

**Specification-cum-Compliance table for
Potentiostat/Galvanostat System that is compatible with and meeting the
specifications of the existing Solartron 1287A system**

NOTE: For each specification, please enter “YES” or “NO” in the second column of this table. If a cell in the second column is left blank, then it will be assumed that the quotation does not comply with the respective specification/requirement. Provide catalogues, data sheets and/or other documentation to support the compliance of your equipment to the given specifications.

Required Specification	Can the quoted system meet the required specification? [YES / NO]	REMARKS (If the answer in the 2nd column is “NO”, then provide the available specifications and other remarks etc.)
1. Is the proposed system compatible with and meeting the specifications of the existing Solartron Model 1287A system		
a) Cell connections: 2-, 3-, and 4-terminal, all floating		
b) Simultaneous measurement of current and voltage will be required		
c) DC sweep/scan rate (analog): 0.0001 Volts/seconds or less to 100 Volts/seconds or more		
d) Current range: 200nA or less to 2A or more		
e) Applied voltage: 14 Volts or more		
f) Compliance voltage: 25 Volts or more		
g) Both IR compensation and Feedback method should be available for compensating the resistance of electrolytic solution (say, concrete)		
h) Impedance frequency: from 10 μ Hz or less to 1 MHz or more		
i) LCD display with a minimum 5.5 digits resolution/accuracy		
j) Power supply: ~220 Volts AC; 5 Amps		
k) Ambient temperature conditions: from 0 to 50°C		
l) A user-friendly, windows based, software compatible with the supplied instrument to perform at least the following tests: (1) Potentiodynamic Polarization tests (i.e., Cyclic Voltammetry, Linear Polarization Resistance, and Tafel Plots with the options for user-defined scan rates and start and end points [or vertex points] for the scans), (2) Electrochemical Noise tests, and (3) Electrochemical Impedance Spectroscopy (EIS) tests. The software should be able to perform various curve fitting procedures on the user-defined portion of the test data and then calculate the corrosion rates and Tafel slopes. Also, superimposing plots from multiple tests must be possible within the software.		
2. Is the proposed instrument compatible with the existing Solartron Model 1260 instrument		
3. Data acquisition system (including One Dell/HP desktop computer with a compatible operating system (XP or Windows 7), 4 GB RAM, and 500 GB hard disk must be provided, GPIB IEEE 488 cable, card, etc.)		