

# Clinical Trial Protocol

## Iranian Registry of Clinical Trials

10 Jun 2026

### The effect of 12 weeks of compound set training on cardiostrophin-1 and platelets and their relationship after one circuit training session in young active male

#### Protocol summary

##### Study aim

The effect of 12 weeks of compound set training on cardiostrophin-1 and platelets and their relationship after one circuit training session in young active male

##### Design

Clinical trial with control group

##### Settings and conduct

Twenty active men were selected in Ardabil city and they will be randomly assigned to the control and experimental groups. Subjects will complete a 60-minute circle training session. Blood samples will be taken before and after this 60 minutes exercise. This circular exercise consisted of 10 stations (leg press, chest press, arm with bar, arm armature wiring harness, front leg, parallel, the back of the wiring arm , boat arm, bar head, and leg leg). The duration of each station will be 15 seconds and the rest between stations will be 45 seconds. Exercise intensity will be 40-60% of a maximum repetition. The training set will run for 12 weeks and 3 sessions per week. After twelve weeks, subjects will perform a circular training session again and blood samples will be taken before and after this session.

##### Participants/Inclusion and exclusion criteria

Non-smoker; no history of cardiovascular disease, hypertension, underlying injuries, sleep disorders and not taking medication, supplementation and caffeine at least 48 hours before the tests.

##### Intervention groups

12 weeks of compound set training

##### Main outcome variables

Cardiostrophin-1; platelets

#### General information

##### Reason for update

##### Acronym

CCPC

#### IRCT registration information

IRCT registration number: **IRCT20181114041655N3**

Registration date: **2019-07-31, 1398/05/09**

Registration timing: **registered\_while\_recruiting**

Last update: **2019-07-31, 1398/05/09**

Update count: **0**

#### Registration date

2019-07-31, 1398/05/09

#### Registrant information

##### Name

Ameneh Pourrahim Ghouroghchi

##### Name of organization / entity

Mohaghegh-e-Ardabili University

##### Country

Iran (Islamic Republic of)

##### Phone

+98 45 3150 5647

##### Email address

a.pourrahim@uma.ac.ir

#### Recruitment status

**Recruitment complete**

#### Funding source

#### Expected recruitment start date

2019-07-27, 1398/05/05

#### Expected recruitment end date

2019-08-11, 1398/05/20

#### Actual recruitment start date

empty

#### Actual recruitment end date

empty

#### Trial completion date

empty

#### Scientific title

The effect of 12 weeks of compound set training on

cardiotrophin-1 and platelets and their relationship after one circuit training session in young active male

**Public title**

The effect of resistance training on cardiotrophin-1 and platelets and their relationship in young active male

**Purpose**

Other

**Inclusion/Exclusion criteria****Inclusion criteria:**

Having at least two years of resistance training history

**Exclusion criteria:**

Smoking history of cardiovascular disease hypertension  
Sleep disorders Using supplements and caffeine at least 48 hours prior to the tests.

**Age**

From **22 years** old to **27 years** old

**Gender**

Male

**Phase**

N/A

**Groups that have been masked**

*No information*

**Sample size**

Target sample size: **20**

**Randomization (investigator's opinion)**

N/A

**Randomization description****Blinding (investigator's opinion)**

Not blinded

**Blinding description****Placebo**

Not used

**Assignment**

Parallel

**Other design features**

Semi-experimental

**Secondary Ids**

empty

**Ethics committees****1****Ethics committee****Name of ethics committee**

Ethics committee of Ardabil University of Medical Sciences

**Street address**

University Ave

**City**

Ardabil

**Province**

Ardabil

**Postal code**

5619911367

**Approval date**

2019-07-21, 1398/04/30

**Ethics committee reference number**

IR.ARUMS.REC.1398.187

**Health conditions studied****1****Description of health condition studied**

No

**ICD-10 code****ICD-10 code description****Primary outcomes****1****Description**

A first session of a circular practice. 12 weeks compound training. A second circle practice session

**Timepoint**

Before a first session of a circular practice. Before 12 weeks compound training. Before and after a second circle practice session

**Method of measurement**

A circular exercise with 10 stations (leg presses, chest presses, arm bolts, armhole wraps, front legs, parallaxes, wrist strap arms, boat armpits, barbells and back legs) and 12-week compendium training.

**Secondary outcomes****1****Description**

Cardiotrophin-1

**Timepoint**

Before and after a first session of a circular practice. Before and after a second session a circular practice

**Method of measurement**

With Kate Zelbieu making Germany and ELISA

**2****Description**

Platelets

**Timepoint**

Before and after a first session of a circular practice. Before and after a second session a circular practice

**Method of measurement**

With Sysmex K-1000 Auto Analyst (Made in Japan)

**Intervention groups****1****Description**

Intervention group: A training session and 12 weeks group. Blood samples are taken from the subjects. Then the subjects do a resistance training session. Blood samples are taken. Then the subjects do 12 weeks of compound set training. Third blood samples are taken. Subjects do a resistance training session like the first one, and fourth blood samples are taken.

**Category**

Other

2

### Description

Control Group: Blood samples are taken from the subjects. Then the subjects do a resistance training session. Blood samples are taken. Then, 12 weeks are spent without performing any training and compound exercise. Third blood samples are taken. Subjects do a resistance training session like the first one, and fourth blood samples are taken.

### Category

N/A

## Recruitment centers

1

### Recruitment center

#### Name of recruitment center

Mohagheh Ardabili University

#### Full name of responsible person

Ameneh pourrahim Ghouroghchi

#### Street address

University Ave

#### City

Ardabil

#### Province

Ardabil

#### Postal code

5619911367

#### Phone

+98 45 3150 5647

#### Email

amenehpoorrahim@yahoo.com

## Sponsors / Funding sources

1

### Sponsor

#### Name of organization / entity

The University of Mohagheh

#### Full name of responsible person

Azim Omidvar

#### Street address

Ardabil Ave

#### City

Ardabil

#### Province

Ardabil

#### Postal code

5619911367

#### Phone

+98 45 3150 5647

#### Email

Azim\_omidvar@yahoo.com

#### Grant name

#### Grant code / Reference number

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

Yes

### Title of funding source

The University of Mohagheh

### 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

The university of Mohagheh Ardabili

#### Full name of responsible person

Ameneh pourrahim Ghouroghchi

#### Position

Assistant professor

#### Latest degree

Ph.D.

#### Other areas of specialty/work

Sport physiology

#### Street address

University Ave

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## Person responsible for scientific inquiries

### Contact

#### Name of organization / entity

The university of Mohagheh

#### Full name of responsible person

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**Person responsible for updating data**

**Contact**

**Name of organization / entity**

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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**

Not applicable

**Title and more details about the data/document**

The effect of 12 weeks of compound set training on cardiostrophin-1 and platelets and their relationship after one circuit training session in young active male

**When the data will become available and for how long**

summer 2020

**To whom data/document is available**

all

**Under which criteria data/document could be used**

With references

**From where data/document is obtainable**

Interent

**What processes are involved for a request to access data/document**

Search

**Comments**