

Risk factors

Background

The workplace must be arranged to make production safe and efficient. The following factors affect health, safety and well-being in the wood processing and furniture industry.

- How the technical equipment works, especially machine safety.
- How the work is arranged (organisation) and the lines of management.
- How easy it is for people to do the work (ergonomic factors). For example whether there is heavy lifting or repetitive work.
- What air contaminants are present – for example wood dust, organic solvent vapours, paints and adhesives – and how they are removed (e.g. extracted).
- Indoor climate and ventilation.
- Noise and vibrations.
- Light.

Workshop layout

Four factors must be considered to create a good work environment – air, noise, light and layout. Layout is the way workplaces, machinery and other items are arranged in relation to each other to keep production flowing smoothly. It must be possible to move around the area easily and safely, and to transport materials efficiently and safely.

Stop and think!

Mark out the working area of machines on the floor around them.

All workplaces must have staff facilities with a dining area or rest area and toilets. If you need to change into work clothes or protective clothing, there must also be a changing room and shower.

There are signs on the wall known as health and safety signs. They alert you to potential hazards. There are

- **prohibition signs**, for example no smoking or open flames
- **warning signs**, for example dangerous substances
- **mandatory signs**, for example hearing protection must be worn
- **emergency signs**, for example emergency exits or escape routes and first aid
- **information signs**, for example LPG
- **fire signs**, for example fire extinguishers.

Stop and think!

Pay attention to the signs in your workplace and respect prohibitions, warnings and mandatory instructions.

Slips and trips are common causes of accidents at work. Floors, stairs and loading bays must be designed to minimise the risk of slips and trips.

Learn more

Visit www.prevent.se and search for workplace layout.

Ventilation

Good background ventilation is necessary in order to replace stale air with clean air without creating draughts. There are many activities in the wood processing and furniture industry that generate air contaminants, primarily wood dust. For this reason, dedicated process ventilation is also needed.

Woodworking machines must have dust hoods connected to a dust extraction system to carry dust and debris away. Other types of process ventilation such as spray boxes and fume cabinets are necessary in order to deal with harmful vapours from paints and solvents. Large machines can be housed in enclosures with their own process ventilation.

Stop and think!

Use a vacuum cleaner and not compressed air to clean machines and work clothes. Compressed air disturbs the dust and blows it into the air, allowing it to be inhaled.

The ventilation system must be inspected and serviced regularly, with details recorded in a log. Process ventilation in a workplace must have a control system with automatic alarms if there is a fault, for example if the filter is damaged or blocked.

Stop and think!

Process ventilation must aim to remove the air contaminants so effectively that no respiratory protection is needed.

Learn more

Visit www.prevent.se and search for ventilation.

Indoor climate

There are no fixed limits specifying how warm or cold a workplace must be. The best temperature for a room depends on the work that is being done in there. It is recommended that

- the temperature should be about 20°C for sedentary and physically undemanding work
- the temperature should be about 14-15°C for more physically demanding work
- the temperature in the staff areas should be at least 20°C.

Learn more

Visit www.av.se and search for temperature or climate.

Light

The light in the workplace must be bright enough for the work that is being done there. High-precision activities need more light. Low light as well as glare can strain your eyes and cause you to make mistakes. Poor lighting may also require you to bend over to see properly, causing headaches and neck pain in the long run.

You can only judge colours correctly under certain types of lighting. Colour fidelity is best with lamps that mimic daylight.

Workshops have a combination of general lighting (roof lighting) and workplace lighting. Adjustable workplace lighting is a good idea because people need more light as they get older.

Reflections and strong contrasts in the field of vision are very tiring for the eyes. For example, bare bulbs may be reflected in displays or panels, and forklift drivers may experience sharp differences in contrast when driving between indoors and outdoors.

All working areas must have natural daylight – this is important for well-being and the body clock.

Stop and think!

Shadows and reflections make it harder to read graduated scales on machines and to use screens, displays, panels, etc. That is why it is important for the workplace lighting to be pointing in the right direction and that other light sources are shaded if necessary.

Learn more

Visit www.av.se and search for light or lighting.

Forklifts

Forklifts are the vehicle of choice to move things around the workplace. Convenient and versatile yes, but they are also heavy and powerful vehicles that are often operate in confined spaces alongside people. That makes forklifts the machine most likely to cause accidents at work in Sweden.

Stop and think!

Accidents involving forklifts often result in serious injuries. Take great care whether you are driving the forklift yourself or there is a forklift nearby.

Anyone who drives a forklift must have documented practical and theoretical knowledge and experience (forklift operator's licence or equivalent). The employer must also give permission to drive a forklift. People working close to forklift operations must be aware of the risks and must be given clear safety instructions.

Reduce the risk of forklift activity by

- separating forklift traffic from other operations, for example with marked forklift routes
- keeping the forklift routes clear
- installing mirrors where visibility is poor

- choosing the right forklift for the job and loading it correctly
- using safety footwear – for forklift drivers and people working in the danger zone around it
- developing rules for operating forklifts, and making sure they are followed!

Stop and think!

Petrol, diesel or LPG forklifts must not be used indoors if the exhaust could harm the staff.

Learn more

Visit www.av.se or www.prevent.se and search for forklifts.

Shift work

Human beings are designed to be active during daylight hours and to sleep when it is dark. That means our attentiveness and performance worsens at night, potentially increasing the risk of mistakes or accidents. If you do shift work, it is important to rest properly between shifts. If your shift times change, you should if possible adjust your body clock over a period of time.

It may be a good idea to take a nap before an evening or night shift.

Your digestion works differently at night so you should eat small amounts of light food during a night shift.

Stop and think!

Certain illnesses can be made worse by shift work, and you may need to adjust your medication to your new sleep-wake cycle. Anyone who regularly works nights must undergo a medical check.

Learn more

Visit www.av.se or www.prevent.se and search for

- night shifts or shift work (Prevent)
- medical checks (Swedish Work Environment Authority).