



Sunshine Gym
Outdoor Fitness Equipment

Buyer's Guide

to BS EN 16630

Sunshine Gym BS EN 16630:2015 Certified



In the world of outdoor fitness equipment, every manufacturer in Europe has had the opportunity to influence the safety of the users exercising on, or standing close to, every single piece of equipment that is manufactured.

This information is collated, agreed and published inside a European standard.

In 2015 the standard BS EN 16630 was created, primarily aimed at minimising risk by setting out all the parameters that have to be taken into account when designing, manufacturing and maintaining outdoor gym equipment for users taller than 1.4m.

This guide aims to equip buyers with a better knowledge of the standard so they can make an informed decision about their outdoor gym investment.

**Sunshine Gym equipment is supplied in more than 80 countries worldwide under various brand names applicable in each individual country.*

How are British & European Standards formed?



Standards are technical specifications defining agreed requirements for products, processes, services or test methods.



The CEN, the European Committee for Standardization, is the platform for the development of European Standards or Euronorms (EN). As members of CEN, the British Standards (BS) Institute, has to automatically adopt any new standards replacing any previous European or national standards. The UK leaving the EU does not affect this process. BS EN standards are published by CEN.

These standards are voluntary guidelines and are the result of a transparent, open and consensual development process. They provide “for common and repeated use, rules, guidelines or characteristics for activities or their results, aimed at the achievement of the optimum degree of order in a given context” (source: www.cencenelec.eu).

Although the standards are not an automatic legal obligation, in the case of a legal review of an incident, a lawyer or judge may refer to an applicable standard. From a common sense point of view, applying the standard gives customers peace of mind that a product out in the public domain meets at least minimum safety requirements.

Certified, conforms or compliant



A manufacturer that has equipment 'certified' means that it has used a qualified independent test house to test that the equipment meets all of the aspects of the said standard.

The independent test house used commonly in our industry is TUV, a worldwide leading technical services provider carrying out testing, inspection and certification across a breadth of industries including the playground sector of which outdoor gyms are closest matched to.

However, equipment that 'conforms' or is 'compliant' to a standard, is equipment that a manufacturer thinks will pass all the requirements but they have not proven it by means of using a qualified test house.

Here at Sunshine Gym, products have been independently certified by the TUV to give user confidence in our product range.



What equipment is Covered in BS EN 16630:2015?



The standard is very clear that it covers outdoor fitness equipment for users over 1.4m in height.



Here at Sunshine Gym, we have two main ranges of equipment: our standard adult range for users over 1.4m in height, all of which is certified to BS EN 16630:2015, and a children's range designed for users under 1.4m tall.

A few of the products listed in the children's range



Children's Rower
BX/SG 4008



Children's Horse Rider
BX/SG 4007



Children's Tai Chi Dsics
BX/SG 4010



Children's Double Slalom Skier
BX/SG 4006

This range, aimed particularly at primary school children, is in fact not yet covered by any standard possibly due to it being a new concept in the UK marketplace. However, at Sunshine Gym we have designed this equipment with aspects of BS EN 16630:2015 in mind and marked it up for users 1.4m and below. This is the best possible outcome we can provide due to no standard being present.

Safety Requirements & Testing



To summarise the key points of the standard:

1

Crushing or Shearing Parts

Many items of outdoor gym equipment will include a number of moving parts, whether this be a rotation pedal or a swinging footrest for example. These moving parts must not create any crush points or any shearing points. A crush point is where either the moving part can connect with a stationary part or where the moving part can connect with another moving part.

In certain cases, the standard allows for a specified sized open end damper to be used (otherwise known as 'bump stops'). Although the standard does allow the use of these, all of Sunshine Gym equipment has dampers enclosed within the equipment to ensure zero crush points across our range.

A shearing point on the other hand is where the moving part can pass with a stationary part or where the moving part can pass with another moving part, creating a shearing action similar to how a pair of shears or scissors work, within the parameters of an 8mm and 60mm open space. All Sunshine Gym equipment either has a smaller space of less than 8mm or a space greater than 60mm at any potential shear point.

2

Entrapment

This part of the standard aims to reduce the risk of entrapment of the head, neck, fingers, leg, or foot. The standard guidance is based on data relating to the potential size of various users of the equipment, and specifies what is considered to be a potential entrapment risk.

A space between 8mm and 25mm (8 and 25mm inclusive) is considered to be a finger entrapment hazard. For example if we were to leave the ends of our handgrips open with a 18mm hole, this would be considered a potential area for finger entrapment, which is why all openings on our equipment are capped, covered or enclosed.

3

Space around the equipment



The standard considers the amount of space provided around each piece of equipment (note: multi user equipment is considered one piece). It factors in the space that the equipment uses, the training space required and also the movement space required for each piece of equipment. As part of our installation instructions, we advise a minimum of 1.5m clear space from the extremities of each piece of our equipment. This ensures compliance with the standard. Please note here that although our adult equipment is certified to BS EN 16630:2015, the installation of the equipment and layout needs to also be compliant.

4

Labelling and Marking



The standard stipulates that both the facility and the equipment should have information provided to users. Some of this information is gym specific such as local maintenance contact details or address of the gym, but details should also be included on how to use the equipment and what it is for. Labels on the equipment must clearly indicate the exercise instructions, manufacturer and which users the equipment is intended for (users over 1.4m in height in this case). To assist equipment owners and buyers, all Sunshine Gym equipment comes complete with a stainless steel permanently fixed label to advise the users of nearly all of the information required, other than the site specific points mentioned earlier.

5

Inspections



The standard advises that a series of inspections are carried out at strategic timescales. These are broken down into:

- **Routine Visual Inspection**
- **Operational Inspection**
- **Annual Inspection**

The BS EN 16630 standard doesn't specify how often and what qualifications are required to carry out each inspection leaving that to each individual manufacturer to specify.

However, another standard we refer to in the course of our business, BS EN 1176 for Playground Equipment, does go a little further into inspection frequency.

Many of the principles applied in BS EN 1176 are what we refer to and advise in the operations and maintenance manual for Sunshine Gym outdoor gym equipment.

NOTE

Some of the information above is our interpretation and therefore does not override any information provided in the standard.

For clarity, if you are unsure about anything written above, the standard will always take precedence.