

# DemAge cohort, Presentation

---



DemAge cohort: interventional  
longitudinal multicentric  
cohort

Promotors:  
Prof. Charlotte Beaudart  
Ph. Biol. Aurélie Ladang

Emma Calluy  
Université de Namur  
Université de Liège

# Dementia

## COGNITIVE OR BEHAVIOR DISORDERS

- 1 Reduced ability to acquire and retain new information
- 2 Impaired reasoning and difficulty managing complex tasks, poor judgement
- 3 Impaired visuospatial abilities
- 4 Impaired language functions
- 5 Changes in personality or behaviour

**Vascular Dementia**

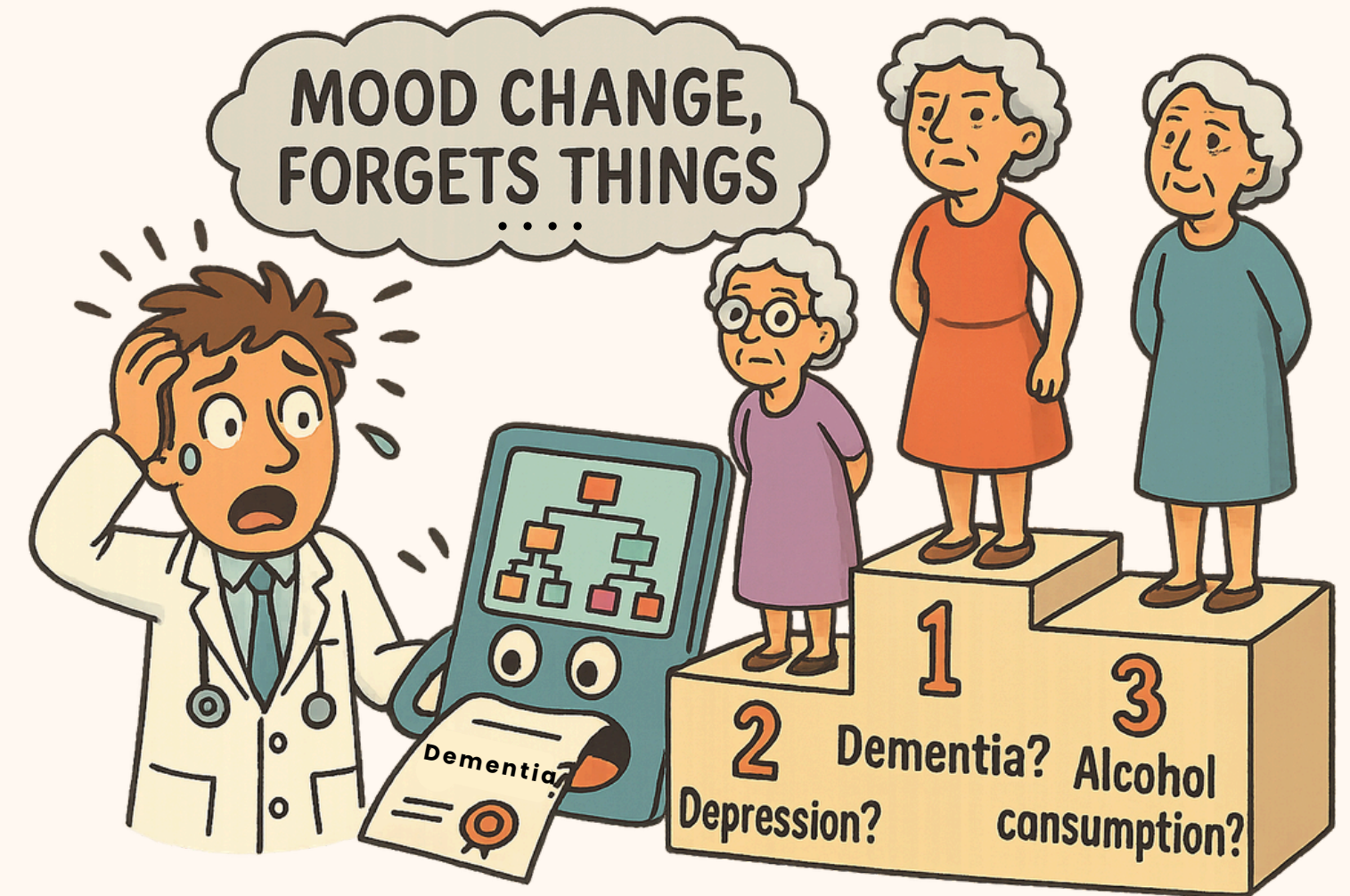
**Lewy body Dementia**

**Frontotemporal Dementia**

**Alzheimer's Dementia**



**95% of dementia cases!**






# Objectives of the DemAge cohort

Interventional, longitudinal, Multicentric cohort


Better understanding of **healthy ageing**

HEALTHY AGEING AND FUNCTIONAL ABILITY



-  Cognitively healthy
-  Altered blood-based biomarkers
-  Clinical diagnosis of Dementia

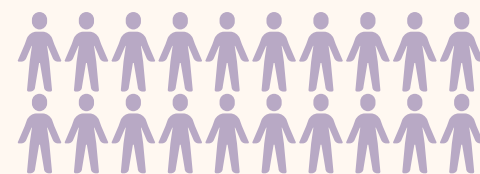
Identifying **early blood biomarkers** for dementia!



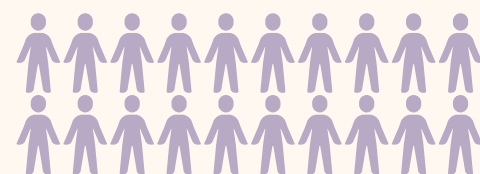
# DemAge cohort, description

- A cohort of 320 cognitively healthy participants without dementia
- A single 12-month recruitment period for enrolment, followed by annual follow-ups
- Ethics application submitted for revision in April 2025 (Liège University Hospital, Central Committee)

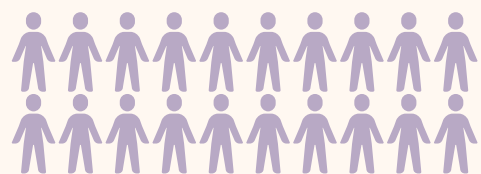
CHU of Liège



CHU UCL Namur (site Godinne, Dinant, Sainte Elisabeth)



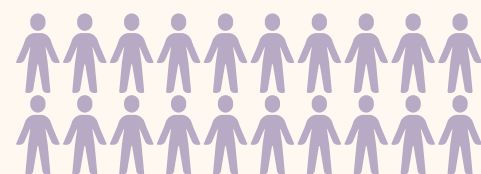
Saint-Luc Bouge



CHU of Brugmann



University of Namur



320 cognitively healthy participants





T1

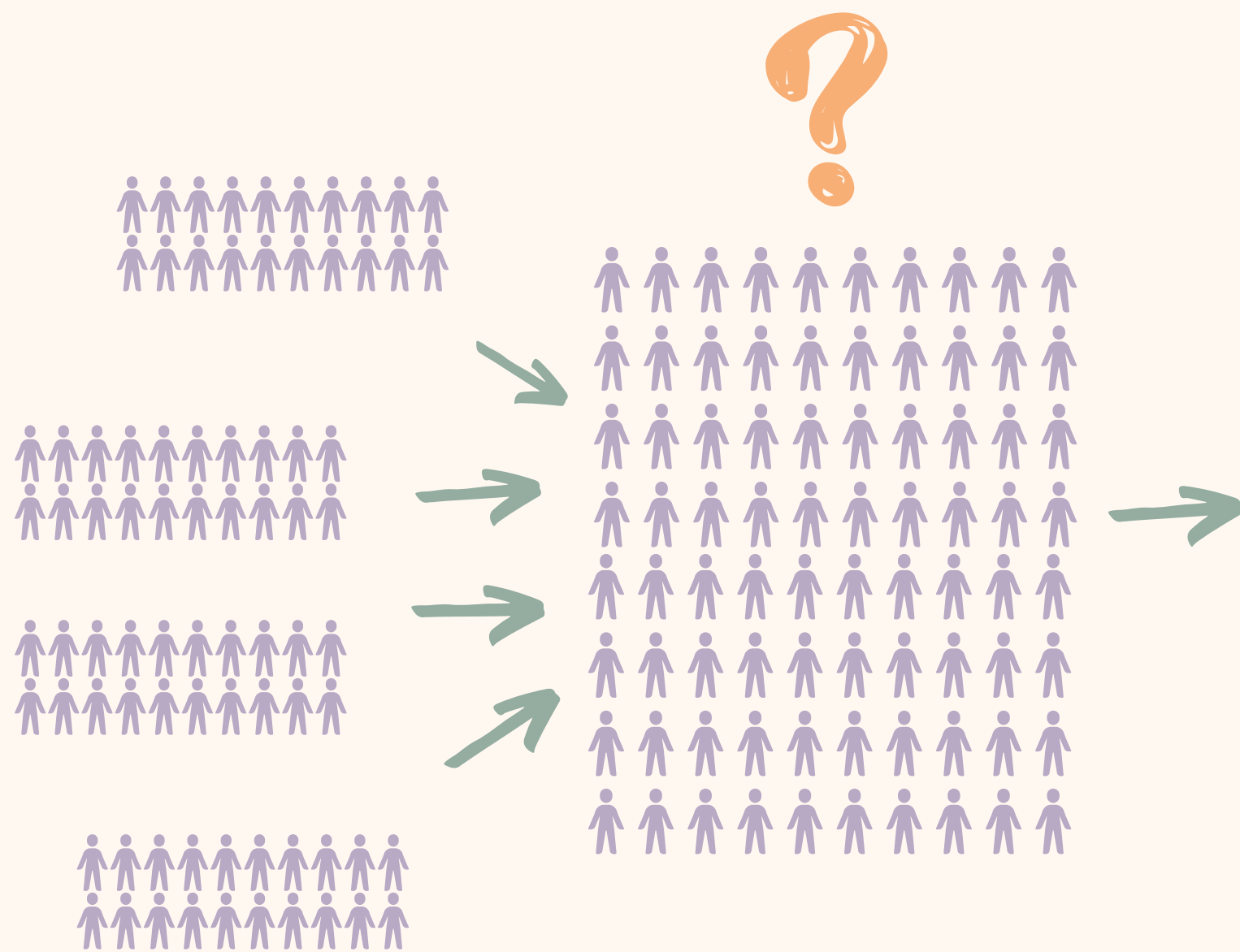


T10



-  Cognitively healthy
-  Altered blood-based biomarkers
-  Clinical diagnosis of Dementia

# DemAge cohort, inclusion criteria



<b>Age</b>	65 years and over
<b>Language</b>	Fluent in French
<b>Comorbidities</b>	Chronic conditions under medical supervision
<b>Absence of cognitive complaints</b>	No consultation with a specialist in memory disorders
<b>Absence of dementia</b>	FCSRT, GDS at inclusion
<b>Cognitive health</b>	MMSE at inclusion

# Recruitment for the DemAge cohort

## Recruitment

Recruitment on a voluntary basis via an information leaflet

- Hospitals
- General practitioners and clinicians
- Social media and in the press

## Registration to inclusion visit

- Microsoft form (link, QR code)
- Mail
- Phone number

People wishing to take part in the study may also be referred to the study researchers by GPs from GAMENA and by doctors, neurologists and geriatricians at the sites mentioned above, or they may volunteer to take part.

## La recherche pour BIEN vieillir !

Vous avez **65 ans et plus** vous vous sentez en "bonne santé", vous êtes curieux et souhaitez faire avancer la science ?

Alors, cette étude est faite pour vous !

**But de l'étude**  
Améliorer le diagnostic des démences !  
Via le développement d'un outil de diagnostic précoce des démences

**Visites**

- 1 première visite composée d'une discussion, d'une prise de sang, d'une évaluation musculaire, d'une échographie osseuse et de courts questionnaires\*
- 1 visite de suivi par an


\*L'étude ne vous soumet pas à d'autres interventions ou à la prise de médicaments



**Risques**  
Légère fatigue  
Risques connus liés à la prise de sang :  
ecchymose, inflammation et douleur localisée


**Sites de recrutement**  
CHU UCL Namur (Godinne, Dinant, Sainte-Elisabeth)  
Saint-Luc Bouge  
Université de Namur  
CHU Brugmann  
CHU de Liège

**Bénéfices**  
Meilleure connaissance de votre santé osseuse, musculaire et neurologique

Renseignements et inscription au :  
+32476834684  
emma.calluy@uliege.be  
<https://forms.office.com/e/ixg9VrLTKs?origin=lpLink>



 UNIVERSITÉ DE NAMUR  
 LIÈGE université



Version 2, 26/02/2026, page 1

# DemAge cohort, data collection

## Data collection (1/2)

- **General medical history**

Age, gender, height, weight, chronic conditions, a full list of prescribed medications, history of fractures, family history of neurological, cardiovascular and metabolic conditions, history of head injuries, years of education, leisure activities.

- **Body composition**

Measurement of muscle mass (InBody 580) and bone mineral density using Echolight's radiofrequency ultrasound and multi-spectrometry (REMS) technology.

- **Intrinsic capacity**

Assessment of mobility (SPPB), vitality (grip strength), cognition (MMSE), psychological well-being (GDS-15) and sensory functions relating to vision (near and far vision tests using the World Health Organisation's WHOeyes app, Check your vision with the WHOeyes app) and hearing (Handicap Inventory for the Elderly).

# DemAge cohort, data collection

## Data collection (2/2)

- **Psychological and cognitive questionnaires**

With researcher's help : MMSE, Montreal Cognitive assessment (MoCA), Global deterioration scale (GDS), Free and Cued Selective Reminding Test (FCSRT), Frontal Assessment Battery (FAB), Charlson comorbidities index, questionnaire on frailty.

Self-administered : GDS-15, Lawton IADL, SarQoL, Questionnaire on attitudes towards ageing, Handicap Inventory for the Elderly.

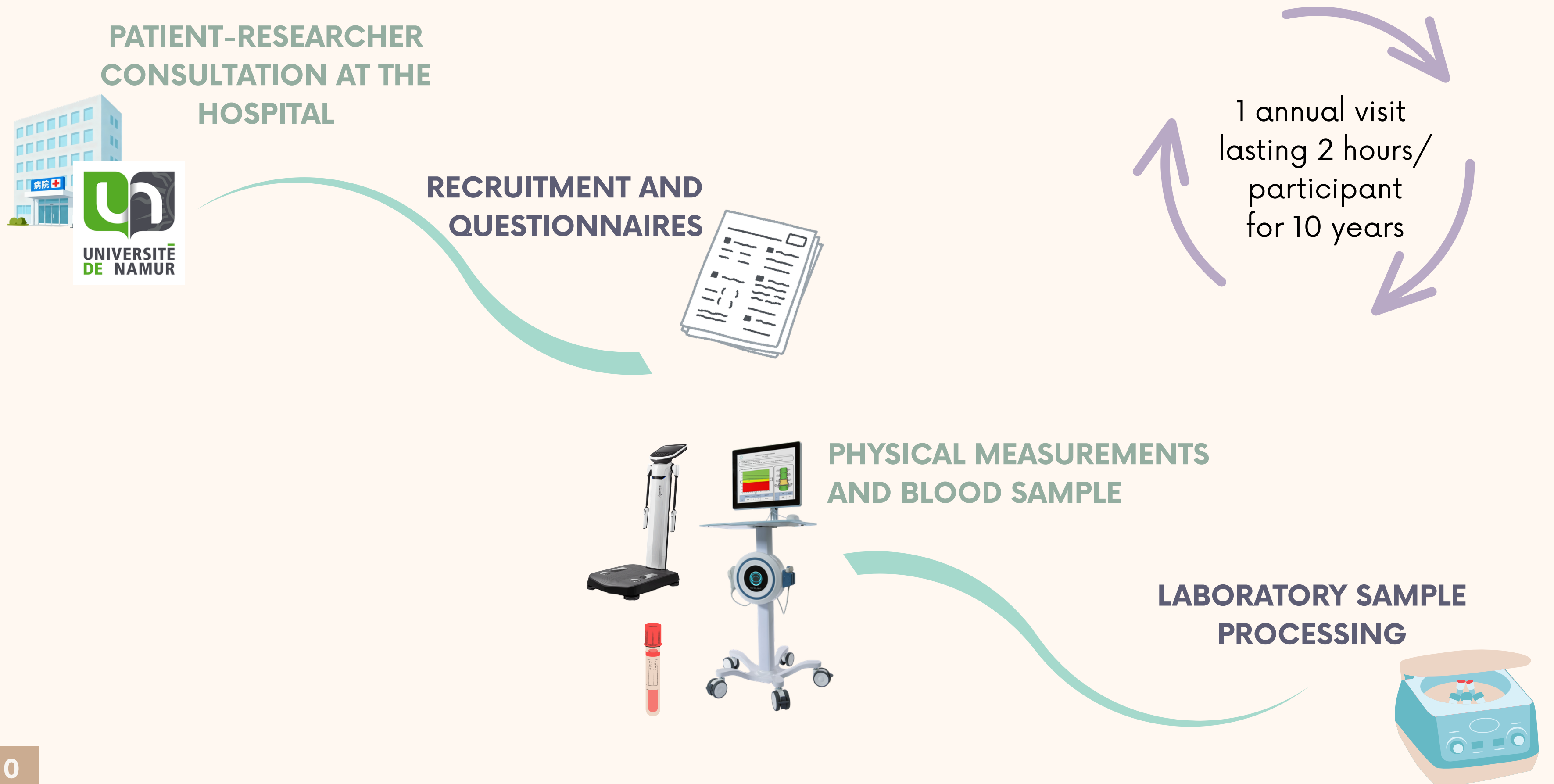
- **Blood samples**

4 tubes (2 serum, 2 EDTA) of 10 millilitres (mL) and 2 tubes (1 heparinised, 1 citrated plasma) of 5 mL.

- **Cognitive state**

Assessed by a close carer or family member.

# The DemAge cohort, “recruitment pathway”



# DemAge cohort, the researchers



**Charlotte Beaudart**

Professor

UNamur

[charlotte.beaudart@unamur.be](mailto:charlotte.beaudart@unamur.be)



**Emma Calluy**

PhD student

Joint Degree: UNamur & ULiege

[emma.calluy@uliege.be](mailto:emma.calluy@uliege.be)



**Aurélie Ladang**

Medical pathologist

CHU Liège

[aladang@chuliege.be](mailto:aladang@chuliege.be)



# DemAge cohort, Presentation

---



Thank for your attention!

Promotors:  
Prof. Charlotte Beaudart  
Ph. Biol. Aurélie Ladang

Emma Calluy  
Université de Namur  
Université de Liège  
[emma.calluy@uliege.be](mailto:emma.calluy@uliege.be)