Prof. EMİNE AYŞE KARASU

Personal Information

Office Phone: <u>+90 312 210 5070</u> Fax Phone: <u>+90 312 210 5099</u>

Web: http://users.metu.edu.tr/akarasu/

International Researcher IDs

ScholarID: zqNd0JsAAAAJ ORCID: 0000-0002-3709-7761

Publons / Web Of Science ResearcherID: B-1642-2008

Yoksis Researcher ID: 164731

Education Information

Doctorate, Middle East Technical University, Faculty of Arts and Sciences, Department of Physics, Turkey 1983 - 1990 Postgraduate, Middle East Technical University, Faculty of Arts and Sciences, Department of Physics, Turkey 1980 - 1983 Undergraduate, Middle East Technical University, Faculty of Arts and Sciences, Department of Physics, Turkey 1975 - 1980

Research Areas

Mathematics, Physics

Academic Titles / Tasks

Professor, Middle East Technical University, Faculty of Arts and Sciences, Department of Physics, 2005 - Continues Associate Professor, Middle East Technical University, Faculty of Arts and Sciences, Department of Physics, 1997 - 2005 Assistant Professor, Middle East Technical University, Faculty of Arts and Sciences, Department of Physics, 1992 - 2002 Research Assistant PhD, Middle East Technical University, Faculty of Arts and Sciences, Department of Physics, 1990 - 1992

Research Assistant, Middle East Technical University, Faculty of Arts and Sciences, Department of Physics, 1980 - 1990

Advising Theses

KARASU E. A., Suggestion of a new model for newtonian thermal analysis of solidification, Doctorate, K.CAN(Student), 2013

KARASU E. A., Some properties and conserved quantities of the short pulse equation, Postgraduate, K.CAN(Student), 2008

KARASU E. A., Prolongation structures Bäcklund transformations and painlevé analysis of nonlinear evolution equations, Postgraduate, İ.YURDUŞEN(Student), 2004

KARASU E. A., Matrix quantum mechanics an dintegrable systems, Doctorate, Y.Pehlivan (Student), 2004

KARASU E. A., Prolongation structures, backlund transformations and painleve analysis of nonlinear evolution equations, Doctorate, İ.Yurduşen(Student), 2004

KARASU E. A., Karasu E., Kerr black holes and their generalizations, Doctorate, H.Cebeci(Student), 2003

KARASU E. A., Scherk-Schwarz reduction of effective string theories in even dimensions, Doctorate, A.Özer(Student), 2003

KARASU E. A., Painleve integrability test, Postgraduate, T.KILIÇ(Student), 2002

KARASU E. A., Use of lie symmetries in solving nonlinear ordinary differential equations, Postgraduate,

H.YILDIRIM(Student), 2001

KARASU E. A., Integrable systems of classical mechanics and lax tensors, Postgraduate, Ö.KAYA(Student), 2000

KARASU E. A., The Prolongation structures of nonlinear evolution equations, Postgraduate, İ.YURDUŞEN(Student), 1999

Published journal articles indexed by SCI, SSCI, and AHCI

I. A new integrable generalization of the Korteweg-de Vries equation

Karasu-Kalkanli A., KARASU A., Sakovich A., Sakovich S., TURHAN R.

JOURNAL OF MATHEMATICAL PHYSICS, vol.49, no.7, 2008 (SCI-Expanded)

II. Singularity analysis of spherical Kadomtsev-Petviashvili equation

Karasu-Kalkanli A., Sakovich S.

JOURNAL OF THE PHYSICAL SOCIETY OF JAPAN, vol.74, no.2, pp.505-507, 2005 (SCI-Expanded)

III. A strange recursion operator for a new integrable system of coupled Korteweg-de Vries equations Karasu A., Karasu A., Sakovich S.

ACTA APPLICANDAE MATHEMATICAE, vol.83, pp.85-94, 2004 (SCI-Expanded)

IV. Integrability of a nonautonomous coupled KdV system

Karasu A., Kilic T.

INTERNATIONAL JOURNAL OF MODERN PHYSICS C, vol.15, no.5, pp.609-617, 2004 (SCI-Expanded)

V. The Lie algebra sl(2,R) and so-called Kepler-Ermakov systems

Leach P., Karasu A.

JOURNAL OF NONLINEAR MATHEMATICAL PHYSICS, vol.11, no.2, pp.269-275, 2004 (SCI-Expanded)

VI. Integrability of Kersten-Krasil'shchik coupled KdV-mKdV equations: singularity analysis and Lax

Kalkanli A., Sakovich S., Yurdusen I.

JOURNAL OF MATHEMATICAL PHYSICS, vol.44, no.4, pp.1703-1708, 2003 (SCI-Expanded)

VII. On the Lie symmetries of Kepler-Ermakov systems

Karasu A., Yildirim H.

JOURNAL OF NONLINEAR MATHEMATICAL PHYSICS, vol.9, no.4, pp.475-482, 2002 (SCI-Expanded)

VIII. Prolongation algebra and Backlund transformations of Drinfeld-Sokolov system of equations Karasu A., Yurdusen I.

INTERNATIONAL JOURNAL OF MODERN PHYSICS A, vol.16, no.26, pp.4261-4269, 2001 (SCI-Expanded)

IX. On soliton solutions of nonlinear sigma models of symmetric spaces

Karasu A.

INTERNATIONAL JOURNAL OF MODERN PHYSICS A, vol.16, no.27, pp.4409-4427, 2001 (SCI-Expanded)

X. Backlund transformation and special solutions for the Drinfeld-Sokolov-Satsuma-Hirota system of coupled equations

Karasu A., Sakovich S.

JOURNAL OF PHYSICS A-MATHEMATICAL AND GENERAL, vol.34, no.36, pp.7355-7358, 2001 (SCI-Expanded)

XI. Integrability of a generalized Ito system: The Painleve test

Karasu-Kalkanli A., Karasu A., Sakovich S.

JOURNAL OF THE PHYSICAL SOCIETY OF JAPAN, vol.70, no.5, pp.1165-1166, 2001 (SCI-Expanded)

XII. About geometrization of the dynamics

Baleanu D., Karasu A., Makhaldiani N.

CZECHOSLOVAK JOURNAL OF PHYSICS, vol.50, no.1, pp.17-22, 2000 (SCI-Expanded)

XIII. Lax tensors, killing tensors and geometric duality

Baleanu D., Karasu A.

MODERN PHYSICS LETTERS A, vol.14, no.37, pp.2587-2594, 1999 (SCI-Expanded)

XIV. The Burgers-Hlavaty equation

Karasu A.

NUOVO CIMENTO DELLA SOCIETA ITALIANA DI FISICA B-GENERAL PHYSICS RELATIVITY ASTRONOMY AND MATHEMATICAL PHYSICS AND METHODS, vol.112, no.10, pp.1373-1380, 1997 (SCI-Expanded)

XV. Painleve classification of coupled Korteweg-de Vries systems

KARASU E. A.

JOURNAL OF MATHEMATICAL PHYSICS, vol.38, no.7, pp.3616-3622, 1997 (SCI-Expanded)

XVI. COLLIDING ABELIAN GAUGE PLANE-WAVES

GURSES M., KALKANLI A.

CLASSICAL AND QUANTUM GRAVITY, vol.6, no.4, 1989 (SCI-Expanded)

XVII. PROLONGATION STRUCTURE AND PAINLEVE PROPERTY OF THE GURSES-NUTKU EQUATIONS KALKANLI A.

INTERNATIONAL JOURNAL OF THEORETICAL PHYSICS, vol.26, no.11, pp.1085-1092, 1987 (SCI-Expanded)

Metrics

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