which includes walking and cycling.



SAÚDE



DE SAÚDE



Direcção-Geral de Saúde