

Phenotypes BrainLaus

B: Base 2003-2008 **F1:** Followup 2009-2013 **F2:** Followup 2014-2018 **F3:** Followup 2018-2021

Brain morphology

Brain volume measures in 134 cortical and subcortical regions

F2 F3

Linear and non-linear models of ageing for 134 cortical and subcortical regional volumes

F2 F3

Brain tissue property measures (myelin, iron, tissue water) in 134 cortical and subcortical regions

F2 F3

Brain water diffusion indices (FA, MD) in 134 cortical and subcortical regions

F2 F3

Interview

Montgomery Asberg Depression Rating Scale (MADRS)

F2 F3

Social recognition & social network questionnaires (in ca 400 individuals)

F2 F3

Additional information

Structural imaging: We use quantitative structural MRI protocol comprising a multi-parameter mapping protocol of three whole-head 3D multi-echo fast low angle shot (FLASH) datasets with T1-, PD-, and MT-weighting at 1 mm isotropic resolution as previously described (Draganski et al., 2011), allowing optimal delineation of iron-rich basal ganglia nuclei, voxel-based quantification of R2*, R1 and MT and measures of grey matter volume/cortical thickness.

Diffusion-weighted imaging (DWI): We use a DWI protocol of whole brain single-shot echo-planar imaging (EPI) at 2mm isotropic resolution. A total of 118 measurements are made over 3 shells with isotropic angular sampling (13 at b=0; 15 at b=650 s/mm²; 30 at b=1000 s/mm²; and 60 at b=2000 s/mm²).

COMPLEMENTARY INFORMATION ON ASSESSEMENTS OF COLAUS|PSYCOLAUS [here](#)