

Lomustine (CCNU)

Information for patients and caregivers. Read this with your treatment calendar and the instructions from your oncology team.

At a glance

Treatment	Lomustine (CCNU); brands include lomustine medac
Used in selected settings	Brain tumours, including selected gliomas; occasional specialist use in lymphoma
How it is given	Capsules swallowed whole with water. Do not open or crush them. More than one capsule strength may be needed to make the prescribed dose. Take the anti-sickness medicine as instructed; the team may advise taking lomustine on an empty stomach.
Before you start	Save your 24-hour oncology number. Have a thermometer and written treatment calendar available.

Important for this medicine

Taking lomustine on extra days can cause a fatal overdose. Confirm the exact number and strength of capsules and the single treatment date or explicitly prescribed short course. If you take an extra dose or the wrong strength, contact the oncology team or emergency department immediately, even if you feel completely well.

What this treatment is and how it works

Lomustine is a chemotherapy medicine from the nitrosourea family. It damages DNA, the instructions inside cells, making it harder for cancer cells to divide. It can reach the brain, which makes it useful for some brain tumours.

When it may be used

It is used for selected brain tumours, including gliomas. It may be used alone or as part of [PCV](#), which contains procarbazine, lomustine and [vincristine](#). The tumour type, molecular test results, previous treatment and your health guide the choice.

It is occasionally used in specialist treatment of lymphoma. Older product labels list several other cancers; that does not mean lomustine is a routine modern treatment for all of them. Your team should explain the specific reason for using it.

Licences and access differ by country and product. This sheet does not establish Indian regulatory approval or availability. Your oncologist will explain the locally appropriate treatment.

Before treatment

Before starting, tell the team about previous cancer treatment, allergies, infection symptoms, heart, lung, kidney or liver disease, hearing or nerve problems, diabetes and all medicines you take. Discuss pregnancy, contraception and fertility. Ask for a written treatment calendar, supportive-medicine instructions and a 24-hour oncology contact number. Baseline blood tests usually include a full blood count and kidney and liver function; additional tests depend on the medicine and your health. Before chemotherapy that reaches the whole body, the team should check for current or past hepatitis B infection. If a test is positive, extra monitoring or antiviral treatment may be needed to prevent the virus becoming active again. The team will coordinate testing and treatment; do not delay urgent cancer treatment yourself.

How treatment is given and the schedule

Capsules swallowed whole with water. Do not open or crush them. More than one capsule strength may be needed to make the prescribed dose. Take the anti-sickness medicine as instructed; the team may advise taking lomustine on an empty stomach.

Lomustine is usually taken as one dose on one specified day, with a long interval before the next course, commonly 6 to 8 weeks. It is not an ongoing daily medicine. Some product-specific specialist plans divide one course across 3 days; only follow that schedule if it is explicitly written for you. Courses must not be repeated sooner than 6 weeks under the referenced SmPC.

In PCV, the other medicines are taken or given on different days. Mark the lomustine day separately. Do not use another person's calendar or the schedule for [temozolomide](#), which is a different brain-tumour medicine.

The dose is calculated for your treatment and health. Do not change the dose or treatment dates yourself. The team will provide a revised calendar if treatment needs to be delayed, reduced or stopped.

Tests and monitoring during treatment

- A full blood count is needed before treatment and usually weekly for at least 6 weeks after each dose. Blood counts often fall most around 4 to 6 weeks after dosing. Feeling well in the first week does not mean you are past the risk period.
- The lowest blood counts after the previous dose help determine the next dose. The effect on bone marrow can build up over successive courses; recovery may take longer and the next course may be delayed.
- Kidney and liver tests are needed during treatment. Breathing tests should be arranged before treatment and repeated during treatment according to the product information and clinical plan. Scans and clinical review assess the brain tumour.

Tell the team about symptoms since the previous dose, including problems that have already settled. A normal earlier test does not make new symptoms safe to ignore.

Side effects: what to expect

The table includes very common and common effects in the current lomustine medac SmPC. Nervous-system symptoms can also come from the brain tumour, radiotherapy or other medicines. Do not judge their cause at home.

You are unlikely to have every effect listed, and this is not an exhaustive list. Report new symptoms even if they are not mentioned here.

Common or more frequent side effects

Practical care and when to ask for help

Possible effect	What you can do	When to contact the team
Low blood counts	White cells fight infection, red cells carry oxygen and platelets help clotting. Treatment can lower one or more of these. Wash hands, avoid close contact with people who are unwell and keep blood-test appointments.	Call immediately for fever, shaking chills or feeling suddenly unwell. Report unusual bruising, bleeding, marked tiredness or increasing breathlessness. Do not wait for a blood-test result before seeking help.
Feeling or being sick	Take preventive anti-sickness medicines at the prescribed times. Try small meals and frequent small drinks; avoid strong food smells if they worsen nausea.	Contact the team the same day if medicines are not controlling symptoms. Seek urgent advice if you cannot keep fluids down, feel faint or pass much less urine.
Reduced appetite or changes in eating	Try smaller, frequent meals with protein and energy-rich foods you tolerate. Ask for a dietitian if your weight or intake is falling.	Report ongoing weight loss or difficulty eating. Inability to drink or signs of dehydration needs same-day urgent advice.
Sore mouth or ulcers	Clean your teeth gently with a soft brush, use the mouth rinses your team recommends and choose soft foods. Avoid alcohol-containing mouthwash and foods that sting.	Report soreness early. Difficulty eating or drinking, fever or severe pain needs same-day advice.
Loose or more frequent stools (diarrhoea)	Record how often you pass stools and follow the team's fluid and anti-diarrhoea plan. Use small, regular drinks unless you have a fluid restriction.	Report new or worsening diarrhoea promptly. Fever, blood, severe abdominal pain, dizziness or difficulty drinking needs urgent assessment.
Changes in liver blood tests	Attend blood tests even if you feel well. Check medicines and supplements with the pharmacist.	Report yellow eyes or skin, dark urine, severe upper-abdominal pain or confusion urgently. The team may need to pause or change treatment.

Possible effect	What you can do	When to contact the team
Drowsiness, reduced alertness or coordination problems	Arrange help with travel and avoid driving if affected. Tell the team about your usual neurological symptoms so changes are recognised.	New confusion, trouble speaking, unsteadiness, weakness or a seizure needs urgent assessment. The tumour and other medicines can also cause these symptoms.
Fever, chills or swelling of the feet or lower legs	Keep a thermometer available and record new swelling.	Treat fever or chills as possible infection and call immediately. Sudden swelling with breathlessness needs emergency help.

Less common and other reported effects

The SmPC describes confusion and kidney injury as uncommon, and hair loss, rash or itching and lung inflammation or scarring as rare. A later second cancer is very rare. These categories come from a specific product label and may not predict the risk of a combination such as PCV. Clinically serious symptoms need assessment whatever their frequency.

Important serious side effects, including rare effects

Serious effects can be common, uncommon, rare or have an uncertain frequency. The following advice explains when to seek help; it does not label all serious effects as rare.

Delayed bone-marrow suppression

Serious infection and bleeding may develop weeks after a single dose. Call immediately for fever, chills or sudden illness. Seek emergency care for uncontrolled bleeding, black stools, vomiting blood, collapse or severe headache. Continue precautions and blood tests throughout the rest period.

Lung inflammation or scarring

Rarely, lomustine can damage the lungs, sometimes after substantial exposure or long after treatment. Report a new persistent dry cough or breathlessness promptly. Severe breathing difficulty is an emergency. Keep planned breathing tests even if you have no symptoms.

Kidney or liver injury

Report much less urine, new swelling, jaundice or dark urine urgently. Kidney damage can develop with cumulative treatment. Regular blood tests help the team decide whether treatment is safe to continue.

A later second cancer

Very rarely, another blood cancer or bone-marrow disorder can develop years later. This risk is weighed against the benefit of treating the current illness. Keep long-term follow-up and report persistent unexplained symptoms.

Accidental overdose

Do not wait for nausea or abnormal blood results. Contact the hospital immediately if the dose or treatment day was wrong, and take the medicine packaging and calendar with you. Do not make yourself vomit or work out a replacement schedule.

When to seek urgent help

Follow your hospital's temperature instructions. If you have not been given a threshold, contact the oncology team immediately for a temperature of 37.5°C (99.5°F) or above, below 36°C (96.8°F), shaking chills or feeling suddenly unwell. Do not wait for a fever if you are deteriorating. Check your temperature before taking a fever-reducing medicine when possible, but do not delay seeking help.

Emergency assessment now

Seek emergency medical help immediately for severe breathing difficulty, chest pain, collapse, a seizure, new confusion, sudden one-sided weakness, uncontrolled bleeding or swelling of the face or throat. Tell emergency staff that you are receiving cancer treatment and when the last dose was given. Do not drive yourself if seriously unwell.

Practical advice for this treatment

Before swallowing anything, read the date, capsule strength and number aloud with your [caregiver](#) if helpful. Keep unused capsules separate from daily medicines and in their original packaging. If a dose is missed or you vomit after it, contact the team for instructions and do not take an extra dose. Ask the pharmacist how to handle capsules safely; caregivers should avoid direct contact and follow handling instructions.

Taking cancer medicines at home

Keep cancer tablets or capsules in their labelled packaging, away from children and pets. Do not share them or put them in a household pill organiser unless the oncology pharmacist agrees. Do not crush, open, split or dissolve them without product-specific pharmacy instructions. A caregiver who handles the medicine should follow the pharmacy's precautions. Return unused medicine to the pharmacy. If you miss a dose or vomit after one, do not take an extra dose; contact the team and follow the medicine-specific plan. If you accidentally take an extra dose or the wrong strength, contact the oncology team urgently even if you feel well. Do not try to make yourself vomit or work out a compensating dose yourself.

Medicines, interactions and vaccinations

Give the oncology pharmacist a complete list of prescription medicines, over-the-counter products, vitamins, herbal and Ayurvedic remedies and supplements. Ask before starting anything new. Do not stop prescribed medicines, including anticoagulants or infection-prevention medicines, without a coordinated plan. Live vaccines are generally unsuitable while immunity is suppressed; discuss vaccine type and timing with the team. Non-live vaccines may be offered, although protection can be reduced. Follow any specific stop-and-call instructions for the cancer medicine on this page or in your written treatment plan.

Anti-seizure medicines, including phenobarbital and phenytoin, need a pharmacist review. Cimetidine, theophylline, other medicines that suppress blood counts and radiotherapy can also affect safety. Do not stop seizure medicines yourself. Live vaccines must be avoided during immune suppression; the referenced SmPC recommends no live vaccines for at least 3 months after treatment, with timing confirmed by the team. The medac capsules contain wheat starch: tell the team about wheat allergy. This is distinct from coeliac disease; the label describes the gluten content as very low.

Pregnancy, fertility and breastfeeding

Chemotherapy can harm a developing baby and may affect fertility temporarily or permanently. Discuss sperm, egg or embryo storage before treatment when feasible. Tell the team immediately about a suspected pregnancy. Periods stopping does not guarantee infertility.

The current lomustine medac SmPC advises effective contraception during treatment and for 7 months after treatment for women who could become pregnant, and for 4 months for men with partners who could become pregnant. Lomustine can cause permanent infertility, so discuss fertility preservation before treatment. Do not breastfeed during treatment; agree any restart with the team.

Everyday life

Gentle activity, regular meals and rest can help you cope. Prepare food hygienically and drink according to your individual fluid plan. Avoid smoking; ask whether alcohol is safe with your exact treatment and other medicines. Plan work, travel and driving around symptoms and monitoring visits. Do not drive if dizzy, sleepy, weak, visually affected or impaired by neuropathy. You can usually be close to family and friends: chemotherapy does not make you radioactive. Follow the unit's instructions for handling urine, vomit, laundry and sexual precautions for the period it specifies.

When to contact the oncology team

Contact the oncology team the same day for persistent vomiting or diarrhoea, difficulty drinking, reduced urine, mouth pain affecting eating, new cough, jaundice, a painful or spreading rash, unusual bruising, worsening constipation or new nerve symptoms. Use the more urgent instructions for the particular symptom when given above. If the team cannot be reached and you are unwell, seek urgent medical care.

Write down your hospital's daytime and out-of-hours numbers before treatment. CTI's general contact details do not replace the emergency number provided by your treating hospital.

After treatment

Keep the planned blood tests and follow-up appointments after the last dose. Blood counts and immunity may take time to recover, and some effects can start or persist later. Contact the team about symptoms rather than waiting for a routine visit. Keep a treatment summary, including drug names, dates and any serious reactions, for future doctors. Response may be assessed with examination, scans or blood or marrow tests, depending on the cancer.

Words you may hear

Nitrosourea	A family of chemotherapy medicines that damage DNA.
PCV	Procarbazine, lomustine and vincristine given on a planned calendar.
Nadir	The lowest blood-count level after a treatment dose.

Frequently asked questions

Do I take lomustine every day?

Usually no: it is a single dose on one specified day. A small number of specialist plans divide a course over 3 days. Your written prescription must make this clear; never continue it as a daily medicine.

Why do I need blood tests weeks after one dose?

The effect on bone marrow is delayed. The lowest counts may occur 4 to 6 weeks later, when infection and bleeding risks can be greatest.

What if I take an extra dose?

Contact the hospital immediately, even if you feel well. The serious effects may be delayed. Bring the packaging and written schedule.

What if I vomit or miss the dose?

Do not take an extra or double dose. Call the oncology team for a specific plan.

Is it the same as temozolomide?

No. They are different drugs with different schedules. Do not carry over the dosing instructions from one to the other.

Will I lose my hair?

Hair loss is classed as rare in the referenced lomustine SmPC, but other PCV medicines or radiotherapy can change the overall risk.

Why might my next course be delayed?

Blood counts may not have recovered, or organ tests or symptoms may need review. A delay can be an essential safety measure.

Can I drive?

Do not drive with drowsiness, poor coordination, visual problems or other impairment. A brain tumour or seizures may also impose driving restrictions; ask your treating team.

Related treatment guides

- PCV

Sources and further reading

Summary of Product Characteristics

Professional reference resources. The SmPC describes product-specific warnings, interactions, adverse effects and monitoring. US prescribing information is identified separately. Original-brand or direct manufacturer documents are linked where retrieved. The team must also check the product actually supplied in India.

- [Lomustine medac - company-supplied UK SmPC](#). Accessed 16 October 2026. Text revised January 2026; emc updated 4 March 2026. Manufacturer brand; not claimed to be the original innovator.
- [Lomustine medac - manufacturer-hosted UK SmPC \(PDF\)](#). Accessed 16 October 2026. UK national version January 2026. Direct manufacturer document.

Other authoritative references

- [Macmillan Cancer Support - Lomustine](#). Accessed 16 October 2026. Capsule administration and patient advice.
- [BC Cancer - Lomustine monograph](#). Accessed 16 October 2026. Revised 5 June 2018. Older schedule and reproductive advice checked against the current SmPC.
- [NCI - infection and neutropenia](#). Accessed 16 October 2026.
- [NCI - mouth and throat problems](#). Accessed 16 October 2026.
- [NCI - diarrhoea](#). Accessed 16 October 2026.
- [NCI - fatigue](#). Accessed 16 October 2026.
- [ASCO hepatitis B screening and management opinion](#). Accessed 16 October 2026. Independent cross-check: Provisional Clinical Opinion: universal three-test screening before or at systemic anticancer therapy; chronic/past infection management.