Clinical Trial Protocol
Iranian Registry of Clinical Trials

08 Nov 2026

Effect of distraction by virtual reality on pain, anxiety and stress of angiography

Protocol summary

Study aim
Evaluate the Effect of distraction by virtual reality on pain, anxiety and stress of angiography
Design
Intervention group: In the virtual reality group, 4 days before the angiography and during admission, special glasses are placed on the patient's head, and for 15 minutes they distribute images designed to reduce pain. The severity of anxiety and pain will be measured before and after the intervention.
Settings and conduct
Intervention group: In the virtual reality group, 4 days before the angiography and during admission, special glasses are placed on the head of the patient, and for 15 minutes they distribute images designed to reduce pain. The severity of anxiety and pain will be measured before and after the intervention. this study will be conducted in Imam Reza Hospital in Mashhad
Participants/Inclusion and exclusion criteria
Age 18 to 60 Awareness of time, place and persons at the time of data collection At least the reading and writing skills
Intervention groups
patients undergoing angiography
Main outcome variables
pain, anxiety and stress

General information

Reason for update
Acronym
IRCT registration information
IRCT registration number: **IRCT20171219037966N4**
Registration date: **2019-02-02, 1397/11/13**
Registration timing: **retrospective**

Last update: **2019-02-02, 1397/11/13**
Update count: **0**

Registration date
2019-02-02, 1397/11/13

Registrant information
Name
Amirreza Nasirzadeh
Name of organization / entity
Country
Iran (Islamic Republic of)
Phone
+98 51 5722 3028
Email address
nasirzadeh@gmu.ac.ir

Recruitment status
Recruitment complete
Funding source

Expected recruitment start date
2018-07-06, 1397/04/15
Expected recruitment end date
2018-11-03, 1397/08/12
Actual recruitment start date
2018-08-14, 1397/05/23
Actual recruitment end date
2018-12-13, 1397/09/22
Trial completion date
2019-01-25, 1397/11/05

Scientific title
Effect of distraction by virtual reality on pain, anxiety and stress of angiography

Public title
Effect virtual reality on angiography
Purpose
Supportive
Inclusion/Exclusion criteria
Inclusion criteria:
Age 18 to 60 Awareness of time, place and persons at the time of data collection At least the reading and writing skills

Exclusion criteria:
The patient's unwillingness to continue the research Continuous use of analgesics 24 hours before intervention Continuous use of anti-anxiety 24 hours before intervention Sight or hearing problems

Age
From **18 years** old to **60 years** old

Gender
Both

Phase
N/A

Groups that have been masked
No information

Sample size
Target sample size: **80**
Actual sample size reached: **80**

Randomization (investigator's opinion)
Randomized

Randomization description
For randomization, the method of permutation blocks (4 blocks, 20) is used.

Blinding (investigator's opinion)
Not blinded

Blinding description

Placebo
Not used

Assignment
Parallel

Other design features

Secondary Ids

empty

Ethics committees

1

Ethics committee

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

Street address
Gonabad University of Medical Sciences, Asian Roads, Gonabad, Khorasan Razavi, Iran

City
Gonabad

Province
Razavi Khorasan

Postal code
9691793718

Approval date
2018-01-31, 1396/11/11

Ethics committee reference number
IR.GMU.REC.1396.174

Health conditions studied

1

Description of health condition studied
Cardiac catheterization

ICD-10 code
I20

ICD-10 code description
Angina pectoris

Primary outcomes

1

Description
Anxiety level

Timepoint
4 days prior to angiography, time of the addmission

Method of measurement
Spielberger state-trait anxiety inventory

2

Description
Stress

Timepoint
4 days prior to angiography, time of the addmission

Method of measurement
DASS-21

3

Description
pain

Timepoint
During Angiography

Method of measurement
NSR

Secondary outcomes

empty

Intervention groups

1

Description
Intervention group: In the virtual reality group, 4 days before the angiography and during admission, special glasses are placed on the head of the patient, and for 15 minutes they distribute the images designed to reduce the pain. In supine position, then a few deep abdominal breaths and The diaphragm is closed and comfortable in the best condition in which it relaxes. By providing a quiet, quiet environment and by minimizing environmental stimuli (such as low light, travel restrictions), the client will watch virtual reality imagery. The severity of anxiety, stress, and pain will be measured before and after the intervention.

Category
Treatment - Other

2

Description
Control group: 4 days before angiography and during

admission without intervention, the intensity of anxiety, pain and pain will be measured during stroke. In this group, there will be no intervention to watch virtual reality movies.

Category
N/A

Recruitment centers

1

Recruitment center

Name of recruitment center
Imam Reza Hospital

Full name of responsible person
Amirreza Nasirzadeh

Street address
Imam Reza Hospital, Imam Reza Square, Mashhad

City
Mashhad

Province
Razavi Khorasan

Postal code
9691945182

Phone
+98 51 3802 2000

Email
nasirzadeharnz@gmail.com

Sponsors / Funding sources

1

Sponsor

Name of organization / entity
Gonabad University of Medical Sciences

Full name of responsible person
Dr. Seyed Ali Sajjadi

Street address
Gonabad University of Medical Sciences, Asian Roads, Gonabad, Khorasan Razavi, Iran

City
Gonabad

Province
Razavi Khorasan

Postal code
9691793718

Phone
+98 51 5722 3028

Email
Sajjadi84a@gmail.com

Grant name

Grant code / Reference number

Is the source of funding the same sponsor organization/entity?
Yes

Title of funding source
Gonabad 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
Gonabad University of Medical Sciences

Full name of responsible person
Amirreza Nasirzadeh

Position
Student

Latest degree
Bachelor

Other areas of specialty/work
Nursery

Street address
Gonabad University of Medical Sciences, Asian Roads, Gonabad, Khorasan Razavi, Iran

City
Gonabad

Province
Razavi Khorasan

Postal code
9691793718

Phone
+98 51 5722 3028

Email
nasirzadeharnz@gmail.com

Person responsible for scientific inquiries

Contact

Name of organization / entity
Gonabad University of Medical Sciences

Full name of responsible person
kokab basiri moghaddam

Position
assistant professor

Latest degree
Ph.D.

Other areas of specialty/work
Nursery

Street address
Gonabad University of Medical Sciences, Asian Roads, Gonabad, Khorasan Razavi, Iran

City
Gonabad

Province
Razavi Khorasan

Postal code
9691793718

Phone
+98 515722302

Email
k.basiri@gmail.com

Person responsible for updating data

nasirzadeharnz@gmail.com

Contact

Name of organization / entity
Gonabad University of Medical Sciences

Full name of responsible person
amirreza nasirzadeh

Position
Student

Latest degree
Bachelor

Other areas of specialty/work
Nursery

Street address
Gonabad University of Medical Sciences, Asian Roads, Gonabad, Khorasan Razavi, Iran

City
Gonabad

Province
Razavi Khorasan

Postal code
9691793718

Phone
+98 51 5722 3028

Email

Sharing plan

Deidentified Individual Participant Data Set (IPD)
Undecided - It is not yet known if there will be a plan to make this available

Study Protocol
Undecided - It is not yet known if there will be 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
Undecided - It is not yet known if there will be 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
Undecided - It is not yet known if there will be a plan to make this available

Data Dictionary
Undecided - It is not yet known if there will be a plan to make this available