Clinical Trial Protocol
Iranian Registry of Clinical Trials

15 Jul 2026

Evaluation of the effect of discontinuing beta-blocker drugs on dipyridamole myocardial perfusion imaging (DMPI) in patients who were on long-term beta-blocker therapy

Protocol summary

Summary

The current study is designed to evaluate the effect of discontinuing beta-blocker drugs on dipyridamole Myocardial Perfusion Imaging (MPI) in patients who are on long-term beta-blockade. One hundred and twenty patients with angiographically confirmed coronary artery disease (CAD), who are on long-term treatment (≥3 months) with therapeutic dose of a beta blocker, will enroll in this randomized clinical trial. Patients with a past history of asthma, second degree type 2 or third degree atrio-ventricualr block, left ventricular ejection fraction less than 50%, previous angioplasty and/or coronary artery bypass graft are excluded from the study. The patients are allocated into two groups: Group A (n=60) in whom beta-blockade is discontinued for 72 hours before dipyridamole stress MPI and Group B (n=60) without discontinuation of beta-blockade prior to MPI. Considering the angiographic results as the gold standard, the sensitivity of MPI for the detection of CAD in each group is calculated based on 95% confidence interval (95%CI).

General information

Acronym

IRCT registration information

IRCT registration number: **IRCT201203041100N5**
Registration date: **2012-03-19, 1390/12/29**
Registration timing: **registered_while_recruiting**

Last update:
Update count: **0**

Registration date

2012-03-19, 1390/12/29

Registrant information

Name

Davood Beiki

Name of organization / entity

Research Institute for Nuclear Medicine, Tehran University of Medical Sciences

Country

Iran (Islamic Republic of)

Phone

+98 21 8863 3333

Email address

beikidav@sina.tums.ac.ir

Recruitment status

Recruitment complete

Funding source

Deputy of Research, Tehran University of Medical Sciences

Expected recruitment start date

2012-02-20, 1390/12/01

Expected recruitment end date

2012-06-21, 1391/04/01

Actual recruitment start date

empty

Actual recruitment end date

empty

Trial completion date

empty

Scientific title

Evaluation of the effect of discontinuing beta-blocker drugs on dipyridamole myocardial perfusion imaging (DMPI) in patients who were on long-term beta-blocker therapy

Public title

Beta-blocker effect on myocardial perfusion scan

Purpose

Diagnostic

Inclusion/Exclusion criteria

Inclusion criteria: patients with angiographically

confirmed CAD (i.e. more than 50% diameter stenosis in at least one coronary artery or major branches), who are on long-term treatment (≥3 months) with therapeutic dose of a beta blockerl. Exclusion criteria: patients with a past history of asthma, second degree type 2 or third degree atrio-ventricualr block, left ventricular ejection fraction less than 50%, previous angioplasty and/or coronary artery bypass graft.

Age
No age limit
Gender
Both

Phase
N/A
Groups that have been masked
No information
Sample size
Target sample size: **120**
Randomization (investigator's opinion)
Randomized
Randomization description
Blinding (investigator's opinion)
Single blinded
Blinding description
Placebo
Not used
Assignment
Parallel
Other design features

Secondary Ids

empty

Ethics committees

1

Ethics committee
Name of ethics committee
Tehran University of Medical Sciences
Street address
Keshavarz boulevard, Ghods str.
City
Tehran
Postal code
Approval date
2006-11-20, 1385/08/29
Ethics committee reference number
132.8183

Health conditions studied

1

Description of health condition studied
myocardial ischaemia
ICD-10 code
I20-I25
ICD-10 code description
Ischaemic heart diseases

Primary outcomes

1

Description
Myocardial Perfusion
Timepoint
3 days after intervention
Method of measurement
Myocardial Perfusion Imaging (MPI)

Secondary outcomes

1

Description
Summed Rest Score (SRS)
Timepoint
After myocardial perfusion scan
Method of measurement
QPS sofware

2

Description
Summed Stress Score (SSS)
Timepoint
After myocardial perfusion scan
Method of measurement
QPS sofware

3

Description
Summed Difference Score (SDS)
Timepoint
After myocardial perfusion scan
Method of measurement
QPS sofware

Intervention groups

1

Description
Group A: in whom the beta-blocker agent is discontinued for 72h before Myocardial perfusion (MPI) scan.
Category
Diagnosis

2

Description
Group B: without discontinuation of beta-blockers prior to MPI.
Category
Diagnosis

Recruitment centers

1

Recruitment center
Name of recruitment center
Research Institute for Nuclear Medicine, Tehran University of Medical Sciences
Full name of responsible person
Street address
City
Tehran

Sponsors / Funding sources

1

Sponsor
Name of organization / entity
Deputy of Research, Tehran University of Medical Sciences
Full name of responsible person
Dr Akbar Fotouhi
Street address
Keshavarz boulevard
City
Tehran
Grant name
Grant code / Reference number
Is the source of funding the same sponsor organization/entity?
Yes
Title of funding source
Deputy of Research, Tehran University of Medical Sciences
Proportion provided by this source
100
Public or private sector
empty
Domestic or foreign origin
empty
Category of foreign source of funding
empty
Country of origin
Type of organization providing the funding
empty

Person responsible for general inquiries

Contact
Name of organization / entity
Research Institute for Nuclear Medicine, Tehran University of Medical Sciences
Full name of responsible person
Dr Babak Fallahi
Position
Asociate Professor of Nuclear Medicine
Other areas of specialty/work
Street address
Research Institute for Nuclear Medicine, Shariati Hospital, N Kargar Ave.
City
Tehran
Postal code
Phone
+98 21 8822 0361
Fax
Email
bfallahi@sina.tums.ac.ir
Web page address

Person responsible for scientific inquiries

Contact
Name of organization / entity
Research Institute for Nuclear Medicine, Tehran University of Medical Sciences
Full name of responsible person
Dr Babak Fallahi
Position
Associate Professor of Nuclear Medicine
Other areas of specialty/work
Street address
Research Institute for Nuclear Medicine, Shariati Hospital, N Kargar Ave.
City
Tehran
Postal code
Phone
+98 21 8822 0361
Fax
Email
bfallahi@sina.tums.ac.ir
Web page address

Person responsible for updating data

Contact
Name of organization / entity
Research Institute for Nuclear Medicine, Tehran University of Medical Sciences
Full name of responsible person
Dr Davood Beiki
Position
Other areas of specialty/work
Street address
City
Postal code
Phone
Fax
Email
Web page address

Sharing plan

Deidentified Individual Participant Data Set (IPD)
empty
Study Protocol
empty
Statistical Analysis Plan
empty
Informed Consent Form
empty
Clinical Study Report
empty

Analytic Code

empty

Data Dictionary

empty