Clinical Trial Protocol
Iranian Registry of Clinical Trials

07 Nov 2026

Evaluation the effect of acupressure on hope and self-efficacy of patients undergoing hemodialysis

Protocol summary

Study aim
Determining the effect of acupressure on hope and self-efficacy of patients undergoing hemodialysis

Design
The randomized single blind clinical trial consisted of control, sham, and intervention groups will conducted on 69 patients. The permutation block method was used for randomization.

Settings and conduct
Patients undergoing hemodialysis refer to the Shafa and Shahid Seyed Mostafa Khomeini wards in Boshrouyeh and Tabas hospitals assigned to the intervention, sham (pseudo acupoint) and control groups by permutation block method. In this study, Data analyzer is blinded.

Participants/Inclusion and exclusion criteria
Having hearing and speech ability,Having complete consciousness, Age between 18-70 years,Age between 18-70 years, having medical file inIntensive care unit,Three times hemodialysis in week and four hours for each session , No limb amputation, wounds, swelling and burns and fractures at the site of acupressure, Exclusion: Having an acute illness or special condition that requires medical attention,Severe mental disorder and use of sedatives,Occurrence of stressful events such as the death of immediate family, separation or divorce, and legal disputes in the past 6 months

Intervention groups
Acupressure technique will be applied In Intervention group one hour after the initiation of hemodialysis, by pressing about 3 to 4 kg weight, for a total of 9 minutes in a circular motion and two rounds per second with the thumb (3 minutes in each point), three days a week for four weeks. Patients will be taught that acupressure works when they feels warmness, heaviness, swollen, or numbness. In sham group (pseudo acupoint), the pressure is applied 1-1 / 5 cm away from the main points with the same method and time.In the control group standard treatment will be done.

Main outcome variables
hope; self-efficacy

General information

Reason for update

Acronym

IRCT registration information
IRCT registration number: **IRCT20211006052687N1**
Registration date: **2021-11-13, 1400/08/22**
Registration timing: **prospective**

Last update: **2021-11-13, 1400/08/22**
Update count: **0**

Registration date
2021-11-13, 1400/08/22

Registrant information

Name
Mahnaz Kayyal

Name of organization / entity

Country
Iran (Islamic Republic of)

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+98 51 4401 8300

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kayyalm99@medsab.ac.ir

Recruitment status
Recruitment complete

Funding source

Expected recruitment start date
2021-11-22, 1400/09/01

Expected recruitment end date
2022-01-20, 1400/10/30

Actual recruitment start date
empty

Actual recruitment end date
empty

Trial completion date

empty

Scientific title
Evaluation the effect of acupressure on hope and self-efficacy of patients undergoing hemodialysis

Public title
Evaluation the effect of acupressure on hope and self-efficacy of patients undergoing hemodialysis

Purpose
Supportive

Inclusion/Exclusion criteria

Inclusion criteria:
Having hearing and speech ability Having complete consciousness Age between 18-70 years Having medical file in Intensive care unit Three times hemodialysis in week and four hours for each session A patient who undergoing hemodialysis for at least 6 months No limb amputation, wounds, swelling and burns and fractures at the site of acupressure

Exclusion criteria:
Having an acute illness or special condition that requires medical attention. Severe mental disorder and use of sedatives Occurrence of stressful events such as the death of immediate family, separation or divorce, and legal disputes in the past 6 months

Age
From **18 years** old to **70 years** old

Gender
Both

Phase
N/A

Groups that have been masked

- Data analyser

Sample size
Target sample size: **69**

Randomization (investigator's opinion)
Randomized

Randomization description
Patients were randomly divided into three groups A, B, and C in 12 blocks of six using the site https://www.Randomization.com and in order to hide the samples allocated in 12 envelopes. Opaque seals prepared by the supervisor are provided to the researcher

Blinding (investigator's opinion)
Single blinded

Blinding description
data analyzer department is unaware of the allocation of study groups

Placebo
Not used

Assignment
Parallel

Other design features

Secondary Ids

empty

Ethics committees

1

Ethics committee

Name of ethics committee
Ethics committee of Sabzevar University of Medical Sciences

Street address
No. 31, Towhid shahr Ave, Shohada Gomnam Blvd, campus of Sabzevar University of Medical Sciences, sabzevar

City
Sabzevar

Province
Razavi Khorasan

Postal code
صندوق 31 -9617913112

Approval date
2021-10-03, 1400/07/11

Ethics committee reference number
IR.MEDSAB.REC.1400.097

Health conditions studied

1

Description of health condition studied
chronic kidney disease

ICD-10 code
N18.4

ICD-10 code description
Chronic kidney disease, stage 4 (severe)

Primary outcomes

1

Description
Hope

Timepoint
Before the intervention and 2 weeks after the intervention

Method of measurement
Herth hope index

2

Description
self-efficacy

Timepoint
Before the intervention and 2 weeks after the intervention

Method of measurement
Sherer general self-efficacy scale

Secondary outcomes

empty

Intervention groups

1

Description
Intervention group: Acupressure one hour after the start of hemodialysis, in the form of a pressure of 3 to 4 kg, for a total of 9 minutes with the thumb (3 minutes anywhere) in a circular motion and two rounds per second, three days a week for four weeks. Patients are also instructed that acupressure works when the patient feels warm, heavy, swollen, or numb.
Category
Other

2

Description
Intervention group: In sham group (pseudo acupoint), the pressure is aplied at a distance of 1-1 / 5 cm from the main points with the same method and time.
Category
Other

3

Description
Control group: Without intervention
Category
Other

Recruitment centers

1

Recruitment center
Name of recruitment center
Shafa Boshrouyeh Hospital
Full name of responsible person
Mahnaz Kayyal
Street address
Jahad Blvd, Shafa Boshrouyeh Hospital
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2

Recruitment center
Name of recruitment center
Shahid Seyed Mostafa Khomeini Hospital, Tabas
Full name of responsible person
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Sponsors / Funding sources

1

Sponsor
Name of organization / entity
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Street address
No. 31, Towhid shahr Ave, Shohada Gomnam Blvd, campus of Sabzevar University of Medical Sciences, sabzevar
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Web page address
https://www.medsab.ac.ir/index.aspx?fkeyid=&siteid=1&fkeyid=&siteid=1&pageid=8659
Grant name
Grant code / Reference number
Is the source of funding the same sponsor organization/entity?
Yes
Title of funding source
Sabzevar University of Medical Sciences
Proportion provided by this source
100
Public or private sector
Public
Domestic or foreign origin
Domestic
Category of foreign source of funding
empty
Country of origin
Type of organization providing the funding
Academic

Person responsible for general inquiries

Contact
Name of organization / entity
Sabzevar University of Medical Sciences

Full name of responsible person
Mahnaz kayyal
Position
Master student of medical surgical nursing
Latest degree
Bachelor
Other areas of specialty/work
Nursery
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Person responsible for updating data

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Sharing plan

Deidentified Individual Participant Data Set (IPD)
Yes - There is a plan to make this available
Study Protocol
Yes - There is a plan to make this available
Statistical Analysis Plan
Undecided - It is not yet known if there will be a plan to make this available
Informed Consent Form
Yes - There is a plan to make this available
Clinical Study Report
Undecided - It is not yet known if there will be a plan to make this available
Analytic Code
Not applicable
Data Dictionary
Not applicable
Title and more details about the data/document
Part of the sample' data will be shared after being unidentified.
When the data will become available and for how long
After data collecting and analyzing , the results will be published as an article.
To whom data/document is available
The results will be published to all researchers in the field.
Under which criteria data/document could be used
The results of this study can be used by all authorities in the field of treatment and care of patients with chronic renal failure undergoing hemdialysis.
From where data/document is obtainable
Applicants can access the research documents to Ms. Mahnaz Kayyal at the address of Sabzevar University of Medical Sciences, School of Nursing and Midwifery. Refer to Student Research Committee Unit
What processes are involved for a request to access data/document
Applicants can access the documents to after filling an application to the Student Research Committee and obtaining the necessary permitions.
Comments