

PR 031551	PROTOCOL FOR SENDING A FROZEN MUSCLE BIOPSY MITOCHONDRIAL ENZYME DIAGNOSTICS	VALID UNTIL 01-01-2024
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Protocol for handling and shipment of a frozen muscle biopsy or other tissue samples for biochemical examinations of pyruvate dehydrogenase, mitochondrial respiratory chain enzymes, mtDNA analysis or Calcium-ATPase (Brody disease).

Material

- Immediately after collection of the muscle biopsy (M. quadriceps, minimal amount 50 mg), or other tissue sample (e.g. liver), the sample has to be snap-frozen in a closed sample vial (do not add buffers, preservatives etc) using liquid nitrogen. Subsequently, the sample can be stored at -80°C until shipment.
- Tissue stored at -80°C may not be thawed and frozen again (e.g. for enzyme histochemical- or electron microscopy examinations; for these purposes separately stored samples should be prepared).
- Muscle tissue frozen using isopentane, or samples pretreated in any other way (e.g. glutaraldehyde, Tissue Tec) are **not** suitable for our biochemical enzyme analyses. Samples pretreated in this way could still be used for mtDNA analysis.
- Please send the material in a box containing a sufficient amount of dry ice (8-10 kg). Since the lab is closed during weekends, please send the parcel on a Monday or a Tuesday in order to make sure that the sample does not arrive during the weekend.
- Please enclose all relevant clinical and personal information about the patient:
 - Name, date of birth
 - Gender
 - Registration number or reference number
 - Health insurance information
 - Physician
 - Department, hospital
 - Medical indication
 - Medication and specific feedingUse request form "Mitochondrial diagnostics", [see webpage LABGK](#)

Address

Send the material by courier service to:

Radboudumc.
Radboud Center for Mitochondrial Medicine.
Translational Metabolic Laboratory – Mitochondrial Enzyme Diagnostics group.

815 Radboudumc Diagnostic Laboratory.
Geert Grooteplein 10.
6525GA Nijmegen.
The Netherlands.

Turn Around Time

The turn around time is 2 months.

More information

Should you wish to receive more information, you can contact us as follows:

E-mail: Richard.Rodenburg@radboudumc.nl
Fax: +31 24 366 8754
Phone: +31 24 361 4567

Status of accreditation: see information in report of performed diagnostic analysis