



CHRISTOPHER JAMES GENERAL CONTRACTORS

CCTV • Service & Maintenance • Garden Maintenance • Warden Call Pendant Alarms • Cleaning
Building Maintenance • Intruder Alarms • Access Control • Home Adaptations - Elderly/Disabled

Electrical Test

Electrical tests

Electrical testing of portable equipment will involve the following:

- (i) Earth bond continuity tests
- (ii) Insulation resistance testing
- (iii) Functional checks

(a) Earth Bond Test (Class 1 equipment only):

Readings should show less than $0.1 + R$ Ohms (where R is the resistance of the lead)

Tested at a current of 1.5 times the rating of the fuse and no greater than 25A for a period of between 5 and 20 seconds or with a short-circuit test current within the range 20mA to 200mA.

(b) Insulation Resistance Test:

The applied test voltage should be approximately 500 Vdc

Class 1 heating equipment < 3kW 0.3M Ohms

Class 1 All other equipment 1M Ohms

Class 2 Equipment 2M Ohms

Class 3 Equipment 250k Ohms

(c) Optional Tests:

Flash Test: No flashover or breakdown shall occur

Operation/Load test: Compare reading with stated details on nameplate

Earth leakage test:

Class 1 Handheld Appliances 0.75mA

Other Class 1 Appliances 3.5mA

Class 2 Appliances 0.25mA

