

HEGPOL: Randomised, placebo controlled, multicenter, double-blind clinical trial to investigate hepatoprotective effects of glycine in the postoperative phase of liver transplantation

Submission date 29/06/2004	Recruitment status No longer recruiting	☒ Prospectively registered ☒ Protocol
Registration date 01/10/2004	Overall study status Completed	☐ Statistical analysis plan ☐ Results
Last Edited 24/08/2009	Condition category Surgery	☐ Individual participant data ☐ Record updated in last year

Plain English summary of protocol
Not provided at time of registration

Contact information

Type(s)
Scientific

Contact name
Dr Steffen P. Luntz

Contact details
Coordination Centre for Clinical Trials (KKS)
University of Heidelberg
Im Neuenheimer Feld 221
Heidelberg
Germany
69120
+49 (0)6221 56 4507
steffen.luntz@med.uni-heidelberg.de

Additional identifiers

Protocol serial number
22 00 16

Study information

Scientific Title

Acronym

HEGPOL

Study objectives

Added 24/08/09:

Kupffer cell-dependent ischemia / reperfusion (I/R) injury after liver transplantation is still of high clinical relevance, as it is strongly associated with primary dysfunction and primary nonfunction of the graft. Glycine, a non-toxic, non-essential amino acid has been conclusively shown in various experiments to prevent both activation of Kupffer cells and reperfusion injury. Based on both experimental and preliminary clinical data this study protocol was designed to further evaluate the early effect of glycine after liver transplantation.

As of 24/08/09 this record has been extensively updated. All updates can be found in the relevant field with the above update date.

Ethics approval required

Old ethics approval format

Ethics approval(s)

Not provided at time of registration

Primary study design

Interventional

Study design

Multicentre randomised double blind placebo controlled parallel group trial

Study type(s)

Treatment

Health condition(s) or problem(s) studied

Liver transplantation (LTX)

Interventions

Verum group receives intravenous 250 ml glycine-solution (4.4%), starting prior to reperfusion of liver transplant during surgery and once daily during the first week after LTX.

Placebo group receives intravenously 250 ml Aqua ad injection.

Intervention Type

Procedure/Surgery

Phase

Not Specified

Primary outcome(s)

Added 24/08/09:

1. Peak levels of both aspartat-amino-transaminase (AST) and alanine-amino-transaminase (ALT) as surrogates for the progression of liver related injury
2. Graft and patient survival up to 2 years after transplantation

Key secondary outcome(s)

Added 24/08/09:

1. Effect of glycine on liver injury based on liver biopsy immediately after re-arterialisation (according to pathological report)
2. Total blood flow in portal vein and common hepatic artery 1 hour after reperfusion
3. Graft injury based on both AST and ALT serum levels (area under the curve [AUC])
4. Incidence of early graft failure based on peak of transaminases or clotting factor support
5. Early onset of graft dysfunction based on Quick's value
5. Serum bilirubin (AUC)
7. CyA-induced nephrotoxicity based on retention parameters during the first eight days after transplantation (AUC)

Completion date

30/04/2011

Eligibility

Key inclusion criteria

Liver transplant recipients

Participant type(s)

Patient

Healthy volunteers allowed

No

Age group

Not Specified

Sex

Not Specified

Key exclusion criteria

Does not match inclusion criteria

Date of first enrolment

01/04/2006

Date of final enrolment

30/04/2011

Locations

Countries of recruitment

Germany

Study participating centre
Coordination Centre for Clinical Trials (KKS)
Heidelberg
Germany
69120

Sponsor information

Organisation
University of Heidelberg (Germany)

ROR
<https://ror.org/038t36y30>

Funder(s)

Funder type
University/education

Funder Name
University of Heidelberg (Germany) - Medical faculty

Funder Name
Novartis Pharma (Germany) - unrestricted grant

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?
Protocol article	protocol	17/08/2005		Yes	No