

1996 □ 2

CONTENTS

Electrodynamics of electrical power devices

Volokhov S.A., Dobrodeev P.N., Meva L.F., Kildishev A.V. Space harmonic analysis of external magnetic

field of industrial entity _____
_____ 3

Bondina N.N., Mikhailov V.M., Rainin V.E. Electric current distribution and contraction resistance in

conductive plate with two lateral
cut-outs _____ 9

Rybalko A.V., Grichuk D.M., Postolaki N.A. On the correlation between electrical energy parameters of pulse and mass of metal surfaces an increase in cathode in electric spark

alloying_____ 13

Conversion of electric energy parameters

Sokol E.F., Shipillo V.P. Formation of finite duration processes from integral mean of output coordinate_____ 17

Gohibev K.F. Method of calculation filters for pulse alternative voltage converters_____ 21

Fedii V.S. Energy storage in a capacitor of series LC-circuit being fed from alternative voltage source_____ 25

Bondartnkb V.M., Abidov S.T., Kashpirovskii O.I., Tsesliv O. V. Calculation of rectifier circuits by

numerical methods based on rational franction approximation_____ 30

Boiko V.S., Boiko V.V., PotiazhehkoIA., Iurchenko N.N. Determination of the conditions for diode

compensated rectifier transition going to the reoperation mode of rectifying elements_____ 35

Gorbachev M.N. The peculiarities of the calculation of power of reactive elements for compensated

controlled bridge rectifier considered as a current source_____ 39

Shidlovskaiia NA. Influence of nonlinear elements on the parameters of two-ports_____ 46

Electromechanical energy conversion

Gentkovski Z. Transistor excited induction generator in the system of guaranteed power supply_____ 49

Naumov V.F. Application of stability region boundary to the diagnostics of the systems meant for

automatic control excitation of power generator_____ 55

Electrical power systems and installations

Butkevich A.F., Kirilenko A.V., Levits MV-G., All-Azzy A.N. Subdivision of the complex electrical circuits

into subcircuits according to given
criteria _____ 59

Bekbudov RS. On the synthesis of multicircuit positional systems with low-damped final

control element

63

Electrical and magnetic measurements

Dunets B. V. Classification and outlook of application of measuring functional converters

67

Kaganov Z.K. Determination of the complex parameters of one-and two-ports _____
_____ 70

Scientific and technical information

Zatiagan A.V., Kozhuchko G.M. Light in the
Ukraine _____
75

