Contents

Vol. 64, No. 12, 2001

Simultaneous English language translation of the journal is available from MAIK "Nauka/Interperiodica"(Russia).
Distributed worldwide by the American Institute of Physics. *Physics of Atomic Nuclei* ISSN 1063-7788.

SYMPOSIUM ON QUANTUM GROUPS

Monodromy Representations of the Braid Group
I. T. Todorov and L. K. Hadjiivanov* 2059

Twist of Lie Algebras by a Rank-3 Subalgebra
N. Aizawa 2069

$3nj$ Coefficients of $u_q(2)$ and Multiple Basic Hypergeometric Series
S. Ališauskas 2074

On a General Analytic Formula for $U_q(su(3))$ Clebsch–Gordan Coefficients
R. M. Asherova, Yu. F. Smirnov, and V. N. Tolstoy 2080

Fourier–Gauss Transforms of Bilinear Generating Functions for the Continuous q-Hermite Polynomials
M. K. Atakishiyeva and N. M. Atakishiyev 2086

The $su_q(2)$ Algebra in the Off-Diagonal Basis and Applications to Quantum Optics
A. Ballesteros and S. M. Chumakov 2093

Exterior Calculus with $d^3 = 0$ on Two-Dimensional Quantum Plane
N. Bazunova 2097

Standard Complex for Quantum Lie Algebras
C. Burdik, A. P. Isaev, and O. V. Ogievetsky 2101

Induced Representations of Quantum Kinematical Algebras
O. Arratia and M. A. del Olmo 2105

Helicity Asymmetry of q-Plane Wave Solutions of q-Maxwell Equations
V. K. Dobrev, S. T. Petrov, and B. S. Zlatev 2110

Decoupling Braided Tensor Factors
G. Fiore, H. Steinacker, and J. Wess 2116

Possible Contractions of Quantum Orthogonal Groups
N. A. Gromov, I. V. Kostyakov, and V. V. Kuratov 2121

On Quantization of r Matrices for Belavin–Drinfeld Triples
A. P. Isaev and O. V. Ogievetsky 2126

On q-Laplace Operator and q-Harmonic Polynomials
N. Z. Iorgov and A. U. Klimyk 2131

* Underlined is presenter of the paper.

Star Products on Coadjoint Orbits
M. A. Lledó 2136

Noncommutative Parameters of Quantum Symmetries and Star Products
P. Kosiński, J. Lukierski, and P. Maślanka 2139

Poincaré–Lie Algebra and Noncommutative Differential Calculus
Z. Güven, Z. Can, R. Mir-Kasimov, and O. Oğuz 2143

Colored Extension of $GL_q(2)$ and Its Dual Algebra
D. Parashar 2146

Classification of Representations of the Algebra $U_q'(so_3)$ through Examples II
M. Havlíček, S. Pošta, and A. U. Klimyk 2151

Dynamical Cremmer–Gervais R Matrix
O. V. Ogievetsky and P. N. Pyatov 2156

Yangians and $\mathcal{W}$ Algebras
C. Briot and E. Ragoucy 2160

Quantum Algebra $U_q(2,1)$: q Analogs of the Gelfand–Graev Formulas
Yu. F. Smirnov and Yu. I. Kharitonov 2167

q-Power Function over q-Commuting Variables and Deformed XXX and XXZ Chains
S. M. Khoroshkin, A. A. Stolin, and V. N. Tolstoy 2173

Super-Drinfeldians and Super-Yangians of Lie Superalgebras of Type $A(n|m)$
V. N. Tolstoy 2179

SYMPOSIUM ON GROUP THEORY AND PATH INTEGRALS

Propagator for the Chebyshev q Object
A. Inomata, J. C. Kimball, and C. Pigorsch 2185

Dual Formulation of Gauge Theories and Confinement
D. Antonov and D. Ebert 2190

Geometric Derivation of Nonlinear Sigma Model for the $1D$ Antiferromagnet
E. A. Kochetov 2195

Reduction in Path Integrals on a Riemannian Manifold with Group Action
S. N. Storchak 2199

Method of Collective Degrees of Freedom in Spin-Coherent-State Path Integral
J. Shibata and S. Takagi 2206

Translationally Noninvariant Path Integral for Bose–Einstein Condensate
V. S. Yarunin 2212

Subject Index to Volume 64, 2001 2216

Author Index to Volume 64, 2001 2234