

The acute effects of cannabis on the brain

No registrations found.

Ethical review	Positive opinion
Status	Pending
Health condition type	-
Study type	Interventional

Summary

ID

NL-OMON27472

Source

NTR

Brief title

Cannabis as a cause of psychosis: an ecogenetic study linking cannabis-induced dopamine response to psychotic mechanisms and experiences

Health condition

cannabis
psychosis
dopamine

Sponsors and support

Primary sponsor: Maastricht University

Source(s) of monetary or material Support: NWO and Maastricht University

Intervention

Outcome measures

Primary outcome

A. Striatal dopamine response after THC and placebo, as measured with PET and [18F]fallypride

B. Psychotic experiences after THC and placebo, as measured with i) novel computer-assisted tasks and ii) clinical interviews

Secondary outcome

C. Influence of genetic variation

Study description

Background summary

The study aims at elucidating the biological mechanism behind the cannabis-psychosis relationship. By using PET and [18F]fallypride, the striatal dopamine response is measured after THC or placebo exposure. Novel computer-assisted tasks as well as clinical interviewing are used to assess psychotic experiences behaviorally.

Study objective

1. Cannabis use increases striatal dopamine release
2. Striatal dopamine release predicts cannabis induced-psychotic experiences
3. Cannabis-induced striatal dopamine response varies as a function of genetic risk for psychosis

Study design

One timepoint (t1)

Intervention

Exposure to delta-9-tetrahydrocannabinol (THC, psychoactive component of cannabis, 8 mg) and placebo

Contacts

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Eligibility criteria

Inclusion criteria

1. Aged between 18 and 50
2. Life-time use of cannabis without having experienced negative effects (e.g. bad trip, toxic psychosis)
3. BMI between 18.5 and 27
4. Having signed informed consent
5. Clinical diagnosis of non-affective schizophrenia or psychotic disorder according to DSM-IV (REFERS ONLY TO PATIENTS)

Exclusion criteria

1. Head trauma
2. Respiratory, cardiovascular, neurological disease, severe renal or liver dysfunction
3. Alcohol use in excess of 5 units per day
4. Weekly use of illicit drugs (other than cannabis)
5. Current use of antipsychotic medication or medication known to interfere with the CB1 receptor (e.g. rimonabant)

6. Pregnancy and breastfeeding

7. Personal or family history of psychosis
(REFERS ONLY TO HEALTHY CONTROLS)

Study design

Design

Study type:	Interventional
Intervention model:	Crossover
Allocation:	Randomized controlled trial
Masking:	Double blinded (masking used)
Control:	Placebo

Recruitment

NL	
Recruitment status:	Pending
Start date (anticipated):	01-06-2008
Enrollment:	30
Type:	Anticipated

Ethics review

Positive opinion	
Date:	19-05-2008
Application type:	First submission

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
NTR-new	NL1272
NTR-old	NTR1318
Other	: 200801
ISRCTN	ISRCTN wordt niet meer aangevraagd

Study results

Summary results

N/A