

# Randomised, multicentre, controlled trial comparing oral norfloxacin versus intravenous ceftriaxone in the prevention of bacterial infections in cirrhotic patients with severe liver failure and gastrointestinal bleeding

<b>Submission date</b> 31/01/2006	<b>Recruitment status</b> No longer recruiting	<input type="checkbox"/> Prospectively registered <input type="checkbox"/> Protocol
<b>Registration date</b> 30/03/2006	<b>Overall study status</b> Completed	<input type="checkbox"/> Statistical analysis plan <input checked="" type="checkbox"/> Results
<b>Last Edited</b> 01/09/2021	<b>Condition category</b> Digestive System	<input type="checkbox"/> Individual participant data

**Plain English summary of protocol**  
Not provided at time of registration

## Contact information

**Type(s)**  
Scientific

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## Additional identifiers

**Protocol serial number**  
99-PBE-MNJF-1

# Study information

## Scientific Title

Randomised, multicentre, controlled trial comparing oral norfloxacin versus intravenous ceftriaxone in the prevention of bacterial infections in cirrhotic patients with severe liver failure and gastrointestinal bleeding

## Acronym

MNJF1

## Study objectives

Intravenous ceftriaxone is more effective than oral norfloxacin in reducing the rate of bacterial infections in patients with advanced cirrhosis and upper gastrointestinal bleeding.

## Ethics approval required

Old ethics approval format

## Ethics approval(s)

The study was approved by the Ethical Committee of each hospital participating in the study and by the Spanish Drug Agency on 29/12/1999

## Study design

Randomised, unblinded, multicentre, controlled trial

## Primary study design

Interventional

## Study type(s)

Treatment

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

Advanced cirrhosis and haemorrhage

## Interventions

Patients who fulfilled the inclusion criteria were randomly allocated into two groups:

1. Patients in the first group received oral norfloxacin 400 mg every 12 hours for seven days
2. Patients in the second group received intravenous ceftriaxone 1 g per day for seven days

Antibiotics were initiated following the emergency endoscopy and always within the first 12 hours after admission into the hospital. Randomisation was done using consecutively numbered computer-generated envelopes containing treatment assignment. Randomisation was independent at each hospital.

## Intervention Type

Drug

## Phase

Not Specified

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

Oral norfloxacin, intravenous ceftriaxone

**Primary outcome(s)**

The end point of the study was to assess if intravenous ceftriaxone is more effective than oral norfloxacin in reducing the rate of bacterial infections within the first 10 days after the haemorrhage.

**Key secondary outcome(s)**

To assess the effects of treatment allocation on control bleeding and hospital survival.

**Completion date**

30/04/2004

**Eligibility****Key inclusion criteria**

1. Age 18 - 80 years
2. Haematemesis and/or melena within 24 hours prior to inclusion
3. Advanced cirrhosis as defined by the presence of two or more of the following signs of liver failure:
  - 3.1. Severe malnutrition
  - 3.2. Serum bilirubin greater than 3 mg/dl
  - 3.3. Ascites and hepatic encephalopathy (grade 1 or more)

**Participant type(s)**

Patient

**Healthy volunteers allowed**

No

**Age group**

Adult

**Lower age limit**

18 years

**Sex**

All

**Total final enrolment**

111

**Key exclusion criteria**

1. Allergy to cephalosporins or quinolones
2. Presence of any of the following signs of infection:
  - 2.1. Fever greater than 37.5°C
  - 2.2. White blood cell count greater than 15,000 mm<sup>3</sup>
  - 2.3. Immature neutrophils greater than 500 mm<sup>3</sup>
  - 2.4. More than 15 leukocytes per field in the fresh urine sediment or data compatible with pneumonia on the chest x-ray

3. Treatment with antibiotics within two weeks prior to the hemorrhage (excluding oral norfloxacin for prophylaxis of spontaneous bacterial peritonitis [SBP])
4. Previously diagnosed advanced hepatocellular carcinoma (one nodule greater than 5 cm, three nodules with one greater than 3 cm or more than three nodules) and human immunodeficiency virus (HIV) infection

**Date of first enrolment**

01/02/2000

**Date of final enrolment**

30/04/2004

## Locations

**Countries of recruitment**

Spain

**Study participating centre**

Hospital Clinic

Barcelona

Spain

00036

## Sponsor information

**Organisation**

Barcelona Hospital Clinic Villarroel (Spain)

**ROR**

<https://ror.org/02a2kzf50>

## Funder(s)

**Funder type**

Hospital/treatment centre

**Funder Name**

Barcelona Hospital Clinic Villarroel (Spain)

## 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>		01/10/2006	01/09/2021	Yes	No