

# The efficacy and safety of a short course of miltefosine and liposomal amphotericin B for visceral leishmaniasis in India

**Submission date**  
01/10/2007

**Recruitment status**  
No longer recruiting

☐ Prospectively registered

☐ Protocol

**Registration date**  
01/10/2007

**Overall study status**  
Completed

☐ Statistical analysis plan

☒ Results

**Last Edited**  
05/08/2021

**Condition category**  
Infections and Infestations

☐ Individual participant data

## Plain English summary of protocol

Not provided at time of registration

## Contact information

### Type(s)

Scientific

### Contact name

Prof Juntra Karbwang-Laothavorn

### Contact details

World Health Organization

20 Avenue Appia

Geneva-27

Switzerland

CH-1211

+41 (0)22 791 3867

karbwangj@who.int

## Additional identifiers

EudraCT/CTIS number

IRAS number

ClinicalTrials.gov number

NCT00371995

Secondary identifying numbers

## Study information

### Scientific Title

The efficacy and safety of a short course of miltefosine and liposomal amphotericin B for visceral leishmaniasis in India

### Study objectives

Visceral Leishmaniasis (VL) is a parasitological infection caused by Leishmania parasites that infect the reticulo-endothelial system and cause hepato-splenomegaly with pancytopenia. if untreated, there is a mortality rate of almost 100%. Most patients die from intercurrent infections.

### Hypothesis:

To evaluate the efficacy and safety of a short course of liposomal amphotericin B in combination with miltefosine for the treatment of visceral leishmaniasis in India.

### Ethics approval required

Old ethics approval format

### Ethics approval(s)

Ethics approval received from:

1. World Health Organization research Ethics Review Committee (WHO ERC) on the 13th July 2007 (ref: RPC 209)
2. Ethics Committee of Rajendra Memorial Research Institute of Medical Sciences (RMRI-ICMR) on the 14th August 2007
3. Ethics Committee of Kala Azar Medical Research centre-Muzaffarpur on the 18th August 2007

### Study design

Open multicentre clinical trial

### Primary study design

Interventional

### Secondary study design

Non randomised study

### Study setting(s)

Not specified

### Study type(s)

Treatment

### Participant information sheet

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

Visceral leishmaniasis

### Interventions

Liposomal amphotericin B (one injection of 5 mg/kg) then miltefosine for 14 days.

**Contact information for Principal Investigators:**

**Centre I:**

Dr Shyam Sundar  
Institute of Medical Sciences  
Banaras Hindu University  
Varanasi 221 005  
India  
Tel: + 91 (0)542 2309493  
Email: drshyamsundar@hotmail.com

**Centre II:**

Dr Prabhat Kumar Sinha  
Rajendra Memorial Research Institute of Medical Sciences, Agamkuan  
Patna 800 007  
India  
Tel: + 91 (0)612 641 565  
Fax: + 91 (0)612 644 379  
Email: pksinha18@yahoo.com

**Joint Sponsor information:**

Zentaris GmbH (Germany)  
Weismuellerstr. 50  
Frankfurt am Main, D-60314  
Germany  
Tel: + 49 (0)69 42602 3429  
Fax: + 49 (0)69 42602 3404  
Email: info@zentaris.com  
Website: <http://www.zentaris.com>

**UNICEF/UNDP/World Bank/WHO Special Programme for Research and Training in Tropical Diseases (TDR)**

Avenue Appia 20  
Geneva-27, CH-1211  
Switzerland  
Tel: + 41 (0)22 791 3725  
Fax: + 41 (0)22 791 4854  
Email: tdr@who.int  
Website: <http://www.who.int/tdr>

**Intervention Type**

Drug

**Phase**

Not Specified

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

Miltefosine, liposomal amphotericin B

**Primary outcome measure**

1. Final cure rate (initial parasitological cure rate based on splenic or bone marrow aspirate and clinical assessment at 6 months after end of treatment)
2. Initial cure rate (initial parasitological cure rate based on splenic or bone marrow aspirate, and clinical response at end of treatment)
3. Adverse events

### **Secondary outcome measures**

No secondary outcome measures

### **Overall study start date**

12/09/2007

### **Completion date**

30/06/2008

## **Eligibility**

### **Key inclusion criteria**

1. Male and female of age between 2 and 65 years (inclusive)
2. Clinical signs and symptoms compatible with Kala Azar (e.g., fever, splenomegaly, anaemia, leucopenia)
3. Confirmed diagnosis of VL by visualisation of parasites on splenic/bone marrow aspirate
4. Written informed consent from the patient/or from parent or guardian if under 18 years old

### **Participant type(s)**

Patient

### **Age group**

Not Specified

### **Sex**

Both

### **Target number of participants**

150

### **Total final enrolment**

135

### **Key exclusion criteria**

1. Haemoglobin less than 6 g/dl
2. White blood cell count less than 1000/mm<sup>3</sup>
3. Platelets less than 50,000
4. Prothrombin time greater than 5 seconds above control
5. Aspartate Aminotransferase (ASAT) greater than three times the upper limit of normal
6. Serum creatinine or Blood-Urea Nitrogen (BUN) greater than 1.5 times the upper limit of normal
7. Malaria
8. Human Immunodeficiency Virus (HIV) positive serology
9. Tuberculosis

10. Lactation, pregnancy
11. Refusing contraception method during treatment period plus 3 months
12. Any concomitant drug that is nephrotoxic
13. Previous treatment with amphotericin B or miltefosine. Previous treatment with antimony or paramomycin, if the treatment ended at least 2 months prior and the patient is clinically worsening, is permitted
14. Post Kala-azar Dermal Leishmaniasis (PKDL)
15. Concomitant treatment with other anti-leishmanial drugs
16. Any condition which compromises ability to comply with the study procedures

**Date of first enrolment**

12/09/2007

**Date of final enrolment**

30/06/2008

## Locations

**Countries of recruitment**

India

Switzerland

**Study participating centre**

World Health Organization

Geneva-27

Switzerland

CH-1211

## Sponsor information

**Organisation**

Indian Council of Medical Research (ICMR) (India)

**Sponsor details**

V. Ramalingaswami Bhawan

Ansari Nagar

New Delhi

India

110029

**Sponsor type**

Research council

**Website**

<http://www.icmr.nic.in/>

**ROR**

<https://ror.org/0492wrx28>

## **Funder(s)**

### **Funder type**

Research organisation

### **Funder Name**

Indian Council of Medical Research (ICMR) (India)

### **Alternative Name(s)**

Indian Council of Medical Research, Government of India, Indian Council of Medical Research (ICMR), New Delhi, ICMROrganisation, , Indian Council of Medical Research, New Delhi, ICMR, ICMRDELHI, ...

### **Funding Body Type**

Government organisation

### **Funding Body Subtype**

National government

### **Location**

India

### **Funder Name**

Zentaris GmbH (Germany)

### **Funder Name**

United Nations Children's Fund (UNICEF)/United Nations Development Programme (UNDP) /World Bank/World Health Organization (WHO) - Special Programme for Research and Training in Tropical Diseases (TDR) (ref: LEI PDE 0603)

## **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?
<a href="#">Results article</a>		03/12/2010	05/08/2021	Yes	No