

# 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

<b>Submission date</b> 19/12/2005	<b>Recruitment status</b> No longer recruiting	<input type="checkbox"/> Prospectively registered <input type="checkbox"/> Protocol
<b>Registration date</b> 19/12/2005	<b>Overall study status</b> Completed	<input type="checkbox"/> Statistical analysis plan <input checked="" type="checkbox"/> Results
<b>Last Edited</b> 11/07/2019	<b>Condition category</b> Respiratory	<input type="checkbox"/> 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  
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## Additional identifiers

### Protocol serial number

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

## **Study type(s)**

Treatment

## **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(s)**

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

### **Key secondary outcome(s)**

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

### **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

### **Healthy volunteers allowed**

No

### **Age group**

Adult

### **Sex**

All

### **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)

**ROR**

<https://ror.org/033xvax87>

## Funder(s)

**Funder type**  
Government

**Funder Name**  
SETER - A branch of the Dutch Ministry of Economic Affairs (Netherlands)

## Results and Publications

**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?
<a href="#">Results article</a>	results	30/12/2014	11/07/2019	Yes	No