# Clinical study of effects of intramuscular diazepam in chronic postherpetic neuralgia

Submission date	<b>Recruitment status</b> No longer recruiting	[X] Prospectively registered		
11/01/2018		☐ Protocol		
Registration date 24/01/2018	Overall study status Completed	Statistical analysis plan		
		[X] Results		
Last Edited	Condition category	Individual participant data		
30/05/2024	Nervous System Diseases			

#### Plain English summary of protocol

Background and study aims

Postherpetic neuralgia is lasting nerve pain in an area previously affected by shingles. It seriously affects the patient's sleep, mood and quality of life. After treatment there are still some patients who suffer from neuropathic pain and it is still a difficult clinical problem. Diazepam is a long-acting drug used in insomnia and sedation. Animal studies have shown that an injection of diazepam can treat neuropathic pain. The aim of this study is to assess the effects of diazepam on postherpetic neuralgia, anxiety, depression and quality of life, and its safety and side effects.

Who can participate?

Patients aged 18 to 80 with postherpetic neuralgia

What does the study involve?

Participants are randomly allocated to two groups. Those in group 1 are given diazepam injections for 3 days. Those in group 2 are given saline (salt water) injections instead. The pain experienced after treatment is assessed for each patient every day for the next 3 months.

What are the possible benefits and risks of participating?

The participants could have better pain relief. The main possible risks are the side effects of diazepam.

Where is the study run from?

Xinhua Hospital (affiliated with Shanghai Jiaotong University School of Medicine) (China)

When is the study starting and how long is it expected to run for? February 2018 to July 2019

Who is funding the study?

Xinhua Hospital (affiliated with Shanghai Jiaotong University School of Medicine) (China)

Who is the main contact? Prof. Ke Ma

# **Contact information**

#### Type(s)

Scientific

#### Contact name

Prof Ke Ma

#### Contact details

No 1665 Kongjiang Road Yangpu District Shanghai China 200092

## Additional identifiers

#### Protocol serial number

XINHUA2018-02

# Study information

#### Scientific Title

Clinical trial of effects of intramuscular diazepam in chronic postherpetic neuralgia

## Study objectives

- 1. Intramuscular diazepam is effective and safe when administered for chronic postherpetic neuralgia patients.
- 2. Treatment of Intramuscular diazepam can improve the quality of life of chronic postherpetic neuralgia patients.

## Ethics approval required

Old ethics approval format

## Ethics approval(s)

Xinhua Hospital Ethics Committee Affiliated to Shanghai Jiaotong University School of Medicine, 26/12/2017, ref: XHEC-C-2017-105

## Study design

Single-center double-blinded randomized controlled clinical study

## Primary study design

Interventional

## Study type(s)

Treatment

Health condition(s) or problem(s) studied

#### Neuralgia

#### **Interventions**

78 participants are randomly allocated to two groups. Those in group 1 (n=39) are given diazepam 10mg intramuscularly for 3 days. Those in group 2 (n=39) are given saline instead. The basic treatment is oral administration of Gabapentin 0.3g t.i.d. The pain experienced after treatment is assessed for each patient every day for the next 3 months.

#### Intervention Type

Drug

#### Phase

Not Applicable

#### Drug/device/biological/vaccine name(s)

Diazepam

#### Primary outcome(s)

- 1. Pain, measured using the visual analogue score (VAS) during the treatment and at 7 days, 14 days, 21 days, 28 days, 2 months and 3 months post-treatment.
- 2. The frequency and intensity of the pain outbreak during the treatment and at 7 days, 14 days, 21 days, 28 days, 2 months and 3 months post-treatment
- 3. The dosage of Gabapentin per day during the treatment

#### Key secondary outcome(s))

- 1. Intensity of anxiety, measured using the PHQ-9 evaluation scale during the treatment and at 7 days, 14 days, 21 days, 28 days, 2 months and 3 months after treatment
- 2. Intensity of depression, measured by the GAD-7 anxiety screening scale during the treatment and at 7 days, 14 days, 21 days, 28 days, 2 months and 3 months after treatment
- 3. Quality of life, measured by the quality of life score (QOL) during the treatment and at 7 days, 14 days, 21 days, 28 days, 2 months and 3 months after treatment

## Completion date

31/07/2019

## **Eligibility**

#### Key inclusion criteria

- 1. Subjects voluntarily signed the informed consent
- 2. Patients suffering from chronic postherpetic neuralgia aged from 18 to 80 regardless of gender
- 3. Moderate to severe pain, VAS> 4 points or more, or burst pain> 3 times/day
- 4. Patients can follow the drug dose and follow-up plan
- 5. Patients can describe the symptoms, no serious infection, respiratory insufficiency and has the ability to cooperate
- 6. Non-allergic persons
- 7. No drug abuse or drug addiction
- 8. Non-lactating, non-pregnant women, subjects who did not have a pregnancy plan within 1

#### month after the test

9. Patients did not participate in a drug test within 3 months before this test (including the test drug)

#### Participant type(s)

Patient

#### Healthy volunteers allowed

No

#### Age group

Adult

#### Lower age limit

18 years

#### Upper age limit

80 years

#### Sex

Αll

#### Total final enrolment

78

#### Key exclusion criteria

- 1. Researchers think that there is any reason participant should be excluded
- 2. In poor situation, severe systemic infection or respiratory dysfunction and uncooperative
- 3. Suffering from severe respiratory system, cardiovascular system diseases, liver and kidney dysfunction, cancer
- 4. Patients who are allergic to diazepam or other benzodiazepines
- 5. Patient who has or a history of drug abuse
- 6. Breastfeeding, gestational women or subjects who do not have a pregnancy plan within 1 month after the test
- 7. Patients who participated in a drug trial within 3 months before this trial
- 8. Patients does not meet the inclusion criteria

#### Date of first enrolment

01/02/2018

#### Date of final enrolment

31/01/2019

## Locations

#### Countries of recruitment

China

#### Study participating centre

# Pain Management Department, Xinhua Hospital affiliated to Shanghai Jiaotong University, School of Medicine

Shanghai China 200092

#### Study participating centre

Pain Management Centre, Xinhua Hospital affiliated with Shanghai Jiaotong University school of medicine

No 1665 Kongjiang Road, Yangpu District Shanghai China 200092

# **Sponsor information**

#### Organisation

Xinhua Hospital (affiliated with Shanghai Jiaotong University School of Medicine)

#### **ROR**

https://ror.org/04dzvks42

# Funder(s)

#### Funder type

Hospital/treatment centre

#### **Funder Name**

Xinhua Hospital (affiliated with Shanghai Jiaotong University School of Medicine)

## **Results and Publications**

#### Individual participant data (IPD) sharing plan

The data sharing plans for the current study are unknown and will be made available at a later date.

#### IPD sharing plan summary

Data sharing statement to be made available at a later date

#### Study outputs

Output type	Details	Date created	Date added	Peer reviewed?	Patient-facing?
Results article		29/05/2024	30/05/2024	Yes	No
Participant information sheet	Participant information sheet	11/11/2025	11/11/2025	No	Yes