## PHYSICS-USPEKHI

English edition of *Uspekhi Fizicheskikh Nauk* July 1998 Volume 168 Number 7

## **Contents**

Volume 41 Number 7	REVIEWS OF TOPICAL PROBLEMS	
1998 Pages 627 – 734	Introduction to string dualities S G Gukov	627
	An exactly solvable model for first- and second-order transitions L I Klushin, A M Skvortsov, A A Gorbunov	639
	Electron attachment to free and bound molecules E Illenberger, B M Smirnov	651
	Natural and man-made low-frequency magnetic fields as a potential health hazard	687
	N G Ptitsyna, G Villoresi, L I Dorman, N Iucci, M I Tyasto	
	CONFERENCES AND SYMPOSIA	
	Scientific session of the Division of General Physics and Astronomy of the Russian Academy of Sciences (1 October 1997)	
	Electron spectroscopy of small radiation doses V A Trapeznikov	711
	Scientific session of the Division of General Physics and Astronomy of the Russian Academy of Sciences (26 November 1997)	
	Optics in the diffraction limit: principles, results, and problems G S Zhdanov, M N Libenson, G A Martsinovskii	719
	Coulomb gap and metal-insulator transitions in doped semiconductors A G Zabrodskii	722

Scientific session of the Division of General Physics and Astronomy of the Russian Academy of Sciences (24 December 1997)	
Superwideband communication systems: characteristics and applications A E Reznikov	727
Physics news on the Internet Yu N Eroshenko	730
PERSONALIA	
Boris Valerianovich Chirikov (on his seventieth birthday) V E Balakin, L M Barkov, N S Dikanskii, G I Dimov, É P Kruglyakov, G N Kulipanov, I N Meshkov, V V Parkhomchuk, V A Sidorov, A N Skrinskii	731
Yurii Moiseevich Kagan (on his seventieth birthday) AF Andreev, AM Afanas'ev, ST Belyaev, EP Velikhov, VL Ginzburg, AM Dykhne, BB Kadomtsev, LA Maksimov, AYu Rumyantsev, NA Chernoplekov	733

Introduction to string dualities S G Gukov	627
An exactly solvable model for first- and second order transitions L I Klushin, A M Skvortsov, A A Gorbunov	639
Electron attachment to free and bound molecules E Illenberger, B M Smirnov	651
Natural and technogenic low-frequency magnetic fields as a potential health hazard N G Ptitsyna, G Villoresi, L I Dorman, N Iucci, M I Tyasto	687
Scientific session of the Division of General Physics and Astronomy of the Russian Academy of Sciences (1 October 1997): contribution by V A Trapeznikov	711
Scientific session of the Division of General Physics and Astronomy of the Russian Academy of Sciences (26 November 1997): contributions by G S Zhdanov et al., A G Zabrodskii	719
Scientific session of the Division of General Physics and Astronomy of the Russian Academy of Sciences (24 December 1997): contribution by A E Reznikov	727
Physics news on the Internet Yu N Eroshenko	730
Boris Valerianovich Chirikov (on his seventieth birthday)	731
Yurii Moiseevich Kagan (on his seventieth birthday)	733

 $\diamond$   $\diamond$   $\diamond$ 

## In the next issue

Thallium-doped lead chalcogenides: investigation methods and properties S A Nemov, Yu I Ravich

Angular divergence and spatial coherence of X-ray laser radiation P D Gasparyan, F A Starikov, A N Starostin

Wave phase conjugation of ultrasonic beams

A P Brysev, L M Krutyanskii, V L Preobrazhenskii

Flare red dwarf stars: news from Crimea R E Gershberg

On the role of dust in fusion devices

V N Tsytovich, J Winter

Physics news on the Internet

Inverse Compton scattering on BBR in high energy physics and gamma (MeV-TeV) astrophysics

D Fargion, A Salis

Conferences and symposia

Personalia