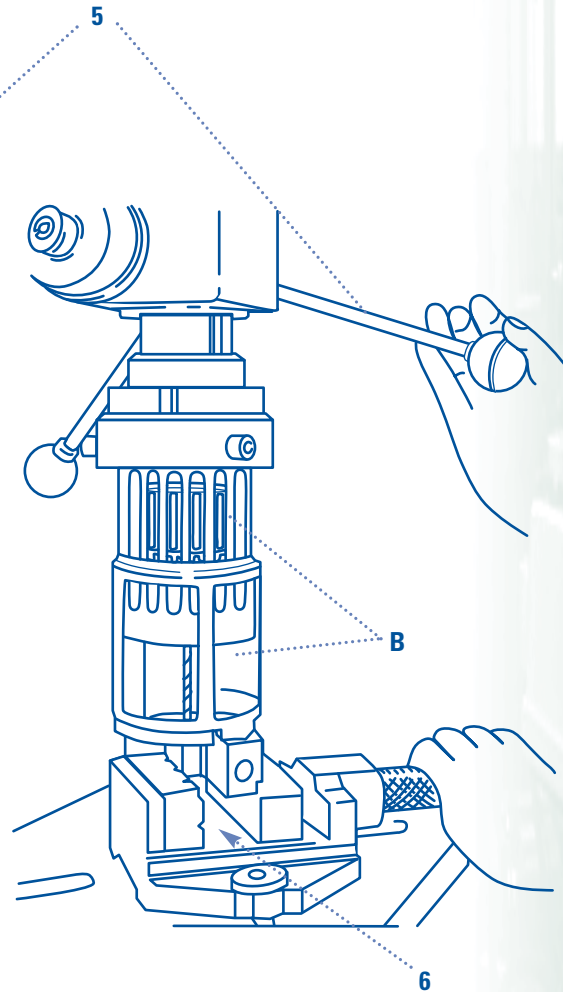
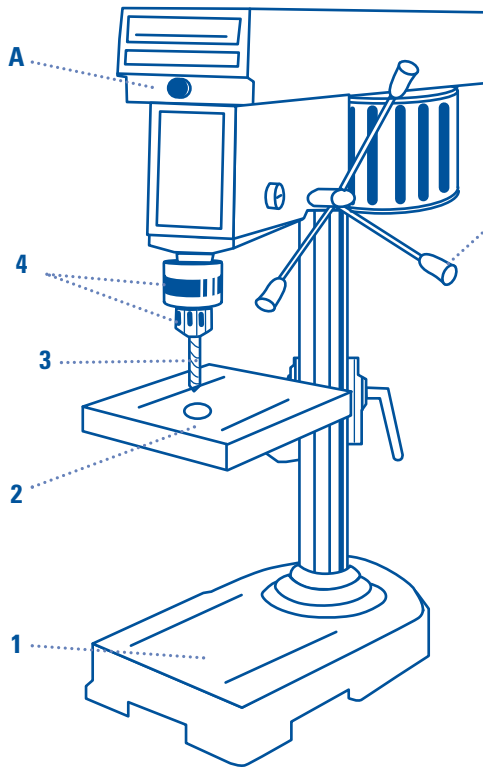


Equipment identification:

Drill Press

Date :



Parts

- 1 Stand
- 2 Table
- 3 Cutting Tool
- 4 Chuck
- 5 Lever
- 6 Vise

Safety Devices

- A Emergency Stop Switch
- B Sliding Cage



Association paritaire pour la santé
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www.aspme.org



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SELF-ASSESSMENT FORM

For Occupational Health And Safety

LEGEND

Preventative Measures

- ▶ Procedural Measures
- Orders/instructions

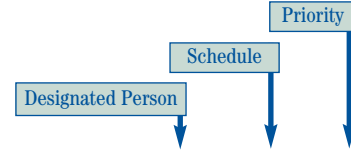
Priority Codes for applying risk measures:

- A. Immediate stoppage and resolution
- B. Resolution as soon as possible
- C. Resolution according to normal company procedures

The suggested preventative measures are based in part from the Workplace Health And Safety Regulations (RSST, S-2.1, r.19.01), from An Act Respecting Occupational Health and Safety (Québec LSST, S-2.1), Machining Techniques: Module 6, Shopwork edited by CEMWQ, 2000, INRS Safety Data Sheet 19; Drill Presses, 1978, and Mechanical Adjustments, edited by Chenelière/McGraw-Hill, 1980.

Mechanical Hazards

Most likely injuries: Cuts, fractures, foreign bodies, crushing etc.



Preventative measures	Applicable <input checked="" type="checkbox"/>	Not applicable <input type="checkbox"/>	Notes	Desig.	Sched.	Prior.
Risk Factor: Contact With A Rotating Cutting Tool Or Chuck						
▶ Install a cage surrounding the chuck and cutting tool.		<input type="checkbox"/>				
● Wait until the chuck has come to a complete stop before carrying out any work in the area of the chuck or cutting tool, such as removing or adjusting the workpiece, taking measurements, etc.		<input type="checkbox"/>				
● Use a smooth, long-handled brush with no rings, straps or hooks to remove shavings and cutting fluid.		<input type="checkbox"/>				
● Never approach a rotating chuck or cutting tool while wearing gloves or holding a rag.		<input type="checkbox"/>				
● Do not wear loose-fitting clothes.		<input type="checkbox"/>				
● Do not wear any jewelry.		<input type="checkbox"/>				
● Tie up long hair and secure under a cap.		<input type="checkbox"/>				
● Never allow a drill press to run unattended.		<input type="checkbox"/>				
▶ Install an emergency stop switch (button, "trigger" handle, etc.).		<input type="checkbox"/>				
● Properly secure the workpiece using safe work procedures and practices (with a vise, clamps, etc.). Never hold the workpiece while machining.		<input type="checkbox"/>				

Notes:

Mechanical Hazards (continued)

Most likely injuries: Cuts, fractures, foreign bodies, crushing etc.

Preventative measures	Applicable <input checked="" type="checkbox"/>	Not applicable <input type="checkbox"/>	Notes	Desig.	Sched.	Prior.
Risk Factor: Accidental Start-Up Of The Drill Press						
▶ Install a recessed or flush-mounted start-up button.	<input type="checkbox"/>					
▶ Ensure that (should the electrical supply to the drill press be interrupted), the drill press cannot start automatically once the electrical power supply is restored.	<input type="checkbox"/>					
Risk Factor: Accidental Start-Up Of The Drill Press During Maintenance Or Repairs						
● Lockout the power cut-off box and then check to ensure start-up is not possible.	<input type="checkbox"/>					
● Unplug the electrical supply cord and lockout the plug.	<input type="checkbox"/>					
Risk Factor: Contact With Pulley Wheels And Drive Belt						
▶ Install a fixed guard, or a locked removable guard.	<input type="checkbox"/>					
● Reduce access to pulleys by avoiding changing speeds unnecessarily.	<input type="checkbox"/>					
Risk Factor: Contact With The Sharp Edges Of Shavings, Non-Deburred Workpieces Or Stopped Cutting Tool						
● Handle only with a rag or cut-resistant gloves and, only when the chuck and cutting tool have come to a complete stop.	<input type="checkbox"/>					
● Immediately put away any unused tools.	<input type="checkbox"/>					
● Remove chips and curls with a vacuum or a brush.	<input type="checkbox"/>					
● Remove long curls with a pair of pliers.	<input type="checkbox"/>					
Risk Factor: Falling Material						
▶ Securely anchor the assembly to the floor or a workbench.	<input type="checkbox"/>					
▶ Supply mechanical handling devices (hoist, dolly with lift table, etc.) suitable to the weight and dimensions of the workpieces.	<input type="checkbox"/>					
● Remove any object likely to fall from the drill press.	<input type="checkbox"/>					
● Wear CSA-approved safety footwear with steel-capped toes.	<input type="checkbox"/>					
Risk Factor: Fall, Slipping						
▶ Repair and clean floor: uneven surfaces, holes, slippery floor, presence of saw chips, etc.	<input type="checkbox"/>					
● Avoid using loose electric extension cords; they clutter up the floor.	<input type="checkbox"/>					

Notes:

Mechanical Hazards (continued)

Most likely injuries: Cuts, fractures, foreign bodies, crushing etc.

Preventative measures	Applicable <input checked="" type="checkbox"/>	Not applicable <input type="checkbox"/>	Notes	Desig.	Sched.	Prior.
Risk Factor: Flying Material (Chuck Key, Tool Fragments, Workpiece, Shavings, etc.)						
▶ Install a screen behind the drill press or place the press against a wall.	<input type="checkbox"/>					
● Stop a drill press if an unusual vibration is felt or noise heard.	<input type="checkbox"/>					
● Do not allow a chuck key to be attached to the drill with a chain.	<input type="checkbox"/>					
● Wear CSA-approved safety glasses with lateral protection.	<input type="checkbox"/>					
● When needed, wear a CSA-approved face shield on top of safety glasses.	<input type="checkbox"/>					
Risk Factor: Flying Chuck Key						
● Ensure the chuck key is removed before starting the drill press.	<input type="checkbox"/>					
▶ Install a keyless chuck to secure the cutting tool to the chuck.	<input type="checkbox"/>					
▶ Supply a spring-loaded chuck key.	<input type="checkbox"/>					
● Never strike a chuck-key with a hammer.	<input type="checkbox"/>					
Risk Factor: Flying Workpiece And Fragments						
● Check that the tool's cutting edges are sharp.	<input type="checkbox"/>					
● Properly secure the cutting tool.	<input type="checkbox"/>					
● Properly secure the workpiece using accepted and safe work practices (with a vise, clamps, etc.). Never hold the workpiece while machining.	<input type="checkbox"/>					
● Select RPM according to the cutting tool and the material being machined.	<input type="checkbox"/>					
● Apply gradual pressure during the machining process.	<input type="checkbox"/>					
● Make a pilot hole before attempting to drill a large-diameter hole.	<input type="checkbox"/>					
Risk Factor: Flying Chips and Curls						
● Use tools with chip breakers. Alternatively, use a back-and-forth technique during machining.	<input type="checkbox"/>					
● Remove chips and curls with a vacuum or with a brush.	<input type="checkbox"/>					
● Remove long curls with a pair of pliers.	<input type="checkbox"/>					
● Remove chips and curls by blowing with compressed air at a pressure less than 200 kPa (30 psi).	<input type="checkbox"/>					
● Never remove chips and curls by blowing with your mouth.	<input type="checkbox"/>					

Notes:

Ergonomic Hazards

Most likely injuries: Musculo-skeletal disorders, backaches, fractures, strains and sprains, etc.

Preventative measures	Applicable <input checked="" type="checkbox"/>	Not applicable <input type="checkbox"/>	Notes	Desig.	Sched.	Prior.
Risk Factor: Handling Heavy And Bulky Workpieces						
▶ Supply mechanical handling devices (hoist, dolly with lift table, etc.) suitable to the weight and dimensions of the workpieces.	<input type="checkbox"/>					
● Ask for help from another worker when help is needed.	<input type="checkbox"/>					
Risk Factor: Straining Working Positions						
▶ Install a transparent guard that doesn't mask the area being drilled (transparent or with small openings).	<input type="checkbox"/>					
▶ Install sufficient lighting to illuminate the machining area so as to eliminate the need to bend neck and back.	<input type="checkbox"/>					
Risk Factor: Static Standing Work						
▶ Supply suitable seating if suitable for such work.	<input type="checkbox"/>					
▶ Supply an anti fatigue mat.	<input type="checkbox"/>					

Heat-Related Hazards

Most likely injuries: Burns.

Preventative measures	Applicable <input checked="" type="checkbox"/>	Not applicable <input type="checkbox"/>	Notes	Desig.	Sched.	Prior.
Risk Factor: Contact With Chips, Curls, Cutting Tools And Hot Workpieces						
▶ Install a guard around the chuck and the cutting tool.	<input type="checkbox"/>					
▶ Install a screen behind the drill press or place the press against a wall.	<input type="checkbox"/>					
● Remove chips and curls with a vacuum or a brush.	<input type="checkbox"/>					
● Use cutting fluid, when needed.	<input type="checkbox"/>					
● Wear snug-fitting long-sleeve shirts.	<input type="checkbox"/>					
● Handle hot workpieces and cutting tools with gloves or a rag.	<input type="checkbox"/>					

Physical Hazards

Most likely injury: Hearing loss

Preventative measures	Applicable <input checked="" type="checkbox"/>	Not applicable <input type="checkbox"/>	Notes	Desig.	Sched.	Prior.
Risk Factor: Noisy Workplace Environment						
● Identify the sources of noise and implement measures to reduce noise at the source, whenever possible.	<input type="checkbox"/>					
● Wear earplugs or earmuffs.	<input type="checkbox"/>					

Chemical and Biological Hazards

Most likely injuries: Dermatitis, intoxication, and infection.

Preventative measures	Applicable <input checked="" type="checkbox"/>	Not applicable <input type="checkbox"/>	Notes	Desig.	Sched.	Prior.
Risk Factor: Inhalation Or Skin Contact Of Contaminants From Cutting Fluids Or The Workpiece						
● Consult the MSDS for the workpiece to be machined to determine if there are any hazardous substances (e.g., beryllium, cobalt, manganese, lead, etc.).		<input type="checkbox"/>				
● Dry-cut whenever possible.		<input type="checkbox"/>				
● Consult the MSDS for the cutting fluid.		<input type="checkbox"/>				
▶ Select cutting fluids that do not contain any amines-class chemical substances and that are the least harmful to your health.		<input type="checkbox"/>				
● When handling chemicals, wear gloves that are resistant to the cutting fluid used.		<input type="checkbox"/>				
● Follow personal hygiene precautions: - frequently wash hands and forearms with mild soap and water - promptly report, treat and cover cuts - regularly change clothing impregnated with cutting fluid.		<input type="checkbox"/>				

Electrical Hazards

Most likely injuries: Electrocutation

Preventative measures	Applicable <input checked="" type="checkbox"/>	Not applicable <input type="checkbox"/>	Notes	Desig.	Sched.	Prior.
Risk Factor: Contact With Parts Normally Or Accidentally Energized						
▶ Install an isolating switch near the drill press, with clear markings.		<input type="checkbox"/>				
● Lockout the isolating switch box and then check to ensure start-up is no longer possible.		<input type="checkbox"/>				
● Unplug the electrical supply cord and lockout the plug.		<input type="checkbox"/>				
● Check the supply cord insulation and the drill press grounding circuit.		<input type="checkbox"/>				

Notes:

Completed By:

This Self-Diagnosis form was developed following a research project in workplace health and safety from IRSST, a workplace health and safety research institute named (Institut de recherche Robert-Sauvé en santé et en sécurité du travail).