Integrated Collection System (ICS): Modernization of Data Collection at Statistics Indonesia

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Abstract

Data collection in Indonesia is a challenge in itself. Indonesia is a large country, with an area of 1,916,862.20 km², consisting of approximately sixteen thousand islands, and the fourth largest population in the world. Each data collection activity can involve hundreds of thousands of data collectors, the number is directly proportional to the time collected, and the data processing officers needed to process the data. Statistics Indonesia is currently working on technology transformation to support a modernized business process in data production, based on analysis as written in Statistical Business Framework Architecture (SBFA). One of the transformations carried out is to build an Integrated Collection System (ICS). ICS is a multimode data collection application enabling Statistics Indonesia to collect data in an integrated manner using several modes such as Computer-Assisted Personal Interviewing (CAPI), Computer-Assisted Web Interviewing (CAWI), Desktop Data Entry for Paper and Pencil Interviewing (PAPI), and External Data Acquisition. This system reforms how Statistics Indonesia collects data using various technologies and data transfers that were unintegrated. The ICS framework simplifies the questionnaire design process (one design for CAPI, CAWI and PAPI) and cuts down on the data collection process when using CAPI and CAWI modes. With CAPI and CAWI, data analysis can be carried out in near real-time, so the waiting time to generate statistics is much faster.