

CURRICULUM VITAE

01. Name & Designation: **Rahul Mohan**
Project Director (Science) & Scientist-E
02. Date of birth: 6th December 1967
03. Department/Organization National Centre for Antarctic & Ocean Research
Earth System Science Organization
Ministry of Earth Sciences
Headland Sada, Goa - 403 804
04. Address National Centre for Antarctic & Ocean Research
Ministry of Earth Sciences
Headland Sada, Goa - 403 804
- TEL: 0832-2525531
FAX: 0832-2520877
Email: rahulmohan@ncaor.gov.in
rahulmohangupta@gmail.com

05. Biographical data

(i) Academic qualifications:

Degree	Year	University / Institute
B.Sc. (Hons.)	1988	Banaras Hindu University
M.Sc. Geology	1990	Banaras Hindu University (Second Rank in Order of Merit)
Ph.D. Geology	1997	Banaras Hindu University & National Institute of Oceanography, Goa

*Ph D Title: Seasonal variation of planktic foraminiferal flux: Sediment trap studies from Southern Bay of Bengal.

*Ph D Guide: Prof.M.S.Srinivasan (BHU) & Dr M V S Guptha (NIO), Banaras Hindu University & National Institute of Oceanography.

(ii) Positions held at NCAOR:

- Scientist – C -Project Mode
National Centre for Antarctic
And Ocean Research, Goa-India April 2003 – May 2006
- Scientist –C
National Centre for Antarctic
And Ocean Research, Goa-India May 2006 – Jan.2008
- Scientist – C & Project Director
National Centre for Antarctic
And Ocean Research, Goa-India Jan 2008 – May 2010
- Scientist – D & Project Director
National Centre for Antarctic
And Ocean Research, Goa-India May 2010 – Dec.2014
- Scientist-E & Project Director
National Centre for Antarctic
And Ocean Research, Goa-India Jan.2015 - Continuing

(iii) Membership of academic and professional bodies

- a. Life Fellow, Geological Society of India

(iv) Awards / Honors

- Awarded the Late Prof. Raj Nath Gold Medal for securing highest percentage of marks in Paleontology at M.Sc. Geology, 1990 and honored with 2nd order of merit at the M.Sc. Geology Examination, 1990.
- Qualified and awarded the "Joint C.S.I.R./U.G.C. (National Entrance Test) Junior Research Fellow /Lectureship Examination " held on 31st Dec., 1990.
- Awarded the C.S.I.R. Senior Research Fellowship (SRF), 1994
- Awarded the C.S.I.R. Research Associateship (RA), 1997
- Awarded the Fast Track Young Scientist Award by Department of Science and Technology in 2002.
- Awarded Certificate of Merit by Ministry of Earth Science on 27-July-2007 for studies on Diatoms at NCAOR
- Awarded Prof. C.Naganna Gold Medal by the Mineralogical Society of India on 17-March-2011 at Mysore University for studies on coccolithophores

- 06. (a) Major Field of Specialization** Marine micropaleontology
- (b) Research Specialization** Marine micropaleontology, Marine Geology and Paleoceanography.
- 08. Area of Current Work:** Indian Scientific Expedition to Antarctica – Science –Programme Implementation
- Micropaleontology with special reference to Coccolithophores and Diatoms
- 09. Experience of Guiding Research** Supervised research projects financed by the Ministry of Earth Sciences Current research interests include Past climate and oceanic variability
- 01 Student Ph.D. awarded
01 Student working for his Ph.D. Thesis
- 10. Administrative Experience**
- a. Member of Bid Committee, IGC-2020
 - b. SCAR-CBET Member from India which deals with fellowships and outreach program of SCAR.
 - c. COMNAP – Outreach group: Member from India.
 - d. Member, Larsemann Hills ASMA Sub-group at COMNAP
 - e. Member, Board of Studies for Hydrography at Goa University
 - f. Member, National SCAR Committee of the Indian National Science Academy (INSA)
 - g. Asian Forum for Polar Science: National Co-ordinator from India
 - h. PAGES – YSM Scientific Committee member,–PAGES 2013
 - i. Member, Indian delegation to Antarctic Treaty Consultative Meeting
 - j. Indian member in Policy Board of SIOS, Norway
 - k. Organising Secretary, XII-ISAES (SCAR) held at Goa, 12-17 July 2015.
- 11. Research Publications** More than 50 publications

Last 05 years PUBLICATION LIST

[1] **R. Mohan**, S. K. Shukla, S. M. Patil, S. S. Shetye, K.K. Kerkar and R. Ravindra.(2010) Diatom Morphometry and its application in deciphering past climatic changes. Gondwana Geological Society –Special Issue on Applied Micropaleontology [Guest Editors: P.Kundal and S K Humane; Invited Paper]. 25 (1), pp.133-138

[2] A.C. Narayana, **Rahul Mohan**, Ravi Mishra (2010) A Preliminary Study on Morphology and Surface Textures of Quartz Grains from Fresh Water Lakes of McLeod Island, Larsemann Hills, East Antarctica. Current Science,, Vol. 99, No. 10, pp.1420-1424.

[3] Satya Prakash, R. Ramesh, M. S. Sheshshayee, **Rahul Mohan** and M Sudhakar,(2010) Effect of iron enrichment on nitrogen assimilation by marine planktons in the Southern Ocean. Current Science, Vol.99, No.10, pp.1400-1404

[4] N. Anilkumar, **Rahul Mohan**, Sunil Kumar Shukla, S. M. Pednekar,M. Sudhakar and R. Ravindra (2010) Signature of coastal upwelling in Prydz Bay, East Antarctica during austral summer 2006, CURRENT SCIENCE, VOL. 99, No. 10, pp.1390-1394.

[5] Manish Tiwari, **Rahul Mohan**, Thamban Meloth, Sushant S.Naik, M. Sudhakar (2011) On Effect of Varying Frontal Systems on the Stable Oxygen and Carbon Isotopic Composition of the modern Planktic Foraminifera in the Southern Ocean. Current Science, Vol.100, No.6, pp.811-887.

[6] News- **Rahul Mohan** and Ratan Kar (2010) National Conference on Climatic Changes during the Quaternary: Special reference to Polar regions and Southern Ocean. Jour.Geol.Soc.India Vol.75, No.2, p.447-448

[7] **Rahul Mohan**, Anayat A. Quarshi, M. Thamban and M. Sudhakar (2011) Diatoms from the surface waters of the Southern Ocean (Indian sector) during the austral summer of 2004. Current Science, 100(8),

[8] Suhas Shetye, **Rahul Mohan**, Sunil Kumar Shukla, Sudhakar Maruthadu, Rasik Ravindra (2011) Variability of *Nonionellina labradorica* Dawson in Surface Sediments from Kongsfjorden, West Spitsbergen. *Acta Geologica Sinica (English Edition)* Vol. 85, No. 3 pp. 801–840 June 2011

[9] Deepti V. G. Dessai, Ksh.Tomchou Singh, **Rahul Mohan**, G. N. Nayak and M. Sudhakar (2011) Reading source and processes from distribution of suspended particulate matter and its selected elemental chemistry in Southern and Indian Oceans. *Current Science*, 100(9), 2011.

[10] Rasik Ravindra and **Rahul Mohan** (2011). Three decades of polar science in India. *Journal of Geological Society of India*, 78, 5-6.

[11] **Rahul Mohan**, Sunil Kumar Shukla, Shramik M. Patil, Suhas Shetye, Karima K.Kerkar (2011) Diatoms from the surface sediments of Enderby Basin of Indian sector of Southern Ocean. *Journal of Geological Society of India*, Vol.78, July 2011, pp.36-44.

[12] Madhusoodhanan C. Manoj, Meloth Thamban, Natani Basavaiah, **Rahul Mohan** (2012) Evidence for climatic and oceanographic controls on terrigenous sediment supply to the Indian Ocean sector of the Southern Ocean over the past 63,000 years *Geo-Marine Letters: Volume 32, Issue 3, Page 251-265*

[13] Naveen Gandhi, R. Ramesh, A. H. Laskar, M. S. Sheshshayee, Suhas Shetye, N. Anilkumar, Shramik M. Patil, **Rahul Mohan** (2012) Zonal variability in productivity and nitrogen uptake rates in the southwestern Indian Ocean and Southern Ocean. *Deep Sea Research I* 67 (August 2012) 32-43.

[14] Suhas Shetye, Marathadu Sudhakar, Shramik Patil, **Rahul Mohan**, Amzad Laskar, Rengaswamy Ramesh, (2012) Physical or Biological processes determine the sea surface pCO₂ in the Indian Sector of the Southern Ocean. *Advances in Geosciences* v. 28:79-92

[15] Suhas S. Shetye, **R. Mohan**, S. K. Shukla, M. Sudhakar and S. Gazi. (2012) Zirconium on benthic foraminiferal tests in the Arctic: a plausible

shield towards ocean acidification. (Open Access Scientific Report, 2012).

[16] Shukla, S.K. and **Rahul Mohan** (2013). The contribution of diatoms to worldwide crude oil deposits. In: the Book entitled "The Science of Algal Fuels: Cellular Origin, Life in Extreme Habitats and Astrobiology". Eds.: R. Gordon & J. Seckbach. Dordrecht, Springer Science, pp.355-382 DOI 10.1007/978-94-007-5110-1_20.

[17] Suhas Shetye, **Rahul Mohan**, Abhilash Nair (2013) Latitudinal shifts in the Polar Front in Indian sector of the Southern Ocean:evidences from Silicoflagellate assemblage. Geosciences Journal DOI 10.1007/s12303-013-0061-8.

[18] Shramik Patil, **Rahul Mohan**, Suhas Shetye, Sahina Gazi (2013) Phytoplankton abundance and community structure in the Antarctic polar frontal region during austral summer of 2009. Chinese Journal of Oceanology and Limnology 31(1), 21-30.

[19] Manoj, M. C., Thamban, M., Sahana, A., **Mohan, R.**, Mahender, K. (2013) Provenance and variability of ice rafted debris from the Indian sector of the Southern Ocean during the last 22000 years. Journal of Earth System Science, 122, 2. 491-501.

[20] Suhas S Shetye, Martuthdau Sudhakar, **Rahul Mohan** (2013) Signatures of acidification from Enderby Basin in Indian sector of the Southern Ocean. International Journal of Earth Sciences and Engineering, vol.06 No.3, p.483-488.

[21] Shramik Patil, **Rahul Mohan**, Suhas Shetye, Sahina Gazi, Syed Jafar (2014) Morphological variability of *Emiliana huxleyi* in the Indian Sector of the Southern Ocean during the austral summer of 2010. Marine Micropaleontology 107:44-58.

[22] Suhas S. Shetye, Maruthadu Sudhakar, **Rahul Mohan**, Babula Jena (2014) Redox potential of Arabian Sea and Bay of Bengal in the context of climate change as reflected by oceanic sediments. Journal of Earth Science, Vol. 25 (2): 366-370).

[23] Shramik Patil, **Rahul Mohan**, Suhas Shetye, Sahina Gazi, Syed Jafar (2014) *Prymnesium neolepis* (Prymnesiophyceae), a siliceous Haptophyte from the Southern Indian Ocean. *Micropaleontology*, (USA) vol.60.no.5,pp.475-481.

[24] Suhas Shetye, **Rahul Mohan**, Syed A. Jafar, Abhilash Nair, Shramik Patil, Rajesh Asthana, Sahina Gazi (2014) Diatom bloom driven Silica depletion under Antarctic sea ice: evidence from Sponge spicules. *Current Science*, vol.107,No.2,p.273-277.

[25] Anish Kumar Warriar, B.S.Mahesh, **Rahul Mohan**, R.Shankar, Rajesh Asthana, Rasik Ravindra (2014) Glacial-interglacial climatic variations at the Schirmacher Oasis, East Antarctica: The first report from environmental magnetism. *Paleogeography, Paleoclimatology, Palaeoecology*, v.412, p.249-260.

[26] **Rahul Mohan**, Suhas S. Shetye, Manish Tiwari, Narayanpillai Anilkumar(2015) Secondary calcification in planktic foraminifera from the Indian sector of the Southern Ocean. *Acta Geologica Sinica*, vol.89,no.1,p.27-37.

[27] Satya Prakash, R.Ramesh, M.S.Sheshshayee, **Rahul Mohan**, M.Sudhakar (2015) Nitrogen uptake rates and f-ratios in the equatorial and Southern Indian Ocean. *Current Science*, vol.108, No.2, p.239-245.

[28] Shramik Patil, **Rahul Mohan**, Suhas Shetye, Sahina Gazi, Syed Jafar.(2015) *Petasaria heterolepis* (Prymnesiophyceae), from the Southern Indian Ocean. *Micropaleontology*, USA. vol. 61, no. 3 pp. 171-176.

[29]Abhilash Nair, **Rahul Mohan**, Suhas Shetye, Sahina Gazi and Syed Jafar (2015 May). Morphological variations of *Trigonium arcticum* (Brightwell) Cleve (Bacillariophyceae) from the surface sediments of Prydz Bay, East Antarctica . *Micropaleontology*. v. 61, no. 3

[30] Suhas S. Shetye, **Rahul Mohan**, Shramik Patil, Babula Jena, Racheal Chacko, Jenson V. George, Sharon Noronha, Neelu Singh (2015-August-In Press-Available Online). Oceanic pCO₂ in the Indian sector of the Southern

Ocean during the austral summer-winter transition phase - Deep Sea Research Part II. DSR2-D-14-00118R5,118B, pp. 250-260.

[31] Nair, A., **Rahul Mohan**, M.C. Manoj, and M. Thamban (2015), Glacial-interglacial variability in diatom abundance and valve size: Implication for Southern Ocean Paleoceanography. *Paleoceanography*, 30, doi: 10.1002/2014PA002680.

[32] Badanal Siddaiah Mahesh, Anish Kumar Warriar, **Rahul Mohan**, Manish Tiwari, Anila Babu, Aswathi Chandran, Rajesh Asthana and Rasik Ravindra. (2015) Response of Long Lake sediments to Antarctic climate: A perspective gained from sedimentary organic geochemistry and particle size analysis. *Polar Science*, p: 1-9.

[33] Anish Kumar Warriar, Hemant Pednekar, Mahesh B.S., Rahul Mohan and Sahina Gazi(2016)Sediment grain size and surface textural observations of quartz grains in late Quaternary lacustrine sediments from Schirmacher Oasis, East Antarctica: paleoenvironmental significance. *Polar Science*, p: