

Who can administer

Status epilepticus: may be administered by registered competent doctor or nurse/midwife.

Other indications: Restricted administration: [see appendix 1](#)

Important information

- Generalised convulsive status epilepticus may be defined as " **5 or more minutes of continuous** seizure activity, OR **more than one seizure without recovery** in between" ^(ref 1)

Available preparations

Ativan 4mg per 1mL ampoule (currently in short supply)

Lorazepam 4mg per 1mL ampoule (Macure)

Reconstitution

Already in solution

- **Draw up using a 5 micron filter needle**
- **Dilute further prior to administration**

Methods of intravenous administration

Slow intravenous injection

- Dilute with an equal volume of either Sodium chloride 0.9% or Water for Injections immediately before administration (example add 1mL injection solution to 1mL diluent)
- Inject into a **large vein** at a rate no faster than 2mg/minute, except in the control of status epilepticus where rapid injection is required ^(ref 2)

Infusion

- Not recommended, see further information.

Dose in adults

Premedication

- Administer 50 micrograms/kg (0.05mg/kg) given 30 to 45 minutes before surgery ^(ref 3)

Convulsive status epilepticus (see important information for definition)

- Administer 4mg
- Allow a few minutes (e.g.three to five minutes) to assess its effect before deciding whether additional doses are necessary ^(ref 1)
- **Elderly and debilitated patients** may respond to lower doses

Acute anxiety ^(ref 3)

- Administer 25 to 30 micrograms per kg (0.025 to 0.03mg/kg) (1.8 to 2.1mg for 70kg patient)
- Can repeat if required after six hours

Elderly and debilitated

- May respond to lower doses - half dose may be sufficient

Renal and hepatic impairment

- Contraindicated in severe hepatic impairment
- Patients with renal impairment have **increased cerebral sensitivity to lorazepam** ^(ref 3)
- Start with **small** doses in severe **renal** impairment
- Monitor frequently and adjust dose carefully according to patient response in both **renal and hepatic impairment**

Further information

- Administration by infusion is an unlicensed method of administration and is **NOT** recommended at GUH, as precipitation has been reported, **particularly with the 4mg per 1mL formulation.**

Storage

- Store between 2 to 8^oC

References

SPC Lorazepam (Macure) 26th Nov 2021

1: Convulsive status epilepticus in adults: Classification, clinical features and diagnosis UpToDate monograph. downloaded 16th Feb 2022

2: Injectable Medicines Guide Medusa, downloaded 16th Feb 2022

3: BNF, accessed online 16th Feb 2022

Therapeutic classification

Benzodiazepine