A multicenter, open-label post authorization safety study to evaluate the effect of LysaKare® infusion on serum potassium levels in GEP-NET patients eligible for Lutathera® treatment

Published: 29-06-2020
Last updated: 09-04-2024

Primary objective(s): To assess the effect of LysaKare® administration on serum potassium concentration in GEP-NET patients eligible for Lutathera® treatmentSecondary objective(s): To confirm the safety profile of LysaKare® infusion in GEP-NET...

Ethical review	Approved WMO
Status	Recruitment stopped
Health condition type	Endocrine neoplasms malignant and unspecified
Study type	Interventional

Summary

ID

NL-OMON52585

Source
ToetsingOnline

Brief title
Lysakare PASS (0050/0870)

Condition

- Endocrine neoplasms malignant and unspecified

Synonym
Gastroenteropancreatic neuroendocrine tumors (GEP-NET); Carcinoid tumors

Research involving

Human

Sponsors and support

Primary sponsor: Advanced Accelerator Applications International SA
Source(s) of monetary or material Support: the sponsor of the study (as described in question B7)

Intervention

Keyword: GEP-NET, Lysakare, post authorization safety study

Outcome measures

Primary outcome

Change in serum potassium levels at specified time points after LysaKare® IV

administration compared to baseline.

Secondary outcome

* Incidence of LysaKare® related adverse events

* Changes in vital signs and ECG parameters

* Change in laboratory parameters

Study description

Background summary

This is a category 3 Post-Authorization Safety Study (PASS) following the European Medicines Agency (EMA) marketing authorization of LysaKare® 25g / 25g solution for infusion. LysaKare® is indicated for reduction of renal radiation exposure during peptide-receptor radionuclide therapy (PRRT) with lutetium (177Lu) oxodotreotide in adults. The marketing authorization was granted based on literature data from similar solutions, which have been used for >10 years in Europe (well established use application).
The purpose of the study is to evaluate the effect of LysaKare® administration on serum potassium levels. A systematic assessment of serum potassium levels will be performed during infusion and up to 24 hours post start of infusion compared to baseline.

Study objective

Primary objective(s): To assess the effect of LysaKare® administration on serum potassium concentration in GEP-NET patients eligible for Lutathera® treatment
Secondary objective(s): To confirm the safety profile of LysaKare® infusion in GEP-NET patients eligible for Lutathera® treatment without co-administration of Lutathera®

Study design

This is a multicenter, open-label post-authorization safety study (PASS). Overall, 40 patients with GEP-NET will be enrolled to receive one infusion with LysaKare® to systematically assess the effect of LysaKare® administration on potassium blood level concentration up to 24 h compared to baseline.

The study schedule for each patient consists of a screening period followed by an infusion day with an optional overnight in-clinic stay, and a follow up call.

Intervention

Subjects will receive 1 x 4 hour infusion with Lysakare.

Study burden and risks

The study schedule for each patient consists of a screening period followed by an infusion day with an optional overnight in-clinic stay, and a follow up call.

In total, the patients will receive 3 x physical exam, 8 x measurements of vital signs, 5 x ECG, 8 x blood test, and a 1 x 4 hour infusion with Lysakare®. On the infusion day, the patients are instructed to drink at least 1 glass of water every hour. If patients are female of childbearing potential, they will have 2 x pregnancy tests.

Risk-benefit analysis:
Amino acid solutions with similar composition to LysaKare® have been widely used for renal protection during PRRT treatment.
The evaluation of potential risks of LysaKare® for this study is based on the literature data presented in the well-established use application. The LysaKare® IB (Guidance to the Investigator) summarizes potential risks and key risk management activities to consider when administering LysaKare®. The main adverse reactions reported after the amino acid solution administration include nausea, vomiting and hyperkalemia.

* Nausea and vomiting
The main adverse reactions are nausea (approximately 25%) and vomiting

(approximately 10%). Pre-treatment with an anti-emetic 30 minutes prior to start of LysaKare® infusion is recommended to reduce the incidence of nausea and vomiting.

* Hyperkalemia
An increase of serum potassium levels may occur. Serum potassium level increases are generally mild and transient. Vital signs should be monitored during the infusion regardless of baseline serum potassium levels. Patients should be instructed to drink substantial quantities of water (at least 1 glass every hour) on the day of infusion to remain hydrated and facilitate excretion of excess serum potassium. In case hyperkalemia symptoms develop during LysaKare® infusion, appropriate corrective measures must be taken.

Safety effects of LysaKare® will be carefully assessed in this study, and patients will be closely monitored.

As LysaKare® is administered in medical practice with Lutathera® as a kidney radiation protection agent and it does not have a therapeutic effect on GEP-NET itself, there is no direct benefit to the patients participating in the study. However, this study will be essential in better understanding the effect of LysaKare® on serum potassium levels in the GEP-NET patient population for its safe use with Lutathera®.

Contacts

Public
Advanced Accelerator Applications International SA

Rue de la tour de l'ile 4
Geneva 2104
CH
Scientific
Advanced Accelerator Applications International SA

Rue de la tour de l'ile 4
Geneva 2104
CH

Trial sites

Listed location countries

Netherlands

Eligibility criteria

Age
Adults (18-64 years)
Elderly (65 years and older)

Inclusion criteria

1. Male or female patients with somatostatin receptor positive gastroenteropancreatic neuroendocrine tumours (GEP-NETs), who are eligible for the treatment with Lutathera® as per Lutathera® label indication.
2. Age *18 years.
3. Patients who have provided a signed informed consent form to participate in the study, obtained prior to the start of any protocol related procedures.

Exclusion criteria

1. Pre-existing hyperkalemia (>6.0 mmol/L at screening) if not adequately corrected before starting the LysaKare® infusion.
2. Instances when Lutathera® is not recommended per the Lutathera® SmPC:
a. Uncontrolled congestive heart failure (NYHA III, IV);
b. Kidney failure with creatinine clearance < 50 mL/min calculated by the Cockroft Gault method;
c. Impaired haematological function with either Hb < 4.9 mmol/L (8 g/dL), platelets < 75 G/L (75x103/mm3), or leucocytes < 2 G/L (2,000/mm3) (except lymphopenia);
d. Liver impairment with either total bilirubinemia > 3 times the upper limit of normal or albuminemia < 30 g/L and prothrombin ratio decreased < 70%.
3. Pregnancy or lactation, positive pregnancy test at screening or pre-dose based on the contraindication for Lutathera®.
4. Hypersensitivity to the IMP active substances.
5. Any significant medical or social condition which may interfere with the subject*s ability to comply with the study visit schedule or the study assessments.
6. Patients who have received any investigational agent within the last 30 days.
7. Patients that have received a dose of Lutathera® prior to the screening visit or are scheduled for Peptide Receptor Repeat (PRRT) treatment within 7 days of the study infusion of LysaKare®.

Study design

Design

Study phase:	4
Study type:	Interventional
Masking:	Open (masking not used)
Control:	Uncontrolled
Primary purpose:	Treatment

Recruitment

NL

Recruitment status:	Recruitment stopped
Start date (anticipated):	05-03-2021
Enrollment:	8
Type:	Actual

Medical products/devices used

Product type:	Medicine
Brand name:	Lysakare
Generic name:	Arginine / lysine
Registration:	Yes - NL intended use

Ethics review

Approved WMO Date:	29-06-2020
Application type:	First submission
Review commission:	METC Erasmus MC, Universitair Medisch Centrum Rotterdam (Rotterdam)
Approved WMO Date:	12-10-2020
Application type:	First submission
Review commission:	METC Erasmus MC, Universitair Medisch Centrum Rotterdam (Rotterdam)

Approved WMO Date:	28-07-2021
Application type:	Amendment
Review commission:	METC Erasmus MC, Universitair Medisch Centrum Rotterdam (Rotterdam)
Approved WMO Date:	20-09-2021
Application type:	Amendment
Review commission:	METC Erasmus MC, Universitair Medisch Centrum Rotterdam (Rotterdam)
Approved WMO Date:	10-06-2022
Application type:	Amendment
Review commission:	METC Erasmus MC, Universitair Medisch Centrum Rotterdam (Rotterdam)
Approved WMO Date:	18-10-2022
Application type:	Amendment
Review commission:	METC Erasmus MC, Universitair Medisch Centrum Rotterdam (Rotterdam)
Approved WMO Date:	18-11-2022
Application type:	Amendment
Review commission:	METC Erasmus MC, Universitair Medisch Centrum Rotterdam (Rotterdam)

Study registrations

Followed up by the following (possibly more current) registration

No registrations found.

Other (possibly less up-to-date) registrations in this register

No registrations found.

In other registers

Register	ID
EudraCT	EUCTR2019-004073-76-NL
CCMO	NL73929.078.20