

Antarctica – Sharadindu Mukerji, Formerly of Geological Survey of India, Kolkata

Antarctica has been the heart of the Gondwanaland formed during the Pan-African event (600 to 500 Ma) and remained so before the supercontinent started breaking up into present day continental fragments approximately 200 million years ago. For obvious reasons, therefore, this frozen landmass has continued to be of great attraction for geoscientists the world over. While Australia led the world in unraveling the geology of a part of east Antarctica a little over 100 years ago, the central Dronning Maud Land (CDML) region facing the Indian-Ocean – Atlantic Ocean sector (of Southern Ocean) remained unexplored till 1958 when IGY (International Geophysical Year) was observed and many nations started actively participating in scientific exploration of the frozen continent.

Russians made significant contributions by coming out with very important basic observation on the geology of a large terrain within CDML. This work of the Russian provided the baseline information over which all later studies have been formulated.

India being part of the Gondwanaland, has special interests in the regions. Thus, Indian efforts towards geoscientific studies in CDML area of East Antarctica began with our first expedition in 1981-1982 austral season and has since, continued without break till the latest (31st expedition) in 2011-2012 austral season. In the course of these 31 expeditions till date our style and impact in Antarctica have graduated from novices in Antarctica science to a respected stature in the international scenario.

Contributions made by Indian geo-

logists during this period certainly take pride in this large scale transformation of Indian involvement in Antarctic science.

The proposed lecture will discuss the beginning of geoscientific study by India in Antarctica, its growth over the years, present status and future plans besides elaborating on practical difficulties which constrain our achievements and often performance in Antarctica. Lack of this background knowledge has sometimes given rise to controversies and feelings which are largely and unduly, not quite kind towards the people who are actually working it out in a terrain as inhospitable as Antarctica.

Summary of the lecture to be delivered at the monthly meeting of the Geological Society of India on 30 May 2012.