Method of Automatic Aggregation, Effective Management and

Customizable Publishing of Geo-spatial Data File

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Abstract: Data is the foundation and result of scientific research, data sharing can make data more usefully valuable to a great extent. Geo-science data have attributes of space, time, integration, great capacity and multi-sources. It is costly work to capture geospatial data. Therefore, it is more necessary to share them among different organizations or scientists. For the effective geo-science research, scientists urgently need a platform which can aggregate manage, search, and get the distributed geospatial data automatically. Computer Network Information Center, CAS constructed a platform named Geospatial Data Cloud (www.gsloud.cn) for Chinese scientists to easily access global geospatial data. So, how to aggregate, organize, storage and manage massive geospatial and remote sense data is a problem to be solved urgently.

This paper splits the automatic aggregation and management geo-spatial data file issues into two sub-problems: Firstly, designs the geo-spatial data search engine which can aggregate and manage the distributed, multi-sourced, heterogeneous space science data automatically. Secondly, gives a customizable and efficient publishing method, it will greatly promote geo-spatial data sharing and application. The geo-spatial data file publishing method consists of three modules, module of data organization and management, module of datasets publishing and module of data products publishing. The realization of effectively geo-spatial data file publishing shall generally be effected by shall generally be effected by close cooperation with different module.

Keywords: Geo-spatial data file, Automatic aggregation, Customizable publishing, Gscloud