

# Clinical Trial Protocol

## Iranian Registry of Clinical Trials

01 Jun 2026

### Evaluation of the intravenous Magnesium sulfate effect in clinically improvement of patient with acute ischemic stroke

#### Protocol summary

##### Summary

Stroke is the leading cause of death and leading cause of disability in adult. The purpose of this clinical trial is Evaluation of the intravenous Magnesium sulfate effect in clinically improvement of patient with acute ischemic stroke. Patients will be randomly selected in neurology emergency of Farabi & Emam Reza hospital of Kermanshah. A group of 97 patients who clinically diagnosed acute ischemic stroke will be enrolled. The patients will be randomly allocated into one of two groups. we will administer Magnesium sulfate 4gr IV in 50 cc normal saline over 15 minutes followed by 16 gr in 100cc over 24 hours as a continuous infusion. The placebo group received equal volumes of normal saline alone. In all patients measure of global disability according to modified Rankin scale and NIH stroke scale will be assessed before of the treatment, 3days after treatment and discharge time. Finally, measure of global disability, amount of admission times and mortality rate in each group will be compared.

#### General information

##### Acronym

##### IRCT registration information

IRCT registration number: **IRCT138901101856N2**  
Registration date: **2010-03-30, 1389/01/10**  
Registration timing: **registered\_while\_recruiting**

Last update:

Update count: **0**

##### Registration date

2010-03-30, 1389/01/10

##### Registrant information

##### Name

Dariush Afshari

##### Name of organization / entity

Kermanshah University of Medical Sciences and Health Services

##### Country

Iran (Islamic Republic of)

##### Phone

+98 83 1835 0177

##### Email address

dafshari@kums.ac.ir

##### Recruitment status

**Recruitment complete**

##### Funding source

Vice-chancellor for research, Kermanshah University of Medical Sciences and Health Services

##### Expected recruitment start date

2010-03-11, 1388/12/20

##### Expected recruitment end date

2010-12-11, 1389/09/20

##### Actual recruitment start date

empty

##### Actual recruitment end date

empty

##### Trial completion date

empty

##### Scientific title

Evaluation of the intravenous Magnesium sulfate effect in clinically improvement of patient with acute ischemic stroke

##### Public title

Evaluation of the Magnesium sulfate effect in ischemic stroke treatment

##### Purpose

Treatment

##### Inclusion/Exclusion criteria

Inclusion criteria: patient's age between 40-95 years, last known well time within 12 hours of treatment initiation. Exclusion criteria: pregnancy-coma -heart block-chronic renal impairment- respiratory distress(24 < RR < 12 l<sub>o</sub>2sat < 90)- systolic blood pressure <90 or >220mmhg-

pre-existing neuralgic psychiatric or advanced systemic disease that confound neuralgical or functional outcome evaluation -hemorrhagic stroke - known recent stroke wheithin past 30 days- rapidly resolving deficit

#### **Age**

From **40 years** old to **95 years** old

#### **Gender**

Both

#### **Phase**

2

#### **Groups that have been masked**

*No information*

#### **Sample size**

Target sample size: **97**

#### **Randomization (investigator's opinion)**

Randomized

#### **Randomization description**

#### **Blinding (investigator's opinion)**

Double blinded

#### **Blinding description**

#### **Placebo**

Used

#### **Assignment**

Parallel

#### **Other design features**

### **Secondary Ids**

empty

### **Ethics committees**

#### **1**

##### **Ethics committee**

###### **Name of ethics committee**

Kermanshah University of Medical Sciences and Health Servises Ethical Comitte

###### **Street address**

Shahid Beheshti boulevard, Kermanshah

###### **City**

Kermanshah

###### **Postal code**

##### **Approval date**

empty

##### **Ethics committee reference number**

88113

### **Health conditions studied**

#### **1**

##### **Description of health condition studied**

ischemic stroke

##### **ICD-10 code**

I64

##### **ICD-10 code description**

Stroke

### **Primary outcomes**

#### **1**

##### **Description**

measure of global disability

##### **Timepoint**

before of the treatment ,3days after treatment and discharge time

##### **Method of measurement**

according to modified Rankin scale

#### **2**

##### **Description**

mortality rate

##### **Timepoint**

During admition times

##### **Method of measurement**

patient' s medical documents

#### **3**

##### **Description**

amount of admition times

##### **Timepoint**

discharge time

##### **Method of measurement**

patient' s medical documents

### **Secondary outcomes**

#### **1**

##### **Description**

Clinical side effects

##### **Timepoint**

daily

##### **Method of measurement**

According to patients daily notes

### **Intervention groups**

#### **1**

##### **Description**

Magnesium sulfate 4gr IV in 50 cc normal saline over 15 minutes followed by 16 gr in 100cc over 24 hours

##### **Category**

Treatment - Drugs

#### **2**

##### **Description**

equal volumes of normal saline

##### **Category**

Placebo

### **Recruitment centers**

## 1

### Recruitment center

**Name of recruitment center**

Farabi Hospital of Kermanshah

**Full name of responsible person**

Dr Dariush Afshari

**Street address**

Ashayer boulevard, Dolat Abad, Kermanshah

**City**

Kermanshah

## 2

### Recruitment center

**Name of recruitment center**

Emam Reza Hospitl of Kermanshah

**Full name of responsible person**

dr nasrin moradian

**Street address**

Sorkhelijeh, Kermanshah

**City**

Kermanshah

## Sponsors / Funding sources

### 1

#### Sponsor

**Name of organization / entity**

Vice-chancellor for research, Kermanshah University of Medical Sciences and Health Services

**Full name of responsible person**

Dr Farid Najafi

**Street address**

Shahid Beheshti boulevard, Kermanshah

**City**

Kermanshah

**Grant name****Grant code / Reference number****Is the source of funding the same sponsor organization/entity?**

Yes

**Title of funding source**

Vice-chancellor for research, Kermanshah University of Medical Sciences and Health Services

**Proportion provided by this source**

100

**Public or private sector**

*empty*

**Domestic or foreign origin**

*empty*

**Category of foreign source of funding**

*empty*

**Country of origin****Type of organization providing the funding**

*empty*

## Person responsible for general inquiries

### Contact

**Name of organization / entity**

Emam Reza hospital

**Full name of responsible person**

Dr Dariush Afshari

**Position**

Neurologist/assistant professor/chairman

**Other areas of specialty/work****Street address**

Sorkhelijeh, Kermanshah

**City**

Kermanshah

**Postal code****Phone**

+98 83 1427 6309

**Fax****Email**

dafshari@kums.ac.ir

**Web page address**

## Person responsible for scientific inquiries

### Contact

**Name of organization / entity**

Emam Reza hospital

**Full name of responsible person**

Dr Dariush Afshari

**Position**

Neurologist/assistant professor/chairman

**Other areas of specialty/work****Street address**

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**Web page address**

## Person responsible for updating data

### Contact

**Name of organization / entity**

Emam Reza Hospitl

**Full name of responsible person**

dr nasrin moradian

**Position**

Resident of neurology

**Other areas of specialty/work****Street address**

Sorkhelijeh, Kermanshah

**City**

Kermanshah

**Postal code****Phone****Fax****Email****Web page address**

## **Sharing plan**

**Deidentified Individual Participant Data Set (IPD)**

*empty*

**Study Protocol**

*empty*

**Statistical Analysis Plan**

*empty*

**Informed Consent Form**

*empty*

**Clinical Study Report**

*empty*

**Analytic Code**

*empty*

**Data Dictionary**

*empty*