

MARINE MACHINIST

DESCRIPTION OF WORK

This is journey level work in the operation of machine tools to fabricate or repair a variety of metal parts to precise dimensions. Assignments are received from the Marine Mechanic Supervisor, who may offer guidance in the selection of methods and materials. Work is guided by plans, specifications, or worn part to be replaced; and is reviewed upon completion.

EXAMPLES OF DUTIES PERFORMED

Studies specifications, diagrams, and sketches; and measures parts with rule, tape, caliper, inside and outside micrometers, or dial indicator to set up machine tool.
Sets up machine tools, such as lathe, power press, mill, or cutter by adjusting chucks, spindles, and cutting tool arm.
Centers stock, controls depth of cut with hand lever, and takes measurements to determine accuracy of cuts during process.
Fabricates propeller shafts, rudders, flanges, bushings, pins, sheaves, collars, bolts, and spacers from rough stock.
Operates press to install bushings on propeller shafts and bushings in sheaves, or to straighten shafts, plates, and arms.
Operates keyway cutter on lathes and in press.
Cuts material to proper size, using power hacksaw or cutting torch.
Builds up worn shafts with metalizer and turns back to standard size.
Aligns shafts.
Performs related duties as required.

RECRUITMENT STANDARDS

Knowledges, Skills, and Abilities

Working knowledge of the principles, and skill in the operation of various machine tools such as lathes, presses, shapers, cutters, milling machines, and grinders.
Working knowledge of the properties of common metals and alloys.
Working knowledge of precise measuring scales and the uses of instruments such as inside and outside calipers and micrometers.
Ability to read and understand technical diagrams and sketches of complex equipment.
Ability to interpret and carry out instructions.

Minimum Education and Experience

Completion of grammar school and three years of progressive experience in the operation of a variety of machine shop equipment in the production of metal parts, preferably in the ship repair or shipbuilding industry; or an equivalent combination of education and experience.