

# Biocompatibility of a new haemodialysis concentrate containing gluconic and citric acid (Honeydew) compared to acetic acid (SelectBagOne®) and citric acid (Honeycit)

<b>Submission date</b> 28/12/2009	<b>Recruitment status</b> No longer recruiting	<input checked="" type="checkbox"/> Prospectively registered
<b>Registration date</b> 17/02/2010	<b>Overall study status</b> Completed	<input type="checkbox"/> Protocol
<b>Last Edited</b> 17/02/2010	<b>Condition category</b> Urological and Genital Diseases	<input type="checkbox"/> Statistical analysis plan
		<input type="checkbox"/> Results
		<input type="checkbox"/> Individual participant data
		<input type="checkbox"/> Record updated in last year

## Plain English summary of protocol

Not provided at time of registration

## Contact information

### Type(s)

Scientific

### Contact name

Dr Mårten Segelmark

### Contact details

Njurkliniken  
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Lund  
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221 85

## Additional identifiers

### Protocol serial number

1476

## Study information

### Scientific Title

Biocompatibility of a new haemodialysis concentrate containing gluconic and citric acid (Honeydew) compared to acetic acid (SelectBagOne®) and citric acid (Honeycit) in an open, randomised, prospective, controlled and parallel-group study

**Acronym**

Honeydew III

**Study objectives**

To collect biocompatibility data on a new haemodialysis fluid (containing gluconic acid and citric acid) for scientific communication.

The primary objective is to investigate the biocompatibility of the new HD concentrate containing gluconic and citric acid during 8 weeks of HD treatment by comparing it with the HD concentrate with acetic acid.

**Ethics approval required**

Old ethics approval format

**Ethics approval(s)**

The Regional Ethical Review Board in Lund pending approval as of 11/01/2010.

**Study design**

Open randomised prospective controlled parallel-group multicentre study

**Primary study design**

Interventional

**Study type(s)**

Treatment

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

Chronic renal failure

**Interventions**

For all treatment arms:

Starts with a 2-week run-in period for stabilisation (SelectBagOne®), followed by an 8-week treatment period with either of the following hemodialysis fluids:

1. Gluconic and citric acid (Honeydew), or
2. Citric acid (Honeycit), or
3. Acetate (SelectBagOne®)

No follow-up period.

**Intervention Type**

Drug

**Phase**

Not Applicable

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

Gluconic and citric acid (Honeydew), acetic acid (SelectBagOne®), citric acid (Honeycit)

### **Primary outcome(s)**

Plasma concentration of Advanced Glycation End products (AGE). Analysing method: Fluorescence (em 430/ex 350).

Sampling for all endpoints will be done at T0, T1 and T2:

T0: (baseline) sampling when entering into the randomised treatment-period

T1: sampling after 4 weeks in treatment-period

T2: sampling after 8 weeks in treatment-period

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

1. Plasma electrolytes (Na, K, Cl, i-Ca), blood glucose, plasma urea, blood haemostatic parameters (Hb, Hct, Lpk, Epk and Tpk) and blood gases but also blood pressure, heart rate, adverse events (AE)/serious adverse events (SAE), concomitant medication, patient and treatment parameters
2. Plasma and urine gluconate and plasma and urine citrate
3. Carboxymethyl lysine (CML), serum pentosidine
4. Blood glutathione (GSH, including oxidised glutathione [GSSG]), blood 8-iso-PGF2a (lipid peroxidation), serum modified advanced oxidative protein products [AOPP], blood total aminothiols (gamma-glutamyl, GSH, cysteine, cystine, homocysteine)
5. Plasma C-reactive protein (CRP), plasma tumour necrotising factor alpha (TNFα) and serum pentraxin-3
6. Blood activated clotting time (ACT) and blood thrombin-antithrombin III (TAT)

Sampling for all endpoints will be done at T0, T1 and T2:

T0: (baseline) sampling when entering into the randomised treatment-period

T1: sampling after 4 weeks in treatment-period

T2: sampling after 8 weeks in treatment-period

### **Completion date**

31/03/2011

## **Eligibility**

### **Key inclusion criteria**

1. Chronic renal failure
2. Stable patients treated 3 times/week for at least 1 month
3. Patients treated in HD mode with a blood flow rate between 250 - 400 ml/min during 4 - 5.5 hours
4. Patients treated with Gambro high flux filter (e.g. Polyflux 170H or Polyflux 210H)
5. Patients treated with Gambro AK200S or AK200 Ultra S with select system
6. Written consent to participate in the study (informed consent)
7. Patient aged 18 years or older, either sex
8. Vascular access able to deliver blood flow rate of greater than or equal to 250 ml/min
9. Haemoglobin 10 - 13.5 g/dl (haematocrit 30% to 40%)
10. Patients able to tolerate prescribed dialysis fluid with electrolyte concentrations as specified for the test device
11. Technical survival during study period as judged by study investigator

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

Patient

**Healthy volunteers allowed**

No

**Age group**

Adult

**Lower age limit**

18 years

**Sex**

All

**Key exclusion criteria**

1. Known human immunodeficiency virus (HIV), hepatitis C virus (HCV) or hepatitis B virus (HBV) infection (positive serology)
2. Patients unable to tolerate citrate
3. Patients using citrate anticoagulation in usual HD treatment
4. Pregnant and lactating women
5. Patients with acute inflammatory or infectious event that, as judged by the investigator, may affect the safety of the patient and/or the results of the study
6. Patients with known haemodynamic instability that could cause, as judged by the investigator, clinical treatment problems
7. Chronic single needle dialysis
8. Participation in other studies during the study period that will affect the outcome of this study
9. Patients not considered compliant to follow the study protocol, as judged by investigator

**Date of first enrolment**

15/04/2010

**Date of final enrolment**

31/03/2011

## **Locations**

**Countries of recruitment**

Sweden

**Study participating centre**

Njurkliniken

Lund

Sweden

221 85

## **Sponsor information**

**Organisation**

Gambro Lundia AB (Sweden)

**ROR**

<https://ror.org/05mw5ed57>

## Funder(s)

**Funder type**

Industry

**Funder Name**

Gambro Lundia AB (Sweden) (ref: 556057-7594)

## 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="#">Participant information sheet</a>	Participant information sheet	11/11/2025	11/11/2025	No	Yes