Appendix 2: Synopsis Proposal Form

Synopsis no.: S2.26

Preliminary title: general health comorbidity in first-episode psychosis: are the psychoses accelerated aging phenotypes?

Contact info for the person(s) proposing the synopsis

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Publication category: 1

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Work Packages involved: WP 2

Partners involved from whom candidate co-authors (*additional to working and writing group*) should be nominated: Amsterdam, Clermont-Ferrand, Sao Paolo, Barcelona, Madrid, Valencia, Santiago, Cuenca.

Objectives (scientific background, hypothesis, methods, and expected results):

Background:

Evidence has suggested that people with schizophrenia have short- end lifespans. Schizophrenia patients appear to suffer from heart, lung, endocrine and metabolic problems at a disproportionate rate — and at startlingly young ages. There is consensus on the need to tailor the pharmacological treatment taking in account the individual sensitivity to possible metabolic, cardiac and neurological co-morbidities Some evidence suggests that the socio-demographic characteristics of the patient, such as age and ethnicity, substance misuse, may influence the co-occurrence of general health problems such as diabetes, metabolic disorders, obesity, vitamin D deficiency, hypertension. These factors are rarely taken in consideration in clinical practice, despite they could influence the outcomes substantially.

The EUGEI study is an occasion for us to collect information which would not be normally available in databases designed for administrative and clinical studies on large populations of patients with FEP. Some specific aspects of genetic sensitivity can be investigated through meta-analysis of genome wide database from the EUGEI project and from external EUGEI collaborators. In particular external EUGEI collaborators could provide extra genomic and candidate genes data on human models of longevity (can be used as supercontrols for the healthy genetic background) and on cohorts of patients affected by the most important comorbidities (Type 2 diabetes, obesity, Parkinson diseases). In these meta-analyses particularly attention will be devoted to mtDNA genetic variability as many evidences suggested that mitochondria play a critical role in the cns physiology and homeostasis . Furthermore, some centers have also systematically collected specific valuable add-on information with respect to cardiological, metabolic and hormonal parameters (e.g. cortisol, other steroids, endocannabinoids).

Aims:

- To characterize the prevalence of all variables (socio-demographic, genetic, clinical etc) possibly linked with metabolic, endocrine, cardiovascular impairments during schizophrenia and other psychosis onset
- to link those variables to the occurrence of general health disorders (for centres with add-on evaluation and

follow-up evaluation)

Data needed for the study:

All incident cases in each centre and controls : age, sex, ethnicity (or country of birth and parental country of birth). Socio-demographic information, Migration History, FIGS, OPCRIT and diagnosis, NOS, Medication list, BMI and Medical history, cannabis and others substances use.

Meta-analysis of all available of genomic and genetic information will be focused to address specific components such as: ethnicity , biochemical parameters (when available), psychopathology

Plan for statistical analysis (overall strategy): Poisson regression analysis to compare risks for groups

Other analyses/methods:

Involvement of external Parties (non EU-GEI):

Laboratory of Immunology DIMES, Unibo (Claudio Franceschi)

IPR check:

Timeframe: Data to be provided to the analysis team by end 2014. Analyses to begin late 2014 or early 2015. Circulation of manuscript to authors spring 2015, publication by summer 2015.

Additional comments: