

# Mirror therapy in patients with complex regional pain syndrome type one of the upper extremity: a randomised clinical trial

<b>Submission date</b> 23/02/2007	<b>Recruitment status</b> No longer recruiting	<input type="checkbox"/> Prospectively registered
<b>Registration date</b> 23/02/2007	<b>Overall study status</b> Completed	<input type="checkbox"/> Protocol
<b>Last Edited</b> 08/09/2011	<b>Condition category</b> Musculoskeletal Diseases	<input type="checkbox"/> Statistical analysis plan
		<input type="checkbox"/> Results
		<input type="checkbox"/> Individual participant data
		<input type="checkbox"/> Record updated in last year

## Plain English Summary

Not provided at time of registration

## Contact information

### Type(s)

Scientific

### Contact name

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### Contact details

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## Additional identifiers

EudraCT/CTIS number

IRAS number

ClinicalTrials.gov number

Secondary identifying numbers

N/A

## Study information

### Scientific Title

### Study hypothesis

Mirror therapy was introduced by Ramachandran in patient with phantom limb pain and is based on new knowledge about the plasticity of the brain. Recently, studies in patients with Complex Regional Pain Syndrome (CRPS) have suggested that exercising with the painful hand behind a mirror and watching a reflection of the normal hand will give the brain the illusion that the hand is now able to move normally.

In these controlled but undersized studies, positive effects were reported on pain, oedema and hand function. In the present single-blind randomised clinical trial, mirror therapy will be presented in three phases:

1. One week Recognition of Hand Laterality using pictures of left and right hands
2. One week of Imagined Hand Movements, and
3. Four weeks of mirror therapy

### Hypothesis:

Mirror therapy in patients with Complex Regional Pain Syndrome type one (CRPS I) has a positive effect on pain, oedema, sensibility, hand function, Activities of Daily Living (ADL) and quality of life compared to standard treatment.

### Ethics approval required

Old ethics approval format

### Ethics approval(s)

Ethics approval received from the local medical ethics committee

### Study design

Randomised, active controlled, parallel group, single blinded trial

### Primary study design

Interventional

### Secondary study design

Randomised controlled trial

### Study setting(s)

Other

### Study type(s)

Treatment

### Participant information sheet

### Condition

Complex regional pain syndrome type 1 (CRPS I)

## **Interventions**

Mirror therapy versus standard treatment:

1. One week recognition of hand laterality using pictures of left and right hands
2. One week of imagined hand movements, and
3. Four weeks of mirror therapy

The control group will receive treatment following standard treatment guidelines.

## **Intervention Type**

Other

## **Phase**

Not Specified

## **Primary outcome measure**

Pain

## **Secondary outcome measures**

1. Hand function
2. ADL
3. Oedema
4. Sensibility
5. Quality of life

## **Overall study start date**

01/12/2005

## **Overall study end date**

01/12/2007

# **Eligibility**

## **Participant inclusion criteria**

Modified research diagnostic criteria for CRPS-1 based on Bruehl 1999.

## **Participant type(s)**

Patient

## **Age group**

Not Specified

## **Sex**

Not Specified

## **Target number of participants**

52

## **Participant exclusion criteria**

1. Treatment for CRPS-I in another institution
2. Psychiatric problems
3. Lack of motivation

**Recruitment start date**

01/12/2005

**Recruitment end date**

01/12/2007

## Locations

**Countries of recruitment**

Netherlands

**Study participating centre**

Erasmus Medical Centre

Rotterdam

Netherlands

3000 CA

## Sponsor information

**Organisation**

Erasmus Medical Centre (The Netherlands)

**Sponsor details**

P.O. Box 2040

Rotterdam

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3000 CA

**Sponsor type**

Hospital/treatment centre

**Website**

<http://www.erasmusmc.nl/>

**ROR**

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

## Funder(s)

**Funder type**

Hospital/treatment centre

**Funder Name**

Erasmus Medical Centre (The Netherlands)

**Funder Name**

Medical Research Advisory Committee Erasmus (MRACE) (The Netherlands)

## **Results and Publications**

**Publication and dissemination plan**

Not provided at time of registration

**Intention to publish date****Individual participant data (IPD) sharing plan****IPD sharing plan summary**

Not provided at time of registration