Test subject information for participation in medical scientific research

The MELK study

A study of the influence of nutrition and ethnic origin on the nutrients in breast milk.

Introduction

Dear Madam,

This information letter requests your participation in a medical scientific study. Participation is voluntary. This document tells you about the type of study, what it means to you, and its advantages and disadvantages. It contains a lot of information. Please review the information and decide whether you want to participate. If you choose to participate, you can fill out the forms in appendices C and D.

Ask your questions

You can base your decision on the information in this letter. In addition, we recommend that you:
- Ask questions to the researcher providing you with this information.
- Talk to your partner, family, or friends about this study.
- Ask Dr N. Muhsen, the independent expert, if you have any questions.
- Read the information on www.rijksoverheid.nl/mensenonderzoek.

1. General information

Wageningen University has set up this study, funded by Ausnutria B.V. Below, we refer to Wageningen University as the 'client'. Researchers carry out the research with various midwives and maternity care organisations. This study requires 120 subjects.
The Medical Ethics Review Committee METC East Netherlands has approved this study.

2. What is the purpose of the study?

With the MELK study, we are researching the link between the nutritional intake and ethnic origin of mothers and the nutrients in breast milk. We also want to know whether there is a link with the baby's health.

With the MELK study, we therefore want to find answers to the following questions:
1. Does the nutritional intake of mothers affect the nutrients in breast milk?
2. Does the ethnic origin of mothers affect the nutrients in breast milk?
3. Is there a link between the nutrients in breast milk and the growth, development and health of the baby?

3. What is the background of this study?

Healthy dietary choices have a positive effect on health. The Netherlands Nutrition Centre (*Voedingscentrum*) has therefore prepared some general nutritional advice (see also www.voedingscentrum.nl). We also know that women have different dietary requirements during breastfeeding. However, there is as yet no specific dietary advice for them. This is because we know little about whether and how the mother's nutritional intake affects the nutrients in breast milk. With the results of this research, we hope to contribute to, among other things, the preparation of dietary advice that is more tailored to the dietary needs of breastfeeding women. It may also be essential to adapt this advice to the ethnic background of breastfeeding women. This is why we are inviting women of Dutch/Western European, Chinese, and Turkish origin to participate in our study.

4. What is the procedure of this study?

What is the study duration?
The study will take four weeks; there are five so-called 'study days' during which we will ask you to complete questionnaires and/or collect breast milk, urine (your own) and/or stool samples (your baby's). The questionnaires will collect information about you and your baby.

Step 1: Are you eligible to participate?
First, we want to assess your eligibility. This is why we ask you to complete a questionnaire to see if you:

- are older than 18;
- are in your last trimester of pregnancy or have given birth in the last month;
- plan to exclusively breastfeed for the first two months after giving birth;
- can collect breast milk for us between the fourth and eighth week of giving birth;
- are of Dutch/Western European, Chinese, or Turkish origin:

  Chinese origin: you were born in China, and at least one of your parents was born in China, or you were born in the Netherlands, and both parents were born in China;

  Dutch/Western European origin: you were born in the Netherlands, another European country, the United States of America or Australia, and at least one of your parents was born there;

  Turkish ethnicity: you were born in Turkey, and at least one of your parents was born in Turkey, or you were born in the Netherlands, and both of your parents were born in Turkey.

  This information is required because we want to study whether there are differences in the composition of breast milk between people of different origins;
- gave birth in week 38, 39, 40 or 41 of your pregnancy;
- gave birth vaginally;
- give written consent for the use of your data;

And to determine if your baby:

- has no diagnosed (chronic) disease;
- had a birth weight of at least 2.5 kg (2,500 grams);
- has not had any antibiotics so far.

Please note that although you may be healthy, you may not be eligible to participate. The researcher will tell you more about this.

Unfortunately, you will not be eligible to participate if you:
- are expecting twins;
- cannot breastfeed;
- are already breastfeeding another infant;
- are currently on a diet to lose weight;
- are diagnosed with a gastrointestinal disorder
- cannot speak and/or read Dutch or English.

Step 2: tests and measurements
The study will take four weeks; on the five study days, we will ask you to complete questionnaires and/or collect breast milk, urine (your own) and/or stool samples (your baby's). We will consult you when planning these study days. We expect all measurements in this study to take three hours of your time.

We will perform the following tests and measurements:

- You will complete several **questionnaires**. The questions are about:
    1. your demographic data (age, work, educational level, etc.), medication use, lifestyle (sleep, stress, nutrition, exercise/activities) and children;
    2. less frequently consumed foods;
    3. your pregnancy, delivery, and your baby's health and feeding;
    4. your baby's gastrointestinal health;
    5. your baby's development;

  These questionnaires provide us with information about factors that affect the composition of breast milk. Some questionnaires are longer than others, the shortest will take about five minutes to complete, and the longest will take about 45 minutes.

- You will fill out a **food diary** four times; this information will help us determine if there is a link between your diet and the composition of breast milk.

- You will collect **breast milk** twice; the milk is used to measure the nutrients in your breast milk.

- You will collect a **stool sample** from your baby's nappy; the sample is used to check which bacteria are present in the stool.

- You will collect your **urine** for 24 hours; we will also determine a number of nutrients in your urine.

- During the **home visit**, we will measure your and your baby's height and weight, and collect the samples.

- Finally, we will ask for your consent to request **information about your child's growth** from the child health centre. This data will be used to better understand the link between breast milk

composition, growth, health and development. If you do not want us to contact the child health centre, you can decide not to give consent, or you can choose not to give consent but to share the information with us during the researcher's home visit.

Appendix B shows the measurements we perform on each study day.

5. What arrangements do we make with you?

We want the study to go well. This is why we make the following arrangements with you:

- You will not participate in any other medical-scientific research during this study.
- You are at home when the house visit is planned; we consult you when planning these days.
- You will collect the breast milk, urine, and stool samples as described in the instructions.
- You will contact the researchers if:
    - you suddenly develop health problems;
    - you no longer want to participate in the study;
    - your phone number, address or email address changes.

6. What side effects, adverse effects or discomfort might you experience?

We do not expect any side effects or complications from participation in the study. This is because no blood is taken or medication given. You only need to complete a few questionnaires and collect breast milk, urine and stool samples for us. The collection of urine might be experienced as an additional burden. For example, you may find it difficult to leave the house because you have to collect all your urine on the day in question. You may also find it uncomfortable to store the urine in the fridge and the stool sample in the freezer. In addition, filling in the questionnaires and the researcher's visit take time. This may affect your daily habits on those study days.

7. What are the advantages and disadvantages of participating in the study?

Participating in the study can have advantages and disadvantages for you. We have listed them for you below. Think about them carefully and talk to others about them.

You do not benefit personally from participating in this study. But with your participation:

- you help the researchers understand the composition of breast milk;
- you help researchers understand factors that can affect the composition of breast milk;
- you contribute to creating nutritional advice for women during breastfeeding.

Participating in the study can have the following disadvantages:

- taking part in the study takes time;
- you must adhere to the agreements of the study.

8. When does the study end?

The researcher will let you know if there is any new information about the study that is important to you. The researcher then asks if you want to continue to participate.

The study ends for you when:

- all the tests have been completed according to the schedule;
- the entire study has been completed;
- you want to stop participating in the study. You can stop participating at any time. Report this to the researcher immediately. You do not have to explain why you want to stop.
- one of the following authorities decides that the study should be terminated:
    - the client;
    - the government; or
    - the medical ethics committee evaluating the study.

What happens when you stop participating in the study?
The researchers will use the data and sample materials (breast milk, urine and stool samples) that have been collected until you decide to stop participating. The sample materials collected can be destroyed at your request. You can inform the researcher of your request.

9. What happens after the study?

Will you receive the results of the study?
About a year after you participate, the researcher will inform you about the study's key outcomes. If you want, you can receive a newsletter to keep you updated on the study's progress and results during the study.

10. What do we do with your data and sample materials?

If you are participating in the study, you also consent to the collection, use and storage of your data and sample materials.

What data do we store?
We store the following data
- your name
- your address
- your date of birth
- data from the questionnaires and diaries

What sample materials do we store?
We store the breast milk, urine and stool samples.

Why do we collect, use and store your data and sample materials?
We collect, use and store your data and your sample materials in order to answer the research questions of this study, and to publish the results.

How do we protect your privacy?
To protect your privacy, your information and your sample materials are given a code. Your data and sample materials only carry this code. We keep the key to the code in a secure place at the university.

When we process your data and sample materials, we use only the code. Also, no one can trace the data and samples back to you in reports and publications about the research. Ethnic origin data is only used to categorise respondents into three study groups and is not shared with third parties. The data is only used for the research questions described in the MELK study. Like all other data collected in the context of the MELK study, ethnic origin data is linked to a random participant number. This participant number cannot be traced back to the participant.

Who can see your data?
Some people may access your name and other personal information without a code. These people check whether the researchers are performing the research properly and reliably. The following people can access your information:

- An auditor working for the client.
- National and international supervisory authorities (e.g. the Health and Youth Inspectorate).

They keep your information confidential. We ask you to give your consent for this inspection.

How long do we store your data and sample materials?
We store your data at the university for 15 years. We also store your sample materials at the university. These are stored for 15 years; this enables us to perform more tests related to this research during the course of the study. As soon as this is no longer necessary, we will destroy your sample materials.

Can we use your data and sample materials for other research?
After this study, your data and your (remaining) sample materials may also be of interest to other scientific research on breast milk composition. For this purpose, your data and sample materials will be stored at the university for 15 years. On the consent form, you can indicate whether you agree to this. If you do not consent, you are still eligible to participate in this study.

What happens in case of unexpected discoveries?
During the study, we may discover something important to your or your baby's health. In that case, the researcher will contact your doctor. You will then discuss with your doctor or specialist what needs to be done. With the form, you give us permission to inform your doctor or specialist.

Can you withdraw your consent to the use of your data?
You can withdraw your consent for the use of your data at any time. This applies to its use in this study and in other research. But please note: if you withdraw your consent and researchers have already collected data for a study, they can still use this information. Your sample materials will be destroyed by the researcher after you withdraw your consent. However, if measurements have already been performed using your sample materials, the researcher can continue to use the results.

Do you want to know more about your privacy?

- If you want to know more about your rights regarding the processing of personal data, please refer to www.autoriteitpersoonsgegevens.nl.

- Do you have any questions about your rights? Or do you have a complaint about the processing of your personal data? If so, please get in touch with the person responsible for processing your personal data. For your study, this is:
    - Wageningen University. See Appendix A for contact details and website.
- If you have any complaints about the processing of personal data, we recommend that you first discuss them with the research team. You can also meet with Wageningen University's Data Protection Officer or lodge a complaint with the Personal Data Authority.

Where can you find more information about the study?
More information about the study can be found on the following website: https://www.isrctn.com/search?q=. After the survey, the website may publish a summary of the results of this study. You can find the study by searching for 'Understanding the impact of maternal diet and ethnicity on the composition of breast milk' (number: ISRCTN35735283)

11. Will you receive a fee if you participate in the study?

You will receive a fee of €25 for participating in this study. In addition, you travel expenses will be compensated if this applies to your situation. You may also keep the Medela manual breast pump at the end of the study. If you drop out before the end of the study, you will receive a smaller fee. The fee for participating in this study should be reported to the Tax Office as income.

12. Will you be insured during the study?

You are not additionally insured for this study since there are no additional risks involved in taking part in the study. Therefore, the researcher of the METC East Netherlands does not need to take out any additional insurance.

13. Do you have any questions?

You can direct any questions about the study to Inga Petersohn. If you want advice from someone who has no interest in the study, you can contact Dr N. Muhsen. He knows a lot about the research but is not involved in the study.
If you have a complaint, please discuss it with the researcher or doctor treating you. If you prefer not to do this, you can contact the complaint officer. Appendix A shows you where to find this person.

14. How do you consent to the study?

You can first think about this study. Next, tell the researcher that you understand the information and whether or not you want to participate. If you want to participate, fill out the consent form provided in this information letter. You and the researcher will both keep a signed version of this consent statement.

Thank you for your time.

16. Appendices

A. Contact details
B. Schedule of testing activities
C. Consent form for subjects
D. Consent form for parents or guardian

Appendix A: Contact details for Wageningen University

Research Team
Inga Petersohn, MSc
Elske Brouwer-Brolsma, PhD
Prof. Edith Feskens

Contact details
Email: MELK-studie@wur.nl
Phone: +31 (0)317- 48xxx

Independent expert
The independent expert can be consulted for questions related to the study that you do not want to discuss with the researcher.
Dr. N. Muhsen, M.D., MFPM.
Email: nmuhsen@hotmail.com
Phone: +31 (0)6 16963517

Complaint officer
The Complaint Officer can help you if you have a complaint that you cannot resolve with the research team.
Eveline Waterham, MSc
Email: eveline.waterham@wur.nl

Data Protection Officer of the institution
Frans Pingen
Email: Privacy@wur.nl

Personal Data Authority
www.autoriteitpersoonsgegevens.nl.

Appendix B: Schedule of testing activities

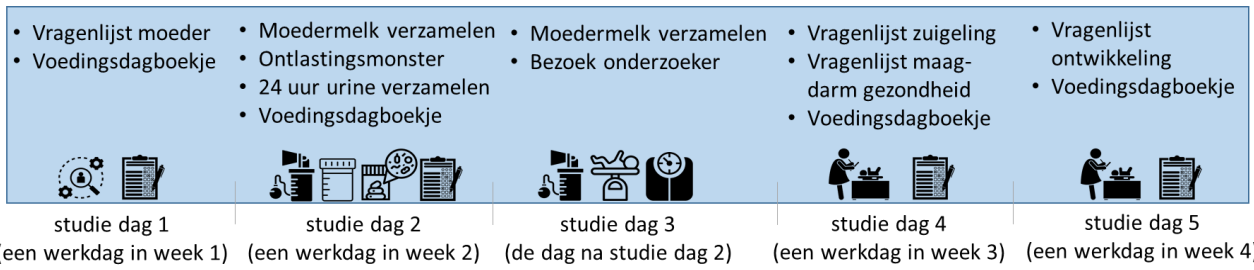
The study is divided into five study days over one month:

- Day 1: We ask you to complete a questionnaire about your demographic data (age, educational level, work, etc.), medication use, lifestyle (sleep, stress, nutrition, exercise/activities) and children. In addition, you will fill out the first food diary. We expect you to spend up to 45 minutes completing the questionnaire and up to 15 minutes filling in the food diary.
- Day 2: We ask you to collect breast milk in the morning. You will receive a breast pump and a special container to perform this task. In addition, we will ask you to collect your urine in a special bottle throughout the day (24 hours) and to take a stool sample from your baby's nappy and place it in a small container. In addition, you will fill in the second food diary. Collecting the milk, urine, and stool samples takes up to 1 hour; completing the diary takes approximately 15 minutes.
- Day 3: We ask you to collect your breast milk in the morning. You receive a breast pump and a special container to perform this task. After that, a researcher will visit you at home to measure the weight and height of you and your baby. Collecting the milk and the visit of our researcher will take approximately 45 minutes.
- Day 4: We ask you to complete a questionnaire about the pregnancy, childbirth, your baby's health and nutrition. In addition, we will send you a questionnaire about your baby's gastrointestinal health, and you will complete the third diary. We expect you to spend approximately ten minutes per questionnaire.
- Day 5: We ask you to complete the final food diary and the last questionnaire about your baby's development.

Below is an overview of the different days and measurements. We plan the study days in consultation with you. At the beginning of the study, you will receive a summary of the study days you have chosen and what happens on these days. On average, you will work on this study one day a week for four weeks.

Image:

1. Questionnaire mother
   Food diary (Study day 1: 1 working day in week 1)
2. Collect breast milk
   Stool sample
   24 hour urine collection
   Food diary (Study day 2: 1 working day in week 2)
3. Collect breast milk
   Home visit researcher (Study day 3: the day after Study day 2)
4. Questionnaire infant
   Questionnaire gastrointestinal health
   Food diary (Study day 4: 1 working day in week 3)
5. Questionnaire development
   Food diary (Study day 5: 1 working day in week 4)



Appendix C: Consent form - Subjects

For the MELK study

Consent form mother

- I have read the information letter. I was also able to ask questions. My questions have been answered sufficiently. I have had enough time to decide whether to participate or not.
- I know participation is voluntary. I also know that I can decide to stop participating in the study at any time. I do not have to indicate why I want to stop.
- I give the researcher permission to pass on information to my family doctor or specialist about any unexpected findings from the study that are important for my health.
- I consent to my data and sample materials being collected and stored. The researchers do this only to answer the research question of this study.
- I give the researchers permission to anonymously record my ethnicity to answer the research questions.
- I know that, for the purposes of research review, some people can access all my data. These people are named in this information letter. I authorise these people to access my data for this review.
- Please check yes or no in the table below.

I give permission for my data to be retained for use in other research, as stated in the information letter.	Yes ☐	No ☐
I give permission for my (remaining) sample materials to be retained for use in other research, as stated in the information letter. The sample materials will be stored for another 15 years.	Yes ☐	No ☐

- I want to participate in this study.

My name is (subject): ……..
Signature: …… Date : __ / __ / __

I declare that I have fully informed this subject about the study.

If any information becomes available during the study that might affect the subject's consent, I will inform the subject about this in a timely manner.

Name of researcher (or their representative):…….

Signature:…… Date: __ / __ / __

The subject will be provided with a complete information letter, together with a signed version of the consent form.

Appendix D: Consent form for parents or guardian

For the MELK study

I have been asked to consent to the participation of my child in this medical scientific research:

Name of subject (child): …….. Date of birth: __ / __ / __

- I have read the information letter for the subject/parents/ caregivers. I was also able to ask questions. My questions have been answered sufficiently. I have had enough time to decide whether or not my child can participate.
- I know participation is voluntary. I also know that I can withdraw my consent for my child's participation at any time. I do not have to indicate why I want that.
- I give the researcher permission to let my family doctor, who treats my child, know that my child is participating in this study.
- I give the researcher permission to pass on information to my child's family doctor or specialist about any unexpected results of the study that are important for my child's health.
- I also consent to the collection and storage of my child's data and sample materials. The researchers only do this to answer the research question of this study.
- I know that, for the purposes of research review, some people will be able to access all the information about my child. These people are named in this information letter. I give these people permission to access my child's data for this review.
- Please check yes or no in the table below.

I give permission for my child's data to be retained for use in other research, as stated in the information letter.	Yes ☐	No ☐
I give permission for my child's (remaining) sample materials to be retained for use in other research, as stated in the information letter. The sample materials will be stored for another 15 years.	Yes ☐	No ☐
I give the researcher permission to request information from the child health centre about my child's development.	Yes ☐	No ☐

- I agree that my child participates in this study.

Name of parent/guardian**: ……
Signature: …… Date: __ / __ / __
Name of other parent/guardian**: ……
Signature: …… Date: __ / __ / __

I declare that I have fully informed the subject(s) mentioned above about the study.

If any information becomes available during the study that might affect the consent of the parent or guardian, I will inform them about this in a timely manner.

Name of researcher (or their representative):…… . ……

Signature: …… Date : __ / __ / __