

Safety and building events at Messukeskus Helsinki

The event organiser is responsible for the general safety of the event; the organiser is also responsible for ensuring that the instructions are followed.

The **event organiser** is responsible for the overall safety of the event.

The **exhibitor** is responsible for the safety of the stand with regard to its structures, the exhibition items, and the activities at the stand.

The **event builder** is responsible for safety at the stand during construction, including liability for material damage and personal injury.

These instructions must be forwarded to event designers and builders.

This information is based on the National Building Code of Finland and the legislation on rescue services. Only the key requirements from the sector regulations have been included in these instructions. The authorities may issue regulations that deviate from these instructions.

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1. Construction materials and interior decoration

Requirements for materials:

- the construction materials must meet the requirements stipulated for public premises
- the floor material must be non-flammable (minimum class SL2, DIN4102 B2, D_{fl}-s1)
- The use of EPS insulation (such as expanded polystyrene) in places of assembly is permitted. The material must always be of S grade. A material certificate and a fire resistance certificate must be delivered to the Service Supervisors Office.
- any fabric used for covering, coating and decoration purposes must primarily be of a material with a fire classification of SL-2, DIN4102 B2, B-s1, d0, or equivalent. All other fabrics must be fireproofed on site to achieve the corresponding fire classification.
- when using pyrotechnics or performing hot work, materials in proximity must be non-flammable (class SL1, DIN4102 B1, B-s1, d0, or equivalent). Proximity is always assessed on a case-by-case basis.
- unusual construction materials and props (e.g. paperboard, cardboard and hay bales) that do not meet the requirements must be fireproofed on site to achieve the corresponding fire classification.
- a reliable fireproofing report must be submitted.

A fire classification certificate must be provided for the materials. If an item of interior decoration or other material does not have a certificate, it must be fire-proofed on site.

If interior decoration material has been fire-proofed elsewhere, a record of this must exist and the material must have an identifier so that it can be recognised. Such materials include, for example, canvas used for interior decoration.

Upon order, VTT provides classifications for materials for which no classification certificate exists.

Accounts of the fire classifications of interior decoration must be sent to the Service Supervisor at least 45 days before the event for approval.

2. Pavilion

Messukeskus has an automatic fire sprinkler system, which imposes limitations on covering the stand. A pavilion or other cover (object or structure such as a tent or vehicle) must not compromise the operation of the fire extinguishing system. A covering structure must not be erected next to the building wall; the minimum distance between the structure and the wall must be 0.5 metres.

Fire-classified gauze or a non-combustible latticework covering fulfil these requirements. The hole structure in the latticework covering must be regular across the area to be covered and at least 70% of the area must be uncovered.

Accounts of the fire classification of the covering must be sent for approval to the Service Supervisors at least 45 days before the event. The Service Supervisor decides on the primary extinguishing equipment and number of fire alarms required by a covered stand. The smallest acceptable fire extinguisher is power class 27A144BC.

Basic requirements for covered stands:

- size of cover less than 10 m²: no safety equipment required unless special safety risks are posed by the activities inside the covered stand.
- size of cover 10 m² to 30 m²: 1 fire alarm or 1 fire alarm per room, 1 primary fire extinguisher required if the activities pose a special risk. The decision shall be made by the Hall Manager on a case-by-case basis.
- size of cover 30 m² to 60 m²: 1 fire alarm or 1 fire alarm per room, 1 primary fire extinguisher required.
- size of cover 60 m² to 99 m²: 2 fire alarms or 1 fire alarm per room, 1 primary fire extinguisher required.
- size of cover more than 99 m²: the requirement for fire extinguishing equipment and fire alarms shall be assessed beforehand by the Service Supervisor. The basic requirement is to have a wireless fire alarm system or a sprinkler system in the area. Further information is available at the Service Supervisor's Office.

3. Building a two-storey stand

An exhibition stand may also be built on two levels subject to the following conditions:

- Messukeskus will comment on the construction of the stand, but the builder is responsible for the safety of the stand and construction work, as well as for organising the work.
- The clearance of the lower floor of a two-storey stand can be a maximum of 2,500 mm and a minimum of 2,200 mm.
- Size of cover more than 99 m²: the basic requirement is to have a wireless fire alarm system or a sprinkler system in the area. There may also be a requirement to use a fire guard service, depending on the floor area. The need for and extent of the fire guard service shall be determined by the Emergency Services. Further information is available at the Service Supervisor's Office.
- the maximum permitted number of persons on the upper floor is 60, at least 1 m² per person. The maximum permitted number of persons may be exceeded if the free area is sufficient and the width of the exits is at least 1,200 mm. The distance to the nearest exit staircase on the upper floor may not exceed 20 metres.
- the height of the railings on the upper floor or the walkways to the upper floor is 1,100 mm from the edge of the straight section to the upper edge of the handrail. There may be a maximum gap of 100 mm both horizontally and vertically between the structures of the upper floor's railing. It must not have horizontal structures that can be climbed. Horizontal rails must be mounted in the railings of the walkways so that the mutual distance between the rails or the distance from the steps does not exceed 500 mm.
- the primary fire extinguishing equipment of a two-storey stand must include at least one class 27A144BC manual extinguisher on the lower floor and one on the upper floor. In addition, the required fire alarms/fire alarm systems specified for each space must be installed. The Service Supervisor will decide on the primary extinguishing equipment and number of fire alarms required by a two-storey stand.
- The plan must be submitted for advance approval by the Service Supervisor no later than 45 days before the event.

Details on the design load specifications and requirements for handrails and railings can be found in the Finnish Building Code valid at any given time.

4. Special structures and Programme areas

Special structures include

- climbing racks
- docks
- elevated floors and performance platforms (12cm or more)

Test and experiment areas

Test and experiment areas are areas reserved for the customers, where testing is done independently or with guidance;

- in particular, testing of sports equipment
- testing of various sports and other equipment (golf, rollerblading etc.)
- testing of tools or equipment

Vehicles used in performances and vehicles that the audience can test drive must have valid motor liability insurance.

The customer service must be informed of special structures at least 45 days before construction begins. The structures must be built according to the building code and be safe for users.

The notice must state the following:

- general arrangements for the area (limitation and walkways of the area)
- planned measures for ensuring safety
- contact persons and contact information

5. Exits

Exits from the hall premises must be designed according to the following general principles:

- the exit doors in the halls must have clear and sufficiently wide corridors
- when using only part of the hall space, during floor design it must be ensured that exit routes run through empty spaces
- the hall corridors must be at least 2,000 mm wide (corridors separating stands).
- All exits must be marked by the builder with official exit markings. Premises comprising more than 300 m² must have illuminated exit signs with battery backup.

Stands built on one level must have sufficient exits leading to the corridors between the stands

The number of exits is determined by the surface area of the stand

- up to 20m² for one 900 mm exit
- 20m² to 50m² for two separate 900 mm exits
- 50m² to 100m² for two separate 900 mm exits and one 1,200 mm exit
- 100m² to 200m² for two separate 1,200 mm exits
- Exits for stands of 200m² and above are specified separately for each case.

Instructions for the exits of stands with two floors

- The distance to the nearest exit staircase on the upper floor may not exceed 20 metres. The maximum permitted number of persons on the upper floor is 60, at least 1 m² per person. The

maximum permitted number of persons may be exceeded if the free area is sufficient and the width of the exits is at least 1,200 mm. The plan must be submitted for advance approval by the Service Supervisor no later than 45 days before the event.

The number of exits shall be determined on the basis of the surface area of the upper floor:

- up to 20m² for one exit of at least 900 mm
- 20m² to 50m² one 1,200 mm or two 900 mm exits
- 50m² to 100m² one 1,200 mm and one 900 mm exit
- Exits for stands of 100m² and above are specified separately in each case.

A spiral staircase is possible if the stand has several exits and at least one of them is a straight path. (Building Code F2: item 2)

6. Hot work

Hot work refers to work where sparks are present or a flame or other heat which poses a fire hazard is used. This includes:

- gas and arc welding
- flame and arc cutting
- disc cutting and metal grinding
- use of gas burners or hot air burners

A person performing hot work during construction and dismantling must obtain a HOT WORK CARD and a written HOT WORK PERMIT from the Service Supervisor's Office.

Persons engaged in hot work or pyrotechnic performances during the opening hours of exhibitions are not required to have a hot work card.

The performance space or hot work site must meet the requirements set for a PERMANENT HOT WORK SITE. The spread of flames, spatters and sparks to other exhibition premises and corridors must be prevented.

Gas welding devices and liquid gas equipment must be equipped with regulatory safety devices.

A written account of a hot work or demonstration site and primary extinguishing equipment and safety measures must be submitted to the Service Supervisor's Office no later than 45 days before the event.

Further information:

Finance Finland, Hot Work Safety Guidelines 2017

7. Pyrotechnical effects and fire shows

Performances with fire include

- torch shows
- fire-eating
- use of open fire

Pyrotechnical devices include

- fireworks
- theatrical effects

- distress rockets
- flares
- signal flares and smoke used for distress signals, which generate fire or heat when fired

Packages of pyrotechnical items in public spaces must be empty and the packages must be clearly labelled empty.

The packages must be placed in display cases, especially after filled packages have been emptied and residues of the substance have been left in the package.

We recommend the use of new and empty factory-made packages.

Notifications concerning the use of pyrotechnic effects and performances involving fire are to be submitted to the rescue authorities as instructed on the Emergency Services' website. Notifications concerning fireworks displays shall be submitted to the police. A copy of the information reported in the notifications must be submitted to the Service Supervisor's Office. The report must be filed 45 days before the event at the Service Supervisor's Office.

8. Candles

We recommend that LED candles be used.

Only safety candles will be accepted in exhibition spaces. No other type of candle may be used.

The case of a safety candle is made of non-combustible material and its fuel is mineral oil. Safety candles must be placed so that the audience cannot come into contact with them.

9. LPG, other flammable liquids and gases, hazardous materials and heating devices

The legislation on chemicals stipulates requirements on the use of LPG (liquefied petroleum gas) in places of assembly and public events. The devices must be suitable for indoor use. Requirements may arise due to ventilation and noise generation.

When planning use, the following must be taken into account:

- the quantities are limited by a fire compartment (hall/fire compartment), which means that an application made in time makes it easier to get a permit
- the size of liquid gas bottles is 5 kg (steel) or 6 kg (composite); we recommend that composite bottles are used
- liquid gas bottles must be placed in a ventilated space
- spare or used bottles must not be stored indoors
- liquid gas devices and hoses must comply with the related regulations and their condition must be checked in advance
- the minimum protective equipment is one smothering blower and one 27A144BC powder extinguisher
- you must apply for a permit from the Hall Manager at least 45 days before the exhibition if you intend to use liquid gas

The above substances may be used in the fair and exhibition spaces only with the special permission of the Service Supervisor's Office.

A heating device that runs on lamp kerosene, petroleum, diesel or gas must be suitable for indoor use. The type of fuel used must be indicated. There must be a containment bund underneath any device using fuel. In addition, the operator must be prepared to handle liquid spills with absorption material.

A permit for use and storage must also be obtained for pressurised containers containing non-combustible gases (e.g., gases for filling balloons).

The pressurised container must be fixed in such a way that it cannot tip over. Exercise caution when moving the pressurised container.

Empty gas bottles must be clearly marked with the label "empty." Only so-called factory empty bottles can be labelled in this way.

An account of the use and storage of the above substances must be submitted to the Service Supervisor's Office 45 days before the exhibition at the latest. Based on this account, the Hall Manager will assess whether a permit must be sought from the Rescue Department.

Also familiarise yourself with the legislation on hazardous substances.

10. Motor vehicles

All vehicles, means of transport and machines (later referred to as equipment) placed at the exhibition or meeting area for presentation must have their power turned off at the main switch, or the battery terminal must be removed.

The power can be turned on if the following conditions are met, however:

- the presentation requires that the power must be turned on
- the equipment is new and unused
- the ignition keys are kept out of reach of the public
- dry powder fire extinguishers of at least class 27A144BC or foam or liquid fire extinguishers of at least class 21A 144B are placed in the presentation area as follows:
 - quantity of equipment: 1–3 items, 1 fire extinguisher
 - quantity of equipment: 4–7 items, 2 fire extinguishers
 - quantity of equipment: 8–10 items, 3 fire extinguishers
 - quantity of equipment over 10 items, to be determined
- the Service Supervisor's Office must be notified of the presentation needs and number of equipment at least 45 days before the event begins.

The Service Supervisor's Office gives permission to keep the power turned on in the case of used equipment or equipment constructed by the exhibitor.

The power must be switched off in the case of equipment stored in lobbies or gallery spaces.

The event organiser will monitor that the regulations are followed.

Equipment that does not comply with regulations can be moved out of the premises at the cost of the owner.

11. Occupational safety

Messukeskus requires that ladders and scaffolding and safe working methods compliant with the Building Decree VNa 205/2009 are used during exhibition set-ups.

When using tools, the user must have protective gear compliant with the operating instructions of the tools.

The driver of a forklift truck or personnel hoist must have the written permission of his or her employer to use such equipment. Before giving such permission, the employer must ensure that the driver has the capabilities and skills required for using the tool.

The employee must always use a fall arrest and helmet within the man cage of telescopic or articulated boom lifts. Use of these is recommended when using articulated jacks.

Additional material on occupational safety is available from the Service Supervisor's Office.

If a dangerous working method or inadequate tools are being used, we will interrupt the work until the shortcomings have been rectified.

Further details are available from Jari Hallamaa, Occupational Safety Manager, and the Service Supervisor's Office during construction/dismantling.

12. Operational machine demonstrations

If an operational demonstration requires hot work, see section 6.

All demonstration activities must be performed in such a manner that they do not pose a hazard to outsiders.

Items that may pose a danger of clamping or cutting must be protected using fixed safeguards, in such a manner that anyone in the proximity of a demonstration cannot touch such items with their hands or feet. Alternatively, the demonstration area can be cordoned off with a fence at least 2m tall (e.g., a net), if no material or sparks are flying from the demonstration.

Details:

OSH Division at the Regional State Administrative Agency of Southern Finland, tel. +358 295 016 000

13. Heavy exhibition items

If the load due to exhibition items in halls 1, 2, 3, 6 and 7 exceeds 10kN/m² (1,000 kg/m²) or 7 kN/m² (700 kg/m²) in halls 4 or 5, their placement must be separately agreed upon with the head of the facility unit.

14. Electrical safety

All electrical installations for an installation must meet the requirements of standard SFS 6000-7-711 (EXHIBITIONS, PERFORMANCES AND STANDS)

Details on the required standards are available from the Finnish Standards Association SFS (www.sfs.fi)

- if you are using your own site or other substations, ensure that all sockets of 32A or less are equipped with a 30mA fault-current guard.
- devices used at stands must have a connection cable with a plug

- only ready-made, earthed extension cables equipped with a plug and extension sockets may be used at stands
- No connections may be performed at Messukeskus/The Finnish Fair Corporation. If necessary, a connection can be ordered for a separate charge.
- if the electric installations at the stand must be reviewed by Messukeskus, a separate charge will apply.
- halogen lights, heaters and other devices that produce a high level of heat must not be installed, without appropriate protection, in such a way that it is possible to be burned or they pose a fire hazard when switched on.
- cables on corridors and walkways must be fixed/protected so that they do not pose a risk of tripping. Cables may be routed over a corridor via an overpass trough. In such a case, the height of the walkway must be at least 2,100 mm.

15. Laser devices

The Radiation and Nuclear Safety Authority (STUK) provides instructions concerning and monitors the use of laser devices in public events.

STUK does not inspect small-powered laser devices on-site when they are of less than 5mW radiation power and used at public events. They must, however, have:

- a professional purpose
- for devices whose power source is a battery, accumulator or mains power (less than 50V voltage), approval from the Occupational Health and Safety department at the Ministry of Social Affairs and Health
- for other devices, the approval of an EU or ETA country
- compliant warning, type and approval labels
- compliant installation, caution and operating instructions in Finnish and, if necessary, in Swedish.

For high-powered laser devices in safety class 3B or with radiation power over 5mW, always contact STUK regarding the use and presentation.

Details:

STUK, tel. +358 9 759 881.

16. Lobbies and galleries

When planning the placement of advertisements etc. in lobbies and the gallery area, consideration shall be given to the special instructions regarding them.

Exhibition covers (tents and other structures obstructing the sprinkler system) may not be used in lobbies or the gallery. No flammable liquids or gases may be placed in lobbies or the gallery. Battery terminals must be removed from motor vehicles or the power must be switched off using the main switch.

When designing the activity or stand's location, contact the event's Service Supervisor's Office.

17. Consumer safety

According to the Consumer Safety Act ([920/2011](#)), the service provider is responsible for the safety of services. Consumer service refers to a service intended for the use or mainly used for private consumption. Service provider refers to a natural person or private or public legal entity that produces, makes available for sale, offers, sells or otherwise provides or commissions consumer services. Services offered by associations and organisations do not fall within the scope of the law if such services are only offered to members and for purposes other than business.

The operator must notify the supervisory authority (Tukes) if a product used in the rendering of a service damages a person's health, or causes an accident, hazard or serious near- miss situation. The form and the instructions for submitting the notification can be found on Tukes's Consumer Safety site.

18. Other considerations

- rows of benches in the auditorium must conform to the provisions of building code F2 (Safety in Buildings, regulations and instructions 2001)
- when cooking food, be sure to protect any hot surfaces to which the public is exposed. The minimum requirement at cooking points is a smothering blanket and, on a case-by-case basis, a powder extinguisher of at least 27A144BC or higher class.
- Also take account of the requirements of the Environment Centre.
- use of a deep fryer is possible, if the following issues are taken into account:
 - use of a deep fryer requires the same protective measures that apply to restaurants. The minimum requirement at cooking points is a smothering blanket and, on a case-by-case basis, a powder extinguisher of at least 27A144BC or higher class, plus a class F grease fire extinguisher placed next to the deep fryer.
 - oil from a deep fryer must be disposed of appropriately.
 - a placement and protection plan must be submitted for approval to the Service Supervisor's Office 45 days before the start of the event.
- use of a charcoal grill is possible, if the following issues are taken into account:
 - use of a charcoal grill always requires approval from the event organiser.
 - use of a charcoal grill requires the same protective measures that apply to restaurants. A food preparation station must have a smothering blanket and a manual extinguisher (minimum power classification 27A144BC)
 - a placement and protection plan must be submitted for approval to the Service Supervisor's Office 45 days before the start of the event.
- saunas and stoves made be used for demonstrations (with electricity connected to the stove) if the following issues are taken into account:
 - if the stove is powered on, the place must be continuously guarded. Guarding must continue for one hour after the power is switched off.
 - no brochures or other easily flammable material must be placed inside the sauna or close to the stove.
 - the product being demonstrated can only be viewed under supervision, and sufficient railings must be used to prevent contact with hot surfaces.
 - stoves and devices must be announced to and approved by Service Supervisor. The Service Supervisor must be notified at least 45 days before the beginning of the event. The notification must include a blueprint of the sauna and the location of the stove.
- temporary accommodation at Messukeskus
 - notices and permits must be applied for in advance from the Rescue Department The Service Supervisor's Office must be informed at least 45 days before the event.
 - instructions on preparing an accommodation and rescue plan and the related forms can be found on the Emergency Services' website.
- outdoor structures
 - wind loads and weather conditions must be taken into consideration when securing the structures
 - structures may not be placed within 8 metres of the property in order to prevent the spread of damage in the event of an accident.

19. Time limits for advance notice items

Item	Deadline	Recipient of notice
Interior decoration fire classification and fabrics, advertising banners	45 days before the event	Service Supervisor
Pavilion	45 days before the event	Service Supervisor
Two-storey stand	45 days before the event	Customer Service
Special structures and programme areas	45 days before the event	Customer Service
Exits for stands of more than 200 square metres	45 days before the event	Service Supervisor
Hot work	45 days before the event	Service Supervisor
Pyrotechnical effects and fire shows	45 days before the event	Service Supervisor
Use of liquid gas	45 days before the event	Service Supervisor
Flammable liquids and gases	45 days before the event	Service Supervisor
Non-flammable gases and pressurised containers	45 days before the event	Service Supervisor
Hazardous substances (chemicals)	45 days before the event	Service Supervisor
Demonstration of the use of heating devices	45 days before the event	Service Supervisor
Demonstration power of motor vehicles on	45 days before the event	Service Supervisor
Use of deep fryers	45 days before the event	Service Supervisor
Saunas and stoves for demonstrations	45 days before the event	Service Supervisor
Temporary accommodation	45 days before the event	Service Supervisor

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We reserve the right to make changes.

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