

RESUME

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RESEARCH INTERESTS :

Air Pollution Dispersion Modelling; Indoor Air Quality and Exposure Assessment; Air Quality Monitoring and Management; Environmental Impact Assessment.

EDUCATIONAL BACKGROUND:

Ph.D. (Physics), 1971, Delhi University
M.Sc. (Physics), 1967, Rajasthan University (Gold Medal)
B.Sc., 1965, Rajasthan University (Atomic Energy Scholarship)

PROFESSIONAL EXPERIENCE :

Institution : Indian Institute of Technology, Bombay
Emeritus Fellow : 19-09-2011 till date
Professor : 30-08-1995 till 30-06-2011
Associate Professor : 06-11-1990 to 29-08-1995
Assistant Professor : 29-10-1982 to 05-11-1990
Lecturer : 16-06-1977 to 28-10-1982
Research Associate : 15-07-1976 to 15-07-1977
CSIR Pool Officer : 16-07-1971 to 14-07-1976

JOURNAL PUBLICATIONS (REFEREED)

[Total 61 ; International 47 ; National 14]

“Development on Particulate Matter Speciation Profiles for Major Sources in Six Cities in India”, Rashmi S. Patil, Rakesh Kumar, Ratish Menon, Munna Kumar Shah and Virendra Sethi, *Atmospheric Research*, 132-133 ,1-11, 2013

“Organic and Inorganic Markers and Stable C-, N-isotopic Compositions of Tropical Coastal Aerosols from Megacity Mumbai : Sources of Organic Aerosols and Atmospheric Processing”, S.G. Aggarwal, K. Kawamura, G.S. Umarji, E. Tachibana, R.S. Patil and P.K. Gupta, *Atmospheric Chem. Phys.*, 13, 4667-4680, 2013.

“Health Benefit Modelling and Optimization of Vehicular Pollution Control Strategies” Nayan V. Sonawane, Rashmi S. Patil*, Virendra Sethi, *Atmospheric Environment*, 60,193-201,2012

“Characterization of Airborne Biological Particles from Wastewater Treatment Plants in Mumbai”, Gangamma S, Patil R S and Mukherji S , *Environmental Science & Technology*, 45(8) , 3282-3287,2011

“Biological Activities of Ambient Particulate Matter and Associated Endotoxin at Different Locations in Mumbai, India” Gangamma S, Rashmi S. Patil, Sandhya Sakure, Suparna Mukherji, Dipshikha Chakravorty, (Submitted to *Environmental Health Perspectives*)

“Health Benefit Analysis of In-Vehicle and Roadside Personal Exposure to Air Pollution in Mumbai” Chitra P Murali and Rashmi S Patil (Submitted to *Science of Total Environment*)

“Estimation of Air Pollutant Emission Loads from Constructional and Operational Activities of a Port and Harbour in Mumbai, India”, Joshy Joseph, Rashmi S. Patil and S.K. Gupta, *Environmental Monitoring and Assessment*, Vol. 159, Issue 1, 85-98, Dec. 2009.

“Prediction of Air Pollution Concentration Using an In Situ Real Time Mixing Height Model”, Sunita Nath and Rashmi S. Patil, *Atmospheric Environment* 40, 3816-3822, 2006.

“A Comparison of Air Quality Indices for a Port and Harbor Region in India”, A.K. Gupta, Rashmi S. Patil and S.K. Gupta, *Int. Jnl. of Environment and Pollution*, 26(4), 313-321, 2006.

“An Emission Model for Heterogeneous Vehicular Fleet in India”, S. Mehta, Rashmi S. Patil and V. Sethi, *Ind. Jnl. of Air Pollution Control*, Vol. VI, No. 11, 1-9, Sept. 2006.

“Design, Development, Calibration and Field Evaluation of an indigenous PM_{2.5} Sampler”, Nitin Goyal, N. Selvakumar, Rashmi S. Patil and Virendra Sethi, *Current Science*, Vol.90, No.2, 151-157, 2006.

“Environmental Management Plan for Port and Harbour Projects”, A.K. Gupta, S.K. Gupta and Rashmi S. Patil, *Clean Technologies and Environmental Policy* 7(2), 133-141, 2005.

“Particulate Respiratory Dose to Indian Women from Domestic Cooking”, S.K. Varghese, Gangamma S., Rashmi S. Patil and V. Sethi, *Aerosol Science and Technology*, 39 (12), 1201-1205, 2005.

“Personal Exposure to Aerosols in Urban Homes”, Rashmi S. Patil, V. Sethi, S.K. Varghese and S. Gangamma, *Bulletin of American Meteorological Society*, Vol. 86, 1226, 2005.

“Statistical Analysis of Coastal Water Quality for a Port and Harbour Region in India”, A.K. Gupta, S.K. Gupta and Rashmi S. Patil, *Envtl. Monitoring and Assessment*, 102, 179-200, 2005.

“A Composite Receptor and Dispersion Model Approach for Estimation of Effective Emission Factors for Vehicles”, A. Vinod Kumar, Rashmi S. Patil and K.S.V. Nambi, *Atmospheric Environment*, 38, 7065-7072, 2004.

“Modelling the Size Separated Particulate Matter from Vehicular Exhaust at Traffic Intersections in Mumbai”, S.B. Gokhale and Rashmi S. Patil, *Environmental Monitoring and Assessment*, 98, 23-40, 2004.

*A Long Term Study of Turbidity and Suspended Solid Concentration for a Port and Harbour Region in India’, A.K. Gupta, S.K. Gupta and Rashmi S. Patil, *Journal of Indian Association of Environmental Management*, Vol. 31, No. 2, 132-140; 2004.

“A Statistical Analysis of Particulate Datasets for Jawaharlal Nehru Port and Surrounding Harbour Region in India” A.K. Gupta, Rashmi S. Patil and S.K. Gupta. *Int Journal of Environmental Monitoring and Assessment*. 95, 295-309, 2004.

“Influence of Meteorological Factors on Air Pollution Concentration for a Coastal Region in India” by A.K. Gupta, Rashmi S. Patil and S.K. Gupta. *International Journal of Environmental Monitoring and Pollution*, Vol.12, No. 3, 253-262, 2004.

*“A Simple Model to Determine In Situ Mixing Height Growth from Surface Measurements” by Sunita Nath and Rashmi S. Patil, *Environmental Fluid Mechanics*, Vol.3, No.3, 195-219, Sept. 2003.

*“Cluster Analysis of Delhi’s Ambient Air Quality Data” by S. Saksena, V.Joshi and Rashmi S. Patil. *Jnl. of Envntl. Monitoring*, Published by Royal Soc. of Chem., 5, 491-499, 2003.

*“Exposure of Infants to Outdoor & Indoor Air Pollution in Low Income Urban Areas – A Case Study of Delhi”, Sumeet Saksena, P.B. Singh, R.K. Prasad, Preeti Malhotra, Veena Joshi and Rashmi S. Patil. *Journal of Exposure Analysis and Environmental Epidemiology*, 2003, 13, 219-230.

“Personal Exposure to Toxic Metals in an Indian Metropolitan Region”, M.M. Kulkarni and Rashmi S. Patil, *Jnl. of the Institution of Engineers*, Vol.84, 23, 2003. **[Awarded the Nawab Z.V.J. Bahadur Memorial Prize from the Institution of Engineers (India), Dec. 2004]**

“Size Distribution of Aerosols (PM10) and Lead (Pb) Near Traffic Intersections in Mumbai (India)”; S.B. Gokhale and Rashmi S. Patil, *Int. Jnl. of Envntl. Monitoring and Assessment*, 95, 311, 2004..

“A Long-term Study of Oxides of Nitrogen Sulphur Dioxide and Ammonia for a Port and Harbour Region in India” by A.K. Gupta, Rashmi S. Patil and S.K. Gupta, *International Journal of Environmental Science and Health (Part-A)*, Vol. A38 (12), 2877-2894, 2003.

“A Comparison of Water Quality Indices for Coastal Water” by A.K. Gupta, S.K. Gupta and Rashmi S. Patil, *International Journal of Environmental Science and Health (Part-A)* Vol. A38 (11), 2711-2725, 2003.

*“An Empirical Model to Predict Indoor NOx Concentrations”, Milind M. Kulkarni and Rashmi S. Patil, *Atmospheric Environment*, Vol.36, 4777-4785, 2002,

“Air Pollution Potential Indices in a Coastal Region in India” A.K. Gupta, Rashmi S. Patil and S.K. Gupta, *Int. Jnl. of Environmental Pollution*, Vol.19, No.5, 2003.

*“Emissions of Gaseous and Particulate Pollutants in a Port and Harbour Region in India”, Ashok Gupta, S.K. Gupta and Rashmi S. Patil, *Envntl. Monitoring & Assessment*, 80(2) : 187-205, Dec. 2002.

*“Source Apportionment of Suspended Particulate Matter at Two Traffic Junctions in Mumbai India”, A Vinod Kumar, Rashmi S. Patil and K.S.V. Nambi, *Atmospheric Environment* 35, 4245, 2001.

*“Monitoring of Atmospheric Behaviour of NOx from Vehicular Traffic”, Shishir Lal and Rashmi S. Patil, *Environmental Monitoring Assessment*, Vol.68, No.1, 37-50, 2001,

“Deposition of Ambient Air Constituents at a Traffic Junction in Mumbai”, A Vinod Kumar,

Rashmi S. Patil, K.S.V. Nambi and T.M. Krishnamoorthy, *Journal of Institution of Engineers (India)*, Vol.81, 48-51, 2001, **(Awarded Prof. R.C. Singh Medal of the Institution of Engineers, India, December 2001).**

"Mixing Height Estimation on Basis of Non-local Determination of Static Stability in an Industrial Region", Sunita Nath and Rashmi S. Patil. *Air Pollution IX Eds. G. Latini and C.A. Brebbia WIT Press*, 133, 2001.

**"Monitoring of Daily Integrated Exposure of Outdoor Workers to Respirable Particulate Matter in an Urban Region of India", M.M. Kulkarni and Rashmi S. Patil, *Environmental Monitoring and Assessment*, 56:128-146, 1999.

**"Factors Influencing Personal Exposure to Nitrogen Dioxide in an Indian Metropolitan Region", M.M. Kulkarni and Rashmi S. Patil, *Indoor Built Environment*, 7, 319-332, Aug. 1998,.

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"Design and Application of a Size Selective Cyclone Separator Inlet for High Volume Sampler", K.V.V.N. Satyanarayana, A.V. Kumar and Rashmi S. Patil, *Pollution Research*, 17, 265-269, 1998.

**"Integrating Air Quality Models with Geographical Information System for Regional Environmental Planning", M.S. Shivrama, Rashmi S. Patil and P. Venkatachalam. *International J. Environmental Studies*, Vol. 54, 95-204 1998.

**"Assessment of Population Exposure and Risk Zones Using GIS", S. Sengupta, Rashmi S. Patil and P. Venkatachalam, *Computer, Environment and Urban Systems*, Vol. 20, No.3, Dec. 1996.

"Impact of Residential Nitrogen Dioxide Exposure on Personal Exposure : An International Study", Rashmi S. Patil et al., *Indoor Air '96*, 1, 931-936, 1996.

"Design and Application of a Size Selective Impactor Inlet for High Volume Sampler", K.V.V.N. Satyanarayana, A. Vinod Kumar and Rashmi S. Patil. *Jnl. of the Institution of Engineers*, Vol. 77, 27, 1997, **[The Rekha Nandi and Bhupesh Nandi Medal Awarded to this paper by the Institution of Engineers India (Ltd.), 1998].**

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**"Dry Deposition Modelling of Atmospheric Aerosols from a Lead Industry", A. D. Vaidya and Rashmi S. Patil, *J. Aerosol Science*, Vol. 2 b, 79, 1995.

"Factor Model Applied to Water Soluble Components of Precipitation Samples", V.K. Sharma and Rashmi S. Patil, *Indian J. Environmental Health*, Vol. 36, No.2, 84-90, 1994.

**"Chemical Mass Balance Model for Source Apportionment of Aerosols", V K Sharma and Rashmi S Patil, *Environmental Monitoring and Assessment*, Vol. 29, 75-88, 1994.

*"Metrose : A Modified Windrose for Air Quality Management", Devdutta S. Niyogi and Rashmi S. Patil, *Atmospheric Environment*, Vol. 28A, 1994.

"Source Apportionment of Suspended Particulate Matter Using a Composite Receptor Model", V.K. Sharma and Rashmi S. Patil, *Ind. Jnl. of Environmental Health*, Vol. 35, No.4, 1993,

*"Size Distribution of Atmospheric Aerosols and their Source Identification using Factor Analysis", V K Sharma and Rashmi S. Patil., *Atmospheric Environment*, Vol. 26 B, No.1, 135-140, 1992,

*"Chemical Composition and Source Identification of Bombay Aerosols", V.K.Sharma and Rashmi S. Patil, *Environmental Technology*, Vol. 13, 1043-1052, 1992.

*"Insitu Measurements of Spatial and Temporal Variation of Atmospheric Aerosols in Bombay", V K Sharma and Rashmi S Patil, *Jnl. of Aerosol Science*, Vol. 22, No. 4, 501-507, 1991.

*"Chemical Composition of Precipitation and Their Role in Determining its Acidity in Bombay", V K Sharma, P P Joshi and Rashmi S Patil, *Environmental Technology*, Vol. 11, 777-784, 1990,

*"Estimation of a Quantitative Air Quality Impact Assessment Score for Thermal Power Plant", S B Patil and Rashmi S Patil, *Atmospheric Environment*, 24B, No.3, 443-448, 1990,

"Air Quality Impact Assessment of Industries : Methodology and Case Study", Rashmi S Patil., *Hand Book on Pollution Control, Process and Plant Engineering (PCHB)*, 295-298, 1990.

"Data Bank on Research and Development Activities on Aerosols in India", Rashmi S Patil, *Indian Aerosol Science and Technology Association Newsletter*, Vol. 2, 1989.

*"A General Finite Line Source Model for Vehicular Pollution Prediction", A K Luhar and Rashmi S Patil, *Atmospheric Environment*, Vol. 23, No.5, 555, 1989.

"Noise Prediction Near Three Traffic Sites in Bombay", A K Luhar and Rashmi S Patil, *Energy Environment Monitor*, Vol. 3, 47, 1987.

"Estimation of Emission Factors for Indian Vehicles", A K Luhar and Rashmi S Patil, *Indian J. Air Pollution Control*, Vol. 7, No. 4, 155, 1986,.

*"A Nomographic Technique for Estimation of Air Quality in Urban Areas", U Munshi and Rashmi S Patil, *Atmospheric Environment*, Vol. 17, No. 5, 1027, 1983.

*"A Numerical Model for Multiple Air Pollution Sources", U Munshi and Rashmi S Patil, VI Int. Clean Air Congress, Paris, May 1983; *Indian Jnl. of Environmental Protection*, Vol.3, No. 3, 1983.

*"A Method for Selection of Air Quality Monitoring Sites", U Munshi and Rashmi S Patil, *Atmospheric Environment*, Vol. 16, 1915, 1982.

*"Application of ATDL Type Models to Bombay", U Munshi and Rashmi S Patil, *Jnl. of Air Pollution Control Association*, 31, 998, 1981.

"Pollution Studies of Powai Lake", M J Bhagvat, Rashmi S Patil and S M Khopkar, *Chemical Era*, Vol. XIV, 317, 1978.

PAPERS PRESENTED & PUBLISHED IN SEMINARS / CONFERENCES PROCEEDINGS:

a) INTERNATIONAL (Total : 42)

"Urbanization and Its Impact on Climate : Indian Scenario", Bherwani, H.B., Patil, R.S. and Kumar R., International Conference on Bioenergy, Environment and Sustainable Technologies (BEST), Thiruvannamalai : 27-30th Jan, 2013; Proceedings pp. 86-87.

"Impact of Urbanization on Regional and Local Climate", Bherwani, H.B., Patil, R.S. and Kumar R., International Conference on Climate Change and Humanity (ICCCH), Rome, Italy : 24-25th Feb., 2013, Full paper accepted.

"Impact of Urbanization on Temperature Profile of the City", Bherwani, H.B., Patil, R.S. and Kumar R., Poster at MAGEEP International Symposium, Mumbai 9-13th Dec., 2012.

"Nexus between Indoor Air Quality (IAQ) and Energy Consumption in Commercial Air-conditioned Building in India" Nitin M. Deodhar, Rashmi S. Patil, Virendra Sethi, CLIMA 2013, 11th REHVA World Congress and 8th International Conference on IAQVEC, 15-19 June, 2013, Prague.

"Ventilation Design for Indoor Air Quality Management as per Indian Climatic Conditions" Ruchi Sharma, Nitin M. Deodhar, Rashmi S. Patil, Virendra Sethi, **10th International Healthy Buildings Conference 2012, Brisbane 8-12 July 2012.**

"Ventilation Design for Indoor Air Quality Management" Patil, R.S., Sethi, V., Sharma, R., *Environmental Information Association 12th National Conference & Exposition* , San Diego ,CA,USA ,March 21-25, 2012

"Indoor Air Quality in Schools of Different Socio-Economic Status in Mumbai" Rashmi S. Patil and Srinidhi Balasubramanian *The 12th Int Conf on Indoor Air Quality and Climate* ,Texas,Austin USA,June 5-10, 2011

"Measurement and characterization of biological activities of ambient particular matter at different locations in Mumbai." Gangamma S., Patil, R.S. Mukherji, S. and Chakravortty, D, *AWMA's 104th Annual Conference and Exhibition, Orlando, USA*, June 21-23, 2011

"Assessment of Health Benefits due to Reduction in Personal Exposure" Rashmi S Patil and Neha Chandorikar, *The 12th Int Conf on Indoor Air Quality and Climate* , Texas, Austin ,June 5-10, 2011

Health Benefit Modeling and Optimization of Vehicular Pollution Control *Exhibition , Strategies*" Nayan V. Sonawane, Rashmi S. Patil, Virendra Sethi , *AWMA's 104th Annual Conf & Exhibition* , Orlando, Florida, US,June 21-24,2011

“Indoor Air Quality Measurements of Particulates in Commercial Kitchens”, Govindraj S. Umarji and Rashmi S. Patil, *Symposium on Air Quality Measurements Organized by AWMA, SFO, US*, 29 April – 2 May, 2007.

“Numerical Simulation of Dispersion from Industrial Stacks and Comparison with Gaussian Models”, Sangeeta Gupta and Rashmi S. Patil, *Int. Conf. on Mesoscale Processes in Atmosphere*, IIT Delhi, Feb. 2006.

“Air Dispersion Modelling for Assessment of Health Benefits of an Urban Industrialized Region in Mumbai; Rashmi S. Patil and Naval K. Chaudhary; *Int. Conf. on Mesoscale Processes in Atmosphere*, IIT Delhi, Feb. 2006

“Sampling and Characterization of PM_{2.5} and PM₁₀ in Pune, India, Rakesh Kumar, Ajay Ojha, Nitin Goyal, Rashmi S. Patil and Virendra Sethi, *7th Int. Aerosol Conf.*, Minnesota, US, Sept. 10-15, 2006.

“Assessment of Indoor Air Pollution in Tribal Population in Western Maharashtra and its Effect on Health”, U.R. Thakare, J.J. Nadkarni, Rashmi S. Patil and S.C. Gupte, *TWOWS Int. Conf. on Women’s Impact on Sc. and Technology*, Bangalore, 21-25, Nov. 2005.

“Deposition of Semivolatile Organic Compounds in Human Respiratory System”, Suresh K. Varghese, Gangamma S., Rashmi S. Patil and V. Sethi, *4th Asian Aerosol Conference*, Dec. 2005, Mumbai.

“Mass Size Distributions and Size Resolved Chemical Composition of Ambient Aerosols at a Commercial Location in Mumbai, India”, Nitin Goyal, Rakesh Kumar, Rashmi S. Patil and V. Sethi, *4th Asian Aerosol Conference*, Dec. 2005, Mumbai.

“A Photochemical Box Model for VOC Emissions in an Urban Region”, Sunita Nath and Rashmi S. Patil, *4th Asian Aerosol Conference*, Dec. 2005, Mumbai.

“Source Apportionment of Polycyclic Aromatic Hydrocarbons in the Urban Atmosphere of Mumbai, India”, S.K. Sahu, G.G. Pandit, Rashmi S. Patil, V.K. Shukla, and V.D. Puranik, *4th Asian Aerosol Conference*, Dec. 2005, Mumbai.

“An Integrated Air Quality Model for Economic Evaluation of Health Impacts of Particulate Control Strategies for an Industrial Region”, Naval K. Chaudhary and Rashmi S. Patil, *4th Asian Aerosol Conference*, Dec. 2005, Mumbai.

“Primary and Secondary Organic Aerosols over Mumbai, India : Estimates on the Basis of Observed Organic Carbon and Elemental Carbon”, S.K. Sahu, G.G. Pandit, Rashmi S. Patil, V.K. Shukla, and V.D. Puranik, *4th Asian Aerosol Conference*, Dec. 2005, Mumbai.

“Effect of Natural and Forced Ventilation Systems on Decay and Deposition Rates Indoor Particles”, S. Gangamma, Suresh Varghese, Rashmi S. Patil and Virendra Sethi, *Int. Conf. Indoor Air 2005*, Beijing, China, Sept. 2005.

“A Composite Receptor and Dispersion Model Approach for Estimation of Effective Emission Factors for Vehicle”, Rashmi S. Patil and A. Vinod kumar, *8th Int. Conf. on Atmospheric Sciences*, March, 2003, Tsukuba Science City, Japan

“Exposure Assessment for a Rural Community using Biomass Fuel in Traditional and Improved Stoves”, Rashmi S. Patil and S. Dash, *9th Int. Conf. on Indoor Air Quality and Climate*, California, US, June 2002.

"Modelling of Indoor – Outdoor Relation of Air Pollutants in Mumbai City", Rashmi S. Patil and V.A. Kumar, *9th Int. Conf. on Indoor Air Quality and Climate*, California, US, June 2002.

"Indoor-Outdoor Relation of Aerosols for Mumbai City", Rashmi S. Patil and V. Anand, *2nd Asian Aerosol Conference*, Pusan, Korea, 1-4th July, 01.

"Emission and Ambient Concentrations of Particulates in a Port and Harbour Region, by Ashok Gupta, Rashmi S. Patil and S.K. Gupta, *2nd Asian Aerosol Conference*, Pusan, Korea, 1-4th July, 2001.

"Mixing Height Estimation on Basis of Non Local Determination of Static Stability", *Int. Conf. on Air Pollution 2000*, Univ. of Cambridge, UK, July 2002.

"Numerical Simulation of Land-Sea-Breeze Circulation and Thermal Internal Boundary Layer Formation over Mumbai using ARPS", Nitin Kudalkar, Sunita Nath, Rashmi S. Patil, Dev Dutta Niyogi and Sethuraman. *Int. Conf. on Air Quality Management* Univ. Brunei Darussalam, Nov. 15-19, 1999.

"Climatological Analysis to Determine Air Pollution for Different Zones in India", Sunita Nath and Rashmi S. Patil, *Seventh Int. Conf. Air Pollution – 99*, Stanford University, CA, USA, Organised by Wessex Inst. of Technology, July 27-29th 1999.

*"Prediction System for Long Range Transport of Atmospheric Pollutants", Sunita Nath, Nitin Kudalkar and Rashmi S. Patil, *Int. Workshop on Long Term Changes and Trends in Atmosphere*, IITM Pune, Feb. 16-19, 1999.

*"Atmospheric Dispersion Modelling of Industrial Stack Emissions in Coastal Region", Debajit Saharia, Rashmi S. Patil, D.S. Niyogi, and Sethuraman, *Int. Symposium on Asian Monsoon and Pollution*, IIT Delhi, Dec. 2-5, 1997.

*"Factorial Analysis to Estimate Factors Influencing Personal Exposure to Air Pollution", Milind Kulkarni, Rashmi S. Patil, D.S. Niyogi and Sethuraman, *Int. Symposium on Asian Monsoon and Pollution*, IIT Delhi, Dec. 2-5, 1997.

*"Impact of Residential Nitrogen Dioxide Exposure on personal Exposure : An International Study", Rashmi S. Patil et al., *7th Int. Conf. on Indoor Air Quality and Climate*, Nagoya, Japan, 1996.

*"Monitoring of Daily Integrated Exposure of Outdoor Workers to Respirable Particulate Matter", M.M. Kulkarni and Rashmi S. Patil, *5th Int. Conf. on Atmospheric Science at Seattle*, Washington, 1996.

*"Population Exposure and Risk Assessment of Air Pollution Using GIS", S.Sengupta, Rashmi S. Patil and P. Venkatachalam, *Indo-US Workshop on Environmental Risk Analysis*, IIT, Delhi, Jan. 1995.

*"Atmospheric Aerosol Measurements at a Traffic Junction", Rashmi S. Patil and A. Vinod Kumar, *Fourth Int. Aerosol Conference, UCLA, California, US*, Aug. 1994,

*"Chemical Characterization and Source Apportionment Using Receptor Models", Rashmi S. Patil and V.K. Sharma, *Fourth Int. Aerosol Conf., UCLA, California, US*, Aug. 1994.

"A Receptor Model for Source Identification of Acid Rain", V K Sharma and Rashmi S Patil, Int. Conf. on Sustainable Development Strategies, IIT Delhi, Jan. 1993

"Simple Methods of Air Quality Impact Assessment from Monitored Data for Indian Industries". V K Sharma and Rashmi S Patil, *International Symposium on Environmental Pollution and Hazardous Waste*, Toronto, Canada, June 1991.

PAPERS PRESENTED & PUBLISHED IN SEMINARS / CONFERENCES PROCEEDINGS (continued)

b) NATIONAL [Total : 25]

"Energy Conscious Air Conditioning Designs for Modern Retail" Nitin M. Deodhar, Rashmi S. Patil, Virendra Sethi, National Conference ACRECONF 5-6 Feb., 2013, ISHRAE, New Delhi.

"City Size and Change in Temperature Profile : Study on Major Indian Cities", by Bherwani, H.B., Patil, R.S. and Kumar Rakesh, 2nd Nat. Conf. on Environment and Biodiversity (EBI) in India, 29-30 Dec., 2012, New Delhi, Paper published in NeBIO Int. Jnl. (ISSN : 2278-2281).

"Impact of Glass Façade Buildings on Environment in Mumbai Metro Region", by Adsul Prashant, Patil R.S., Kumar Rakesh, 2nd Nat. Conf. on Environment and Biodiversity (FBI) in India, 29-30 Dec., 2012, New Delhi.

"IAQ and Energy : A Nexus" Nitin M. Deodhar, Rashmi S. Patil, Virendra Sethi, 8th National Conference ACR Trendz, 5-6 Oct., 2012, ISHRAE Pune

"Characteristics and associated health parameters of bioaerosols in Mumbai, India". Gangamma S., Patil, R.S., Mukherji, S. and Chakravorty, D. (2010) *Envirovision-2010*. Organized by Indian Environmental Association & IIT Bombay. November 23-26, 2010

This poster was awarded the first prize

"Measurement of Fine Particulate Matter and CO from Transport in Mumbai", Chitra P. Murali and Rashmi S. Patil, *National Seminar on Emerging Trends in Environment and Development KVNSED 2009*; Dept. of Env'tl. Sc., Univ. of Kerala, 8-9th Oct., 2009.

"Contribution of the Transport Sector to Global Warming and Possible Mitigation Measures", Chitra P. Murali and Rashmi S. Patil, *National Workshop on Global Warming*, Trivandrum, 19-21st Jan., 2009.

"Modelling and Mapping of Air Pollution Health Benefits for an Urban Region", Vasudev Athalye, Rashmi S. Patil and V. Sethi, *All India Seminar on Air Pollution and Health Impacts*, IIT Roorkee, Feb. 2006 **[Best Paper Award]**.

"Mass Size Distribution of Fine Particulate Matter from Cooking and Estimation of Lung Deposition", S. Gangamma, Suresh K. Varghese, Rashmi S. Patil and Virendra Sethi, *Indo-Norwegian Seminar*, IIT Kanpur, June 2005.

"Indoor Air Pollution due to Domestic Cooking in Urban Households", S. Gangamma, Suresh K. Verghese, Rashmi S. Patil and Virendra Sethi, *National Seminar*, Bangalore University, Nov. 2004.

"Monitoring and Control of Air Pollution Exposure due to Domestic Cooking in Urban Areas", S. Gangamma, Suresh K. Varghese, Rashmi S. Patil and Virendra Sethi, *IASTA Meeting and Int. Conf.*, IIT Kanpur, Nov. 2004

"Estimation of Road Dust Resuspension at Traffic Junctions using Trace Elements", A. Vinod Kumar and Rashmi S. Patil, *Nat. Conf. on Advances in Env'tl. Sc. & Engg.*, IIT Bombay, Dec. 2003.

"Characterization of PAH Associated with Size-segregated Atmospheric Aerosols", S.K. Sahu, G.G. Pandit, Rashmi S. Patil, T.N. Mahadevan, *Nat. Conf. on Advances in Env'tl. Sc. & Engg.*, IIT Bombay, Dec. 2003.

"An Expert System for Estimation of Population Exposure in an Urban Region", M.M. Kulkarni and Rashmi S. Patil, *Nat. Conf. on Advances in Env'tl. Sc. & Engg.*, IIT Bombay, Dec. 2003.

"Real Time Determination of PBL and Pollutant Concentration for Coastal Region Using ARPS", Sunita Nath, Abhijeet Nagarale and Rashmi S. Patil, *Nat. Symposium TROPMET 2001*, organized by IMD, Feb. 2001, Mumbai.

"Meteorological Data Analysis for Environmental Management of a Port and Harbor Project", A.K. Gupta, Rashmi S. Patil and S.K. Gupta, *Nat. Symposium TROPMET 2001*, organized by IMD, Feb. 2001, Mumbai.

"Indoor and Outdoor Air Pollution Exposure Monitoring" M.M. Kulkarni and Rashmi S. Patil; *All India Convention on Air Pollution*, Mumbai, April 1997.

"Fuel Usage in Delhi Slums and Exposure to Air Pollution", S. Saksena and Rashmi S. Patil et al., *Int. Conf. on Biomass Energy Systems*, Organised by TERI, BOD and British High Commission, 1996, Delhi.

"Assessment of Exposure of Outdoor Workers to Aerosol", M.M. Kulkarni and Rashmi S. Patil, *IASTA Bulletin* Vol.8, No.4, pp. 521, 1995.

"Air Pollution due to Low Grade Cooking Energy Sources", M.M. Kulkarni and Rashmi S. Patil, *Conf. on Energy and Environment*, Univ. of Pune, 1995.

"Particle Size Distribution of Atmospheric Aerosols at a Traffic Junction in Bombay" A. Vinod Kumar and Rashmi S. Patil, *Annual Conference on Aerosol Science and Technology*, Bombay, Jan. 1994.

"Indoor Air Quality in Commercial Buildings Emerging Concerns", S. Saxena and Rashmi S Patil, *All India Convention on Air Pollution* Organized by NCTD and MPCB, Bombay, June 1993. **[Best Paper Award]**

"Effective Meteorological Data Representation with the Developing Countries as the Cynosure" Devdutta S. Niyogi and Rashmi S Patil, *All India Convention on Air Pollution*, Organized by NCTD and MPCB, Bombay, June 1993

"Ambient Air Quality at Traffic Junctions", A Vinod Kumar and Rashmi S Patil, *4th Annual Conference of Indian Aerosol Science and Technology Association*, Ahmedabad, Oct. 1992.

"Receptor Modelling of Aerosols" V K Sharma and Rashmi S Patil, *National Seminar on Environmental Management*, BARC, Feb. 1992

"Size Distribution of Atmospheric Aerosols using QCM Cascade Impactor" V K Sharma and Rashmi S Patil, *Second Annual Conference of IASTA*, BARC, Bombay, Feb. 1990.

INVITED LECTURES: [Total : 46]

a) Air Quality Monitoring, Modelling and Management

- Air Quality Modelling for Health Benefit Assessment of Alternate Control Strategies ,Workshop organized by AIT, Gurgaon Haryana with NCSU, US under US NSF program, March, 2011
- Modelling for Health Benefit Assessment of Air Quality Management Strategies , Workshop Organized by NEERI ,Mumbai ,Khandala ,Nov 2010
- Air Quality Monitoring and Modelling for Assessment of Impacts in Urban Regions, Nat Discussion Meeting on Atmospheric Sciences, Organised by DST, GOI, IISc, Bangalore, 22-24th Oct., 2009.
- Climate Change and other Significant Aspects for Air Pollution, Conf. on "Show Casing Science", Organized by Indian Women Scientists", 8-10th March, 08, Delhi.
- Application of Air Quality Models for Environmental Management, NITIE, Bombay, Dec. 07.
- Role of Indoor Air Quality in Air Quality Management, Round Table organized by NEERI, March 07, Theme Address.
- Assessment of Air Pollution Issues in India, Indian Women Sc. Assoc. IX All India Meeting, Nov. 2004
- Ozone Layer Depletion : Causes and Remedies, MPCB, Mumbai, Sept. 2004
- World Bank and MoEF sponsored Training Program, IIT Bombay, March 2003
- UGC Training Programme, Dept. of Mathematics, Bangalore University, 2002.
- Training Program at IPCL, Baroda, 1997
- World Bank sponsored Training Program at IIT Bombay, 1996, 1993
- Training Program, Dept. of Statistics, Univ. of Bombay, 1995
- Tata Energy Research Institute, Delhi, 1994
- Dept. of Marine, Earth and Atm. Sciences, NCSU, Raleigh, USA, 1994
- Training Program, NITIE, Bombay, 1997, 1994
- IDBI Sponsored Workshop, Bombay, 1993, 1994
- Dept. of Environment, Govt. of Maharashtra, 1993
- Nat. Soc. For Air Pollution Control, Bombay, 1990

b) Indoor Air Pollution and Human Exposure Assessment

- Invited talk at an Indo-French Seminar on Indoor Air Quality at Nantes, France by IFCPAR and Ecole Des Mines De Nantes, 30th May - 3rd June 2010 on "The Challenges in Monitoring and Control of Indoor Air Pollution due to Combustion in Kitchens in Urban and Rural Areas".
- Dept. of Env'tl Health Sciences, School of Public Health, University of California Berkeley on Indoor Air Pollution due to Domestic Combustion 11th June, 2010.
- Indoor Air Quality in Schools : American Int. School of Bombay, March 2008.

- Int. College for Girls, Jaipur, Nov. 8, 2005.
 - Keynote address in a Workshop organized by Jodhpur Univ., March 7, 2005 on Environmental and Pollution Awareness
 - High level conference organized by NEERI and MPCB, Mumbai, March, 2005
 - World Bank sponsored Training Program, IIT Bombay, Jan. 2002, Feb. 2003
 - UGC Training Programme, Dept. of Mathematics, Bangalore University, June 2002 and Dec. 2003
 - BARC, Nov. 1998, 1997
 - CPCB, Delhi, 1997
 - Indian Women Scientists Association, Nehru Centre, Bombay, 1997
- c) Environmental Impact Assessment and Management
- Transportation Engg. Dept., IIT Bombay, July 2003.
 - Centre for Appropriate Technology, IIT Bombay, Feb. 2003
 - World Bank and MoEF sponsored Training Programme, IIT Bombay, February 2002; March 2002
 - MoEF sponsored Training Program, IIT Bombay, Feb. 2000
 - Indo-British Training Program, Bombay 1998
 - IDBI sponsored Training Program, Bombay, 1973, 1996, 1994
 - World Bank sponsored Training Program at IIT Bombay, 1996
 - ICICI sponsored Training Program, Bombay, 1994
 - RCF, Bombay 1995
 - World Bank, USEPA Office, and CEQ, Washington US, 1994
 - IGIDR – NABARD sponsored Workshop, Bombay 1994
 - TRDDC, Pune, 1993
 - MoEF, GOI, New Delhi, 1993

RESEARCH PROJECTS:

a) SPONSORED PROJECTS [Total : 8]

“Sampling and Analysis Techniques for Bioaerosols : Standardization and Field Evaluation for Airborne Endotoxin”, R S Patil and Suparna Mukherji Sponsored by Dept. of Sc. & Tech., GOI, 2008-2011.

“Measurement and Characterization of Airborne Biological Particles” R S Patil and S Gangamma ,Sponsored by DST ,GOI,2009-2012

“Comparative Study of Traditional and Improved Chulhas with respect to Indoor Air Pollution”; Collaboration with IWSA and sponsored by MNES, Delhi, 2000-2003.

Indo-US Collaborative Research Project on "Modelling of Urban and Regional Scale Air Pollution in India" Sethuraman, NCSU, Raleigh U.S., R.V. Madala, NRL, Washington, US and Rashmi S Patil, IIT Bombay, Sponsored by USIF and ONR/NRL (1997-2004).

"Monitoring of Human Exposure to Air Pollution in Highly Industrial Area" Sponsored by CPCB, Delhi, (1994 - 1997); Rashmi S. Patil.

"Preparation of Manuals on EIA of Developmental Projects" Sponsored by UNDP through MEF, GOI, 1994 - 1995 (Principal Investigator)

"Action Plan on Environmental Impact Assessment Projects", Sponsored by United Nations Development Programme through Ministry of Environment and Forests, GOI. (Principal Investigator) ; (1992 - 1993)

"A Quantitative Methodology for Environmental Impact Assessment", DST sponsored, (Co-Investigator), 1986-1988.

"Monitoring of Air Pollution in Industrial Complex", DST sponsored (1979-1983), Principal Investigator.

b) CONSULTANCY PROJECTS [Total : 34]

"Development of Framework and Audits of Environmental Performance of Units of RCF Ltd., Chembur", March 2013, Team Member (under consideration)

"Exploratory Study for Estimation of Contributory Factors to Pulmonary Tuberculosis in Vulnerable Urban and Informal Settlements in Mumbai", Coordinated by The Foundation of Medical Research, Mumbai and funded by The Wellcome Trust and Medical Research Council, London UK under Environmental Exposure and Chronic Disease Program, Duration two years from Jan. 2013, Advisor.

Newcastle and Mumbai Partnership on Sustainability and Environment Research (NAMPSER); Co-Investigator, Funded by UKIERI and UGC (UK-India Education and Research Initiative). UK Lead Institute : School of Civil Engineering & Geosciences, Newcastle University, Newcastle, Upon Tyne, NE1 7 RU, UK. India Lead Institute : CESE, IIT Bombay Mumbai – 400 076. Team Member ,2013

"Development of Air Pollution Source Profiles for Indian Cities", Project by CPCB, Virendra Sethi and Rashmi S. Patil, 2006-2010

"Ambient Air and Marine Water Quality Monitoring for Jawaharlal Nehru Port", JNPT, Nhava Sheva, Bombay; Rashmi S. Patil and S.K. Gupta, 2005-2012

"Mumbai Port Trust – Air Monitoring for Coal Handling at Haji Bunder", WAPCOS, GOI, Rashmi S. Patil and S.K. Gupta, March 2006.

"Environmental Data Base Management System for Power Plants in Maharashtra", MESB, Govt. of Maharashtra, March – October, 2000, R.S. Patil.

"Strengthening of Air Quality Monitoring Network for Mumbai, Consultant to Environmental Management Centre", Mumbai, May 2002.

"Project Implementation Plan for Capacity Building in EIA", The World Bank, Washington US and MoEF, GOI, Feb. – April, 2000, Rashmi S. Patil and S.K. Gupta.

"EIA of a Combined Hazardous Waste Disposal Facility", MIDC, Govt. Of Maharashtra: 1997-1998; S.K. Gupta and Rashmi S. Patil.

"Air Dispersion Modelling of Thermal Power Stations using ISC Software" MSEB, Mumbai, 1999, Rashmi S. Patil, Consultant.

"Air Pollution Dispersion Modelling for Trombay Thermal Power Station", Tata Consultancy

Engineers, Sept. 1997, Rashmi S. Patil, Consultant.

"Field Air Monitoring for Mumbai Urban Transport Project", AIC-WATSON Ltd., 1996; Rashmi S. Patil and S.K. Gupta.

"Indoor Air Quality Monitoring of IDBI Tower", IDBI, March 1996, H. Veeramani and Rashmi S. Patil.

"Estimation of Efficiency of a Respirable Particulate Sampler", Netel Chromatographs Ltd., 1995, Rashmi S. Patil.

"EIA of Konkan Railway Project", Goa Sector, Rashmi S. Patil and S.K. Gupta, 1993 - 1995

Consultant, Tata Energy Research Institute (1993-1994), Rashmi S. Patil.

Consultant, EIA, Tata Research Development and Design Centre (1993-1994), Rashmi S. Patil.

"Air Quality Prediction of Proposed Marine Chemical Terminal at Jawaharlal Nehru Port", Nhava-Sheva, Feb. 1994; Rashmi S. Patil, P.M. Modak and S.K. Gupta.

"Feasibility Report for the Proposed Centre for Environmental Studies at Bhubaneswar, Orissa" for Orissa Environment Programme under Indo-Norwegian Cooperation (7 Team Members), 1994.

"Ambient Air and Marine Water Quality Monitoring at Jawaharlal Nehru Port", JNPT, 1991-1993 (4 Team Members).

"Determination of Various Parameters of Smoke", Explosives Research and Development Lab, DRDO, Pune, 1991, Rashmi S. Patil.

"Physico Chemical Baseline Data for EIA of Singareni Collieries" Kirloskar Consultants Ltd., 1991, Rashmi S. Patil.

"Dispersion Modelling of Stack Emissions from RCF at Thal-Vaishet", RCF, Oct. 1990, P.M. Modak and Rashmi S. Patil.

"Size Analysis of Atmospheric Aerosols at RCF, Chembur", RCF, Sept. 1990, Rashmi S. Patil.

Consultant, Tata Energy Research Institute (Project on AQIA of Thermal Power Plant, Bombay) July 1990, Rashmi S. Patil.

"Dispersion Modelling for Emissions from Fertiliser Complex", RCF Ltd., Thal and Chembur Units, July 1989, P.M. Modak and Rashmi S. Patil.

"Dispersion Modelling for Refinery Emissions", Bharat Petroleum Corpn. Ltd., Bombay, Jan. 1989, P.M. Modak and Rashmi S. Patil.

"Determination of Particle Count", Aditya Environmental Services, 1988, Rashmi S. Patil.

"Ambient Air Quality Survey at Ambarnath and Stack Monitoring at Roha", Maharashtra Pollution Control Board, 1987, Rashmi S. Patil.

"Identification of Three Air Monitoring Locations within RCF Complex", Chembur, Bombay 1985, P.M. Modak and Rashmi S. Patil.

"Environmental Impact Assessment of Bombay Trans-Harbour Link", Maharashtra Pollution Control Board, 1982 (Co-investigator)

CONFERENCE / WORKSHOP ORGANIZED:

SERB School on Air Quality Management, IIT Bombay, Dec. 6-7, 2012, Sponsored by DST, GOI, Co-Coordinator, Coordinator Prof V Sethi

Workshop on Air Quality Modelling and Management for Urban and Industrial Areas in India, IIT Bombay, May 10-12, 2012, Co-Coordinator, Coordinator Prof V Sethi

Environmental Impact Assessment, Training Programme sponsored by World Bank through MoEF, GOI, 4th – 8th February 2002 and 11th – 15th March, 2002.

"Environmental Impact Assessment" Co-Coordinator, Indo-British Training Programme, 9th – 21st Feb., 1998.

"EIA of Industrial Projects", World Bank Sponsored Training Programme, 1996, Rashmi S. Patil.

"Sampling and Analysis of Air and Water Pollutants" World Bank Sponsored Training Program, 1996, S.K. Gupta and Rashmi S. Patil.

"Action Plans on EIA" Workshop Sponsored by UNDP and MoEF, GOI, Rashmi S. Patil and S.K. Gupta, June 1995.

Technical Program Committee Member, European Aerosol Conference - 95, Helsinki, Finland, Sept. 18 - 22, 1995.

Coordinator, Training Programme on Air Quality Management, Sponsored by MoEF, GOI, and funded by World Bank, Sept. 6-10, 1993

Member, Technical Programme Committee, Indian Aerosol Science and Technology Association Annual Conferences, 1990 -

Convener, International Workshop on "Environmental Science and Engineering Education" sponsored by Gesellschaft Fuer Technische Zusammenarbeit (GTZ) of Federal Republic of Germany, Jan. 1988.

Air Pollution Monitoring and Management, WHO Sponsored Workshop, IIT Bombay, Oct., 1984, R.S. Patil (Co-Coordinator).

PROFESSIONAL ACTIVITIES / HONORARY WORK:

a) COMMITTEE MEMBER

Member, Atmospheric and Space Science Board of Studies Committee, Pune University 19/4/2012 for two years.

Member, Scientific Program Committee of the Environmental Health Conference in Basel; from 19-23rd Aug. 2013; Organized by Swiss Tropical and Public Health Institute, Univ. of Basel, with Int. Soc. Of Exposure Sciences (ISES), Int. Soc. Of Env'tl. Epidemiology (ISEE) and Int. Soc. of Indoor Air Quality (ISIAQ).

Nominated as a member of MAPAN (Monitoring Air Pollution Automatic Network) Project Monitoring Committee (PMC), IITM, Pune, March 2013, 5 years.

Conference and Inauguration of Centre of Environmental Research and Training (CERT) Vashi, Navi Mumbai, 16th June, 2012; Honoured for Contribution to Research in Air Pollution.

Member, Expert Committee for Promotion Interviews at BARC, Trombay; 13/2/2012, 13/6/2012.

Member, Expert Committee for Civil Engineering Faculty Selection, IIT Kanpur, 12th March, 2013.

Chairperson, Enquiry Committee for a Staff Nurse, IIT Hospital, March 2012.

Chairperson, Session I 'Green Initiatives" Int. Symposium on a Sustainable Future – 2012, at IGIDR, Mumbai, Jan. 21-22, 2012.

Member, Program Advisory Committee in Atmospheric Sciences under SERC, DST, GOI, 2004 till Date

Expert Reviewer, Global Energy Assessment (GEA), Knowledge Module 4 : Health Impacts of Energy System; Int. Institute for Applied Systems Analysis, Austria, 2010

Member, Advisory Group on Air Quality and Health under Global Earth Observations (GEO) Task, CAPITA, Washington Univ., St Louis, US, June 2009.

Visitor's Nominee, Garhwal University, Srinagar, Uttarkand, 2009.

Visitor's Nominee, North East Hill University, Shillong, 2004-2005.

Member, Editorial Board, Asian Journal of Chemical and Environmental Research, May 2007-2010.

Member, Editorial Board, Jnl. of Scientific and Industrial Research, Published by NISCAIR, New Delhi, Jan. 2008 – Dec. 2010.

Member, National Expert Committee on Vehicular Pollution Control, CPCB, Delhi, 2008.

Member, Editorial Board, Environmental Fluid Mechanics, Kluwer Academic Publishers, 2001 – 2006.

Member, Nat. Advisory Committee, All India Seminar on Air Pollution and Health Impacts, IIT Roorkee, Feb. 2006.

Member, Organizing Committee, Int. Conf. on Mesoscale Processes in Atmosphere, Feb. 2006, IIT Delhi.

Member, Organizing Committee, Asian Aerosol Conference, Dec. 2005, Mumbai.
Invited expert for Roundtable on Policy Instruments for Air Quality Improvement in South

Asian Cities, 10-11 May, 2005, New Delhi, Organised by Asian Development Bank.

Invited expert for meetings for Air Pollution and its Impact on Urban Health organized by NEERI, MPCB. Dec. 04 – Jan. 05.

Invited expert for workshop on “Urban Air Quality Management : Progress and Future Challenges”, Organised by CPCB and World Bank, 18th to 19th Oct., 2004 at Delhi.

Expert Member, Selection Committee for SO/F to SO/G, BARC, June 2005, 2007 and 2010.

Member, National Organizing Committee for National Seminar on Role of Environment in Industry and Sustainable Development in 21st Century, Orissa School of Mining Engineering, Keonjhar, Oct. 29-30, 2005.

Member, Int. Advisory Technical Committee, 6th Int. Aerosol Conference, Sept. 8-13, 2002, Taipei, Taiwan.

Member, Int. Advisory Committee, 2nd Asian Aerosol Conf., July 1-4, 2001, Pusan, Korea.

Member, Advisory Committee on Environment, MCGM, Govt. of Maharashtra, 1999-todate.

Member, Technical Advisory Committee, on Health Effects of Rural Pollution, Project by IGIDR, Bombay, under MoEF, India and UNDP, March 1999.

Member, Expert Committee on Formulation of Guidelines on Air Pollution Dispersion Modelling, CPCB, Feb. 1995.

Invited Participant, Workshop on Capacity Building in EIA, Organized by British Council, Bombay, Jan. 1995.

Member, Committee on Environmental Planning and Coordination, Ministry of Petroleum and Natural Gas, GOI, 1993 - 1995

Member, Working Committee on URBAIR Project under Metropolitan Environment Improvement Programme, Sponsored by DOEn, Govt. of Maharashtra, and funded by World Bank, 1993

Member, Managing Committee, Indian Aerosol Science and Technology Association, 1993

Member, Inter-Agency Project (IAEA, WHO, UNIDO, UNEP) on Environmental Health and Risk Assessment - Working Group on Study of Air Emissions, 1990.

Member, Technical Committee of Maharashtra Pollution Control Board, 1989.

Member, Editorial Board, Scavenger, 1991

Member, Editorial Board of Indian Aerosol Science and Technology Association Newsletter, 1988

Member, SOCLEEN, Bombay

Member, Indian Association of Air Pollution Control

Member, Indian Environmental Association

b) REVIEWER/REFEREE

Examiner, MNIT, Jaipur Ph.D. Thesis of Ms. Parul Gupta, 2013.

Examiner, EAD, BARC, M.Tech. Thesis Dissertation Mr. Mahesh Tiwari, June 2012.

Examiner, Dept. of Space & Atmospheric Science, Pune University, Ph.D. Thesis of Mr. Sanjay D. More, Sept. 2012.

Review of Projects, Ministry of Earth Sciences, Delhi, 5/3/2013.

Reviewer, Research projects, Dept. of Science & Technology, Atmospheric Sciences under SERC, 2004 till date.

Reviewer, Manuscripts for Journals like : Journal of Science and Total Environment, Atmospheric Environment, Urban Climate.

Peer Reviewer, Int. Journal of Environment and Pollution, Inter Sc. Publishers, 2010

Reviewer Natural Environment Research Council, UK, Research project on Clean Air for London, May 09.

Reviewer, Nat. Env't. Res. Council, UK, Research Proposal, Particulate Pollution in London, (PAPILON, 2004)

Reviewer, Research Projects, Atmospheric Sciences under SERC, DST, 2004 till date.

Reviewed manuscript for Journals like : Atmospheric Environment, Aerosol Science and Technology, Atmospheric Pollution Res. and Int. Jnl. of Environment & Waste Management

Nominated Review Committee Member of the Journal entitled, "Environmental Monitoring and Assessment" Kluwer Academic Publ., 1996 to date.

Reviewer, Research Projects, Dept. of Science and Technology, GOI, N.Delhi, 1990.

Referee for the Journal: "Energy, Environment Monitor", 1988.

Referee for the Journal "Mausam" 1980.

Examined about 25 PhD Thesis from IITD, Pune University, IITM Pune, Mumbai Univ. etc.

Ph.D. THESIS SUPERVISED:

- Air Quality Modelling for Optimization of Pollution Management Strategies (in progress)
- Indoor Air Quality and Energy Consumption Nexus in Air Conditioned Commercial Buildings (in progress)
- Airborne Bacteria and Endotoxin in Wastewater Treatment Plants in Mumbai : Characteristics and Associated Health Effects (submitted, 2013)

- Characterization and Source Apportionment of Ambient PM_{2.5} and PM₁₀ in Mumbai and Pune (2009)(Co-Guide)
- Environmental Monitoring and Assessment of a Port and Harbour Region (2008)(Co-Guide)
- Monitoring and Modelling of Ambient Air and Marine Water Quality for a Port and Harbour Region (2002).
- Experimental and Theoretical Determination of Mixing Height and its Application to Air Pollution Dispersion Modelling (2001).
- Integrated Exposure Assessment of Airborne Pollutants in an Urban Community using Biomass and Kerosene Cooking Fuels (1999).
- Assessment of Human Exposure to Air Pollution in an Industrial cum Residential Area of Mumbai (1998)
- Monitoring and Modelling of Ambient Air Quality Near Two Traffic Junctions in Mumbai(1998)
- Monitoring and Modelling of Atmospheric Aerosols in an Industrial Region of Bombay (1992).

M.TECH. DISSERTATION SUPERVISED : Total 57

INFORMATION SUMMARY

Sr.No.	Item	Number in various years			
		2005-2013 (Last 5 yrs.)	1995-2005	1975-1995	Total
1	Jnl. Publications	12	30	19	61
2	Int. Conf. etc. Proceedings	21	14	4	36
3	Nat. Conf. etc. Proceedings	9	11	6	21
4	Invited Talks	12	20	14	46
5	Research Projects	8	15	15	35
6	M.Tech. Thesis Guided	22	18	17	57
7	Ph.D. Thesis Guided	5	5	1	11