

Name:

Institute of Genomic Medicine and Rare Disorders Semmelweis University

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http://semmelweis.hu/genomikai-medicina/

GENETIC TEST REQUEST FORM

Maiden name:

| Social security number: Date of birth: | | Mother's name: | |
|--|----------------------------|---|--|
| Address: | | | |
| Requesting physician's | | Requesting physician's | |
| name: | | stamp number: | |
| Requesting physician's | | | |
| email: | | | |
| OEP code: | | Diagnosis (BNO code): | |
| Sample type: | ♦ EDTA blood (9 ml) | ♦ other: | |
| | ♦ nerve/muscle tissue: | | |
| Date of sampling: | | Ambulatory Registry | |
| Dlagge analoge the | mbulataw abaat/madiaal | Number: | |
| Please enclose the a | imbulatory sneet/medical | report containing the patient's clinical data. | |
| | | N OF CONCENT | |
| DECLARATION OF CONSENT | | | |
| Planned intervention: | ••••• | •••••• | |
| Name of patient: Name of legal representative | e/relative: | | |
| Health condition, medical o | • | | |
| | | | |
| Possible advantages and risk complications): | ks of completing / failing | the recommended medical examinations (side effects, | |
| | | | |
| Possible advantages and risk complications): | ks of completing / failing | the recommended interventions (side effects, | |
| | | | |
| Surgical and non-surgical po | | | |
| Medical examination and expectable outcome of the intervention, and the probability of the success of that: Asking for information on complications with a probability of under 1% YES NO | | | |
| | | | |





| Planned date and time of the medical examinations a (The patient is aware of the possibility of variation. | |
|---|--|
| Expectable fee of the care: | |
| Questions of the patient/legal representative and ans | |
| | |
| | |
| A | requent complications and expectable consequences of sonalized answers to my verbal/written questions, and I at the way of the treatment. |
| | on the planned one occurring during the operation, and to considers that necessary or an urgent necessity requires |
| accept that unpredictable complication can happen negative effect on the expectable results and recover | a also in case of a professional treatment, which has ry time. |
| reject any of the recommended care. In this case, I need the request of legal representative, in case of an i | peration defined by the physician, I have the right to make a written declaration about the fact of the rejection. incapable patient or a patient with limited incapacity, irrevocable damage in the patient's health condition is |
| Agree, Disagree (please underline) with the plann | ned intervention to be completed on me. |
| | ng any cell parts, tissues, organs removed for diagnostic mination ad intervention by the Semmelweis University, edical research. |
| ¥ • • • • • • • • • • • • • • • • • • • | to handle my personal health care data in order to has informed me that Semmelweis University maintains system, so information share can happen in the interest |
| Budapest, 20 | |
| | |



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Diseases of Central Nervous System

Monogénes stroke syndroma

- ♦ CADASIL (NOTCH3) gene mutation screening
 - ♦ MELAS (m.3243A>G) point mutation analysis

Stroke risk factor test

- ♦ Leiden Factor V mutation screening
- ♦ ApoE genotyping
- ♦ MTHFR (methionine tetrahydrofolate reductase) mutation screening (c.677 C>T)
- ♦ Thrombocyte glycoprotein receptor polymorphism exam: GPIb alpha-VNTR

Trinucleotide repeat disorders

- ♦ Huntington's disease (differential diagnosis)
- ♦ Fragile X syndromes
 - ♦ Classic Fragile X syndrome
 - ♦ FXTAS syndrome
 - ♦ POI/POF syndrome
- ♦ Spinocerebellar Ataxia profile (ataxia differential diagnostic) or
 - ♦ SCA1 (ATXN1) gene
 - ♦ SCA2 (ATXN2) gene
 - ♦ SCA3 (ATXN3) gene
 - ♦ SCA6 (CACNA1) gene
 - ♦ SCA7 (ATXN7) gene
- ♦ Dystrophy myotonic type 1

Parkinson disease (familiar or early onset)

- ♦ PARK2 gene analysis
- ♦ LRRK2 gene analysis
- ♦ PINK1 gene analysis
- ♦ DJ1 gene analysis

Dystonia

♦ DYT1 (Torsin A) gene deletion screening

Iron accumulation in basal ganglia

♦ Coeruloplasmin e(CP) gene mutation analysis

Neurodegeneration with brain iron accumulation

- ♦ BPAN gene analysis
- ♦ COASY gene analysis
- ♦ MPAN (C19orf12) gene analysis
- ♦ PANK2 gene analysis
- ♦ PLA2G6 gene analysis

Hereditary Alzheimer disease

- ♦ APP gene analysis
- ♦ Presenilin-1 (PS1) gene analysis
- ♦ Presenilin-2 (PS2) gene analysis

Frontotemporal dementia

- ♦ TAU protein (MAPT) gene analysis
- ♦ Granulin (GRN) gene analysis

Prion diseases

♦ PRNP3 gene analysis

Mental decline, dementia, atherosclerosis risk factor

♦ ApoE genotyping

♦ TREM2 gene analysis

Migraine risk factor test

- ♦ MELAS (m.3243A>G) point mutation analysis
- ♦ MTHFR mutation analysis (c.677 C>T)
- ♦ CADASIL (NOTCH3) gene point mutation screening

Non syndrome hearing loss

♦ Connexine 26 (GJB2) gene analysis

Optic atrophy

- ♦ OPA1 gene analysis
- ♦ Leber Hereditary Optic Neuropathy (mtDNS)

Beta oxidation disorder

♦ MCAD gene (m.985 A>G) genotyping

Depression, posttraumatic stress

♦ 5HTT receptor gene genotyping

Mitochondrial DNA disorders

- ♦ PEO mtDNS deletion screening
- ♦ Myopathy mtDNA deletion screening
- ♦ mtDNA depletion syndrome (only from muscle, up to the age of 4)
- ♦ MELAS (m.3243A>G) mutation analysis
- ♦ NARP (m.8993 T>C, T>G) mutation analysis
- ♦ MERRF (m.8344 A>G,) mutation analysis
- ♦ LHON (m.4360 G>A, m.11778 G>A, m.14484 T>C) point mutation analysis
- ♦ Whole mtDNA sequencing (from muscle tissue with special agreement)

Intergenomic communication disorders (can be requested only in case of mtDNA deletion/depletion in the muscle tissue)

- ♦ mtDNA depletion syndrome (only from muscle, up to the age of 4)
- ♦ Multiplex mtDNA deletion screening
- ♦ Alpers syndrome (POLG1 gene analysis)
- ♦ SANDO (POLG1 gene analysis)
- ♦ PEO syndrome (POLG1 gene analysis)
- ♦ PEO syndrome (Twinkle gene analysis)
- ♦ PEO syndrome (ANT1 gene analysis)
- ♦ PEO syndrome (RRM2B gene analysis)
- \Diamond Depletion syndrome (TK2 gene analysis)
- ♦ SMA like image (TK2 gene analysis)
- \Diamond Myopathy (TK2 gene analysis)

Hypertrophic cardiomyopathy with COX negative fibres (infancy)

♦ SCO2 gene analysis

Neuromuscular Disorders

Myoglobinuria

♦ CPT-II (carnitin-palmitoyl-transferase II) mutation analysis (c.C338T, c.C149A hot spot)

Congenital Myasthenia Syndrome





 $\lozenge \ \, \text{CHNRE Romani founder gene mutation} \\ \text{analysis}$

Dystrophy myotonic type 1

♦ DMPK gene analysis

Facioscapulohumeral (FSHD) muscular dystrophy

♦ FSHD1A gene deletion analysis

Duchene-Becker muscular dystrophy

♦ Dystrophin gene analysis

Limb girdle (LGMD) muscular dystrophy DNA diagnostic

- ♦ LGMD2A (CAPN3 550 del A)
- ♦ LGMD2c (γ SG p. C283Y)
- ♦ LGMD2I (FKRP c.826 C>A)

Muscular dystrophy protein diagnostic (from muscle)

- ♦ Dystrophin Western blot
- ♦ LGMD autosomal dominant form: (caveolin, myotilin) Western blot
- Autosomal recessive form: (dysferlin, calpain, sarcoglycans) Western blot

Spinal muscular dystrophy

♦ SMN1 gene deletion analysis

Spinal muscular dystrophy 1

♦ SCO2 gene analysis

Hereditary neuropathies

- ♦ Congenital cataracta facial dysmorphy neuropathy (CCFDN) founder mutation
- ♦ Lom (NDRG1) neuropathy founder mutation
- ♦ Hereditary neuropathy pressure palsy (HNPP) PMP22 deletion test
- ♦ Multiplex tunnel syndrome: PMP22 deletion
- $\Diamond\,$ Charcot Marie Tooth-I. (demyelinisatio type of neuropathy) profile: PMP22 duplication,

connexin 32, MPZ, EGR2 gene analysis

- ♦ Charcot Marie Tooth-II (axonal type of neuropathy) profile: mitofusin, MPZ, Connexin 32 gene analysis
- ♦ Dejerine Sottas neuropathy MPZ, EGR2 gene analysis
- ♦ Congenital hypomyelination syndrome MPZ, EGR2, Connexin 32 gene analysis
- ♦ Autosomal dominant hereditary neuropathies: (PMP22 deletion/ duplication, MPZ, EGR2 gene analysis)
- ♦ X chromosomal hereditary neuropathy - Connexin 32 (GJB1) gene analysis

Pharmacogenomic Exams

Aminoglycoside-induced deafness

 \lozenge (m.1555 A>G) mutation analysis

Azatioprine toxicity

♦ MTHFR mutation analysis

Citalopram side effect

♦ CYP2C19*2 genotyping

Clopidogrel effectiveness

♦ CYP2C19*2 genotyping

Diazepam side effect

♦ CYP2C19*2 genotyping

Lanzoprazol side effect

♦ CYP2C19*2 genotyping

Omeprazole side effect

♦ CYP2C19*2 genotyping

Pantoprazole side effect

♦ CYP2C19*2 genotyping

Statin-induced myopathy

♦ SLCO1B1, KIF6, COQ2, ATP2B1 genotyping

Ticagleror side effect

♦ CYP2C19*2 genotyping

Valproate-induced hepatotoxicity

♦ POLG1 gene SNPs exam

Non-supported, self-financing exams

Molecular cytogenetic tests (aCGH)

- ♦ Multiplex congenital minor anomalies
- ♦ Delayed global development/mental retardation with or without dysmorphic features
- ♦ Autism spectrum disease

Exams by new-generation sequencing

Panel tests

- ♦ Hereditary spastic paraparesis (51 genes)
- ♦ ALS panel (50)
- ♦ Autism panel (103 gene)

Whole exome test

Information on the costs of non-supported exams can be requested at molneur@med.semmelweis-univ.hu.

Please fill in the request form correctly and add all the clinical data, otherwise the exams will not be performed until the missing information arrives.

Date:

Physician's signature

stamp