# PRACTISE: Promoting acute thrombolysis for ischemic stroke.

Gepubliceerd: 22-09-2005 Laatst bijgewerkt: 18-08-2022

The purpose of this study is: 1. To evaluate the effect of a high intensity implementation strategy compared to a regular intensity strategy; 2. Identify success factors and obstacles for mplementation of thrombolysis; and 3) to assess the cost-...

**Ethische beoordeling** Positief advies **Status** Werving gestopt

Type aandoening -

**Onderzoekstype** Interventie onderzoek

## **Samenvatting**

#### ID

NL-OMON28863

**Bron** 

Nationaal Trial Register

**Verkorte titel** 

**PRACTISE** 

**Aandoening** 

Stroke

### **Ondersteuning**

Primaire sponsor: Erasmus MC Rotterdam

Overige ondersteuning: ZON MW

Postbus 93245 2509 AE Den Haag

Website: www.zonmw.nl

## Onderzoeksproduct en/of interventie

#### **Uitkomstmaten**

#### Primaire uitkomstmaten

Treatment with thrombolysis or not in all registered patients.

## **Toelichting onderzoek**

#### Achtergrond van het onderzoek

#### Background:

Thrombolysis with rt-PA is an effective treatment for patients with ischemic stroke within 3 hours from onset. More than 25% of stroke patients arrive in time to be treated with thrombolysis. Nevertheless, in most hospitals, only 1 to 8% of all stroke patients are treated. Professional, organizational and contextual barriers are hampering broad implementation. The purpose of this study is:

- 1. to evaluate the effect of a high intensity implementation strategy compared to a regular intensity strategy;
- 2. identify success factors and obstacles for implementation of thrombolysis; and
- 3. to assess the cost-effectiveness of thrombolysis in routine daily Dutch neurological care settings, taking into account the costs of implementation.

#### Methods:

The effect of the implementation will be evaluated in a cluster randomized, controlled design. Randomization will be done on the hospital level, with pairwise stratification for thrombolysis rate, size and type of hospital (academic or non-academic, and regional versus urban).

#### Primary outcome:

the number of thrombolyses in the high intensity versus the regular intensity group.

#### Secondary outcomes:

the rate of symptomatic intracebral hemorrhages among thrombolysed patients, the

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proportion of patients admitted within 3 hours from onset of symptoms, and health status at 3

months. Twelve centers will participate, yielding a two-armed trial of 3500 stroke patients per arm. This is sufficient to a detect a 50% increase in thrombolysis rate in centers with the high intensity intervention compared to regular intensity intervention, and a twofold increase in the rate of symptomatic intracerebral hemorrhage in thrombolysed patients, with adjustment for intracluster correlation.

The implementation strategy is based on the Breakthrough methodology, preceded by an indepth analysis of obstacles from a regional and national point of view. A tool kit with improvement actions to be used by the vascular neurologist, the change agent, will be developed and introduced. The improvement actions will include the FAST test for GP's and ambulance personnel, a less strict set of contra-indications derived from a Delphi panel of international experts,1 tools to improve the "door to needle time", and tools for dealing with issues of decision making under conditions of uncertainty.

The implementation process will be monitored by means of the Assertive Community Treatment approach, according to prespecified criteria, in order to identify obstacles and success factors for implementation of thrombolysis.

The results will be analyzed with a logistic regression model with a random parameter for center effect.

#### Doel van het onderzoek

The purpose of this study is:

- 1. To evaluate the effect of a high intensity implementation strategy compared to a regular intensity strategy;
- 2. Identify success factors and obstacles for mplementation of thrombolysis; and 3) to assess the cost-effectiveness of thrombolysis in routine daily Dutch neurological care settings, taking into account the costs of implementation.

#### Onderzoeksopzet

N/A

#### Onderzoeksproduct en/of interventie

The high intensity intervention consists of the introduction of a set of implementation tools, directed at the four levels where barriers against trombolysis are expected. This toolkit will be explained in a training sessions to the vascular neurologist and coordinating nurse in each

center, who also act as the local agents of change. Training session takes place after 6 months and 1 year.

## Contactpersonen

#### **Publiek**

Erasmus Medical Center, Department of Neurology, Suite Ee 2240, P.O. Box 1738 Maaike Dirks Rotterdam 3000 DR The Netherlands

#### Wetenschappelijk

Erasmus Medical Center, Department of Neurology, Suite Ee 2240, P.O. Box 1738 Maaike Dirks Rotterdam 3000 DR The Netherlands

#### **Deelname** eisen

## Belangrijkste voorwaarden om deel te mogen nemen (Inclusiecriteria)

All patients who are admitted with acute stroke, i.e. patients with an acute focal neurological deficit, which cannot be explained by a condition other than stroke, andonset of symptoms not longer than 24 hours ago, will be included in the trial. Thesepatients will be registered, and a minimal set of baseline data will be recorded. Patients with acute stroke, who are admitted within 4 hours from onset of symptoms will be registered and followed up after three months.

## Belangrijkste redenen om niet deel te kunnen nemen (Exclusiecriteria)

Age under 18.

## **Onderzoeksopzet**

### **Opzet**

Type: Interventie onderzoek

Onderzoeksmodel: Parallel

Toewijzing: Gerandomiseerd

Blindering: Open / niet geblindeerd

Controle: N.v.t. / onbekend

#### **Deelname**

Nederland

Status: Werving gestopt

(Verwachte) startdatum: 01-10-2005

Aantal proefpersonen: 7000

Type: Werkelijke startdatum

## **Ethische beoordeling**

Positief advies

Datum: 22-09-2005

Soort: Eerste indiening

## **Registraties**

## Opgevolgd door onderstaande (mogelijk meer actuele) registratie

Geen registraties gevonden.

## Andere (mogelijk minder actuele) registraties in dit register

Geen registraties gevonden.

## In overige registers

Register ID

NTR-new NL273 NTR-old NTR311

Ander register : 945-14-217

ISRCTN ISRCTN20405426

## Resultaten

#### Samenvatting resultaten

Trial protocol on trial website.