

A New Look at Geography of the World

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Abstract: *The rapid expansion of Web content has raised numerous concerns relating to reliable and meaningful information delivery. What users actually need is information that suits the task and context at hand, from a reliable knowledge source, with an assurance of information objectivity and integrity. In this respect, most of the numerous web sites that offer geographical information have, serious drawbacks: Often, advertisements are intermixed. It is hard to tell if information is slanted or censored. Facts presented are usually taken from one single source and not checked against others. Also, most information is of numeric nature. This is particularly true of databases like the one provided by the UN, the Worldbank, Wolfram Alpha, DBpedia, etc. A modest mixture of textual information and a selection of pictures are found in Factbook, Wikipedia, Britannica or Factfish, and maps are employed as in Open Street View, Google Street View, or Geonames. However, cultural or country-specific issues are never addressed. We have started what we believe is the first serious attempt to provide a site that tries to overcome some of those weaknesses in geographyoftheworld.org. Without reinventing the wheel, i.e. using information from various sources as far as copyright issues permit, we are building a site that beyond presenting numerical data we try to consolidate and verify such data and we dig deep into the hearts of countries by mentioning cultural aspects, stories typical for a certain region and a range of pictures with solid description showing the uniqueness of parts of the world.*

Index Terms: *Data Integration, Knowledge Discovery, Geographic Server, Data Exploration*

1. INTRODUCTION

As the web is doubling in less than two years, the delivery of reliable and interactively useable information is important. In this paper we describe fairly sophisticated Webserver [30] providing general geographical information. In addition to numeric information that we try to check against various sources we also want to get across the “spirit” of countries by providing special information, pictures with ample explanations, stories typical for the country and information on culture.

To summarize, we are trying to ensure information reliability by consolidating information (e.g. figures on various aspects of a country) by comparing numbers in different databases and taking only figures for granted if they agree in all databases examined. Otherwise we try to find out where the discrepancies come from. In many cases we are not successful and hope that the community will help.

As a start we concentrate on figures that are fairly static in time like size of countries, highest mountains, largest cities, typical (and dated pictures), stories about surprising facts or curiosities concerning a country, etc. Figures that change rapidly in time are handled by re-importing certain parts of some databases, and by tying in the community in many countries of the world, see Section 8.

We do not concentrate on figures or mere facts as such, but allow users to experiment with figures by comparing parameters both concerning countries and groups of countries. This allows determining regions of the world with particular positive or negative aspects, as required by a user’s interest. We also use at least three sources for maps, one version allowing adding links to arbitrary information at any point in the map to augment and adapt maps to varying information needs.

However, the dominating feature of our server is that we do not just want to present numerical facts about countries, but a large set of typical and well-texted pictures, stories that are typical in some way (be it because of special folklore, legends, aspects of natures, interesting comparisons of figures with other countries) and emphasizing cultural aspects from Nobel prize winners to UNESCO heritage sites to National Parks.

To do this in a systematic way presents many challenges. It starts with the fact that it is not even clear what a country is. Although it sounds reasonable to take the official 193 UN countries (and we use this list as main guideline) this decision is contentious, as shown by many examples: Cyprus is considered one UN country, yet de facto it consists of a Greek and a Turkish part and some pockets of land belonging to the UK overseas territories. Most would consider Taiwan a separate country, yet China’s “one country” policy has never allowed Taiwan to