13.5 Sanding machines (belt, bobbin and disc types)

NOTE Sanding machines are “high-risk woodworking machinery” (see 13.1).

13.5.1 Belt sander/band facer and bobbin sanding machines

13.5.1.1 Hazards

Employees and learners should be made aware of the following hazards.

a) The work piece, which can become jammed in the sanding machine.
b) Hands or clothing, which can become entangled with moving parts.
c) Wood dust, which can be inhaled.
d) Inadvertent starting of the machine.
e) The belt, which can break up and lash out.
f) Hands and fingers, which can come into contact with the abrasive surface.

13.5.1.2 Risk control measures

The machine should be provided with:

a) a means of electrical isolation using a fused isolating switch on or adjacent to the machine, and that it is controlled by a starter incorporating overload protection and no-volt release;
b) a conveniently positioned and accessible, emergency stop switch (which could be the normal “off” switch) or other suitable control device that can quickly stop the machine in an emergency;
c) fixed guards (removable only with the use of a tool) or, alternatively, interlocked guards that enclose the drive mechanisms.

The belt should be narrower than the belt support plate and pulleys, to protect the user from the belt edges. Belts should be set in the correct direction of rotation.

The sanding table should be of rigid metal construction. The gap between the table and the belt should be as small as is practicable but sufficient to clear the debris. For angled sanding, it should only be possible to tilt the table downwards away from the belt, to avoid jamming timber between the table and the belt.

On horizontal sanding machines, the fence should be correctly set close to the abrasive surface. The tracking should be checked by rotating first by hand.

On bobbin sanding machines, there should be as small a gap as possible between the table insert and the bobbin.

Consideration should be given to marking a “no finger zone” on the table of the machine.

A risk assessment should be carried out to evaluate the likely risks to health from inhalation of wood dust and any action required to prevent or control the risks (see 13.1). Where an effective LEV system is not in place, a dust mask conforming to BS EN 149:2001+A1:2009 class FFP3 should be used.

Suitable eye protection should be used if deemed appropriate by the risk assessment. Long hair and loose clothing should be secured so as not to come into contact with moving parts. Jewellery should be removed. Gloves should not be worn.

Abrasive belts and bobbins should be examined before use. Torn belts and bobbins should be discarded.

Adjustable guarding should be provided for the abrasive belt so that only the minimum required for the sanding operation is exposed.

The machine should be included in a planned maintenance programme that should include electrical safety tests.