## **Table of Contents**

Virtual Instrument for Determining Rate Constant of Second-Order Reaction by pX Based on LabVIEW 8.0

Electrochemical Behavior of Titanium and Its Alloys as Dental Implants in Normal Saline

Electron-Collision-Induced Dissociative Ionization Cross Sections for Silane

Spatial Heterogeneity and Imperfect Mixing in Chemical Reactions: Visualization of Density-Driven Pattern Formation

Fischer-Tropsch Synthesis Over Iron Manganese Catalysts: Effect of Preparation and Operating Conditions on Catalyst Performance

Use of Viscosity to Probe the Interaction of Anionic Surfactants with a Coagulant Protein from Moringa oleifera Seeds

The Cold Contact Method as a Simple Drug Interaction Detection System

The Effect of Tb and Sm Ions on the Photochromic Behavior of Two Spiropyrans of Benzoxazine Series in Solution

Hydriding Reaction of LaNi<sub>5</sub>: Correlations between Thermodynamic States and Sorption Kinetics during Activation

Hollow Disc and Sphere-Shaped Particles from Red Blood Cell Templates

Ultrasoft and High Magnetic Moment CoFe Films Directly Electrodeposited from a B-Reducer Contained Solution

Determination of Differential Enthalpy and Isotherm by Adsorption Calorimetry

Comparison of the Molecular Dynamics of C70 in the Solid and Liquid Phases

Caustic-Side Solvent Extraction Chemical and Physical Properties: Equilibrium Modeling of Distribution Behavior

Physical Characterization of RX-55-AE-5: A Formulation of 97.5 % 2,6-Diamino-3,5-

Dinitropyrazine-1-Oxide (LLM-105) and 2.5% Viton A

Ballistic Protons and Microwave-Induced Water Solitons in Bioenergetic Transformations Surface Photochemistry: Benzophenone as a Probe for the Study of Modified Cellulose Fibres Study of Polymer Material Aging by Laser Mass Spectrometry, UV-Visible Spectroscopy, and Environmental Scanning Electron Microscopy

Organic Analysis of Peridotite Rocks from the Ashadze and Logatchev Hydrothermal Sites The Study of In¿uence of the Teslar Technology on Aqueous Solution of Some Biomolecules Kinetics and Mechanism of Paracetamol Oxidation by Chromium(VI) in Absence and Presence of Manganese(II) and Sodium dodecyl Sulphate

Theoretical Study of Sequence Selectivity and Preferred Binding Mode of Psoralen with DNA Fast Drug Release Using Rotational Motion of Magnetic Gel Beads

Oxidation of Quercetin by Myeloperoxidase

Reversible Control of Primary and Secondary Self-Assembly of Poly(4-allyloxystyrene)-Block-Polystyrene

Pt/TiO<sub>2</sub> Coupled with Water-Splitting Catalyst for Organic Pollutant Photodegradation: Insight into the Primary Reaction Mechanism

Room-Temperature Growth of SiC Thin Films by Dual-Ion-Beam Sputtering Deposition Homogenization of Mutually Immiscible Polymers Using Nanoscale Effects: A Theoretical Study

Index