

Inclusion of existing collections and collections consisting of biomaterial left-overs in the Radboud Biobank

Background

The Radboud Biobank facilitates the storage and issuance of biomaterial from prospective 'de novo' collections comprised of Radboudumc patients who have provided written informed consent for the collection and use of biomaterial and the associated data in scientific medical research. Furthermore, the Radboud Biobank advises collections on the registration of the associated data.

The inclusion of existing collections in the Radboud Biobank improves the quality of the existing biobank by aligning with Radboud Biobank standards for all new samples that are collected. This increases the visibility of the existing and historical collections. The Radboud Biobank also offers the possibility of transferring left-over biomaterial to the Radboud Biobank, e.g. after completion of a specific study.

Conditions for joining the Radboud Biobank

1. Clear description of the potential scientific value of the collection.
2. (Application for) approval for the collection from the METC Oost-Nederland or the CMO Radboudumc. These review committees verify if legal-ethical demands have been met.
3. Biomaterial and the associated data are linked by a code to a unique (ex)patient from the Radboudumc using an encrypted key file.
4. Biomaterials are stored suitable for future research. Collection date plus relevant conditions are recorded (see Appendix 1).
5. As a minimum: age, sex, initial diagnosis code and unique patient number are recorded.
6. A signed contract between the collection and the Radboud Biobank with standard terms and conditions regarding personnel investments, right-of-say, issuance and financial arrangements.

Consequences for the storage of the biomaterial

The collection is included in the biobank information management system (BIMS) with new codes and notes regarding prior storage conditions. To avoid unnecessary defrosting and refreezing aliquotation to Radboud Biobank storage standards is done when an opportunity occurs, e.g. when a sample is first issued. Processing dates are recorded in the BIMS.

Clinical data

In accordance with the FAIR principles the Radboud Biobank is continually improving the findability and access to the collections. The Radboud Biobank strives to provide the national biobank catalogue regularly with metadata from the collections. They publish the data so that what the Radboudumc has to offer is visible internationally.

Financial consequences

Repacking and moving biomaterial and the associated data from the collection to the Radboud Biobank is at the expense of the collection owner, as indicated in a quote by the Radboud Biobank (see Appendix 1). Fees for issuances will be charged to the applicant to cover the costs of storage and management. From 1-1-2024 staggered rates will be charged for issuances in accordance with the new Radboud Biobank business model arising from the *Fit for the Future* reorganization.

Next steps

Should you wish to include your collection in the Radboud Biobank please fill in the attached form and return it via email to postbox: RadboudBiobank@radboudumc.nl. Based on this we will be able to ascertain if the collection is suitable for the Radboud Biobank. If this is the case our lab technicians

Bio-3927 version 3.0: authorised on: 17-07-2023

Geprint en uitsluitend geldig op 24-7-2023.

will estimate the amount of time they will need to transfer and register the collection. They may contact you for more information. The Radboud Biobank will then send you a no-obligation quote. Should you have any questions while filling out the form please feel free to contact us.

Appendix 1: Form Acquisition of Existing and Historical Collections.

General information:		
Name of applicant		
Name of collection		
Department		
Owner of collection		
Clinical data:		
Contact person clinical data		
Location of clinical data		
Informed Consent (IC):		
Contact person IC		
Location of IC		
Period of consent		
Evt. CMO number/ letter of approval		
Biomaterial:		
Contact person biomateriaal		
Type of biomaterial and amount	Biomaterial	Amount
Scientific goals per type of biomaterial/expected use (Purpose). For example: Analysis of metabolite proteins. Omics analysis (Metabolomics, Proteomics), DNA-sequencing, cfDNA analysis, microbiome analysis etc.	Biomaterial	Scientific goals
Collection period		
Is there a registration system present (BIMS, Excel, etc.)?		
Were deviances registered? e.g. procedure/SOP deviances or issues such as hemolytic, icteric, lipemic serum and plasma samples.		
Were the samples labelled with a code or is there patient information on the samples?		
Are SOPs available?		
Was the patient/donor fasting at the time the biomaterial was collected?		
Have the samples been thawed and refrozen or moved?		

Pre-analytical trajectory:

Please fill in the details for each type of biomaterial in the table below.

Table 1 : Description of pre-analytics per type of biomaterial.

Type of Biomaterial		Primary tube	Transport temperature (between collection and preparation for storage)	Time from collection to storage.	Centrifuge conditions (if applicable)	Long term storage (storage tube and temperature)
X	EXAMPLE Plasma centrifuged once	K2EDTA 10 ml BD no. 12345 *1	Room temp.	Within 4 hours of collection	10 minutes 2000g Room temp.	2ml Polypropyleen tube, -80C
	Blood (whole blood)					
	Blood (umbilical cord)					
	CSF					
	DNA					
	RNA					
	Plasma centrifuged once					
	Plasma centrifuged twice					
	Saliva					
	Feces					
	Serum					
	Cells (not blood), non-viable					
	Cellen (niet bloed), viable					
	Ficoll mononuclear cells (viable)					
	Ficoll mononuclear cells (non-viable)					
	24 hours Urine					
	1st morning Urine sample					
	Urine random					
	Other:					

*1 Describe additions such as anticoagulants, clotting activators, antioxidants with or without gel with as much detail as possible (if applicable). If known, include the make and article number of the primary collection tube e.g. K2EDTA 10 ml purple BD-article no. 12345