Clinical Trial Protocol
Iranian Registry of Clinical Trials

29 Jun 2026

Effects of myofascial release and ergon technique on foot function and balance in plantar fasciitis

Protocol summary

Study aim

To compare the effects of myofascial release and ergon technique on foot function and balance in patients with planter fasciitis.

Design

It was a concealed, randomized, single blinded, sham controlled clinical trial with a parallel group design of 18 patients.

Settings and conduct

Study was conducted at Layyah city hospital of govt college university Faisalabad Layyah campus. The study population was consisted of patients with upper cross syndrome. The study was single blinded. The participants didn't know while they were receiving experimental or conventional treatment.

Participants/Inclusion and exclusion criteria

Inclusion criteria: Age 30-50 years, both Gender, positive Windlass test, pain in the morning when taking the first steps or after prolonged rest, having unilateral resistant heel pain Exclusion criteria: Individuals with a history of trauma, any systemic illness, like rheumatism, arthritis, fracture below the knee during the preceding year, prior foot surgery, positive diagnosis of fat pad syndrome or tarsal tunnel syndrome were excluded

Intervention groups

Participants will be randomly allocated into two groups (Group A: MRT group, Group B: ergon technique group). The participants randomly allocated in Group A will be received myofascial release technique. Participants will execute this training after 15 minutes of ultrasound. This approach requires three sessions per week for six weeks. Group B participants will have received treatment includes ultrasound for 15 min and ergon technique.

Main outcome variables

Foot function (Foot Function Index), Balance (Berg Balance scale)

General information

Reason for update

Acronym

IRCT registration information

IRCT registration number: **IRCT20230731058990N3**
Registration date: **2024-02-01, 1402/11/12**
Registration timing: **retrospective**

Last update: **2024-02-01, 1402/11/12**
Update count: **0**

Registration date

2024-02-01, 1402/11/12

Registrant information

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Kashaf Faraz
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Recruitment status

Recruitment complete

Funding source

Expected recruitment start date

2023-10-04, 1402/07/12

Expected recruitment end date

2023-10-24, 1402/08/02

Actual recruitment start date

2023-10-06, 1402/07/14

Actual recruitment end date

2023-10-28, 1402/08/06

Trial completion date

2023-11-15, 1402/08/24

Scientific title
Effects of myofascial release and ergon technique on foot function and balance in plantar fasciitis

Public title
Myofascial release and ergon technique effects in plantar fasciitis for foot function and balance

Purpose
Treatment

Inclusion/Exclusion criteria

Inclusion criteria:
Age 30-50 years Both Gender Positive Windlass test Pain in the morning when taking the first steps or after prolonged rest Having unilateral resistant heel pain

Exclusion criteria:
Individuals with a history of trauma A fracture below the knee during the preceding year Any systemic illness, like rheumatism, arthritis Prior foot surgery A positive diagnosis of fat pad syndrome or tarsal tunnel syndrome were excluded

Age
From **30 years** old to **50 years** old

Gender
Both

Phase
3

Groups that have been masked

- Participant

Sample size
Target sample size: **26**
Actual sample size reached: **18**

Randomization (investigator's opinion)
Randomized

Randomization description
Participants were randomized using gold fish bowl method into two groups, control and experimental. Treatment allocation were done by using concealed envelope method. In this, sealed opaque envelops with treatment regimen written were provided to the participants. Once a patient had consented to enter a trial room, an envelope was opened, and the patient was then offered the allocated treatment.

Blinding (investigator's opinion)
Single blinded

Blinding description
The study was single blinded. The participants did not know while they were receiving experimental or routine physical therapy treatment. and yes, intervention is similar enough for blinding participants.

Placebo
Not used

Assignment
Parallel

Other design features
Heel pain, Windlass test, Berg Balance Scale, Foot Function Index

Secondary Ids

empty

Ethics committees

1

Ethics committee

Name of ethics committee
Research Ethics Committee (REC)

Street address
1-Km defense road Lahore, Pakistan

City
Lahore

Postal code
54000

Approval date
2023-08-12, 1402/05/21

Ethics committee reference number
REC-UOL-567-08-2023

Health conditions studied

1

Description of health condition studied
Plantar fasciitis

ICD-10 code
Plantar fa

ICD-10 code description
M72.2

Primary outcomes

1

Description
Foot Function

Timepoint
Baseline, 3rd week and 6th week of treatment

Method of measurement
Foot Function Index

2

Description
Balance

Timepoint
Baseline, 3rd week and 6th week of treatment

Method of measurement
Berg Balance Scale

Secondary outcomes

1

Description
Quality of Life

Timepoint
Baseline, 3rd and 6th week of treatment

Method of measurement
Short Form-12

Intervention groups

1

Description
Group A received routine physical therapy included ultrasound. Ultrasound will be used for 10 minutes (Frequency 3MHz) in each session. Total duration for each session with intervention will be 25-30 minutes. After baseline treatment, myofascial release technique was given according to the anatomy trains concept on the superficial back line of lower limb. The subjects are taken in supine position with Lower Limb extended and foot in Dorsiflexion. Myofascial release technique was given on the plantar surface. The technique was performed in three strokes directly over the patient's skin by sliding the hand throughout the Dorsiflexion with constant pressure in the caudo-cranial direction

Category
Rehabilitation

2

Description
Group B received routine physical therapy included ultrasound. Ultrasound will be used for 10 minutes (Frequency 3MHz) in each session. Total duration for each session with intervention will be 25-30 minutes. After baseline treatment, Ergon technique has several different options for tools as well as treatment techniques. Now we use Graston tool while patient in prone position scan the tissue and point of fibrosis or any sort of restriction in gastrocnemius. Use the tool all the way down in sweeping motions feelings for restrictions from proximal to distal and from up to down at the junction of Achilles. Now ask the patient to do dorsiflexion while scooping Achilles tendon from insertion to origin.

Category
Rehabilitation

Recruitment centers

1

Recruitment center

Name of recruitment center
Department of Physical Therapy, DHQ Hospital Layyah

Full name of responsible person
Dr Khurram mahmood

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Sponsors / Funding sources

1

Sponsor

Name of organization / entity
UOL, Lahore

Full name of responsible person
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Grant name

Grant code / Reference number

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

Title of funding source
UOL, Lahore

Proportion provided by this source
100

Public or private sector
Private

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
UOL, Lahore

Full name of responsible person
Dr Sania Naz

Position
Professor

Latest degree
Medical doctor

Other areas of specialty/work
Physiotherapy

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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
Yes - There is a plan to make this available

Informed Consent Form
Yes - There is a plan to make this available

Clinical Study Report
Yes - There is a plan to make this available

Analytic Code
Yes - There is a plan to make this available

Data Dictionary
Yes - There is a plan to make this available

Title and more details about the data/document
Demographic data and data related to final outcome will be shared by maintaining the confidentiality.

When the data will become available and for how long
Data will be available from April 2024 to June 2024 after the 6 months of publication. The data sharing plan for a clinical trial (i.e., what data will be shared when and under what conditions) will be publicly available at a third-party site that shares data with and meets the data requirements of WHO's International Clinical Trials Registry Platform; this occur before the first participant is enrolled.

To whom data/document is available
Dr. Sania Naz (corresponding author) professor at UOL, Lahore.

Under which criteria data/document could be used
for research purpose

From where data/document is obtainable
To the corresponding author of the study, Dr Sania Naz and can contact on +923044407035 saaniaanaz@gmail.com can visit these search engines, you can find my study easily here https://www.researchgate.net/ https://scholar.google.com/

What processes are involved for a request to access data/document
Open-access and there is the traditional public data release where anyone can get access to the data with no registration or conditions. The request will be reviewed by Director in Charge and in case of eligibility, it would be shared in two weeks

Comments
I want randomized clinical trial registration.