



## *Job Description*

<b>Job Title:</b>	Shop Machinist	<b>Job Category:</b>	Technical
<b>Location:</b>	Canfield OH	<b>Travel Required:</b>	Yes
<b>Position Type:</b>	Hourly, Full time, Non-exempt	<b>Reports to:</b>	

The primary duties of this position include, but are not limited to, the servicing of various sizes of generators and related shop equipment. The employee is responsible for diagnosing equipment, troubleshooting and repairing the equipment. This position requires the employee to be mostly in the shop but does require some time in field at customer locations. This position works closely with all technicians, in addition to parts and service staff, as well.

### **BASIC SKILLS**

- Using logic and reasoning to identify the strengths and weaknesses of alternative solutions, conclusions or approaches to problems.
- Giving full attention to what other people are saying, taking time to understand the points being made, asking questions as appropriate, and not interrupting at inappropriate times.
- Understanding written sentences and paragraphs in work related documents.
- Talking to others to convey information effectively.
- Understanding the implications of new information for both current and future problem-solving and decision-making.

### **DESKTOP COMPUTER SKILLS**

- **Internet** - Using a computer application to create, manipulate, edit, and show virtual slide presentations.
- **Navigation** - Using scroll bars, a mouse, and dialog boxes to work within the computer's operating system. Being able to access and switch between applications and files of interest. Navigating the Internet to find information, including the ability to open and configure standard browsers; use searches, hypertext references, and transfer protocols; and send and retrieve electronic mail (e-mail).

### **TASKS**

- Measure velocity, horsepower, revolutions per minute (rpm), amperage, circuitry, and voltage of units or parts to diagnose problems, using ammeters, voltmeters, watt meters, and other testing devices.
- Record repairs required, parts used, and labor time.
- Reassemble repaired electric motors to specified requirements and ratings, using hand tools and electrical meters.
- Repair and rebuild defective mechanical parts in electric motors, generators, and related equipment, using hand tools and power tools.
- Engine blocks: bore, hone, resurface when needed
- Rebuild engines
- Rewire electrical systems, and repair or replace electrical accessories.
- Inspect electrical connections, wiring, relays, charging resistance boxes, and storage batteries, following wiring diagrams.
- Read service guides to find information needed to perform repairs.
- Inspect and test equipment to locate damage or worn parts and diagnose malfunctions, or read work orders or schematic drawings to determine required repairs.
- Solder, wrap, and coat wires to ensure proper insulation.



- Assemble electrical parts such as alternators, generators, starting devices, and switches, following schematic drawings and using hand, machine, and power tools.
- Lubricate moving parts.
- Remove and replace defective parts such as coil leads, carbon brushes, and wires, using soldering equipment.
- Disassemble defective equipment so that repairs can be made, using hand tools.
- Lift units or parts such as motors or generators, using cranes or chain hoists, or signal crane operators to lift heavy parts or subassemblies.

## WORK ACTIVITIES

- Adjust equipment to ensure optimal performance.
- Assemble electrical components, subsystems, or systems.
- Braze or weld metal parts or components.
- Clean equipment, parts, or tools to repair or maintain them in good working order.
- Communicate with coworkers to coordinate installations or repairs.
- Cut materials according to specifications or needs.
- Disassemble equipment for maintenance or repair.
- Fabricate parts or components.
- Inspect electrical or electronic systems for defects.
- Inspect mechanical equipment to locate damage, defects, or wear.
- Install insulation in equipment or structures.
- Level machines or equipment.
- Lubricate equipment to allow proper functioning.
- Maintain inventories of materials, equipment, or products.
- Maintain repair or maintenance records.
- Measure equipment outputs.
- Operate cranes, hoists, or other moving or lifting equipment.
- Prepare compounds or solutions to be used for repairs.
- Read technical information needed to perform maintenance or repairs.
- Read work orders or descriptions of problems to determine repairs or modifications needed.
- Reassemble equipment after repair.
- Rebuild parts or components.
- Remove dents from equipment, materials, tools or structures.
- Remove parts or components from equipment.
- Repair defective engines or engine components.
- Repair electrical components.
- Repair electronic equipment.
- Replace worn, damaged, or defective mechanical parts.
- Rewire electrical or electronic systems.
- Seal gaps or cracks to prevent leakage or moisture intrusion.
- Smooth surfaces of objects or equipment.
- Solder parts or connections between parts.
- Test electrical circuits or components for proper functioning.
- Test mechanical equipment to ensure proper functioning.



## WORKING KNOWLEDGE OF THE FOLLOWING TOOLS:

Adjustable wide mouth pliers	Adjustable wrenches
Alternating current AC arc welder	Angle grinder
Ammeters	Stripping tools
Aqueous cleaning and washing equipment	Bench grinder
Armature tester	Bearing fitting tool kits
Braze welding machine	Carburetor balancer
Chamfering machine	Electrical coil winding machine
Cutters	Diagonal cut pliers
Dip tanks	Dynamometers
Electrolytic bath machine	End cut pliers
Feeler gauges	Forklifts
Grinders	Growler tester
Hacksaw	Heat treating age hardening furnace
Hydraulic hand crimp tool	Insulation resistance meters
Knurling tool	Laser measuring systems
Levels	Long nose pliers
Mallets	Manual press brake
Manual wire straighteners	Megohmmeters
Multimeters	Nut drivers
Ohmmeters	Rubber mallet
Oscilloscopes	Paint application system
Personal computers	Phasemeters
Plasma arc welding machine	Pneumatic grinders
Pocket knives	Power grinders
Sawing and cut-off machine	Saws
Shears	Soldering iron
Shot blasting machine	Vibration testers
Sound detector	Tablet computers
Tachometers	Tape measures
Threading machine	Utility knives
Voltage or current meters	Screwdrivers
Wedges	Wire brushes
Wire cutters	Wire or cable cutter



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## OFFICE TECHNOLOGY REQUIREMENTS

- Desktop computers
- Fax machine
- Photocopiers
- Tablets and Cell Phones

## QUALIFICATIONS AND EDUCATIONAL REQUIREMENTS

- At least 5 years' experience in a technician position with additional applicable schooling
- Must be able to attend overnight manufacturer training classes when required.
- Excellent customer service and telephone skills
- Ability to multi-task and work independently with little or no supervision.
- Proactive and progressive in identifying and solving problems

## PHYSICAL REQUIREMENTS OF JOB:

- Activities requiring handling and grasping with the hands when performing repairs or maintenance of equipment by utilizing hand tools, power tools, air tools, nuts, bolts, electronic controls, and other small parts
- Occasional use of foot/feet to operate foot pedal on equipment to test operation
- Frequent lifting up to 25 lbs., occasional lifting up to 50 lbs., and infrequent lifting up to 75 lbs.
- Ability to walk and stand on concrete and uneven surfaces for at least 4 hours per day
- Ability to bend, kneel and work with arms raised for prolonged periods of time
- Ability to climb over and into heavy equipment several times per day
- Occasional working at heights above 10 ft
- Exposure to bright lights, extreme temperatures, loud noise, dust, gas and/or fumes

## SAFETY REQUIREMENT

Safety gear are as follows but are not limited to or all-inclusive and specific to jobs performed.

- Safety goggles
- Gloves
- Hearing protection
- Steel toe shoes

Employee Name		Supervisor:	
Employee Signature:			
Date Signed		Revised:	June 2016; March 2021