# The effects of the use of antibiotics during acute exacerbations in chronic obstructive pulmonary disease (COPD) on the severity and duration of exacerbations: the ABC-trial

Submission date	Recruitment status No longer recruiting	<ul><li>Prospectively registered</li></ul>		
19/12/2005		☐ Protocol		
Registration date	Overall study status	Statistical analysis plan		
19/12/2005	Completed	[X] Results		
<b>Last Edited</b> 11/07/2019	Condition category Respiratory	[] Individual participant data		

# Plain English summary of protocol

Not provided at time of registration

# Contact information

# Type(s)

Scientific

#### Contact name

Dr J. van der Palen

### Contact details

Medisch Spectrum Twente P.O. Box 50000 Enschede Netherlands 7500 KA

# Additional identifiers

**EudraCT/CTIS** number

IRAS number

ClinicalTrials.gov number

Secondary identifying numbers

NTR351; MEC: P04-08

# Study information

## Scientific Title

The effects of the use of antibiotics during acute exacerbations in chronic obstructive pulmonary disease (COPD) on the severity and duration of exacerbations: the ABC-trial

## Acronym

ABC-trial

## **Study objectives**

## Primary:

Additional treatment with antibiotics in case of an exacerbation of chronic obstructive pulmonary disease (COPD) will not lead to a reduction in the severity and duration of exacerbations compared to treatment without antibiotics.

## Secondary:

The relapse rate (defined as a new exacerbations within 28 days) is not reduced in case of additional treatment with antibiotics of a COPD exacerbation.

## Ethics approval required

Old ethics approval format

## Ethics approval(s)

Ethics approval received from the local medical ethics committee

## Study design

Double blinded, randomised, placebo controlled, parallel group trial

# Primary study design

Interventional

# Secondary study design

Randomised controlled trial

# Study setting(s)

Hospital

# Study type(s)

Treatment

## Participant information sheet

# Health condition(s) or problem(s) studied

Chronic obstructive pulmonary disease (COPD)

#### **Interventions**

Intervention group: Prednisolone 30 mg for 7 days, antibiotics (Amoxicillin/clavulanic acid three times daily for 7 days) and a Body Area Network for monitoring of health status. Control group: Prednisolone 30 mg for 7 days, placebo of Amoxicillin/clavulanic acid (three times daily for 7 days) and a Body Area Network for monitoring of health status.

## Intervention Type

Drug

#### Phase

**Not Specified** 

## Drug/device/biological/vaccine name(s)

Prednisolone, antibiotics (amoxicillin/clavulanic acid)

## Primary outcome measure

Duration of the exacerbations. This is measured by a Body Area Network, a symptom diary and lung function (FEV1 and PEF).

## Secondary outcome measures

- 1. Severity of the exacerbations. This is measured by a Body Area Network, a symptom diary and lung function (FEV1 and PEF).
- 2. Relapse rate. A relapse is defined as an exacerbation that resolves due to the blinded treatment but re-occurs within 28 days of the treated exacerbation.
- 3. Cost-effectiveness of treatment with antibiotics
- 4. Use of rescue-medication, recorded in the symptom diary
- 5. Quality of life, measured by the Chronic Respiratory Questionnaire and the COPD Chronic Questionnaire

## Overall study start date

25/05/2005

# Completion date

01/01/2007

# **Eligibility**

## Key inclusion criteria

- 1. Patients of the outpatient clinic of the Medical Spectrum Twente
- 2. Aged between 40 and 75 years
- 3. A clinical diagnosis of COPD as defined by the Global Initiative for Chronic Obstructive Lung Disease (GOLD) criteria
- 4. A signed and dated written informed consent from the subject prior to study participation
- 5. Patients with COPD presenting one or two of the following characteristics:
- 5.1. A positive Grams stain of the sputum
- 5.2. A clinically relevant decrease of lung function, defined as a decrease in forced expiratory volume in one second (FEV1) of 200 ml or more and 12% or more from baseline value
- 5.3. Two or more exacerbations in the previous year
- 6. Present with signs and symptoms of an exacerbation at the outpatient clinic
- 7. Current smoker or ex-smoker
- 8. Able to understand, read and write Dutch

## Participant type(s)

Patient

## Age group

Adult

### Sex

Both

## Target number of participants

60

## Total final enrolment

35

## Key exclusion criteria

- 1. Serious other disease with a low survival rate
- 2. Clinical symptoms (e.g. temperature greater than 38.5°C), indicating pneumonia and a thorax X-ray positive for pneumonia
- 3. Another disease, which influences bronchial symptoms and/or lung function (e.g. cardiac insufficiency, sarcoidosis, pulmonary embolism, rib fracture, pneumonia and bronchial carcinoma)
- 4. Severe psychiatric illness
- 5. Uncontrolled diabetes mellitus
- 6. Need for regular oxygen therapy
- 7. Maintenance therapy with antibiotics
- 8. Subject with a known hypersensitivity to amoxicillin/clavulanic acid (Augmentin®)
- 9. Use of antibiotic 4 weeks before study entry
- 10. Use of prednisolone (except for a maintenance ration) 4 weeks before study entry
- 11. An exacerbation less than 4 weeks before study entry
- 12. Alpha1-antitrypsine deficiency
- 13. Former participation in the ABC-trial

## Date of first enrolment

25/05/2005

## Date of final enrolment

01/01/2007

# Locations

## Countries of recruitment

Netherlands

## Study participating centre Medisch Spectrum Twente

Enschede Netherlands 7500 KA

# Sponsor information

## Organisation

Medisch Spectrum Twente (Netherlands)

## Sponsor details

P.O. Box 50000 Enschede Netherlands 7500 KA

## Sponsor type

Hospital/treatment centre

## Website

http://www.mstwente.nl/

### **ROR**

https://ror.org/033xvax87

# Funder(s)

## Funder type

Government

## **Funder Name**

SENTER - A branch of the Dutch Ministry of Economic Affairs (Netherlands)

# **Results and Publications**

# Publication and dissemination plan

Not provided at time of registration

Intention to publish date

Individual participant data (IPD) sharing plan

# IPD sharing plan summary

Not provided at time of registration

# **Study outputs**

Output type	Details	Date created	Date added	Peer reviewed?	Patient-facing?
Results article	results	30/12/2014	11/07/2019	Yes	No