

Abstract

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The German Micro-Census-Routing Project

A cooperation of the German National Statistical Institute, the German National Mapping Agency, and the State Statistical Office of Hesse shows the benefits of the usage of geospatial information within official statistics in a specific case. By integrating statistics and geospatial information the accessibility of primary schools was generated for the households of the German Micro-census.

First, the households of the Micro-census as well as the addresses of the primary schools were geocoded. Second, a routing service calculated the accessibility of the nearest primary school by foot and by car for each household. Third, by treating the generated information – the time or distance it takes a household to reach the closest primary school – as an usual survey characteristic we were able to extrapolate the information by the “normal” methodologies of the Micro-census. As a result the accessibility of primary schools for households with children within urban and rural areas was calculated.

Using this method in the production of official Statistics has numerous advantages. The analysis potential based on official data may be extended. The burden on respondents may be reduced. A whole range on new analysis questions may rise and also may be answered by the transfer of the method to other topics.