PREQUEL GENETICS®

TEST REQUEST FORM & INFORMED CONSENT

Sample Code:

REFERRING HEALTHCARE PROFESSIONAL NAME/Stamp*

PATIENT, PREGNANCY & SAMPLE INFORMATION

FIRST NAME*	SURNAME*	DATE AND PLACE OF BIRTH* (DD/MM/YY)
PATIENT ADDRESS	**CITY AND ZIPCODE**	**PATIENT TELEPHONE***
MATERNAL WEIGHT (KG)	**MATERNAL HEIGHT** (CM)	**E-MAIL***
ULTRASOUND DATE* (DD/MM/YY)	**BLOOD DRAW DATE*** (DD/MM/YY)	**GESTATIONAL AGE AT DRAW*** (WEEKS/DAYS)

PREGNANCY TYPE*	☐ Single	☐ Dichorionic Twin	☐ Monochorionic Twin	
VANISHING TWIN (IF APPLICABLE)	☐ Yes	**IVF (IF APPLICABLE)**	☐ Homologous	☐ Embryo Donation
REPEAT SAMPLE (IF APPLICABLE)	☐ Yes		☐ Sperm Donation	☐ Egg Donation

PATIENT, PREGNANCY & SAMPLE INFORMATION

INDICATION FOR TESTING/RISK FACTORS* (TICK ALL THAT APPLY)	EXPECTANT MOTHER AFFECTED BY/HAS UNDERGONE*
☐ Fetal abnormalities in previous pregnancies *(please give details)*	☐ Immunotherapy *(excluding intravenous immunoglobulin (IVIg) treatment)*
☐ High serum screen result *(please give details)*	☐ Maternal genetic condition *(please give details)*
☐ Maternal age > 35 years	☐ Organ transplant/Stem cell therapy
☐ Patient choice	☐ Recent transfusion *(<4 months)*
☐ Ultrasound abnormalities for current pregnancy *(please give details)*	☐ Tumour/Fibromas *(please give details)*
PREVIOUS NO. OF PREGNANCIES	**MEDICAL NOTES** *Provide details of relevant medical history, e.g., risk score for T21, T18, T13 if known*
PREVIOUS NO. OF MISCARRIAGES	

TEST TYPE REQUIRED* (Tick one only)

☐ Prequel NIPT® Basic	**Chromosomes 21, 18, 13 and CNVs**
☐ Prequel NIPT® 5	**Chromosomes 21, 18, 13, X, Y*[1] and CNVs**
☐ Prequel NIPT® DiGeorge	**Chromosomes 21, 18, 13, X, Y*[1] + DiGeorge syndrome and CNVs**
☐ Prequel NIPT®5 Advance	**Chromosomes 21, 18, 13, X, Y*[1] + panel 23 Microdeletions + Trisomies 9 + 16 and CNVs**
☐ Prequel NIPT® Karyo	**Genome-wide NIPT that provides karyotype-level insight**
☐ Prequel NIPT® Karyo Advance	**Genome-wide NIPT that provides karyotype-level insight + panel 23 Microdeletions**
☐ Prequel NIPT® MonoGene	Prequel NIPT Karyo® + **102 Fetal Monogenic diseases (father sample required)**
☐ Prequel NIPT® MonoGene Advance	Prequel NIPT Karyo Advance® + **102 Fetal Monogenic diseases (father sample required)**
☐ Prequel NIPT® Total	Prequel NIPT Karyo® + **102 Fetal Monogenic diseases + Carrier mother (father sample required)**
☐ Prequel NIPT® Total Advance	Prequel NIPT Karyo Advance® + **102 Fetal Monogenic diseases + Carrier mother (father sample required)**
☐ Prequel NIPT® Total Family	Prequel NIPT Karyo Advance® + **50 Fetal Monogenic diseases + Carrier screening mother and father (father sample required)**

DO YOU WISH TO KNOW FETAL SEX? *,[2] ☐ YES ☐ NO

INCLUDE RH FACTOR?
It can only be requested if the pregnant woman is Rh negative and her partner is Rh positive. It is necessary to attach the tests certifying the blood type of each parent.
☐ YES ☐ NO

FATHER'S DETAILS *(where required)*

NAME*	SURNAME*	DATE OF BIRTH(DD/MM/YY)
PATIENT ADDRESS	**POSTCODE**	**DATE OF SAMPLE COLLECTION(DD/MM/YY)**

PREQUEL GENETICS®

TEST REQUEST FORM & INFORMED CONSENT

REFERRING HEALTHCARE PROFESSIONAL NAME/Stamp*

Sample Code:

PATERNAL CONSENT

I consent to the selected test, I am aware of where it will be analyzed, and I confirm that I have been informed by my doctor about the purpose, limitations, and characteristics of the test.I understand that this is a screening for specific abnormalities and that it does not exclude the presence of other conditions not analyzed.
I understand that the results must be evaluated by my doctor. I have had the opportunity to ask questions, I have received the information sheet, and I know that I can request further clarification or genetic counseling.I consent to the use of my data for quality control and audit purposes, aware that I may withdraw my consent at any time.

Name (CAPITAL LETTERS) _____

Signature X_____ **Date:** GG/MM/AAAA

INVOICE (IF APPLICABLE)

☐ Patient ☐ Medical Doctor

RESULT

☐ Patient ☐ Medical Doctor
☐ Friend/Family member
E-mail adress: (Capital letters):

_____

MEDICAL DOCTOR CONSENT *

- I confirm that I am a licensed healthcare professional or a physician duly registered with the relevant medical board.
- I verify that the information provided regarding the patient and the prescribing physician is complete and accurate.
- I confirm that I have requested this screening test based on my professional judgment and the patient's medical necessity.
- I have explained the limitations of this test and answered all questions to the best of my ability.
- I understand that Prequel Genetics may request additional information and I agree to provide it, if necessary, for the analysis.
- I have collected and packaged the sample strictly in accordance with the instructions provided in the kit.
- I certify that I have informed the patient that biological samples and genetic data derived from the test may be used, in anonymous and/or aggregated form, for scientific research, internal validation, and improvement of analytical methodologies, in compliance with applicable regulations, and that such use does not affect the performance of the test or the clinical results.

Complete Name of the Doctor (CAPITAL LETTERS) _____

Signature X_____ **Date:** GG/MM/AAAA

PATIENT CONSENT AND INFORMATION NOTICE

The Undersigned _____

DECLARES

that I have fully understood the limitations of the test and all other information provided and described in detail during the meeting with the Doctor/Healthcare Professional. That I have received all detailed information regarding the genetic analysis I am about to undergo. That I have understood and carefully considered all aspects of the examination, as well as the benefits and purpose of the genetic test, including its limitations. That I have had the opportunity to ask all the questions I deemed necessary and have received answers that I consider complete. I consent to the performance of the selected test and understand that: it is a screening test and that the results do not exclude the possibility of other abnormalities not specifically investigated; the NIPT detects the possibility that the fetus may be affected by the aneuploidies included in the test; the fetal karyotype may not correspond to the test results; it is possible that the amount of fetal DNA (fetal fraction) in maternal plasma may not be sufficient to complete the analysis; the results should subsequently be reviewed by my physician. I have had the opportunity to ask questions and understand that I may request free pre-test genetic counseling. I consent to the use of my personal data for quality control or scientific research purposes. I understand that I may withdraw my consent at any time.I consent to the use of any residual sample for additional investigations, if necessary, and to the storage and use of anonymized health information for the development or improvement of future non-invasive tests. **I FURTHER AUTHORIZE AND ACKNOWLEDGE** That the processing of my personal and special categories of data is carried out pursuant to Articles 7 and 9(2)(a) of Regulation (EU) 2016/679. The data will be used for diagnostic and treatment purposes as described in the information notice provided and, in anonymized form, for scientific research aimed at improving the performance and quality of the test. My data may be communicated or transferred to third parties located within the European Union exclusively for the same diagnostic and treatment purposes indicated above. Such parties will process the data in full compliance with applicable data protection laws and in accordance with the principles of lawfulness, fairness, and confidentiality set out in Regulation (EU) 2016/679. I GIVE MY CONSENT to the processing of data pursuant to Article 7 of GDPR 2016/679 (mandatory). I GIVE MY CONSENT to the processing of data pursuant to Article 5 of GDPR 2016/679 regarding the receipt of commercial information about new tests and specific categories of interest (such data will not be disclosed to third parties) (optional).

INFORMATION NOTICE FOR INFORMED CONSENT - TEST DETAILS:

The Prequel® NIPT test is a non-invasive prenatal screening test performed on whole maternal peripheral blood samples and intended for the detection of fetal genetic abnormalities in pregnant women with a gestational age of at least 10 weeks. The test analyzes cell-free fetal DNA circulating in maternal blood through whole-genome sequencing in order to assess chromosomal aneuploidy status. Prequel® NIPT is designed exclusively as a screening test and does not replace invasive diagnostic tests such as fetal karyotyping. A low-probability result reduces the risk of the chromosomal abnormalities investigated but does not completely exclude the possibility that the fetus may be affected. The method's limit of detection (LOD) is represented by a fetal fraction equal to or greater than 1%, according to internal validation. If the fetal fraction is insufficient or if the data obtained do not allow for a clear interpretation, a new sample may be requested to repeat the analysis. The test may detect chromosomal abnormalities in other chromosomes that will not be reported in the test report. Furthermore, the analysis result may not reflect the true chromosomal status of the fetus, as the test cannot identify abnormalities resulting from confined placental mosaicism, the presence of a vanishing twin, or maternal genetic and pathological conditions.Biological samples collected for the performance of the Prequel® NIPT test, as well as the genetic data derived from them, may be used in anonymous and/or aggregated form for scientific research, development, and improvement of analytical methodologies, in compliance with applicable data protection and biomedical research regulations (EU Regulation 2016/679 – GDPR and applicable national laws). Such use does not affect the clinical test result, does not allow identification of the patient or fetus, and has no direct diagnostic or commercial purpose. Refusal to consent to the use of samples and/or data for research purposes does not affect the execution of the test or the quality of the service provided.

PREQUELNIPT® TESTS:

PrequelNIPT® Basic is designed to detect common trisomies of chromosomes 21, 18, and 13, as well as deletions and duplications ≥7 Mb, including all segmental chromosomal abnormalities involving part of a chromosome.

PrequelNIPT® 5 is designed to detect common trisomies of chromosomes 21, 18, and 13; sex chromosome abnormalities (trisomy X – Triple X syndrome; disomy Y – Jacobs syndrome; disomy X in a male fetus – Klinefelter syndrome; monosomy X – Turner syndrome); and deletions and duplications ≥7 Mb involving part of a chromosome.

PREQUEL GENETICS®

TEST REQUEST FORM & INFORMED CONSENT

REFERRING HEALTHCARE PROFESSIONAL NAME/Stamp*

Sample Code:

PrequelNIPT® 5 Advance is designed to detect common trisomies of chromosomes 21, 18, 13, 9, and 16; sex chromosome abnormalities (Triple X syndrome, Jacobs syndrome, Klinefelter syndrome, Turner syndrome); deletions and duplications ≥7 Mb; and 23 microdeletions <7 Mb, including: 1p36 deletion syndrome, Cri-du-Chat syndrome (5p-), Prader-Willi/Angelman syndrome (15q11.2), DiGeorge syndrome (22q11.2), Langer-Giedion syndrome (8q24), Jacobsen syndrome (11q23), Smith-Magenis syndrome (17p11.2), 2q31.2 deletion syndrome, 3q29 deletion syndrome, Williams-Beuren syndrome (7q11.23), 7q11.23 duplication syndrome, Miller-Dieker syndrome (17p13.3), Pallister-Killian syndrome (12p duplication), 15q11-q13 duplication syndrome, 15q14 deletion syndrome, Xp21.1-21.2 deletion syndrome, 17q11.2 deletion syndrome, 17q12 deletion syndrome, Koolen-De Vries syndrome (17q21.31), and Phelan-McDermid syndrome (22q13), Potocki-Lupski syndrome and Alagille syndrome 1.
PrequelNIPT® 5 DiGeorge detects common trisomies (21, 18, 13), sex chromosome abnormalities, deletions and duplications ≥7 Mb, and specifically the 22q11.2 microdeletion (DiGeorge syndrome).
PrequelNIPT® Karyo detects common trisomies (21, 18, 13), sex chromosome aneuploidies, and rare autosomal aneuploidies (trisomies of all other chromosomes), as well as deletions and duplications ≥7 Mb.
PrequelNIPT® Karyo Advance includes all features of Karyo plus 23 microdeletions <7 Mb (same list as above).
PrequelNIPT® MonoGene and **PrequelNIPT® MonoGene Advance** combine the capabilities of Karyo and Karyo Advance with analysis of 102 inherited and de novo monogenic disorders (52 inherited + 50 de novo). A complete list of the 102 monogenic disorders analyzed is available at the following link: https://www.prequel-genetics.com/PrequelGenetics/Documents/102_Monogenic_ENG.pdf.
PrequelNIPT® Total and **PrequelNIPT® Total Advance** combine Karyo/Karyo Advance with analysis of 102 monogenic disorders and a maternal carrier test for 5 conditions:Cystic fibrosis (CFTR gene) Congenital deafness (GJB2 gene) Spinal muscular atrophy (SMN1 gene) Duchenne muscular dystrophy (DMD gene) Fragile X syndrome (FMR1 gene)A complete list of the 102 monogenic disorders analyzed is available at the following link: https://www.prequel-genetics.com/PrequelGenetics/Documents/102_Monogenic_ENG.pdf
PrequelNIPT® Total Family combines Karyo Advance with analysis of 50 de novo monogenic disorders in the fetus and a carier test for both parents analyzing over 900 genes associated with more than 1300 genetic diseases. A complete list of the 50 de novo monogenic disorders analyzed in the fetus is available at the following link: https://www.prequel-genetics.com/PrequelGenetics/Documents/50_De_Novo_ENG.pdf
A complete list of more than 900 genes and over 1,300 monogenic diseases analyzed in the parents is available at the following link: https://www.prequel-genetics.com/PrequelGenetics/Documents/Complete_Genetic_Scan_900_genes.pdf This test represents the most comprehensive level of information currently available during pregnancy through non-invasive prenatal screening. A copy of the original report has been retained by the laboratory and is available upon request.

TEST LIMITATIONS

Prequel® NIPT is a prenatal screening test and is not diagnostic; therefore, any high-probability result must always be confirmed by invasive diagnostic testing. The test carries a residual risk of false positives and false negatives estimated at approximately 0.1% and must not be interpreted in isolation from other clinical, ultrasound, or laboratory findings. The test is not validated for pregnancies with more than two fetuses and is not designed to detect chromosomal mosaicism or polyploidies such as triploidy. It does not exclude chromosomal abnormalities other than those investigated, nor does it identify genetic disorders, congenital defects, or fetal complications of other origins. A low-probability result does not completely exclude the analyzed chromosomal abnormalities. The result may not reflect the true chromosomal status of the fetus due to confined placental mosaicism, vanishing twin, or maternal conditions. Results may be influenced by maternal and fetal factors, including but not limited to recent maternal blood transfusions, organ transplants, surgery, immunotherapy, stem cell therapy, maternal cancer, maternal or placental mosaicism, fetal demise, or a non-viable twin. Clinical decisions and pregnancy management must never rely solely on Prequel® NIPT results but always require integrated specialist evaluation. For major autosomal chromosomal abnormalities and sex chromosome aneuploidies, Prequel® NIPT has a sensitivity and specificity of 99.9%, indicating a high ability to correctly identify both positive and negative cases. However, despite high analytical performance, the test does not guarantee absolute diagnostic accuracy; therefore, high-probability results always require confirmation through invasive testing.

SENSITIVITY AND SPECIFICITY

For major autosomal chromosomal abnormalities and sex chromosome aneuploidies, Prequel® NIPT demonstrates 99.9% sensitivity and 99.9% specificity. These values indicate a very high capacity to correctly identify both affected and unaffected cases. Nevertheless, despite this high analytical performance, the test does not provide absolute diagnostic certainty, and high-probability results must always be confirmed by invasive diagnostic testing.

To withdraw any of the above consents or for legal information, please send an email to: legal@prequel-nipt.com

Date:GG/MM/AAAA

Signature

X_____