



RECTAS



**A Report On Geospatial Metadata Workshop Conducted At The First Annual  
Conference Of The Geoinformation Society Of Nigeria**

**Held At  
Merit House, Abuja On November 26, 2003**

**Organized By  
USGS/GSDI & RECTAS**

**1.0 Funding / Sponsorship:**

This workshop was funded by GSDI Secretariat, USGS / EROS Data Centre, USA under the GSDI Small Grant for SDI Activities from which RECTAS has benefited.

**2.0 Workshop Objectives:**

The aim of the workshop is to assist participants to develop the necessary skill in capturing and publishing metadata for geospatial data holdings. In other words, the specific objectives are to explain the concepts and benefits of metadata to the participants; to review and adapt the ISO metadata content into an implementable metadata standard and to use existing metadata software tool to publish metadata.

**3.0 Workshop Programme:**

The one-day geospatial metadata workshop was carried out successfully with a good turnout of seventy-eight (78) participants (see the attached list of participants for details). The presenters were Dr. Jide Kufoniya (Executive Director of RECTAS) and Mr. Paul Borisade (Lecturer, RECTAS). Each of the participants was given a free copy of CD containing many existing software for creating (harvesting), validating and publishing geospatial metadata. The CD also contained a copy of the SDI Cookbook and the workshop presentation materials.

**3.1 Workshop Schedule:**

**1. Morning Session**

- Opening & Introduction: Chairperson/ President, GEOSON
- SDI Concepts and Components: Jide Kufoniya
- *BREAK*
- Introduction of Relevant Sections of the GI Policy for Nigeria: Jide Kufoniya
- Introduction to Metadata: Jide Kufoniya

- Review of ISO Metadata Standard: Jide Kufoniyi

## 2. Afternoon Session

- Implementation of Metadata: Jide Kufoniyi / Paul Borisade
  - Adoption of a Minimum Metadata Standard for Metadata Implementation*
  - Designing A Relational Data Structure for Metadata Implementation*
  - B R E A K*
  - Existing software for Metadata Implementation*
  - Test Implementation Aspects*
- Final Questions / Discussions: Jide Kufoniyi
- Closing: Chairperson/President, GEOSON

### 3.2 Activities:

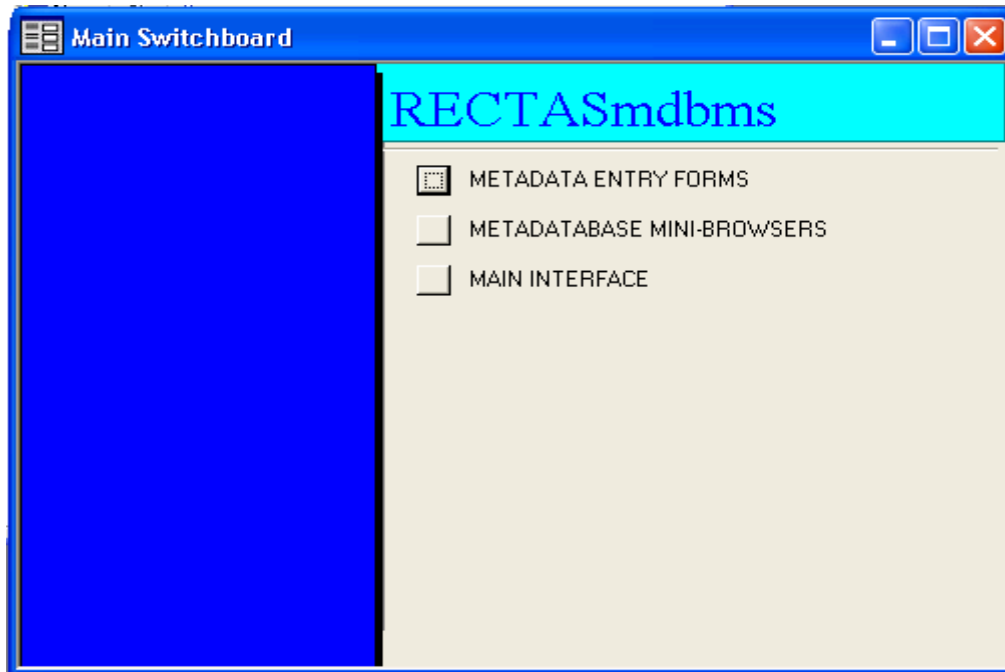
The workshop started around 10 a.m. to allow participants to register for the GEOSON conference and was declared open by the President of GEOSON, Prof. O.O. Ayeni. Dr Kufoniyi then took over to explain the objectives of the workshop and proceeded with the following presentations, accompanied by Mr Paul Borishade.

- Overview of SDI (ppt)
- GI Policy for Nigeria (ppt)
- Geospatial Data Standard Issues (ppt)
- Introduction To Metadata (ppt)
- Final Contents of ISO Standard for Geospatial Metadata (Word)
- ISO Status (ppt)
- Implementing Metadata Projects
- Sections 1 and 7 ENRAEMED to explain the elements of the Metadata structure (ppt)
- Clearinghouse
- Z39.50 and Significance
- Test Implementation with in-house facility and public domain software

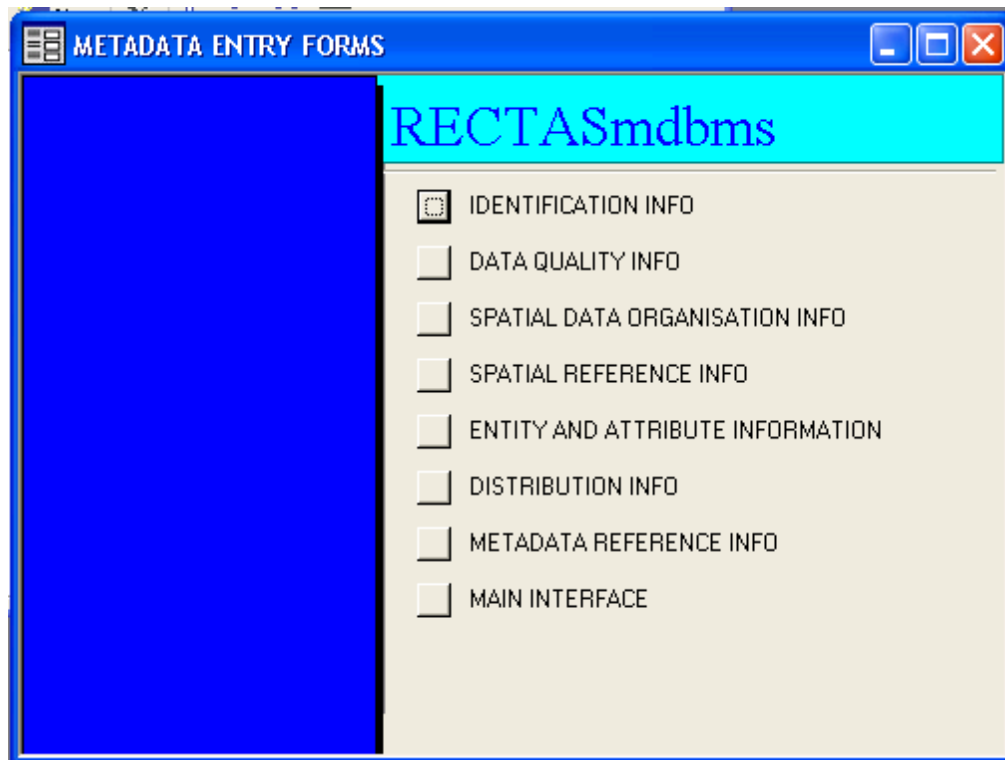
Specifically, the following software were demonstrated to the participants from installation stage to metadata implementation level:

1. Public domain (free) software: Metalite version 2 (Stand-alone), ArcView Metadata Collector (ArcView 3.x Extension) and the ENRAEMED (Stand-alone),
2. In-house self-tutored Metadata development using Microsoft Access (Ms Access) Relational Database Management System with accompanying graphic user interfaces (GUI) to both explain the concepts of metadata standards contents and validation procedures using the minimum metadata contents of the ISO Metadata Standard.

Below are screen dumps of the interfaces developed for the test implementation using Ms Access.



**Figure A1: Main Interface of the Ms Access Metadatabase**



**Figure A1.1: Main Interface To Metadabase Entry Forms(Categories)**

**Figure A1.1.1: Identification Information Entry Form (part)**

#### **4.0 Attendance:**

In all, seventy-eight (78) participants (including the presenters) from different organisations participated and benefited from the workshop. The organizations include: Regional Centre for Training in Aerospace Surveys (RECTAS), Surveying and Geoinformatics Department, University of Lagos; Department of Surveying and Photogrammetry, Enugu State University; Chevron Nig. Ltd.; Department of Surveying and Geoinformatics, Nnamdi Azikiwe University, Awka; Integrated Mapping Services, Port-Harcourt; Nigerian Institution of Surveyors; RESLARC Group; Polaris Surveys Limited (Lagos); EDGES Environmental Services, Abuja; GEOSYS Company (Lagos); GML Projects Ltd., Abuja; Surveyors Council of Nigeria (SURCON); States Survey Departments from Lagos, Cross-River, Anambra, Akwa Ibom, Ondo, etc; Ministry of Lands and Housing (Abeokuta, Ogun state) and a host of other personalities and organisations.

The full list of participants is attached as appendix “METADATA WORKSHOP ATTENDANCE LIST”- a word document.

### **5.0 Some General Questions and Discussions:**

During the general discussion session, participants discussed/raised many issues including: more clarifications on the order in which spatial data collection, vis-à-vis, metadata creation should normally be implemented; data security issues, how to educate those in the government and the general GI Community regarding the importance of metadata; marketing datasets and the need for a quick implementation of the country's GI policy to monitor the issues concerning SDI in general.

Responding to the issues raised, it was revealed that the GI Policy was in the process of being submitted to the Federal Executive Council by the Federal Ministry of Science and Technology at the time of the workshop. The participants were assured that the policy, when properly implemented, would certainly take care of most of the issues raised. For example, the policy would take care of establishment and monitoring of the common standards expected to guide creation/custodianship of spatial data: for both government-owned and private organizations.

It was pointed out that although an ISO-compliant metadata structure should be designed ahead of time, it was obvious that before one could talk of actually creating/populating the metadata database, the geospatial data for which the metadata would be created must have been acquired. Nowadays, enforcement of policy and security regarding spatial data sharing is very feasible, only if desired.

Having noted that many of the participants have no e-mail addresses, those concerned were strongly advised to get an e-mail account through any of the many ISPs in their cities, they were informed of such examples as yahoo and hotmail. This will assist them in getting current information such as the SDI Newsletter, EIS-Africa Newsletter, etc. apart from getting "internet-literate" and thereby being able to browse the net for relevant information.

From the workshop, the creation and publishing of metadata would enhance the marketing of geospatial datasets of an organisation as demonstrated in the workshop. Participants were also encouraged to get in touch with RECTAS regarding partnership for the implementation of metadata including capacity building and geospatial data production in general.

## **6.0 Conclusion:**

From the general comments and discussion session, it can be concluded that the workshop achieved its objectives. The President of the Geoinformation Society of Nigeria (GEOSON) expressed appreciation of the Society and all participants to USGS / EROS Data Centre USA and RECTAS for the execution of the workshop which he acclaimed as being successful.

The Centre plans to follow-up the workshop gains by monitoring implementation of metadata in the organizations represented at the workshop.



Dr Olajide Kufoniyi  
Executive Director  
RECTAS