

**AN ATLAS FOR POLAR SCIENCE: THE CYBERCARTOGRAPHIC ATLAS OF ANTARCTICA****AND BEYOND**

P.L. Pulsifer, S. Caquard, D.R.F. Taylor

*Carleton University, Ottawa, Ontario, Canada*

The paper presents the status, current developments and future plans for the SCAR Cybercartographic Atlas of Antarctica Project (The Atlas) (<http://www.carleton.ca/gcrc/caap>). The project aims to establish an on-line spatial information system that facilitates discovering, utilizing, presenting and distributing existing information and data about Antarctica to a wide variety of users. The project is being developed under the Geographic Information program of the SCAR Experts Group on Geospatial Information.

The methods used to develop the atlas are based on user-centred design, interactivity and interoperability. Thus, design objectives focused on ease of use, effective user engagement and system extensibility respectively. From a technical perspective, The Atlas has been developed using open source software underpinned by an open standards framework.

The results of the current Atlas release cycle are presented, including a review of: the information and technical architecture used to develop content models; approaches to cartographic representation; pedagogical aspects of content; and systems developed to facilitate collaboration between Atlas developers and users. Several content modules are presented on topics ranging from glacier morphology to Antarctic exploration to environmental protection.

The current status of The Atlas is discussed in the context of plans for future developments during the International Polar Year and beyond.