

Clinical Trial Protocol

Iranian Registry of Clinical Trials

18 Sep 2026

The effect of clinical audit process on the endo-tracheal and tracheostomy suctioning skills of nurses working in the critical care units (ICU) in AJA hospitals in Tehran

Protocol summary

Summary

This is a randomized controlled trial study that was conducted to evaluate the effect of clinical audit process on the level of tracheostomy and endotracheal tube suctioning skill in nurses and anesthesia technicians working in intensive care units in 2013-14. Research setting was AJA hospitals in Tehran, Iran that had intensive care units and were randomly allocated in two groups of intervention (3 hospitals) and control (3 hospitals). All of nurses and anesthesia technicians working in intensive care units (70 in the intervention group and 65 in the control group) recruited by census method. Inclusion criteria included anesthesia technicians and nursing staff in the intensive care units with an associate degree or higher and at least two months work experience in the intensive care units. Exclusion criteria were unwillingness to maintain in the study and having very good score in the pre-intervention phase. The intervention was conducted via implementation of the five-stage clinical audit in the intervention group. For detection of endotracheal and tracheostomy tube suctioning skill in subjects, pre- and post intervention, the checklist was used.

General information

Acronym

IRCT registration information

IRCT registration number: **IRCT2015080123446N1**
Registration date: **2015-10-05, 1394/07/13**
Registration timing: **retrospective**

Last update:

Update count: **0**

Registration date

2015-10-05, 1394/07/13

Registrant information

Name

Fatemeh Teymouri

Name of organization / entity

AJA University of Medical Sciences

Country

Iran (Islamic Republic of)

Phone

+98 21 5588 0283

Email address

z.farsi@ajaums.ac.ir

Recruitment status

Recruitment complete

Funding source

This research was funded by a grant from Vice chancellor for research of AJA University of Medical Sciences.

Expected recruitment start date

2013-07-23, 1392/05/01

Expected recruitment end date

2014-02-20, 1392/12/01

Actual recruitment start date

empty

Actual recruitment end date

empty

Trial completion date

empty

Scientific title

The effect of clinical audit process on the endo-tracheal and tracheostomy suctioning skills of nurses working in the critical care units (ICU) in AJA hospitals in Tehran

Public title

The effect of clinical audit process on the suctioning skills of nurses

Purpose

Supportive

Inclusion/Exclusion criteria

Inclusion criteria: anesthesia technicians and nursing staff in the ICUs with an associate degree or higher; at least two months work experience in the ICUs. Exclusion criteria: unwillingness to maintain in the study; having very good score in the pre-intervention phase.

Age

No age limit

Gender

Both

Phase

3

Groups that have been masked

No information

Sample size

Target sample size: 135

Randomization (investigator's opinion)

Randomized

Randomization description

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

The Research Council and the Research Ethics committee in the AJA University of Medical Sciences

Street address

AJA University of Medical Sciences, Etemadzadeh St., Fatemi St., Tehran, Iran.

City

Tehran

Postal code

Approval date

2013-11-18, 1392/08/27

Ethics committee reference number

9214

Health conditions studied

1

Description of health condition studied

Tracheostomy

ICD-10 code

Z43.0

ICD-10 code description

Attention to tracheostomy

Primary outcomes

1

Description

Endotracheal and tracheostomy Suctioning Skill

Timepoint

pre intervention and one month after intervention

Method of measurement

checklist

Secondary outcomes

empty

Intervention groups

1

Description

Five-stage of clinical audit including assessment of suction procedure skill, comparison of current situation with standards, identifying weaknesses, face to face education in 45 min, and reassessment of suction procedure skill.

Category

Other

2

Description

Control group: Assessment of suction procedure skill, comparison of current situation with standards, identifying weaknesses, and reassessment of suction procedure skill.

Category

Other

Recruitment centers

1

Recruitment center

Name of recruitment center

502 hospital

Full name of responsible person

Sara Rashidifar

Street address

502 Hospital, Intersection of Taleghani and Bahar St., Taleghani St. Tehran, Iran

City

Tehran

2

Recruitment center

Name of recruitment center

Khanevadeh Hospital

Full name of responsible person

Street address

Khanevadeh Hospital, Kaj St., Sepah Padegan St., Shariati St., Tehran, Iran

City
Tehran

3

Recruitment center

Name of recruitment center

Beasat Hospital

Full name of responsible person

Street address

Beasat Hospital, Before Afsarieh, Beasat Highway,
Tehran, Iran

City

Tehran

4

Recruitment center

Name of recruitment center

Imam Reza Hospital

Full name of responsible person

Street address

Imam Reza Hospital, Etemadzadeh St., Fatemi St.,
Tehran, Iran

City

Tehran

5

Recruitment center

Name of recruitment center

Golestan Hospital

Full name of responsible person

Street address

Golestan Hospital, before Heravi Square, Saiyad
Shirazi Highway, Tehran, Iran

City

Tehran

Sponsors / Funding sources

1

Sponsor

Name of organization / entity

AJA University of Medical Sciences, Vice chancellor for
research

Full name of responsible person

Dr. Kamran Azma

Street address

Vice chancellor for research, AJA University of Medical
Sciences, Etemadzadeh St., Fatemi St., Tehran, Iran

City

Tehran

Grant name

Grant code / Reference number

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

Yes

Title of funding source

AJA University of Medical Sciences, Vice chancellor for
research

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

AJA University of Medical Sciences

Full name of responsible person

Shahla Aliyari

Position

PhD/ Research Manager

Other areas of specialty/work

Street address

Faculty of Nursing, AJA University of Medical Sciences,
Kaj Street, Shariati Street, Tehran, Iran.

City

Tehran

Postal code

Phone

+98 21 7750 0404

Fax

Email

aliyar_shah@yahoo.com

Web page address

Person responsible for scientific inquiries

Contact

Name of organization / entity

AJA University of Medical Sciences

Full name of responsible person

Fatemeh Kalrozi

Position

MSC

Other areas of specialty/work

Street address

Faculty of Nursing, AJA University of Medical Sciences,
Kaj Street, Shariati Street, Tehran, Iran.

City

Tehran

Postal code

Phone

+98 21 7750 0404

Fax

Email

f.kalrozi@ajaums.ac.ir

Web page address

Person responsible for updating data

Contact

Name of organization / entity

AJA University of Medical Sciences
Full name of responsible person
Maryam Nezamzadeh
Position
MSc
Other areas of specialty/work
Street address
Faculty of Nursing, AJA University of Medical Sciences,
Kaj Street, Shariati Street, Tehran, Iran.
City
Tehran
Postal code
Phone
00
Fax
Email
nezamzadeh_maryam@yahoo.com
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