



INDIAN INSTITUTE OF TECHNOLOGY BOMBAY
MATERIALS MANAGEMENT DIVISION
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PR No. 1000021423 (Rfx No. 6100000946)

Detailed Technical Specifications for Spares for Tecnai F30 ST (D948) TEM:

1. 4022 268 02112: Emitter Low drift Mono:

This module is used in FEI, FEG transmission electron microscopy, in electron microscopes, a field emission gun is used to produce an electron beam that is smaller in diameter, more coherent and with up to three orders of magnitude greater current density or brightness that can be achieved with conventional thermionic emitters such as tungsten or lanthanum hexaboride (LaB6)-tipped filaments. The result in both scanning and transmission electron microscopy is significantly improved signal-to noise ratio and spatial resolution, and greatly increased emitter module is fixed inside the gun assembly and supply will be connected to it, electrons emitted from this module will be accelerated towards the specimen by applying the acceleration voltage to the complete assembly.

2. 5322 695 16006: P.M. DIAPHR.MECH.7 Pos. :

Mechanical assembly is used to define the position of the aperture with respect to below number. X axis and Y axis position is defined by two rotating screw. Top screw is adjusting Y axis and side screw is for X axis adjustment.

3. 5322 530 54032: O-ring Viton 1.78x5.28:

This "O" ring is used for preventing Vacuum Leakage, it is made of Rubber.

4. 5322 138 10075: ALKALINE BATTERY 22,5V

It is 22.05 Volts alkaline battery used for screen current amplifier board in TEM. This helps to read screen current of beam falling on screen.