Bristol Hackspace



Safety Rules

Observe all safety instructions. Induction or Instructions are required for some of the machines. Ask someone for help, consult the wiki or message the forum when in doubt.

Ask for instructions if you are unfamiliar on how to use a tool. This is to protect you and to protect the tool. This is a shared space – consider others around you before using a machine; and be aware of others working nearby. **Leave the space cleaner than you found it.**

Make sure you know where the **emergency stops and fire extinguishers** are. In case of "call 999"-type emergencies, make sure there is someone at the door to let paramedics in. If you have to stay with the wounded, jam the doors open. Bring your key(card)s with you if you have to let emergency personnel in.



Wear protective clothing

Wear tight fitting clothing, keep long hair tied up, no jewellery or anything else that can be caught by a machine. Consider that others may be working at the space – and you may be in close range of their machines too.



Wear appropriate footwear

No sandals or similar in the wood or metal shop.



Wear a mask when needed

Especially when cutting materials such as MDF



Eye protection recommended

Also consider that hard-metal cutters and ceramics can suddenly shatter.



Protective gloves recommended

But also: be careful with gloves – they can be caught in the machine and when made of a sturdy material, help rip your finger off.



Ear protection recommended

If something breaks or is amiss – it is **your** responsibility to report it. If you find something broken – report it before using/repairing the machine.

If a machine is not clean or appears broken - then report this to the forum. Clean/fix prior to use.

Notice something wrong with this poster? Edit directly at https://github.com/bristolhackspace/SafetySheetsMachines/or request a change in the forum.

Template



Safety Rules

Induction can be performed **online**. Complete the Induction to receive an unlock code. Make sure you lock up the machine after use! **Induction in person** is required. Post on the forum to arrange this.

Report any use in the log - and pay for it!

Be sure to attach and power on the dust extractor. Move the gates to extract dust from your machine.

If a machine is not clean or appears broken - then report this to the forum. Clean/fix prior to use.

Report any damage, issues or accident within 24 hours to the forum.

Wood Workshop



Safety Rules

The wood shop is separated from the rest of the space for dust- and clean-tool control reasons.

Keep wood-tools separate from other tools and free of (machining) oil.

Connect a shopvac/vacuum cleaner to keep the dust under control.



Keep the door to the main room closed

To keep the dust under control.



Keep wood-tools separate

Try to keep wood- and metal-tools separate; the latter are often oily and can spoil others people work for a long time aftwards. Try not to do metal work in the wood shop.



Ear protection recommended



Eye protection recommended



Wear protective clothing

Wear tight fitting clothing, keep long hair tied up, no jewellery or anything else that can be caught by the machines.



Wear a mask when needed

Make appropriate use of dust extraction.

Try to leave the woodshop in a better state than you found it.

If a machine is not clean or appears broken - then report this to the forum. Clean/fix prior to use.

Report any damage, issues or accident within 24 hours to the forum.

Pillar Drill



Safety Rules

Do not attempt to change the drill speed, as the gearing is non-standard.

Make sure you clamp your workpiece well - to avoid spinning.

Be aware of other people around you (especially through the door to the main room).



Eye protection recommended

Swarf will fly. Marterial can come loose.



Do not wear gloves

Especially strong leather ones. They get caught easily and then 'help' ripping body parts off.



Wear protective clothing

Wear tight fitting clothing, keep long hair tied up, no jewellery or anything else that can be caught by the machine.



Crushing

Risk of crushing – the machine does not have any sensors that detect obstacles. The drill is operated by gears. They will not slip or stop.



https://wiki.bristolhackspace.org/equipment/woodshop/floor-standing-pillar-drill

If a machine is not clean or appears broken - then report this to the forum. Clean/fix prior to use.

Report any damage, issues or accident within 24 hours to the forum.

Wood Lathe



An induction is Mandatory

Read these instructions **prior** to use to prevent damage to you and the equipment. Check the wiki for more information. You must have completed an induction to use the machine.

This machine is for WOOD. See the wiki or internet for other materials.

Induction in person is required. Post on the forum to arrange this.

Be sure to attach and power on the dust extractor. Move the gates to extract dust from your machine.



Wear protective clothing

Wear tight fitting clothing, keep long hair tied up, no jewellery or anything else that can be caught by the machine.



Wearing a face shield is mandatory



Wear a mask when needed

Especially when sanding.



Do not wear gloves



Spinning material

Risk of laceration and entanglement.



Sharp tools in contact with spinning material

Tools could be caught and thrown.

https://wiki.bristolhackspace.org/equipment/woodshop/woodturning lathe/home

If a machine is not clean or appears broken - then report this to the forum. Clean/fix prior to use.

Report any damage, issues or accident within 24 hours to the forum.

Mitre Saw



An induction is Mandatory

Read these instructions **prior** to use to prevent damage to you and the equipment. Check the wiki for more information. You must have completed an induction to use the machine.

This machine is for WOOD only.

Induction can be performed **online**. Complete the Induction to receive an unlock code. Make sure you lock up the machine after use!

Be sure to attach and power on the dust extractor. Move the gates to extract dust from your machine.



Wear ear protection



Wear a mask



Wear eye protection



Automatic start-up

Risk of laceration and entanglement.



Wear protective clothing

Wear tight fitting clothing, keep long hair tied up, no jewellery or anything else that can be caught by the machine.



Sharp rotating elements

So keep your fingers away.
Bypassing or using your fingers to hold the guard open is downright stupid.

https://wiki.bristolhackspace.org/equipment/woodshop/mitre_saw

If a machine is not clean or appears broken - then report this to the forum. Clean/fix prior to use.

Report any damage, issues or accident within 24 hours to the forum.

Table Saw



Safety Rules

This machine is for WOOD only.

Let others in the room know before you start using it!

Induction can be performed **online**. Complete the Induction to receive an unlock code. Make sure you lock up the machine after use!

Be sure to attach and power on the dust extractor. Move the gates to extract dust from your machine.



Wear ear protection



Do not wear gloves



Wear eye protection



Spinning material

Risk of laceration and entanglement.



Wear protective clothing

Wear tight fitting clothing, keep long hair tied up, no jewellery or anything else that can be caught by the machine.



Sharp rotating elements

So keep your fingers away. Bypassing or using your fingers to hold the guard open is downright stupid.



Wear a mask

https://wiki.bristolhackspace.org/equipment/woodshop/tablesaw

If a machine is not clean or appears broken - then report this to the forum. Clean/fix prior to use.

Report any damage, issues or accident within 24 hours to the forum.

Wood Bandsaw



An induction is Mandatory

Read these instructions **prior** to use to prevent damage to you and the equipment. Check the wiki for more information. You must have completed an induction to use the machine.

This machine is for WOOD and PLASTIC only.

Induction in person is required. Post on the forum to arrange this.

Be sure to attach and power on the dust extractor. Move the gates to extract dust from your machine.



Check the blade is running true before use

If it has a kink, or is blunt, it should be replaced.



Check that all six bearings are in the correct position before use

They should be close to, but not touching, the blade. There are three below the table to check!



Ear protection Strongly Recommended



Eye protection Recommended



Wear protective clothing

Wear tight fitting clothing, keep long hair tied up, no jewellery or anything else that can be caught by the machine.



Wear a mask when needed

https://wiki.bristolhackspace.org/equipment/woodshop/bandsaw

If a machine is not clean or appears broken - then report this to the forum. Clean/fix prior to use.

Report any damage, issues or accident within 24 hours to the forum.

Jointer



These Instructions are Mandatory

Read these instructions **prior** to use to prevent damage to you and the equipment. Check the wiki for more information.

This machine is for WOOD only.

This machine does not have a dust collection nozzle. Ensure you clean up afterwards.



Wear ear protection



Wear a mask



Wear eye protection



Do not wear gloves



Wear protective clothing

Wear tight fitting clothing, keep long hair tied up, no jewellery or anything else that can be caught by the machine.



Sharp element

This machine is effectively spinning knives with no guard.

https://wiki.bristolhackspace.org/equipment/woodshop/jointer

If a machine is not clean or appears broken - then report this to the forum. Clean/fix prior to use.

Report any damage, issues or accident within 24 hours to the forum.

Thickness Planer



These Instructions are Mandatory

Read these instructions **prior** to use to prevent damage to you and the equipment. Check the wiki for more information.

The Dust extractor is not strong enough to pull all of the wood dust from the Thicknesser hose, so you may need to manually empty this in to the bin.

Be sure to attach and power on the dust extractor. Move the gates to extract dust from your machine.



Wear ear protection



No reaching in

Don't stick your hands where you can't see them!



Wear eye protection



Do not wear gloves



Wear protective clothing

Wear tight fitting clothing, keep long hair tied up, no jewellery or anything else that can be caught by the machine.



Counterrotating rollers

This machine will 'pull' you in using counter rotating rollers. Which ALSO have a ratchet mechanism.



Wear a mask

https://wiki.bristolhackspace.org/equipment/woodshop/thicknesser

If a machine is not clean or appears broken - then report this to the forum. Clean/fix prior to use.

Report any damage, issues or accident within 24 hours to the forum.

Wood Router(s)



Safety Rules

This machine is for WOOD only.



Wear ear protection



Wear a mask



Wear eye protection



Entanglement hazard



Wear protective clothing

Wear tight fitting clothing, keep long hair tied up, no jewellery or anything else that can be caught by the machine.



Sharp rotating element

There may not be a guard. Familiarise yourself with the risks and minimise them.

https://wiki.bristolhackspace.org/equipment/woodshop/pdf1200d3 Other routers are also in the hackspace.

If a machine is not clean or appears broken - then report this to the forum. Clean/fix prior to use.

Report any damage, issues or accident within 24 hours to the forum.

Belt and Disc Sander



Safety Rules

Be sure to attach and power on the dust extractor. Move the gates to extract dust from your machine.



You can use the block of rubber to clean the belt and disc

It sits on the dust extractor tubes. Run the rubber over the belt and disc while it is running.



Wear protective clothing

Wear tight fitting clothing, keep long hair tied up, no jewellery or anything else that can be caught by the machine.



Wear ear protection



Wear a mask

Warn others if you're sanding toxic wood.



Wear eye protection



Fast spinning object

Risk of entanglement

https://wiki.bristolhackspace.org/equipment/woodshop/beltsander

If a machine is not clean or appears broken - then report this to the forum. Clean/fix prior to use.

Report any damage, issues or accident within 24 hours to the forum.

Bins



These Instructions are Mandatory

Read these instructions **prior** to use to prevent damage to you and the equipment. Check the wiki for more information.

No Wood in the Bin! General purpose bin for Plastic, Sawdust, Metal, paper.



Empty if full!

Empty in to the green bin outside and to the right of the building. Bags are are in the consumables cupboard.



No Glass, e-Waste, or food.

There are bins for glass and e-Waste. Take your food home.



No Wood!

Sawdust is fine.



No Fires

No, Seriously, Please don't put solid wood in here.

If a machine is not clean or appears broken - then report this to the forum. Clean/fix prior to use.

Report any damage, issues or accident within 24 hours to the forum.

CNC Mill



These Instructions are Mandatory

Read these instructions **prior** to use to prevent damage to you and the equipment. Check the wiki for more information.

Induction in person is required. Post on the forum to arrange this.



Wear eye protection

When the door is open.



No wood or dusty materials. No ferrous metals (e.g. Steel)

unless you know what you're doing with steel.



No reaching in



Flying Debris Hazard



Automatic start-up



Sharp element



Crushing of hands

https://wiki.bristolhackspace.org/equipment/cnc/mill

If a machine is not clean or appears broken - then report this to the forum. Clean/fix prior to use.

Report any damage, issues or accident within 24 hours to the forum.

PCB Mill



An induction is Mandatory

Read these instructions **prior** to use to prevent damage to you and the equipment. Check the wiki for more information. You must have completed an induction to use the machine.



Do not wear gloves

Especially strong leather ones. They get caught easily and then 'help' ripping body parts off.



Eye protection recommended

Swarf will fly. Cutters can come loose. Broken cutters can fly very far and are razor sharp.



Wear protective clothing

Wear tight fitting clothing, keep long hair tied up, no jewellery or anything else that can be caught by the machine.



Crushing

Risk of crushing – the machine does not have any sensors that detect obstacles.

Note that it can also run very slow; barely noticeable.



Slippery surface

Floor will get very slippery; especially when using coolant.



Sharp rotating elements

This machine is essentially a cutter without any guard whatsoever.

Only switch XYZ feeds when the machine is not running. Use the hand-wheel to get the gear fully locked in prior to starting the feed. Be sure to tighten all 4 nuts post rotating the head or all 4 nuts when moving the head laterally.

Try to avoid getting coolant or similar on the slide-ways – especially the Y slipway between machine and table. Use a shield or adjust the flow. Machine needs to be cleaned post use. When using coolant – also empty the recess on the left of the table and clean out the t-Slots until dry.

If a machine is not clean or appears broken - then report this to the forum. Clean/fix prior to use.

Report any damage, issues or accident within 24 hours to the forum.

Template



Safety Rules

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Report any use in the log - and pay for it!

Be sure to attach and power on the dust extractor. Move the gates to extract dust from your machine.

If a machine is not clean or appears broken - then report this to the forum. Clean/fix prior to use.

Report any damage, issues or accident within 24 hours to the forum.

Laser Cutter



These Instructions are Mandatory

Read these instructions **prior** to use to prevent damage to you and the equipment. Check the wiki for more information.

Do not use unless coolant temperature is below 24c

Induction in person is required. Post on the forum to arrange this.



Laser beam



Crushing of hands



flammable material

If a machine is not clean or appears broken - then report this to the forum. Clean/fix prior to use.

Report any damage, issues or accident within 24 hours to the forum.

Prusa i3 MK3s



These Instructions are Mandatory

Read these instructions **prior** to use to prevent damage to you and the equipment. Check the wiki for more information.

If you start a print and need to leave, you MUST post on the forum. There is a chat group set up for this.

Induction in person is required. Post on the forum to arrange this.



Do not change printer settings.

You can change print settings, but not printer.



Automatic start-up

Machine may suddenly start moving.



Hot Surface and very hot extruder head



Crushing of hands

https://wiki.bristolhackspace.org/equipment/cnc/prusamk3

If a machine is not clean or appears broken - then report this to the forum. Clean/fix prior to use.

Report any damage, issues or accident within 24 hours to the forum.