

CURRICULAM VITAE

Dr. Ajaya Kumar Singh
Professor of Chemistry
(DST-FIST Sponsored)
Govt. V. Y. T. PG. Autonomous College,
(College with Potential for Excellence)
Durg, Chhattisgarh, India

Personal Information

Birth date: January 4th, 1966

Nationality: Indian

Sex: Male

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Durg-490023, Chhattisgarh

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Educational Qualifications

B.Sc.: Physics, Chemistry, Maths: Gorakhpur University, Gorakhpur (UP)1986

M. Sc.: Chemistry: Poorvanchal University, Jaunpur (UP)1988

Ph. D: Chemistry: University of Allahabad, Allahabad (UP) 2002

Thesis topic – “Studies on kinetics and mechanism of some redox processes in solutions”

Academic- Achievements/Awards

- Qualified National Eligibility Test (**NET-JRF**) conducted by Joint Council of Scientific and Industrial Research-University Grant Commission (CSIR-UGC), New Delhi, India (June 1992).
- **Junior Research Fellowship** in Department of Chemistry, University of Allahabad, U.P., India. (From Feb.10, 1993 to July 18,1994)
- **Teacher’s Research Fellowship** in Department of Chemistry, University of Allahabad, U.P. (From March 17, 2000 to March 16, 2002) awarded by University .Grant Commission .New Delhi, India
- Undergraduate and Postgraduate teaching from July1994 till date (nearly 22years)

Research Project Completed

- University Grant Commission (UGC), New Delhi funded project entitled “Transition metal catalyzed oxidation kinetics of some biologically active / industrially important compounds” for the period of 2006-2008
 - **Studies on Some chemically deposited nanocrystalline Thin Films doped with Transition metal and rare earth metallic ions.**

Funded by UGC for 2011-2014 (Rs 12,93,800/)

- **Oxidative degradation of antibiotic/analgesic by Colloidal MnO₂ in micellar system**

Funded by CCOST for 2013-2015 (Rs.5,00,000)

Research Paper Published/accepted: 105 H-INDEX: 14, i-10: 27

Ph.D. supervision: Awarded- 10 Thesis submitted: One

Work in Progress: Five candidates

Area of Research:

Oxidation Kinetics and Catalysis, Micellar Catalysis, Homogeneous Catalysis, Synthesis and Characterization of Nano-crystalline Solid Thin films, Adsorption of heavy metal ions

Other Recognitions:

- Comfortable in handling & interpretation of data of AAS, FTIR, UV- Visible Spectrophotometer
- **Associate Editor**
Advances in Chemical Engineering and Science, Scientific Research Publishing, USA
- Member in the **Editorial Advisory Board** of the following Journals
 - (1) **Walailak Journal of Science and Technology(WJST),Thailand**
 - (2) **Research Journal of Pharmaceutical, Biological and Chemical Sciences, India**
 - (3) **Prime Journal of Microbiology, India**
 - (4) **Journal of Applied Chemistry, Hindawi Publishing Corporation, USA**
 - (5) **International Journal of Molecular Catalysis, Academic and Scientific Publishing**
 - (6) **American Journal of Nano Science and Nanotechnology (Science Publishing Group, USA)**
 - (7) **Journal of Catalyst and Catalysis (STM Journals, India)**
 - (8) **Trends in Chemical Engineering (STM Journals, INDIA)**
 - (9) **Austin Chemical Engineering (Austin Publishing Group)**
 - (10) **International Journal of Thermodynamics and Chemical Kinetics (Journals Pub, India)**
 - (11) **International Journal of Nanomaterials and Nanostructures (Journals Pub, India)**
 - (12) **International Journal of Green Chemistry (Journals Pub, India)**
 - (13) **Science Rise, Scientific International Journal, (Ukraine)**

- Affiliate Member of **IUPAC(2009-2010)**
- Life Member, **Indian Association of Chemistry Teachers**
- Life Member, **Luminescence Society of India(LM476)**
- Member, **American Nano Society**
- Life member, **Indian Chemical Society, Kolkata(LM-7219)**
- Life member, **Indian Science Congress Association (ISCA)**
- Life member of **Indian Society for Surface Science & Technology(ISSST),Kolkata**
- Life member of **Indian Council of Chemists (ICC),Agra (LF 1080)**
- life member of **Catalysis Society of India (CSI),Chennai**
- Life member of **Poorvanchal Academy of Sciences(PAS), Jaunpur**
- **Reviewed research papers submitted in the following Journals :**

Applied Physics A, **Springer**, Chemical Physics Letters, **Elsevier**, Materials Chemistry and Physics, **Elsevier**, Analytical Methods, **Royal Society of Chemistry**, Microchemical Journal, **Elsevier**, Ionics, **Springer**, Catalysis Letter, **Springer**, Journal of Environmental Chemical Engineering, **Elsevier**, Reactive and Functional Polymers, **Elsevier**, Journal of the Taiwan Institute of Chemical Engineers, **Elsevier**, Journal of Physical Organic Chemistry, **Wiley**, Optik - International Journal for Light and Electron Optics, **Elsevier**, Synthetic Communications, **Taylor & Francis**, Journal of Solution Chemistry, **Springer**, Colloid and Polymer Science, **Springer** Chemical Engineering Journal, **Elsevier**, Coloration Technology, **Wiley**, Journal of Medicinal Plants Research, **Academic Journals**, Bioremediation Journal, **Taylor & Francis**, International Journal of Thermo physics, **Springer**, African Journal of Food Science, **Academic Journals**, International Journal of Plant Physiology and Biochemistry, **Academic Journals**, Natural Product Research, **Taylor and Francis (UK)**, Chinese Medicine, **Scientific Research Publishing(USA)**, African Journal of Pure and Applied Chemistry, **Academic Journals**, Journal of Bioinformatics and Sequence Analysis (JBSA), **Academic Journals**, Journal of Petroleum and Gas Engineering, **Academic Journals**, **The Open catalysis Journal**, Bentham Publications, **ACADEMIA JOURNAL OF EDUCATIONAL RESEARCH**, Academia Publishing, UK

- Delivered an invited talk in “**35th Annual Conference of Bangladesh Chemical Society: Chemistry for Sustainable Development**” Organized by **Bangladesh Chemical Society, 07-09 December 2012.**
- Delivered invited talk “ **Synthesis, structural and optical Behavior of some chemically deposited nanocrystalline thin films**” at the Seminar organized by **Higher Education Enhancement Project** under the Joint collaboration of the

University Grants Commission of Bangladesh and the World Bank in the Department of Chemistry, University of Dhaka, Bangladesh, **10th December, 2012**

- Delivered an invited talk in “**All India Conference (AICON)-2012**” at **Chhatrapati Shivaji Institute of Technology (CSIT)**, Durg (C.G.) India, **20th January, 2012**.
- Presented research paper in “**1st International Conferences on “TAP SUN: The Sustainable Future”**”, organized by **Indo-German Nachkontakt Association (IGNA)**, **Hyderabad, India**, 25th-26th Nov. 2011,
- Presented research paper in “**XVI International Workshop on the Physics of Semiconductor Devices**”, organized by **Indian Institute of Technology, Kanpur, India**, 19th-22nd December, 2011.
- Presented research paper in “**National Seminar on Emerging Trends in Chemical Sciences**”, organized by Department of Chemistry, Kalyan PG College Bhilai Nagar (C.G.), India, 18th –19th November, 2011.

- **Presented paper in International Conference** Organized by **Indian Council of Chemists** at **Bangkok** on **11-15th June 2011**.
- **Delivered invited Lecture** at **Kathmandu Humboldt Club Nepal**, **Nov.15-18, 2010**
- **Presented a Oral paper** in **Bangladesh Chemical Congress 2008 (BCC2008)**, **Dhaka, Bangladesh** (Jan.31-Feb2,2009)
- **Delivered lecture** in **Chemical-Congress 2008**, organized by **Nepal Chemical Society**, **Kathmandu, Nepal** on **May, 23-25, 2008**
- **Presented a paper (Oral presentation)** at the *2nd Asia Symposium on Colloidal and Surface Sciences held in Jinan, Shandong University, China*, on **Oct.28-31, 2007**.
- **Chaired Session** in “National symposium on Fundamental and Analytical Aspects of Self organizing Systems” organized by Department of Chemistry, Kalyan Mahavidyalaya, Bhilai, India in collaboration with Indian Society for Surface Science & Technology (ISSST), Kolkata March 8-10, **2007**.
- **Chaired Session** in “5th Chhattisgarh Young Scientist Congress organized by Chhattisgarh Swami Vivekananda Technical University, Bhilai, Chhattisgarh, India (Feb 28 – March 1, **2007**).
- **Organized “National Science Day”** as organizing Secretary of **Chemical/Physical Science in our College, 28th Feb, 2016** (Theme- **Make in India: Science and Technology driven Innovation**)
- **Organized one Day Seminar “Ujale Bhavisya ki Or”** on **13 Feb, 2016**
- **Organized International Conference on “Recent Trends in Science and Engineering”** as Co-convener on **15-16 January, 2016**
- **Organized one day Seminar** on “**Green Chemistry**” as organizing Secretary on **30 Nov. 2015**

- Organized “National Science Day” as organizing Secretary of Chemical/Physical Science in our College, 28th Feb,2015(Theme- Science for Nation Building)
- Organized “National Science Day” as organizing Secretary of Chemical/Physical Science in our College, 28th Feb,2014 (*Theme-Fostering Scientific Temper*)
- Organized “National Science Day” as organizing Secretary, in the Department of Chemistry in our College, 28th Feb,2013(Theme- *Genetically Modified Crops and Food Security*)
- **ORCID ID :orcid.org/0000-0001-8180-7292**
- **<https://www.scopus.com/authid/detail.uri?authorId=55487558500>**
- **<https://scholar.google.co.in/citations?user=HjMc27oAAAAJ>**

List of Publications

International Journals

105. Novel glycine-functionalized magnetic nanoparticles entrapped calcium alginate beads for effective removal of lead

Microchemical Journal 130(2017) 168–178

Authors Name: Renu Verma, Anupama Asthana, **Ajaya Kumar Singh**, Surendra Prasad, Md. Abu Bin Hasan Susan

Impact factor of the Journal: 3.1

104. Hydrophilic ionic liquid-assisted control of the size and morphology of ZnO nanoparticles prepared by a chemical precipitation method

Royal Society of Chemistry Advances 6(2016) 92040-92047

Authors Name: Mousumi Akter, Shazia Sharmin Satter, **Ajaya Kumar Singh**, M. Muhibur Rahman, M. Yousuf A. Mollah, Md. Abu Bin Hasan Susan

Impact factor of the Journal: 3.2

103. Oxidative degradation of norfloxacin by water soluble colloidal MnO₂ in the presence of

cationic surfactant

Indian Journal of Chemistry:A 55A(2016)1059-1067

Authors Name: Ajaya Kumar Singh^{a,*}, Neelam Sen^a & Som Kumar Chatterjee^b

Impact factor of the Journal: 0.89

102. Silver Nanoparticle Entrapped Calcium-Alginate Beads for Fe(II) Removal via Adsorption
Macromol. Symp. 366 (2016)42–51

Authors Name: Anupama Asthana, Renu Verma, **Ajaya Kumar Singh**, Md. Abu Bin Hasan Susan, Rameshwar Adhikari

Impact factor of the Journal: 0.913

101. Degradation of naphthylazo anionic dye by Fenton and Fenton-like processes: A Comparative study with Fast sulphon black-F
Desalination and Water Treatment (In Press)

Authors Name: Bhawana Jain, **Ajaya K Singh**, Virender K Sharma

Impact factor of the Journal: 1.27

100. Kinetic study of oxidation of paracetamol by water soluble colloidal MnO₂ in the presence of an anionic surfactant

Colloid and Polymer Science 294(2016) 1611–1622

Authors Name: **Ajaya Kumar Singh**, Neelam Sen, Som Kumar Chatterjee, Md. Abu Bin Hasan Susan

Impact factor of the Journal: 1.89

99. Highly flexible, conductive and transparent PEDOT:PSS/Au/PEDOT:PSS multilayer electrode for optoelectronic devices

Materials Letters 174 (2016) 204–208

Authors Name: Mariya Aleksandrova, Valentin Videkov, Radost Ivanova, **Ajaya K.**

Singh, Gautam Sheel Thool

Impact factor of the Journal: 2.489

98. Kinetic determination of trace amount of mercury(II) in environmental samples

Microchemical Journal 128 (2016)55–61

Authors Name: Garima Pravin Pandey, **Ajaya Kumar Singh**, Surendra Prasad, Lata Deshmukh, Anupama Asthana, Sunitha B.Mathew, Masafumi Yoshida

Impact factor of the Journal: 3.1

97. Glycine functionalized magnetic nanoparticle entrapped calcium alginate beads: A

promising adsorbent for removal of Cu(II) ions

Journal of Environmental Chemical Engineering 4 (2016) 1985–1995

Authors Name: Anupama Asthana, Renu Verma, **Ajaya Kumar Singh**, Md. Abu Bin Hasan Susan

Impact factor of the Journal: 1.05

96. Studies on Structural, Morphological and Optical Properties of Chemically Deposited CdS_{1-x}Se_x Thin Films,

Journal of Fluorescence, 26(2016) 459-469

Authors Name: Soumya R. Deo, Ajaya K. Singh, Lata Deshmukh,, Narendra Pratap Singh Mariya P. Aleksandrova

Impact factor of the Journal: 1.93

95. Kinetic and mechanistic study of micellar effect of hydrolytic reaction of di-2-methoxy-4-nitroaniline phosphate

Journal of Dispersion Science and Technology

(2016)DOI:10.1080/01932691.2016.1146614

Authors Name: Homeshwari Yadav, S. A. Bhoite, **Ajaya Kumar Singh**

Impact factor of the Journal: 0.8

94. Micelle catalyzed oxidative degradation of paracetamol by water soluble colloidal MnO₂ in acidic medium

Tenside Surfactants Detergents 53(2016) 347-356

Authors Name: Ajaya Kumar Singh, Neelam Sen, Som Kumar Chatterjee, N.P. Singh

Impact factor of the Journal: 0.9

93. Effect of Surfactants on Hydrolysis of Mono-N-ethyl-o-toluidine Phosphate

Tenside Surfactants Detergents 53,(2016) 182–194

Authors Name: Homeshwari Yadav, S. A. Bhoite, **Ajaya Kumar Singh**

Impact factor of the Journal: 0.9

92. Shape tunable synthesis of Eu and Sm doped ZnO microstructures: a morphological Evaluation

Bulletin of Materials Science 38, (2015)1519–1525

Authors Name: Gautam Sheel Thool, Arunakumari M, **Ajaya K. Singh**, Surya Prakash Singh

Impact factor of the Journal: 1.2

91. Cowrie-Shell Architectures: Low Temperature Growth of Ni Doped CdS Film

Journal of Alloys and Compounds 649, (2015), 553–558

Authors Name: Gautam Sheel Thool, K. Sraveen, **Ajaya K. Singh**, U. Pal, and Surya Prakash Singh

Impact factor of the Journal: 2.99

90. Metal chalcogenide nanocrystalline solid thin films

Journal of Electronic Materials 44 (2015) 4098-4127

Authors Name: Ajaya Kumar Singh, Soumya R Deo, Lata Deshmukh, Md.Abu Bin Hasan
Susan

Impact factor of the Journal: 1.8

89. Studies on structural, morphological and optical behavior of chemically deposited Cd_{0.5}Pb_{0.5}S thin films

Optik - International Journal for Light and Electron Optics 126(2015), 2311–2317

Authors Name: Ajaya Kumar Singh, Soumya R Deo, Lata Deshmukh, L.J.Paliwal,
R.S.Singh

Impact factor of the Journal:0.68

88. Mechanistic study of [RuCl₃(H₂O)₂OH]⁻ catalyzed oxidation of L-leucine by acidic N-Bromophthalimide

Journal of the Iranian Chemical Society 12 (2015) 1717-1728

Authors Name: Bhawana Jain, **Ajaya Kumar Singh**, Reena Negi

Impact factor of the Journal: 1.41

87. Homogenous catalysis of Ru(III) for the oxidation of Thiamine by ChloramineT in acidic medium

International J. Electrochem. Sci., 10 (2015) 759 – 774

Authors Name: Aftab Aslam Parwaz Khan, Anish Khan, Abdullah M. Asiri,
Ajaya Kumar Singh

Impact factor of the Journal: 1.7

86. Synthesis and Characterization of Cerium doped CdZnS nanoparticles

Indian Journal of Physics 89(2015) 1153-1159

Authors Name: Ritu Shrivastava, Subhash Shrivastava, R S. Singh, **A .K. Singh**

Impact factor of the Journal: 1.7

85. Characterization of CdZnS Thin Film Grown by Using Different Capping Agents

Materials Research Express 2 (2015)036401

Authors Name: Ritu Shrivastava, Subhash Shrivastava, R S. Singh, **A .K. Singh**

Impact factor of the Journal:

84. Synthesis, morphological and Optical Properties of Nanocrystalline Solid Cu_xS Thin Films,

Synthesis and Reactivity in Inorganic, Metal-Organic, and Nano-Metal Chemistry 46(2016)570-582

Authors Name: Swati Mehra, **A.K.Singh**, Gautam Sheel Thool

Impact factor of the Journal:

83. Synthesis and Optical properties of Nanocrystalline copper selenide thin films,

CSVTU Research journal 7(2014)86-91

Authors Name: Swati Mehara, **Ajaya Kumar Singh**

Impact factor of the Journal:

82. Mechanistic study of novel oxidation of D-arabinose by N-bromophthalimide in presence of using micro-amount of chloro-complex of Ru(III) as a homogeneous catalyst

Arabian Journal of Chemistry **Corrected Proof** doi:10.1016/j.arabjc.2014.08.021

Authors Name: Neerja Sachdev, **Ajaya Kumar Singh**, Alpa Shrivastava, Yokraj Katre,
Aftab Aslam Parwaz

Impact factor of the Journal: 2.68

81. Development of surfactant assisted kinetic method for trace determination of thallium in environmental samples, **Microchemical Journal** Volume 118, January 2015, Pages 150–157

Authors Name: Garima Pravin Pandey, **Ajaya K. Singh***, Lata Deshmukh, Surendra Prasad,
Anupama Asthana

Impact factor of the Journal: 3.58

80. Cu-implanted ZnO nanorods array film: An aqueous synthetic approach
Journal of Alloys and Compounds, 618 (2015) 421–427

Authors Name: **Ajaya Kumar Singh**, Gautam Sheel Thool, Surya Prakash Singh

Impact factor of the Journal: 2.4

79. Low temperature Mn doped ZnO nanorod array: Synthesis and its photoluminescence Behavior

Ind. Eng. Chem. Res. 53, (2014)9383–9390

Authors Name: **Ajaya Kumar Singh**, Gautam Sheel Thool, Prakriti Ranjan Bangal,
Sunkara Sakunthala Madhavendra, and Surya Prakash Singh

Impact factor of the Journal: 2.2

78. Facile synthesis of flat crystal ZnO thin films by solution growth method: A micro-Structural investigation

Journal of Saudi Chemical Society 18 (2014) 712-721

Authors Name: Gautam Sheel Thool, **Ajaya Kumar Singh**, R. S. Singh, Ashish Gupta,
Md. Abu Bin Hasan Susan

Impact factor of the Journal: 1.2

77. Structural, Morphological and Optical Studies on Chemically Deposited Nanocrystalline CdZnSe Thin Films

Journal of Saudi Chemical Society 18(2014) 327-339

Authors Name: Soumya R. Deo, **Ajaya K. Singh**, Lata Deshmukh, L.J.Paliwal, R. S. Singh, Ashish Gupta

Impact factor of the Journal: 1.2

76. Structural and Optical Properties of nanocrystalline Cu_xS Solid Thin Films

Austin Journal of Chemical Engineering 1(2014)1-5

Authors Name: **Ajaya Kumar Singh**, Swati Mehra and **Gautam Sheel Thool**

75. A novel and sensitive kinetic method for the determination of malathion using chromogenic reagent,

Microchemical Journal 113(2014)83-89

Authors Name: Garima Pravin Pandey, **Ajaya K. Singh***, Lata Deshmukh, Surendra Prasad,
L. J. Paliwal, Anupama Asthana, Sunitha B.Mathew

Impact factor of the Journal: 3.58

74. Micellar effect on hydrolysis of 4-methyl-2-nitroaniline phosphate

Colloid Journal 76 (2014,) pp 765-773

Authors Name: Bhawana Bairagi, S.A. Bhoite, **Ajaya Kumar Singh***

Impact factor of the Journal: 0.63

73. Determination of Dicofol in Various Environmental Sample by Spectrophotometric Method Using Chromogenic Reagents

Synthesis and Reactivity in Inorganic, Metal-Organic, and Nano-Metal Chemistry

45:8,(2015) 1199-1205

Authors Name: Garima Pravin Pandey, **Ajaya K. Singh***, Lata Deshmukh, Anupama Asthana

Impact factor of the Journal: 0.7

72. Kinetics of Cetyltrimethylammonium Bromide catalysed oxidation of Cyclopentanone by NBP in acidic medium

Tenside Surfactants Detergents 51(2014)146–155

Authors Name: Kamalini Tripathi, Yokraj Katre, **Ajaya Kumar Singh**

Impact factor of the Journal: 0.7

71. Optical Characterization of the (Cd-Zn)S:CdCl₂ Thin Film Deposited by CBD Method, **International Journal of Advancements in Research & Technology**, 2 (2013) 152-158

Ritu Shrivastava, R. S. Singh, **A. K. Singh**

Impact Factor of the Journal:0.4

70. Photocatalytic degradation of an azo dye with ZnO nanoparticles

AIP Conference Proceedings,1536(2013)243-244

Authors: Garima Pravin Pandey, Ajaya K. Singh, Lata Deshmukh, Anupama Asthana, and Soumya R. Deo

69. Effect Of Annealing On Structural & Optical Behavior Of Nanocrystalline Cd_{0.5}Zn_{0.5}S Thin Films

AIP Conference Proceedings,1536(2013)251-252

Authors: Soumya R. Deo , **Ajaya K. Singh**, Lata Deshmukh, Garima Pandey

68. Influence of cetyltrimethylammonium bromide/sodium dodecylsulphate micelles on the oxidation of L-arginine by N-bromophthalimide in presence of HClO₄

Indian J Chemistry :A 52A(2013)732-738

Authors: Yokraj Katre, Namita Goyal, Radhika Sharma, **Ajaya Kumar Singh**

Impact factor of the Journal:

67. SYNTHESIS OF COPPER SULPHIDE(CuS) THIN FILM BYCHEMICAL BATH DEPOSITION METHOD AND ITS CHARACTERIZATION

European Chemical Bulletin 2(2013) 518-523

Authors: **Ajaya Kumar Singh**, Swati Mehra, Gautam Sheel Thool

Impact factor of the journal: 2.1

66. Growth and Characterization of Nanocrystalline CdSe Thin Solid Films

Research on Chemical Intermediates, 41(2015) 535-548

Authors: Soumya R. Deo, **Ajaya K. Singh** , Lata Deshmukh, Garima Pandey, R. S. Singh,

Ashish Gupta

Impact factor of the journal: 0.7

65. Kinetics and mechanism of Aquachlororuthenium (III) catalyzed oxidation of tartaric acid by acid bromate.

The Open Catalysis Journal 6, (2013)8-16

Authors: Ajaya Kumar Singh, Ashok Kumar Singh, Vineeta Singh, Ashish, Surya Prakash Singh, B.Singh

Impact factor of the journal: Nil

64. Oxidation behavior of L-threonine by N-bromophthalimide in micellar system of CTAB.

Journal of The Chilean Chemical Society, 58(2013)1524-1529.

ISSN 0717-9707

Authors: Yokraj Katre, Namita Goyal, Radhika Sharma, **Ajaya Kumar Singh**

Impact factor of the journal: 0.8

63. Mechanistic aspects for the oxidation of brilliant green dye by chloramine-T in presence of perchloric acid: A spectrophotometric kinetic approach. *Research on Chemical*

Intermediates, 40(2014) 605-617, (Springer)

Authors: Ajaya Kumar Singh, Shakila Bano

Impact factor of the journal: 1.5

62. Kinetic and mechanistic investigation of chlorocomplex of Ru(III) and Ir(III) catalyzed oxidation of D-Fructose by N-bromophthalimide in acidic medium.

Journal of Saudi Chemical Society. In Press (Elsevier)

Authors: Neerja Sachdev, **Ajaya Kumar Singh***, Alpa Shrivastav, Yokraj Katre

Impact factor of the journal: 1.2

61. Impact of Micelle media on the kinetics of Oxidation of L-Lysine (An essential amino acids) by N-bromophthalimide. *Journal of Dispersion Science and Technology*.

34 (2013)1421-1428 (Taylor & Francis)

Authors: Yokraj Katre, Namita Goel, **Ajaya Kumar Singh**

Impact factor of the journal: 0.63

60. Synthesis and effect of post-deposition thermal annealing on morphological and optical properties of ZnO thin film. *Research on Chemical Intermediates*, 38 (2012) 2041-2049 (Springer)

Authors: **Ajaya Kumar Singh**, Gautam Sheel Thool, Soumya R. Deo, R. S. Singh, Ashish Gupta

Impact factor of the journal: 1.5

59. Micelle catalyzed oxidative degradation of norfloxacin by chloramine-T.

Journal of Molecular Catalyst A: Chemical 361 (2012) 1-11 (Elsevier)

Authors: Alpa Srivastava, **Ajaya Kumar Singh**, N.Sachdeva, D.R.Srivastava, Y.R.Katre, S.P.Singh, Man Singh, J. C. Mejuto

Impact factor of the journal: 3.956

58. Kinetics and mechanism of oxidation reaction of lactose by N-bromophthalimide: Micelles

used as a catalyst. *Colloid Journal* 74 (2012) 391-400 (Springer)

Authors: Y.R.Katre, Minu Singh, A.K.Singh

Impact factor of the journal: 0.7

57. Oxidation of D-Glucose by NBP in the presence of chlorocomplex of Ir(III): A Kinetic and mechanistic study, *Research on Chemical Intermediate* 38 (2012) 507- 521. (Springer)

Authors: Ajaya Kumar Singh, N.Sachdeva, Alpa Srivastava, Bhawna Jain, Y.R. Katre,

Impact factor of the journal: 1.5

56. Micellar effect on kinetic assessment of the oxidative degradation of Norfloxacin by chloramine-T. *Journal of Dispersion Science and Technology* 33 (2012) 1752-1761 (Taylor & Francis)

Authors: Alpa Srivastava, Ajaya Kumar Singh, N.Sachdeva, D.R.Srivastava, Y.R.Katre.

Impact factor of the journal: 0.63

55. Synthesis and characterization of chemically deposited nanocrystalline CdSe thin film. *Synthesis and Reactivity in Inorganic, Metal-Organic, and Nano-Metal Chemistry* 41 (2011) 1346-1350. (Taylor & Francis)

Authors: Ajaya Kumar Singh, Soumya R. Deo, Gautam Sheel Thool, R. S. Singh, Y.R.Katre, Ashish Gupta.

Impact factor of the journal: 0.504

54. Pd(II) catalyzed oxidative degradation of paracetamol by chloramine-T in acidic and alkaline media, *Industrial & Engineering Chemistry Research* 50 (2011) 8407-8419 (American Chemical Society)

Authors: Ajaya Kumar Singh, Reena Negi, Bhawana Jain, Yokraj Katre, Surya Prakash Singh, and Virender Kumar Sharma.

Impact factor of the journal: 2.237

53. Influence of cationic micelle on the oxidation of acetaldehyde by N- bromophthalimide. *Journal of Dispersion Science and Technology* 33 (2012) 863-870 (Taylor & Francis)

Authors: Y R Katre, Radhika Sharma, G. K. Joshi, Ajaya Kumar Singh

Impact factor of the journal: 0.628

52. Kinetic Study of Oxidation of Galactose by N- Bromophthalimide in the presence of cationic micelle in acidic medium. *Research on Chemical Intermediates* 38 (2012) 179-193. (Springer)

Authors: Y.R.Katre, Savita nayak, G.K.Joshi, Ajaya Kumar Singh

Impact factor of the journal: 1.5

51. Catalytic effect of Cetyltrimethylammonium Bromide on the oxidation of Oxalic acid by N-Bromophthalimide in Acidic medium. *Journal of Dispersion Science and Technology* 33 (2012) 1038-1045. (Taylor & Francis)

Authors: Yokraj Katre, S.Rajani Mudliar, Ghanat K Joshi, Ajaya K Singh

Impact factor of the journal: 0.628

50. Micelle catalysed oxidation of 4-Methyl, 2-Pentanone by NBP in the presence of acetic acid
Journal of Dispersion Science and Technology 33 (2012) 447-456. (Taylor & Francis)
Authors: Y. R. Katre, Kamalni Tripathi, Ajaya K. Singh
Impact factor of the journal: 0.628
49. Effect of anionic surfactant on the oxidation of DL-aspartic acid by N- bromophthalimide: A kinetic study, *Journal of Dispersion Science and Technology*. 32 (2011) 1434-1444. (Taylor & Francis)
Authors: Y.R. Katre, Ghanat K. Joshi and Ajaya K. Singh
Impact factor of the journal: 0.628
48. Influence of cetyltrimethylammonium bromide/sodium dodecylsulfate micelles on the oxidation of D-fructose by N-bromophthalimide in presence of sulfuric acid: a kinetic study. *Oxidation Communications* 34 (2011) 273-291.
Authors: Yokraj Katre, Minu Singh, Ajaya K. Singh
Impact factor of the journal: 0.123
47. Kinetics and Mechanism of Cetyltrimethylammonium Bromide Catalyzed N-Bromosuccinimide Oxidation of D-Mannose in Acidic Medium. *Journal of Dispersion Science and Technology* 32(2011) 903-912. (Taylor & Francis)
Authors: Yokraj Katre, Minu Singh, Ajaya Kumar Singh
Impact factor of the journal: 0.628
46. Micellar Effect upon Kinetics of Oxidation of Acetophenone by N- Bromophthalimide in Aqueous Acetic acid medium. *Journal of Dispersion Science and Technology* 32 (2011) 341-351 (Taylor & Francis)
Authors: Y. R. Katre, K. Tripathi, G. K. Joshi, Ajaya K. Singh
Impact factor of the journal: 0.628
45. Characterization and optical studies of CdSe Nanocrystalline thin films. *Digest Journal of Nanomaterials and Biostructures* 6 (2011) 433-442.
Authors: R.S.Singh, S.Bhushan, Ajaya K Singh, S.R. Deo
Impact factor of the journal: 1.2
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