



**EH&S/General Safety
Shop Safety Program**

Procedure No.: SS-MHA-BND-S

Authorized/Approved By:

Title: Shop Equipment Hazard Analysis & Management Form

Issue Date:

Review Date:

Page Number: 1 of 4

1. Hazard Management Details - General

Shop/Equipment Item: **BAND SAW**

Make/Model No.:

Serial No.:

Department:

Work Location:

Person(s) Conducting Hazard Analysis: **JOHN M. SEAMAN**
Campus General Safety Specialist

Date Conducted: *May 2, 2013*

Equipment Photo:

Description of Use:

Summary of Key Risks: (refer to appropriate subsections)



A band saw uses a vertical blade consisting of a continuous band of metal with teeth along one edge. Work pieces are hand fed onto the cutting edge.

The band rides on two wheels rotating in the same plane. The band saw produces uniform cutting action as a result of an evenly distributed tooth load.

Band saws can be used for woodworking, metal working, or for cutting a variety of other materials, and are particularly useful for cutting irregular or curved shapes, but can also be used to produce straight cuts.

- Entanglement
- Inhalation
- Eye Injury
- Trauma (Impact and Cutting)
- Noise
- Hand/Foot Injury
- Fire
- Electrical Shock



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2. Documentation:

Relevant Legislation/Standards	Y / N	Comments:
a. Is equipment required to be registered?	Y <input type="checkbox"/> N <input checked="" type="checkbox"/>	
b. Is a user license/Certification required?	Y <input type="checkbox"/> N <input checked="" type="checkbox"/>	
c. Key Reference Materials Required:	Manufacturer's Operator's Manual (specifically safety features) General Requirements: OSHA 29 CFR 1910.132 Machine Safeguarding: OSHA 29 CFR 1910.212 and 1910.213. Hearing Conservation: OSHA 29 CFR 1910.95 https://www.osha.gov/SLTC/etools/machineguarding/saws/band_saws.html https://www.osha.gov/SLTC/etools/woodworking/production_bandsaws.html	
Equipment Documentation	Y / N	Comments:
a. Are operator's manuals accessible?	Y <input checked="" type="checkbox"/> N <input type="checkbox"/>	
b. Is this a restricted use item?	Y <input checked="" type="checkbox"/> N <input type="checkbox"/>	
c. Does this equipment require safe use document(s)/test?	Y <input checked="" type="checkbox"/> N <input type="checkbox"/>	

3. Personal Protective Equipment (PPE) Required (Check the box for required PPE)

Gloves	Face Masks	Eye Protection	Face Shield	Hearing Protection	Safety Footwear	Protective Clothing	Welding Mask
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	OPTIONAL	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

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4. Hazard Analysis

TASK	HAZARD	CAUSE	PREVENTIVE MEASURE
Routine Operation	Entanglement	Long hair, loose clothing, rags, cleaning brushes and jewelry could become entangled in the moving parts of the band saw.	Aprons can be used to restrict loose clothing. Hair ties/hair nets can be used to secure long hair. Jewelry and accessories must be removed prior to operating the band saw.
	Inhalation	Hazardous fumes, gases, dust	Appropriate ventilation as required, disposable respirators
	Eye Injury	Projectiles	Safety glasses with side shields or safety goggles
	Trauma	Projectiles, rotating parts, point of operation, ingoing nip points, flying chips & sparks	Situational awareness, PPE, protective clothing, machine guards
	Noise	Equipment Operation	Wear appropriate hearing protection
	Foot Injury	Drop object on foot	Wear safety shoes/boots
	Hand Injury	Sharp objects	Gloves as appropriate for task
	Fire	Sparks	Appropriately placed fire extinguisher. Remove all combustible materials and potential fire hazards from area
	Electric Shock	Improper grounding, improper operations and maintenance	Proper grounding of frame. Manufacturer's instructions strictly followed
Routine Maintenance/Repair	Lacerations/Punctures	Sharp edges on blades	Use/wear safety gloves when changing blades
Shutdown/Isolation	Electrical Shock	Improper Lockout/Tag-out	Strict adherence to established Lockout/Tag-out protocols

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Equipment Procedures/ Requirements

1. Operate equipment in strict accordance with Manufacturer's instructions and in accordance with OSHA 29 CFR 1910.212 and 1910.213.
2. Only authorized users can operate equipment.
3. A mechanical or electrical power control shall be provided to make it possible for the operator to cut off power without leaving their position at the point of operation.
4. All belts, pulleys, gears, shafts shall be guarded in accordance with the requirements of OSHA 29 CFR 1910.219.
5. Machines designed for a fixed location shall be securely anchored to prevent walking or moving.
6. One or more methods of machine guarding shall be provided to protect the operator and others in the area from hazards such as those created by point of operation, ingoing nip points, rotating parts, flying chips and sparks.
7. All portions of the saw blade shall be enclosed or guarded, except for the working portion of the blade between the bottom of the guide rolls and the table. Band saw wheels shall be fully encased.
8. Each band saw shall be provided with a tension control device to indicate proper tension for the standard blades used on the machine.
9. Feed rolls of band saws shall be protected with a suitable guard to prevent the hands of the operators from coming in contact with the in-running rolls at any point.
10. Report any observed defect or safety hazard to your supervisor immediately.
11. Where any object handled would possibly cause injury to feet if dropped, safety shoes will be worn.
12. Where any object handled could possibly cause cuts, punctures or abrasions to hands, appropriate gloves will be worn. **(Exception: where rotating machinery presents a greater hazard of entangling gloves, they are optional with a written justification).**
13. Keep hands, hair and loose clothing clear of all moving parts.

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