

1990, No 5

CONTENTS

Electrodynamics of Electric Power Devices

Pukhov G.E. Possible Generalization of the Classical Method for Calculation

of Transition Processes in the Electric Chains _____
_____ 3

Batygin Yu., V., Gorkin L.D., Legeza A.V., Reshetnikov V.V., Khlmenko L.T. Experimental
Studies

in Potentialities of Magnetic-Pulse Method For Deformation of Thin Metal
Plates _____ 15

Burdak A.P., Reztsov V.F., Khadzhinov A.L. Peculiarities of Space-Time Distribution of Electric

Field in One- and Two-Layer Nonideal
Dielectrics_____ 20

Gorislavets Yu.M., Erkenov N.Kh. Calculation of Electromagnetic Pressure in the Channel

of MHD-Granulator with External Magnetic Field_____ 25

Bedyukh A.R., Kotenev F.A., Ladikova-Roeva I.F., Levchenko V.I., Parubocha T.V. Heating

of a System of Moving Cylindrical Semiconductors in a Plane Inductor of Special Construction_
_____ 30

Bolyukh V.F., Danko V.G. Work of Cryoresistive Excitation Winding Under

Short-Time
Conditions_____ 36

Bobrov Yu.K., Matveev A.A., Fedotov I.P. Hydrodynamic Parameters of Pulse Arc

Discharge in
Water_____ 41

Boldov B.A., Kamaletdinov A.Z. Study of Electromagnetic Velocity Transducer of Cylindrical

Shape with Half-Spherical
Fairing_____48

Transformation of Electric Power Parameters

Pivnyak G.G., Berkovich E.I., Luskind Yu.I., Magidson N.V., Orel A.A. Method to Form Equation
for the Gate Circuit When Changing Its Structure_____53

Zhemerov G.G., Kolyandr I.I., Petrik E.B. Compensated Immediate Frequency Converter_____58

Pavlovsky V.A. Network Noise Suppressing Filter as a Source of Network Noises_____65

Electromechanical Energy Conversion

Lishchenko A.I. Problems of Autononous Power Engineering and Possible Ways of Their
Solution _____70

Volkov A.V., Rogaleva T.I. Study of Starting Regime of Asynchronous Motor under Power Supply

from the Autonomous Current
Invertor _____ 77

Shnaider A.G., Figman M.M. Transversal Stabilization of the Secondary Element of Linear

Motor-Bearing _____ 83

Electric Power Systems and Plants

Mayer V.Ya., Kladko S.P., Zeniya. Methods and Algorithm to Calculate Harmonic Components

of Asymmetric Parameters of Electric Energy When Determining Indices of Its Quality _____
88

Electrical and Magnetic Measurements

| | |
|---|----|
| <i>Grinevich F.B., Monastyrsky Z.Ya., Savolyuk A.M.</i> Correction of Errors from Vertical Gradient of Dielectric Constant of Medium in'the Capacity Self-Compensated Level Ganges | 93 |
|---|----|

| | |
|---|----|
| <i>Rudenko N.A.</i> Analysis of Dynamic Characteristics of the Analyser for Symmetric Components Harmonics | 99 |
|---|----|

Brief Notes

| | |
|--|-----|
| <i>Pobyvanets I. P., Yurchenko E. A., Fartushok I. M.</i> Energetic Sense of the Second Order Linear Differential Equations with Constant Coefficient | 107 |
|--|-----|

Scientific and Technical Information

| | |
|--|--|
| <i>Shevchenko E.V.</i> Antomatic Control and Regulation Device for Nontraditional Sources of | |
|--|--|

Electric Energy «AVTOSHCHIT»

111

Suchik V.E. Complex of Programs of Multicriterial Choice of Design «VYBOR-A»

111

Renin A.A. High Voltage Sources with Low Power
(IVM)

110

Zhuikov V.Ya. Current Source of Power Supply for Laser with Sypphire Pumping Lamp

92