Attentional disengagement from itch and pain

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The primary objective of the study is to investigate attentional disengagement from both itch and pain in healthy subjects. The role of individual characteristics in attentional disengagement from itch and pain will be explored.

Ethical review	Approved WMO
Status	Recruiting
Health condition type	Other condition
Study type	Observational non invasive

Summary

ID

NL-OMON42439

Source
ToetsingOnline

Brief title
Attention to itch and pain

Condition

- Other condition

Synonym
Itch, pruritus; Pain

Health condition

aandoeningen die gepaard gaan met (chronische) jeuk en pijn

Research involving
Human

Sponsors and support

Primary sponsor: Universiteit Leiden
Source(s) of monetary or material Support: NWO Veni subsidie

Intervention

Keyword: Attentional processes, Itch, Pain

Outcome measures

Primary outcome

The primary outcome is similar for both itch and pain, and concerns one*s capacity to disengage attention. Attentional disengagement from itch or pain is reflected by the reaction time of responses to ipsilaterally (as opposed to the itch/pain stimulus) versus contralaterally presented visual targets during the itch and pain stimuli, respectively, corrected for the reaction time during control blocks (i.e. without somatosensory stimulus).

Secondary outcome

As secondary outcome, the accuracy (i.e. incorrect responses) of the reactions to the visual targets will be determined during the itch and pain blocks, corrected for the control blocks. Exploratory, the degree of attentional disengagement from itch will be compared to the degree of attentional disengagement from pain, both with respect to the reaction times and the accuracy. Moreover, individual characteristics assessed by self-report questionnaires will exploratory be related to attentional disengagement from itch and pain.

Study description

Background summary

Itch and pain are somatosensory sensations that serve as warning signals to protect for potential threat. The prioritization of somatosensory stimuli is regulated by attentional processes. Focusing attention on somatosensory stimuli is protective in the case of physical threat when attentional focusing leads to faster detection and more accurate discrimination of for example pain. However, in chronic pain attentional processes, and particularly the ability to disengage attention from pain, seem to be disturbed. In view of the similarities between pain and itch, similar mechanisms of attentional processes might also be relevant for itch. Recently we developed and validated a somatosensory attention task for the investigation of attentional disengagement from itch. However, this task has not yet been used for the investigation of attentional disengagement from pain.

Study objective

The primary objective of the study is to investigate attentional disengagement from both itch and pain in healthy subjects. The role of individual characteristics in attentional disengagement from itch and pain will be explored.

Study design

This is an experimental study in which the somatosensory attention task will be used to investigate attentional disengagement from itch and pain. The somatosensory attention task for itch will now be adapted to be also applicable to measure attentional disengagement from pain. In addition, validated questionnaires measuring individual characteristics will be administered.

Study burden and risks

Potential participants will first complete a screening questionnaire (ca. 15 min). Participants will then visit the lab at the Faculty of Social and Behavioural Sciences of Leiden University once for approximately 1:45 hours. For the somatosensory attention task, itch and pain will be induced non-invasively by means of electrical stimulation, according to a method that has frequently been applied by our research group. The task is not difficult, and only requires concentration. Moreover, a series of validated questionnaires will be administered to assess relevant individual characteristics. No risks are involved with participation in this study.

Contacts

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Trial sites

Listed location countries

Netherlands

Eligibility criteria

Age
Adults (18-64 years)
Elderly (65 years and older)

Inclusion criteria

Healthy volunteer; 18-30 years old; fluent in Dutch language

Exclusion criteria

Severe physical or psychiatric morbidity (e.g., multiple sclerosis, diabetes mellitus, heart or lung disease, rheumatoid arthritis, vasculitis, major depressive disorder), use of pacemaker, chronic itch or pain complaints, use of antihistaminics, pregnancy.

Study design

Design

Study type: Observational non invasive

Masking:	Open (masking not used)
Control:	Uncontrolled
Primary purpose:	Diagnostic

Recruitment

NL

Recruitment status:	Recruiting
Start date (anticipated):	19-10-2015
Enrollment:	53
Type:	Actual

Ethics review

Approved WMO

Date:	12-10-2015
Application type:	First submission
Review commission:	METC Leiden-Den Haag-Delft (Leiden) metc-ldd@lumc.nl

Study registrations

Followed up by the following (possibly more current) registration

No registrations found.

Other (possibly less up-to-date) registrations in this register

No registrations found.

In other registers

Register	ID
CCMO	NL54237.058.15