What is the WorldPop Program?

Improving the spatial demographic evidence base for low- and middle income countries (LMIC).

We partner with statistical agencies, health ministries and international agencies to assemble and harmonize existing spatial demographic data.

We develop scalable methods and models for integrating ancillary data sources to complement and fill data gaps in census.

Integrating new technologies, including high resolution satellite imagery and mobile data.

Publish fully documented, peer-reviewed methods and make outputs open access.

How it can strengthen national statistical capacity?

National census data will continue to be our most important data source.

But the 2015-2030 SDG period typically includes just one census datapoint.

We are using other available (survey, satellite, mobile) datasets to fill the gaps and update estimates on population distributions, characteristics and dynamics.

Example: 1km x 1km poverty mapping in Bangladesh?

GPS-located household survey cluster data

Geospatial covariate layers (satellite, mobile data)

Observed cluster-level variation represented by:
1. Sampling model (e.g. binomial)
2. Geospatial covariates (fixed effects)
3. Spatial covariance (random effects)
4. Gaussian noise term