# **EPIPAGE 2 - Epidemiological study on low gestational age infants 2**

Head :Ancel Pierre-Yves, U953 - Unité de recherche épidémiologique en santé périnatale et santé des femmes et des enfants

Last update : 01/21/2014   Version : 2   ID : 3411		
General		
Identification		
Detailed name	Epidemiological study on low gestational age infants 2	
Sign or acronym	EPIPAGE 2	
CNIL registration number, number and date of CPP agreement, AFSSAPS (French Health Products Safety Agency) authorisation	CNIL n°911009 / CCTIRS n°10.626 / CPP SC-2873	
General Aspects		
Medical area	Gynecology/ obstetrics Pediatrics	
Health determinants	Genetic	
Keywords	Perinatality, neonatal mortality and morbidity (respiratory, neurological, infectious, metabolic), neural development (motor, sensory, cognitive), growth), handicaps	
Scientific investigator(s) (Contact)		
Name of the director	Ancel	
Surname	Pierre-Yves	
Address	HOPITAL ST VINCENT DE PAUL- 82 AVENUE DENFERT ROCHEREAU- BATIMENT LELONG-75014 PARIS	
Phone	+33 (0)1 56 01 83 63	
Email	pierre-yves.ancel@inserm.fr	

Unit

U953 - Unité de recherche épidémiologique en

santé périnatale et santé des femmes et des

enfants

Organization	INSERM
OT GUITIZACIOTI	11425171-1

$\cup$	ובו	חר		ons
-	шак	JU	au	כווט

Participation in projects, networks and consortia Yes

## **Funding**

Funding	status	Mix	ed
---------	--------	-----	----

**Details** 

Ce projet a été financé grâce au soutien de:1) l'Institut de Recherche en Santé Publique / Institut Thématique Santé Publique, et des partenaires financeurs suivants : Ministère de la santé et des sports, Ministère délégué à la recherche, Institut National de la Santé et de la Recherche Médicale. Institut National du Cancer et Caisse Nationale de solidarité pour l'Autonomie.2) la fondation PREMUP3) Programme EQUIPEX des Investissements d'avenir dans le cadre de la plateforme RE-CO-NAI

# Governance of the database

Sponsor(s) or organisation(s)

responsible

Institut National de la Santé et de la Recherche

Médicale - INSERM

Organisation status

**Public** 

#### Additional contact

## Main features

### Type of database

Type of database Study databases

Study databases (details) Cohort study

Database recruitment is carried

out by an intermediary

A selection of health institutions and services

Database recruitment is carried out as part of an interventional study

No

Additional information regarding sample selection.

Prospective. End of inclusions: 01/12/2011

## Database objective

Main objective

More than 10 years are passed since the beginning of the EPIPAGE study. The evolutions occurred since justify the creation of a new cohort.

The main objectives of EPIPAGE 2 are:

- 1) Study the becoming of extremely premature children and their families
- 2) The evaluation of care organization effects and medical practice on premature children's health and development
- 3) Research of causes and consequences of prematurity
- 4) Study the path of the different families and the decisions process at the moment of birth and intensive care
- 5) The needs analysis of medical and educational care

One of the originalities of the study is to have permitted the creation of complementary and multidisciplinary projects, in order to reply and deepen to question difficult to handle on the children of the cohort. These projects, based on the same structure of EPIPAGE 2, needs additional investigations and an own funding.

A total of 8 studies have been developed in the field of brain imaging, bio-markers, nutrition, motherchild interaction and ethics:

- ETHIQUE (decision process leading to survival or death of children born between 22 and 26 weeks of amenorrhea)
- EPIFLORE (study of the introduction of the intestinal microbiota)
- EPIRMEX (Study of the executive functions and of the language development, depending on anomalies detected through NRM)
- BIOPAG (Identification of the early bio-markers of pathologies from an umbilical cord sample (DNA, RNA)
- OLIMPE (Study of the existing links between the quality of early mother-child interactions and the neural and developmental becoming)
- CHORHIST (Research of chorioamniontides through anatomo-pathological analysis of placenta)
- EPINUTRI (Study of the associations of the intake of polyunsaturated fatty acids, iron intake and neurological becoming of extremely premature children)
- EPIPAIN 2 (treatment of painful movements in

neonatal intensive care.

RE-CO-NAI platform

EPIPAGE 2 is one of the two cohorts constituting the RE-CO-NAI platform, together with the ELFE cohort.

The general objective of this platform is to create an infrastructure offering the measures required for collecting, highly secured storage and distribution of data concerning the pregnancy, the birth and the child.

The research platform consist of cohorts of infants followed since birth will allow to study, in a global and multidisciplinary way, the stakes on health, development and socialization of children. It will in addition provide substantial visibility in the world of academic research (French and international), but also with regards to bodies, associations, and industries that have interests in children. As such, it will allow for an optimized valorization of the data collected and will facilitate the dissemination of data.

Inclusion criteria

EPIPAGE 2 is a population based perspective cohort. All the children born in 25 regions of France, extremely premature (22-26 weeks of amenorrhea) on 8 months, highly premature (27-31 weeks of amenorrhea) on 6 months and moderately premature (32-34 weeks of amenorrhea) on 1 month. A control group of full-born children will be constituted from Elfe study. Children of families having expressed a refusal will not be included. In this case, the information from the health certificate of the 8th day could be used to characterize the population concerned.

# Population type Age Newborns (birth to 28 days) Infant (28 days to 2 years) Early childhood (2 to 5 years) Childhood (6 to 13 years) Population covered General population Gender Male Woman **National** Geography area Detail of the geography area 21 regions of metropolitan France and 4 overseas regions (Martinique, Guadeloupe, Guyana, Réunion)

Data collection	
Dates	
Date of first collection (YYYY or MM/YYYY)	04/2011
Size of the database	
Size of the database (number of individuals)	[1000-10 000[ individuals
Details of the number of individuals	- 8398 prématurés/premature births and Induced therapeutic abortions/avortements - 7595 enfants/children
Data	
Database activity	Current data collection
Type of data collected	Clinical data Declarative data Biological data
Clinical data (detail)	Direct physical measures Medical registration
Details of collected clinical data	Clinical examination at inclusion and during the follow-up (birth, 2 years, 5years, 8 years, 11-12 years). Information collected through the clinical examination: motor, sensory, cognitive development, height and weight growth, respiratory pathologies
Declarative data (detail)	Paper self-questionnaire Face to face interview
Details of collected declarative data	Clinical examination at inclusion and during the follow-up (birth, 2 years, 5 years, 8 years, 11-12 years). Information collected through the clinical examination: motor, sensory, cognitive development, height and weight growth, respiratory pathologies
Biological data (detail)	Biological data from coming from the medical record. For a sub-sample of children (n=150), umbilical cord blood has been taken
Presence of a biobank	Yes
Contents of biobank	Whole blood Cord blood Fluids (saliva, urine, amniotic fluid, ?)

Tissues	
Others	

Details of biobank content Maternal blood, umbilical cord blood, stools of the

newborn. The constitution of the biological collections that will allow a number of early exposures, as well as markers of health condition, is one of the specific objectives of the two studies

of the RE-CO-NAI platform.

Health parameters studied Health event/morbidity

Health event/mortality

Quality of life/health perception

## **Procedures**

the medical record and the medical teams, as well as information from the mother about pregnancy, delivery, intensive care (self-questionnaire and interview with the mother). During the follow-up, data are collected at 2, 5, 8 and 12 years. -A clinical and psychological check-up will be realized at 5, 8

and 12 years (motor, sensory, cognitive development, height and weight growth, respiratory

pathologies) - Data concerning child's health, his development, his schooling, his quality of life, possible handicaps, consequences on the family are collected through a self-questionnaire submitted to

the mother at 1, 2, 5, 8 and 12 years.

Quality procedure(s) used Coherence request during and after computer data

entry. Missing data checked back to the original file. Subjects an doctors remainders for follow-up visits. Internal quality audit report. Patients receive

information about the use of their data.

Participant monitoring Yes

Links to administrative sources

Details on monitoring of Children will be followed until 12 years old. participants

Yes

participants

Linked administrative sources SNIIRAM (file under preparation) (detail)

#### Promotion and access

#### Promotion

Link to the document <a href="http://www.hal.inserm.fr/EPIPAGE">http://www.hal.inserm.fr/EPIPAGE</a>

Description	List of publications in HAL
Link to the document	http://www.ncbi.nlm.nih.gov/pubmed/? term=epipage+OR+25541510[uid]+OR+19932945 [uid]

Description	List of publications in Pubmed
-------------	--------------------------------

Access	
Terms of data access (charter for data provision, format of data, availability delay)	Data utilization possible for academic teams. Access to every interested research team after an evaluation of the project by the scientific council
Access to aggregated data	Access on specific project only
Access to individual data	Access on specific project only