## Digitizing the linguistic atlas of German-speaking Switzer-land

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In this paper, we report on recent digitization efforts of the linguistic atlas of German-speaking Switzerland (*Sprachatlas der deutschen Schweiz*, henceforth SDS). The SDS project was initiated in the 1930s, its data collection (in 557 locations) took place in the 1940s and 1950s, and the publication of the resulting eight volumes (totalling about 1500 hand-drawn maps) occurred between 1962 and 1997. While the SDS is often considered to have pioneered the concept of small-scale linguistic atlas (*Kleinraumatlas*), its achievement before the digital era prevented it from being used for quantitative analyses and computational work, and no digitization efforts had been undertaken until recently. Here, we would like to report on the advancement of our SDS digitization project and of some potential uses of the resulting dataset.

Because of time and resource constraints, we had to restrict the SDS data in three ways: (1) selection of a subset of the maps, (2) removal of 8 inquiry points located on Italian territory, (3) removal of rarely used variants in each map. We will discuss the linguistic and dialectological reasonings behind these choices. We will also present the technical process of map digitization that we found to be most productive.

In the first phase, 216 maps were digitized by one of the co-authors. In the second phase, some of the 216 existing maps were refined and 20 additional maps were digitized by one of the co-authors. The digitized maps are made available on an interactive web site, and can be downloaded freely as ArcGIS shapefiles for research purposes. We will also briefly present briefly some of our application of this material, such as a multi-dialectal morphological generator, a machine translation system into the various Swiss German dialects, as well as dialectometrical analyses.