Clinical Trial Protocol
Iranian Registry of Clinical Trials

10 Jun 2026

The effect of an upper respiratory care program on incidence of ventilator-associated pneumonia in mechanically ventilated patient in Al-Zahra hospital intensive care units,Isfahan University of Medical Sciences.

Protocol summary

Summary

Objective:effect of an upper respiratory care program on incidence of ventilator-associated pneumonia in mechanically ventilated patient in Al-Zahra hospital intensive care units,Isfahan University of Medical Sciences, 2014. Study Design: randomized clinical trial. Study population: patients admitted to intensive care units of Esfahan Al-Zahra hospital. Inclusion criteria: willingness to participate in the study: Patients above 18,mechanical ventilation for more than 24 hr,free of pneumonia or respiratory infections by the time of arrival to the hospital,free of pneumonia before intubation,free of pneumonia in the first 48 hr of intubation, free of limitations due to head elevation.In intervention group the patients were taken under an upper respiratory care program including oral and subglottic secretion suction before every position change, head elevation during the treatment and measuring and controlling the trachea cuff pressure twice a day, in the control group the upper respiratory care program is carried out as the routine protoco.interference:during the first 5 days of intubation the upper respiratory care program was applied to the interference group. evaluation of ventilator related pneumonia variables carried out in control and intervention group during the 5 days.

General information

Acronym

IRCT registration information

IRCT registration number: **IRCT2013122215898N1**
Registration date: **2014-05-10, 1393/02/20**
Registration timing: **prospective**

Last update:
Update count: **0**

Registration date

2014-05-10, 1393/02/20

Registrant information

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Nasim Bahrami
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Isfahan University of Medical Science
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Recruitment status

Recruitment complete

Funding source

Vice chancellor for research, Isfahan University of Medical Sciences

Expected recruitment start date

2014-05-22, 1393/03/01

Expected recruitment end date

2014-07-23, 1393/05/01

Actual recruitment start date

empty

Actual recruitment end date

empty

Trial completion date

empty

Scientific title

The effect of an upper respiratory care program on incidence of ventilator-associated pneumonia in mechanically ventilated patient in Al-Zahra hospital intensive care units,Isfahan University of Medical Sciences.

Public title
The effect of an upper respiratory care program on incidence of ventilator-associated pneumonia
Purpose
Prevention
Inclusion/Exclusion criteria
inclusion criteria: Patients above 18,mechanical ventilation more than 24 hr,free of pneumonia or hospital infections before and in the first 48 hr of intubation, free of invasive antibiotics, free of limitations due to head position of medical bed, Exclusion Criteria: Death before the end of the study, extubation before the end of the study,Transfer to other wards or hospitals before the end of the study, undergoing surgery during the study
Age
No age limit
Gender
Both

Phase
N/A
Groups that have been masked
No information
Sample size
Target sample size: **64**
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
Medical Ethics Committee of Isfahan university of medical science.
Street address
Faculty of Nursing and Midwifery, Isfahan University of Medical Sciences, Azadi Square, Hezar-Jerib,Isfahan Isfahan Isfahan Iran, Islamic Republic Of 461-81746
City
Isfahan
Postal code
Approval date
2014-05-05, 1393/02/15
Ethics committee reference number
391295

Health conditions studied

1

Description of health condition studied
Ventilator Associated Pneumonia
ICD-10 code
J95.9
ICD-10 code description
Postprocedural respiratory disorder, unspecified

Primary outcomes

1

Description
Incidence of Ventilator Associated Pneumonia
Timepoint
Before intervention, day 3, day 4, day 5,
Method of measurement
Clinical Pulmonary Infection Score, CPIS.

Secondary outcomes

empty

Intervention groups

1

Description
In the Intervention group, the upper respiratory care program was carried out, which included oral and subglottic secretion suction with 100-140 mmHg before each change position, head elevation every 12 hours (8am-8pm) using Oblique resulting the patient being fixed in 45◦,measuring the trachea cuff pressure twice a day every 12 hours (8 am-8pm) resulting in the fixed interval of 20-30 mmH2O.
Category
Prevention

2

Description
In control group patients were taken under routine upper respiratory care, including oral and subglottic secretion suction every two hours for patients under mechanical ventilation independent of the position change routines. Measuring and controlling the trachea cuff pressure were not carried under any special protocols depending on the environmental characteristics. head elevation was taken under consideration but not documented.
Category
Prevention

Recruitment centers

1

Recruitment center
Name of recruitment center

Al-Zahra Hospital

Full name of responsible person

nasim bahrami

Street address

City

Isfahan

Sponsors / Funding sources

1

Sponsor

Name of organization / entity

Vice chancellor for research, Isfahan University of Medical Sciences

Full name of responsible person

Dr Peiman Adibi

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Isfahan University of Medical Sciences, Azadi Square, Hezar-Jerib street, Isfahan.

City

Isfahan

Grant name

Grant code / Reference number

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

Yes

Title of funding source

Vice chancellor for research, Isfahan 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

Isfahan University of Medical Science

Full name of responsible person

nasim bahrami

Position

MSc student in critical care nursing

Other areas of specialty/work

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Person responsible for scientific inquiries

Contact

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MSc in Nursing

Other areas of specialty/work

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Position

MSc student in critical care nursing

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Fax

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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