

Specifications for Trinocular Inverted Research Microscope for bright Field and Phase contrast with Photography System (Make: Carl Zeiss, Model: Primo Vert) to be purchased from the DSTBT, Govt. of WB sponsored Project entitled ‘Biosynthesis of Nanoparticles as Therapeutic Agent Using Mangroves and Medicinal Plants Against Drug Sensitive and Drug Resistant Clinical Isolates of Indian Kala-Azar’

1. The instrument should be suitable for Bright field and Phase contrast image analysis.
2. The microscope should have automatic illumination shut off facility at least 15 minutes to increase the lamp life and longevity.
3. Stand should have both side inbuilt live LED as intensity indicator & ensure lamp life longevity.
4. The microscope having trinocular port for attachment with 0.5X to 0.63X relay lens attached with trinocular head.
5. Specimen Stage should be large at least 200 mm x 230 mm to accommodate different samples Viz., large tissue culture bottles, petri dishes, microtiterplates and culture flasks.
6. The eyepiece tube should be trinocular with 45° inclination angle F.O.V.20/22MM.
7. The eyepiece lens with both side diopter adjustments F.O.V.20/22MM.
8. Complete with bright field and phase contrast objective 10x ph, 20x ph, 40x ph.
9. Optical system should be infinite.
10. Complete with both 6V/30 watt halogen lamp and white light LED illuminator with Lamp life of at least 60,000hrs together with interference green filter, blue filter.
11. Coaxial coarse and fine adjustment, for coarse tightness adjustment.
12. Condenser working distance of NA 0.4, WD 53mm with filter slider and phase slider. Without condenser WD 187mm.
13. Camera resolution and frame rate should be 47 fps for fast moving image and exposure should be 100 micros to 4s, camera sensor 1/2”, pixel size should be 2.2µm X2.2 µm, should be 5.0MP or above,
14. It should be complete with image analysis software for measurements, text annotation, color adjustment etc.
15. The Microscopes, Camera and imaging software must be from same manufacturer for best compatibility.

CHEMICAL COMPANY:-

1. Hi-Media 2. Sigma Aldrich 3. SRL 4. Gene-I 5. Merck 6. Merck-millipore 7. Lonza 8. BD Bioscience 9. Invitrogen 10. Molecular Probes 11. Qualigen 12. G-Bioscience 12. Applied Biosystems 13. QIAmp 14. CDH 15. Gibco

GLASSWARES & PLASTICWARES:

1. Tarson, 2. Labware, 3. Millex, 4. Dispovan, 5. Millipore, 6. Schott-duran, 7. Borosil, 8. Riviera, 9. Ependorf, 10. Qiagen, 11. Bluestar, 12. Hi-Media