NPTEL Video Course - Chemistry and Biochemistry - NOC:Electrochemical Impedance Spectroscopy

Subject Co-ordinator - Dr. S. Ramanathan

Co-ordinating Institute - IIT - Madras

Sub-Titles - Available / Unavailable | MP3 Audio Lectures - Available / Unavailable

Lecture 30 - Challenges in RMA
Lecture 31 - Patterns Reported in Experiments
Lecture 32 - Warburg part - 1
Lecture 33 - Warburg part - 2
Lecture 34 - Warburg part - 3
Lecture 35 - Bounded Warburg
Lecture 36 - CPE
Lecture 37 - Porous electrodes
Lecture 38 - Films, PDM
Lecture 39 - PDM
Lecture 40 - Applications
Lecture 41 - NLEIS. Introduction and mathematical background
Lecture 42 - Electron Transfer reaction
Lecture 43 - Two step reaction
Lecture 44 - Two step reaction (Continued...)
Lecture 45 - Rt and Rp estimation
Lecture 46 - Galvanostatic simulations
Lecture 47 - Instabilities
Lecture 48 - Solution resistance effects
Lecture 49 - Detection on nonlinearities using KKT
Lecture 50 - Frumkin and Temkin isotherms
Lecture 51 - NLEIS Experimental aspects. FFT, PSD, THD
Lecture 52 - Application - other techniques HA, EFM