

Table of Contents

Statistical Analysis Of Spiral Dynamic Domains Spatial And Temporal Characteristics During Self-Organization Process In Iron Garnets Multidomain Magnetic Films

L.Y. Agafonov, P.I. Gerevenkov, D.S. Mekhonoshin, L.A. Pamyatnykh
Pages 1-4, <http://doi.org/10.18502/kms.v1i1.553>

Features of Magnetocaloric Effect in Er(Co-Fe)₂ Laves Phases

M.S. Anikin, E.N. Tarasov, N.V. Kudrevatykh, M.A. Semkin, A.S. Volegov,
A.A. Inishev, A.V. Zinin
Pages 5-10, <http://doi.org/10.18502/kms.v1i1.554>

Elastomagneto-resistive Properties of Films of 3d-Metals Alloys

G. Balymov, E.V. Kudyukov, N.A. Kulesh, V.N. Lepalovskij, V.O. Vas'kovskiy
Pages 11-16, <http://doi.org/10.18502/kms.v1i1.555>

Numerical And Experimental Study Of Multi-Point Forming Of Thick Double-Curvature Plates From Aluminum Alloy 7075

S. Belykh, A. Krivenok, K. Bormotin, A. Stankevich, R. Krupskiy, V. Mishagin,
A. Burenin
Pages 17-23, <http://doi.org/10.18502/kms.v1i1.556>

Analysis Of Surface Orange Peel Of Automotive Aluminum Alloy Pipe Using Electron Backscatter Diffraction (EBSD)

D.Y. Chao, W.Z. Shao, J.T. Jiang, L. Zhen
Pages 24-30, <http://doi.org/10.18502/kms.v1i1.557>

Combined Process For Producing Continuously Cast And Deformed Billets From Technical Copper

V.V. Chernomas, S.N. Khimukhin, T.S. Khimukhina

Pages 31-35, <http://doi.org/10.18502/kms.v1i1.558>

Characteristics and Sensing Properties of the $\text{La}_{1-x}\text{Nd}_x\text{Co}_{0.3}\text{Fe}_{0.7}\text{O}_3$ System for CO Gas Sensors

J.C. Ding, Z.P. Wu, H.Y. Li, Z.X. Cai, X.X. Wang, X. Guo

Pages 36-40, <http://doi.org/10.18502/kms.v1i1.559>

Synthesis In Supercritical Ammonia And Characterization Of Nanostructured Nickel Oxinitride

K.J. Ding, M.Yu. Semenov

Pages 41-45, <http://doi.org/10.18502/kms.v1i1.560>

Formation and Optical Properties of BaSi_2 Films on Si (111) – a Promising Nanomaterial for Solar Cells

V.L. Dubov, D.V. Fomin, K.N. Galkin, N.G. Galkin

Pages 46-50, <http://doi.org/10.18502/kms.v1i1.561>

Components Influence On Dielectric Properties Of Ferroelectric Composite Materials

O.V. Efimova, E.V. Stukova, E.Yu. Koroleva

Pages 51-56, <http://doi.org/10.18502/kms.v1i1.562>

Dielectric Permittivity Enhancement By Charged Domain Walls Formation In Stoichiometric Lithium Niobate

A.A. Esin, A.R. Akhmatkhanov, V.Ya. Shur

Pages 57-63, <http://doi.org/10.18502/kms.v1i1.563>

Strontium And Iron Substituted Lanthanum Nickelate As Cathode Material In Solid Oxide Fuel Cells

A.R. Gilev, E.A. Kiselev, V.A. Cherepanov

Pages 64-70, <http://doi.org/10.18502/kms.v1i1.564>

Development Of A Cathode Designing Method To Avoid Electrodes' Interference During Blisk Electrochemical Machining

J.C. Zhang, Z.Y. Xu, W.F. Su, D. Zhu

Pages 71-77, <http://doi.org/10.18502/kms.v1i1.565>

Physical And Mechanical Properties Of Sea Ice In Bending

S.V. Koshkin, N.A. Taranukha

Pages 78-83, <http://doi.org/10.18502/kms.v1i1.566>

Influence of Magnetic Prehistory on the Exchange Bias in Fe₂₀Ni₈₀/FeMn/Fe₂₀Ni₈₀ Films

T.V. Kulikova, E.A. Stepanova, V.O. Vas'kovskiy

Pages 84-89, <http://doi.org/10.18502/kms.v1i1.567>

Benefits And Prospects Of Laser Welding Application In Vacuum

I.Yu. Letyagin, D.N. Trushnikov, V.Ya. Belenkiy

Pages 90-94, <http://doi.org/10.18502/kms.v1i1.568>

Preparation and Properties of Boron-Based Nano-B/CuO Thermite

T. Liu, X. Chen, A.J. Han, M.Q. Ye, S.T. Zhang

Pages 95-102, <http://doi.org/10.18502/kms.v1i1.569>

Electrical Properties of Tungstates Ln₂(WO₄)₃ (Ln – Gd, Ho)

D.A. Lopatin, A.F. Guseva, N.N. Pestereva, E.L. Vostrotina, L.I. Baldina

Pages 103-108, <http://doi.org/10.18502/kms.v1i1.570>

Heat Treatment Effect On Magnetic Properties Of Finemet-Type Films

E.A. Mikhailitsyna, V.A. Kataev, V.N. Lepalovskij, A. Larrañaga, A.S. Volegov

Pages 109-114, <http://doi.org/10.18502/kms.v1i1.571>

Polarization reversal by tip of scanning probe microscope in SBN

E.A. Neradovskaya, M.M. Neradovskiy, V.V. Fedorovyh, A.P. Turygin, V.Ya. Shur, A.L. Kholkin, I.L. Ivleva

Pages 115-121, <http://doi.org/10.18502/kms.v1i1.572>

Polymer Nanocomposites Exploited Under The Arctic Conditions

A.A. Okhlopkova, L.A. Nikiforov, T.A. Okhlopkova, R.V. Borisova

Pages 122-128, <http://doi.org/10.18502/kms.v1i1.573>

Problems Of Operation Of Elastomer Materials In The Arctic Region

N.N. Petrova, V.V. Portnyagina, V.V. Mukhin, E.S. Kyzmina

Pages 129-134, <http://doi.org/10.18502/kms.v1i1.574>

Magnetic Structures of Some Multiferroics

M.A. Semkin, N.V. Urusova, D.G. Kellerman, A.P. Nosov, S. Lee, A.N. Pirogov

Pages 135-141, <http://doi.org/10.18502/kms.v1i1.575>

Effect Of Annealing On The Behavior Of Oxygen Dissolved In Germanium And Optical Properties Of Single Crystals

A.F. Shimanskii, O.I. Podkopaev, T.O. Pavluk, S.A. Kopytkova,

A. N. Gorodishcheva, R.A. Filatov

Pages 142-148, <http://doi.org/10.18502/kms.v1i1.576>

Wear-Resistant Polymer Composites Based On Polytetrafluoroethylene And Layered Silicates

S.A. Sleptsova, Yu.V. Kapitonova, N.N. Lazareva, M.M. Makarov

Pages 149-154, <http://doi.org/10.18502/kms.v1i1.577>

Influence of Carbon Fibers on Structure and Properties of Polytetrafluoroethylene

A.A. Okhlopkova, T.S. Struchkova, A.P. Vasilev, A.G. Alekseev, L.A. Nikiforov
Pages 155-160, <http://doi.org/10.18502/kms.v1i1.578>

Forecasting Durability and Cyclic Strength of Aluminum Alloy AA2219 Using Fractal Analysis of Acoustic Emission

O.E. Sysoev, D.G. Kolykhalov, E.A. Kuznetsov, S.V. Belykh
Pages 161-167, <http://doi.org/10.18502/kms.v1i1.579>

Enhanced Strength and Ductility of AZ80 Magnesium Alloys by Spray Forming and ECAP Techniques

L.L. Tang, Y.H. Zhao, R.K. Islamgaliev, R.Z. Valiev
Pages 168-171, <http://doi.org/10.18502/kms.v1i1.580>

1D NiO-SnO₂ Heterojunction Nanofibers as Acetone Sensor

W. Tang, J. Wang
Pages 172-176, <http://doi.org/10.18502/kms.v1i1.581>

Electromechanical Measurements Of Gd-Doped Ceria Thin Films By Laser Interferometry

A.D. Ushakov, N. Yavo, E. Mishuk, I. Lubomirsky, V.Ya. Shur, A.L. Kholkin
Pages 177-182, <http://doi.org/10.18502/kms.v1i1.582>

Controlling Surface Potential of Graphene Using dc Electric Field

R. Vidyasagar, B. Camargo, E. Pelegova, K. Romanyuk, A.L. Kholkin
Pages 183-189, <http://doi.org/10.18502/kms.v1i1.583>

**Free Vibration Analysis Of The Moderately Thick Laminated Composite
Rectangular Plate On Two-Parameter Elastic Foundation With Elastic
Boundary Conditions**

H. Zhang, D.Y. Shi, Q.S. Wang

Pages 190-193, <http://doi.org/10.18502/kms.v1i1.584>