

# Biomarker evaluation of different types of Internet-based interactive computer-tailored nutrition education on fat consumption

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<b>Registration date</b> 04/04/2006	<b>Overall study status</b> Completed	<input type="checkbox"/> Statistical analysis plan <input checked="" type="checkbox"/> Results
<b>Last Edited</b> 06/01/2021	<b>Condition category</b> Other	<input type="checkbox"/> Individual participant data

**Plain English summary of protocol**  
Not provided at time of registration

## Contact information

**Type(s)**  
Scientific

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## Additional identifiers

**Protocol serial number**  
NTR623

## Study information

## **Scientific Title**

Biomarker evaluation of different types of Internet-based interactive computer-tailored nutrition education on fat consumption

## **Study objectives**

Computer-tailored health education has been found to be a promising intervention technique to improve a variety of health related behaviours, such as physical activity and dietary behaviours. To be able to improve efficacy, efficiency and applicability of computer-tailored interventions, more in-depth investigations are needed into the most effective delivery forms (print versus interactive), the feedback elements that contribute to efficacy, and whether intervention effects can also be demonstrated using biomarkers as an outcome measure.

The aim of the present study was three-fold:

1. To investigate whether provision of interactive computer-tailored information versus in print format differ in efficacy
2. To identify the minimally required feedback elements of a computer-tailored intervention
3. To evaluate the intervention effects using biomarkers as an outcome measure in addition to self-reported behaviour

These research questions were studied in relation to a computer-tailored intervention aimed at fat intake. Fat intake is an important behavioural risk factor and computer-tailored interventions have been found most effective in reducing fat intake. The study was conducted among healthy adults recruited from nine companies and two communities in the area of Rotterdam.

## **Ethics approval required**

Old ethics approval format

## **Ethics approval(s)**

Ethics approval received from the local medical ethics committee

## **Study design**

Randomised, single blind, active controlled, parallel group trial

## **Primary study design**

Interventional

## **Study type(s)**

Prevention

## **Health condition(s) or problem(s) studied**

No condition, healthy person

## **Interventions**

The study contains four experimental conditions and one control group:

1. Computer-tailored personal feedback on fat consumption in print form
2. Computer-tailored personal and normative feedback on fat consumption in print form
3. Computer-tailored personal, normative and action feedback on fat consumption in print form
4. Computer-tailored personal, normative and action feedback on fat consumption in web-based form (CD-ROM)
5. Generic information on fat consumption in print form (control group)

All the intervention materials were provided once.

**Intervention Type**

Other

**Phase**

Not Specified

**Primary outcome(s)**

1. Total fat and saturated fat consumption - measured with a validated food frequency questionnaire developed by Wageningen University
2. Blood lipids (total cholesterol, high density lipoprotein [HDL], low density lipoprotein [LDL], triglycerides) - sampling and analysing conducted by a certified laboratory (Star Rotterdam)

**Key secondary outcome(s))**

1. Intention to change
2. Process measures

**Completion date**

21/04/2005

**Eligibility****Key inclusion criteria**

1. Age 18 - 65 years
2. No prescribed diet from dietician or physician
3. No treatment for hyper-cholesterolaemia
4. Sufficient understanding of the Dutch language

**Participant type(s)**

Patient

**Healthy volunteers allowed**

No

**Age group**

Adult

**Lower age limit**

18 years

**Sex**

All

**Key exclusion criteria**

Does not comply with the above inclusion criteria

**Date of first enrolment**

24/03/2003

**Date of final enrolment**

21/04/2005

## **Locations**

**Countries of recruitment**

Netherlands

**Study participating centre**

**Erasmus Medical Center**

Rotterdam

Netherlands

3000 CA

## **Sponsor information**

**Organisation**

Erasmus University Medical Center

**ROR**

<https://ror.org/018906e22>

## **Funder(s)**

**Funder type**

Research organisation

**Funder Name**

ZonMw

**Alternative Name(s)**

Netherlands Organisation for Health Research and Development

**Funding Body Type**

Private sector organisation

**Funding Body Subtype**

Other non-profit organizations

**Location**

Netherlands

# Results and Publications

## Individual participant data (IPD) sharing plan

### IPD sharing plan summary

Not provided at time of registration

### Study outputs

Output type	Details	Date created	Date added	Peer reviewed?	Patient-facing?
<a href="#">Results article</a>	results	29/04/2008	06/01/2021	Yes	No