
CONTENTS

**THERMAL PHYSICS
AND THERMOLOGY**

Andrey T. Tyulkov,
Denis R. Gilmiev

**Modeling of Filtration
in the Development
of Under-Gas Area Using the Method
of Screening Gas Cap by Injecting
the Polymer Solution.....**10

Maxim V. Stolpovskii,
Ekaterina P. Scheglova

**On Heating the Porous Media
Under Gas Hydrates Formation.....**23

Mikhail N. Chekardovskiy,
Pavel Yu. Mikhailov,
Igor Yu. Shalagin

**Parameters of Heat Transfer
in the Exterior Wall Structures
of Frame-Panel Type.....**36

**FLUID, PLAZMA,
AND GAS MECHANICS**

Aleksandr B. Shabarov,
Aleksandr V. Shatalov

**Pressure Drops in Water-Oil
Mixture Flow in Porous Channels.....**50

Sergey P. Rodionov,
Andrei Yu. Botalov,
Dmitry Yu. Legostaev

**Simulation of Two-Phase Filtration
Considering the Effect
of the Periodic Load.....**73

Vadim V. Tarasov

**Calculation of the Ideal Gas
Outflow Time from the Reservoir
of Constant Volume
into the Environment with a Constant
Pressure at an Adiabatic Process.....**84

**MATHEMATICAL MODELING,
NUMERICAL METHODS
AND SOFTWARE SYSTEMS.
INFORMATION TECHNOLOGIES**

Andrey L. Litnevsky

**The Approximation
of the Time Dependence
of Excited Nuclei Fission Rate
on the Smooth Function.....**96

Amir A. Gubaidullin,
Dmitriy Ye. Igoshin,
Nadezhda A. Khromova

**The Generalization
of the Kozeny Approach
to Determining the Permeability
of the Model Porous Media
Made of Solid Spherical Segments**105

Kirill Yu. Samsonov,
Aleksandr P. Shevelev

**Method For Determining
the Technical Parameters
of Water Restrictions**121