

## **A Unified Height Reference System for Africa (AFRUHRS)**

The overall objective of the project is to determine a unified continental height reference system for Africa towards the realization of the International Height Reference System (IHRM), one of the focus areas of the Global Geodetic Observing System (GGOS). The specific aims include:

1. Establishing an accurate height reference system for Africa (AFRUHRS) in 2022 that will help to unify all the existing height systems within the African continent and refer them to the new IHRM to be established according to IAG Resolution No. 1 adopted at the IUGG General Assembly 2015. This height reference system will govern all the height measurements using global navigation satellite systems (GNSS).
2. Supporting global and regional applications of the IHRM, e.g., studies of geodynamics such as monitoring global change, variations of sea level and continental hydrology, geophysical hazards, vertical crustal motions of tectonic or anthropogenic origin.
3. Train experts who will spearhead the sustained realization of AFRUHRS by future versions when more data become available. This will be achieved through enabling participation of younger scholars from African developing countries.
4. Enhance the cooperation between the African geoscientists. 5. Utilization of the fast-improving GNSS technology, which is so far lacking in Africa due to the non-existence of an accurate height reference system for Africa.