# PHYSICAL ACTIVITY FRIENDLY ENVIRONMENT MODEL

Jeroen Hoyng, Dianne Scholte

## **Physical Activity Friendly Environment model**

### What is a physical activity friendly environment?

The Knowledge Centre for Sport & Physical Activity Netherlands defines a physical activity friendly environment as an environment that facilitates, stimulates and challenges people to be physically active, to play, to exercise or to do sports.

The main requirements of a physical activity friendly environment are:

- An environment with public areas and facilities where people can be physically active, play, meet, exercise, and that facilitates active transport.
- An environment that encourages users to play, exercise and engage in active transport. For example through interventions, campaigns, exercise apps and a variety of activities.
- An environment that enables facilities to be used sustainably.
- An environment that is clean, intact, safe, accessible and challenging.
- An environment that is created bottom-up; based on user needs, through civic participation and through collaboration between public and private parties.
- An environment that has been applied on and tailored to the right scale.

#### Three elements: hardware, software and orgware

The physical activity friendly environment model (figure 1) shows that in order to create a physical activity friendly environment, you need to combine three particular elements. (1) Hardware consists of everything that is physically present in public space. (2) Software is about the activities that are offered in that public space, and (3) orgware refers to the organizational process behind both hardware and software. In order to create a physical activity friendly environment, all three elements need to be present and in tune. Only then can your citizens (in the middle of figure 1) be optimally physically active.

The Knowledge Centre for Sport & Physical Activity Netherlands created an abbreviation to help you remember the different elements of the physical activity friendly environment model:

SPORT ABC MOVES people.



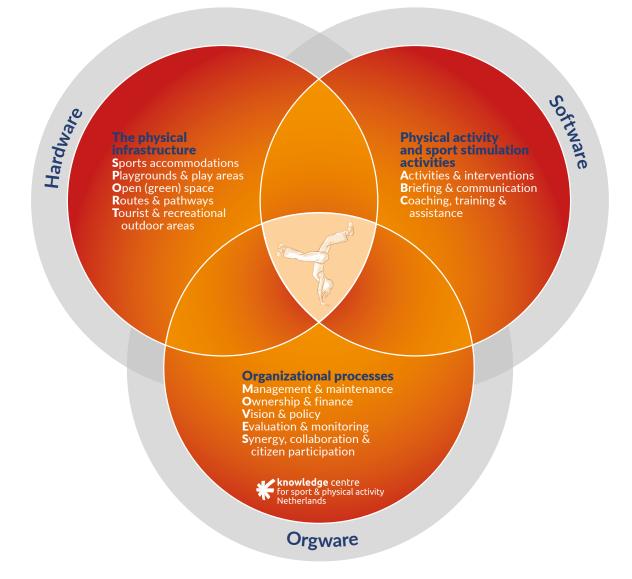


Figure 1. Physical Activity Friendly Environment model (Hoyng & Van Eck, 2021; based on Dobrov; 1979).

#### Hardware

Hardware is the physical infrastructure. This needs to be accessible to everyone and facilitate sports, play and physical activity.

- → Sports accommodations: includes indoor sports centres, gyms, sports fields, swimming pools, riding schools, climbing halls, ice rinks, outdoor fitness spaces, multifunctional accommodations, vacant buildings that are temporarily used as sports venues, etc.
- → Playgrounds & play areas: includes schoolyards, public playgrounds, skate parks, lawns, play areas, etc.
- → Open (green) space: includes squares, parks, allotments, lakes for recreational purposes, ponds, publicly accessible vacant lots, etc.
- → Routes & pathways: includes sidewalks, walking paths, bicycle paths and highways, recreational routes, inline skating routes, horse trails, etc.
- → Tourist & recreational outdoor areas: includes forests, dunes, beaches, heathlands, etc.

In addition to these components, one can argue that activity-stimulating real estate (such as schools and offices) can persuade people to become more physically active.

#### Software

Software refers to the physical activity and sport stimulation activities.

- → Activities & interventions: includes sport events, programs, interventions, tournaments, etc. These can be organized sports activities offered by sports clubs, community associations, and community sports coaches in both private and public space. Also included are specific interventions that schools, municipal health services, municipalities, health and welfare organizations or others can use to stimulate specific groups to engage in physical activity.
- → Briefing & communication: includes campaigns, wayfinding, websites or applications to inform people about different options for physical activity. This helps citizens to obtain relevant information about routes and events, as well as the use of a park, sports area or specific sports equipment. For example, placing a sign next to an outdoor fitness area that (visually) explains how to use the different fitness equipment can encourage people to try it out.
- → Coaching, training & assistance: Includes the effort of community sports coaches, youth workers, social workers, trainers, instructors, childcare centers, community managers and volunteers to train, coach and assist. These people are based in the community and know the people, so they can get in touch with (potential) users, can help them become more physically active, or can take stock of their wishes and needs. One way to do this is by accompanying citizens to different sports locations in the city/area in order to raise awareness.

#### Orgware

Orgware concerns the organizational process of accomplishing and maintaining the hardware and software. From a policy point of view, the municipality is responsible for and in charge of any physical activity friendly environment. However, this should not be their task alone. It is important to involve partners: the community, sports clubs, schools, community sports coaches, welfare organizations, housing corporations, project developers, etc.

- → Management & maintenance: (participatory) designing, building, organizing, managing and maintaining locations, routes and areas. In order to create support for the development of sports and play areas, communication with local citizens, as well as with present and/or future users, is key. Good cooperation with the community also means drawing from their expertise. This will create a sense of ownership among residents and users, which will in turn lead to a sense of shared responsibility to maintain and manage the area.
- Ownership & finance: a physical activity friendly environment requires an integrated and intersectoral financial approach, as well. Investments will pay off for multiple sectorsnot only in financial terms, but also through greatly improved health outcomes and more sustainability.
- → Vision & policy: a physical activity friendly environment is not a temporary investment. Most of the return requires a long-term perspective. Formulate a strategic vision for a healthy city or active city, and include goals for a physical activity friendly environment.

Ensure that this vision is included in the policy of other sectors that can contribute, such as healthcare, welfare, sport and recreation, urban development, traffic and transport, etc.

- → Evaluation & monitoring: It's important to regularly check on the usage (e.g. occupancy rate) of the available sports accommodation , playgrounds, play areas, routes, etc. Do they still fit the users' current needs and wishes? It is also important to gain insight into what works, for whom, when and why. Also, remember to evaluate the process: how did the cooperation between different involved sectors and stakeholders go?
- → Synergy, collaboration & citizen participation: When designing public spaces, it is important to take users' wishes and needs into account. Local citizens can often pinpoint bottlenecks and opportunities. If you work with partners, include other municipal departments and involve the community, you can achieve synergy and multiple goals.

#### People

When it comes to creating a physical activity friendly environment in any community, the people in that community are key. Every project that aims to create a physical activity friendly environment should start from a sense of urgency seen and felt by the locals. Participatory planning, participatory design and participatory maintenance are valuable aspects that help make a physical activity friendly environment successful.

#### Context

It is hard to define what makes for a 'good' physical activity friendly environment. There are no blueprints. The way you design yours is always dependent on local context: citizens, culture, landscape and the opportunities in the community or municipality involved. When hardware, software and orgware are well-coordinated and complement each other, the people are sufficiently stimulated, facilitated and encouraged to become physically active, to play, to exercise and to engage in sports. Or, in other words, this is when the SPORT ABC MOVES people.