Connecting Northern Finland Birth Cohorts with Borealis and THL Biobanks (CoCoBi)

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More powerful means to identify trajectories of healthy aging, risk factors and preventive means to different aging related diseases can be achieved through combination of the health data in clinical biobanks with the longitudinal health information of population cohorts. At the moment, majority of the data is within silos of multiple electronic systems prohibiting integration. A major challenge is Big Data harmonization and mining in a manner that simultaneously respects the donor's privacy, legal aspects and enables efficient research use, which is a key requirement for the potential of Finnish biobanks and for better biomedical research and health care. In this consortium we will create an integration and harmonization model between Northern Finland Birth Cohorts, THL Biobank and Biobank Borealis of Northern Finland. The consortium members participate in the BBMRI.fi network of Finnish biobanks, and the data models created here can later be utilized by other biobanks and cohorts.