

i) If firm have experience of handling/ manufacturing similar type of components/tubes, then they have to forward the details such as size of component, material flow formed and other process etc.

B) CENTRAL SLEEVE AND PLUG END CLOSING ASSY.

1) Essential facilities: The firm must have below listed facilities.

a) Compression Moulding Press / Hydraulic press - for capacity min. 300 kg/cm.sq with day light to accommodate die and punch assy. for components of diameter 225 mm and length 150 mm for moulding powder to be pressed and cured as per specification.

b) CNC turning lathes / lathes - for chucking diameter upto 250 mm dia and turning length of 500 mm for operations like rough and finish turning, facing, boring etc and threading of M210 X 2 P saw tooth threads.

c) Hardness testing equipment - for hardness testing for all types of steels.

d) Measuring Instruments - Vernier caliper- 0-300 mm & Bore Meter - upto 250 mm min., Surface plate, Vernier Height gauge, slip gauge, feeler gauges & other facilities for testing Geometrical testing such as concentricity, ovality, etc or otherwise CMM. Weighing Balance (Digital) - 0-20 kg.

Special thread GO and NOGO plug gauges for checking M210 X 2 P spl. Saw tooth treads duly calibrated from NABL laboratory.

e) Barcol Hardness testing facilities for testing hardness of all the FRP moulded portion. Min hardness no. required to be checked and ensured is 50.

2) Desirable Facilities: The firm should either possess or should be capable to arrange as and when required the following facilities.

a) Reliable resources for supply of steel rods/ forgings for the components.

b) Heat treatment facility for tempering and hardening of components.

c) Mechanical Testing - UTM machine for tensile strength testing of steel.

d) Ultrasonic testing facility for flaw detection of forged component.

e) Zinc plating - all the assemblies will be zinc plated to IS: 1573 -1936, Fe/Zn 12.5 type 'C'

f) If firm have experience of handling/ manufacturing similar type of compression moulding components in situ with metallic components, then they have to forward the details such as size of component, FRP material handled in the process etc.

C) PACKING BOXES FOR W/HEAD & PROPULSION UNIT

1) Essential facilities: The firm must have below listed facilities.

a) Firm must have their own workshop for cutting wood, equipped with Wood cutting saw.

b) Firm must have valid authorization/resources for acquiring wood at large scale.

c) If firm have experience of manufacturing similar type of wooden packing boxes then they have to forward the details such as size of boxes supplied.

Submitted for information and necessary action please.


JT.GM/CM&RS