

Mildronate® (Meldonium) instructions

Name in Cyrillic : МИЛДРОНАТ

Active substance : Meldonium

Meldonium is a structural analog of gamma-butyrobetaine which present in every cell of the human body.

Pharmacologic action

cardioprotective, anti-hypoxic, angioprotective, antianginal.

In high load conditions Mildronate® restores the balance between delivery and cellular oxygen demand, eliminates the accumulation of toxic products of metabolism in the cells, protecting them from damage; It has a tonic effect.

As a result of its use of the body acquires the ability to withstand stress and to quickly restore energy reserves. Because of these properties Mildronate® used to treat a variety of disorders of the cardiovascular system, the blood supply to the brain, as well as to improve physical and mental performance. As a result of reducing the concentration of carnitine hard gamma-butyrobetaine is synthesized , and it has vasodilating properties.

In the case of acute ischemic myocardial injury Mildronate® slows the formation of necrotic areas, and allows to shorten the rehabilitation period. In heart failure, increases myocardial contractility, increases exercise tolerance, reduces the frequency of angina attacks. In acute and chronic ischemic cerebrovascular disorders improves blood circulation in the ischemic focus, promotes redistribution of blood to the ischemic area. It is effective in the case of vascular and dystrophic pathology of the ocular fundus. The drug eliminates functional disturbances of the central nervous system in patients with chronic alcoholism during abstinence syndrome.

Pharmacokinetics

If ingestion is well absorbed. Bioavailability is about 78%. Cmax is achieved in 1-2 hours. Is biotransformed in the body into two major metabolites which are excreted by the kidneys. $T_{1/2} = 3-6$ hours, depending on the dose.

Indications

Capsules and injections :

complex therapy of IHD (angina, myocardial infarction);
chronic heart failure and cardiomyopathy dyshormonal and complex therapy of acute and chronic disorders of the brain blood supply (cerebral strokes and cerebrovascular insufficiency);
abstinence syndrome in chronic alcoholism (in combination with specific alcoholism therapy);
reduced working capacity, physical stress, including in athletes.

Injections :

hemophthalmus and retinal hemorrhages of different etiologies;
thrombosis of the central retinal vein and its branches;
retinopathy of different etiology (diabetic, hypertensive)

Contraindications

hypersensitivity;
increased intracranial pressure (in violation of the venous outflow, intracranial tumors)

Pregnancy and breast-feeding

The safety of the drug has not been proved during pregnancy. It is not clear whether the drug is excreted in breast milk. At the time of treatment should stop breastfeeding.

Side effects

Rarely - allergic reactions (redness, rash, itching, swelling), as well as dyspepsia, tachycardia, changes in blood pressure, agitation.

Interaction

It increases the vasodilating effects of some antihypertensive drugs, cardiac glycosides. It can be combined with antianginal drugs, anticoagulants, antiplatelet agents, antiarrhythmics, diuretics, bronchodilators. In view of the possible development of mild tachycardia and hypotension, caution should be exercised when combined with nitroglycerin, nifedipine, alpha-blockers, antihypertensive agents and peripheral vasodilators.

Dosing and Administration

Capsules - orally, injections - intravenous, in the first half of the day.

Cardiovascular disease, adults in the complex therapy: capsules - 0.5-1 g per day or injections intravenously - 5-10 ml in 1 or 2 divided doses. The course of treatment - 4-6 weeks.

Cardialgia amid dyshormonal myocardial dystrophy - orally (capsules), 0.25 g of 2 times a day. The course of treatment - 12 days.

Cerebrovascular accidents: acute phase - intravenous injection, 5 ml of solution for injection 1 times a day for 10 days, then orally (capsules) of 0.5-1 g per day. The course of treatment - 4-6 weeks. Chronic disorders - orally (capsules) of 0.5-1 g per day. The course of treatment - 4-6 weeks. Repeated courses (usually 2-3 times a year) are possible after consulting a doctor.

Vascular pathology and degenerative diseases of the retina: parabolbarbo, 0.5 ml solution for injection for 10 days.

The mental and physical overload, including athletes, the optimum dosage - 1 g / day (0.25 g 4 times a day, or 0.5 g of 2 times a day). The course of treatment - 10-14 days. If necessary, repeat the treatment after 2-3 weeks. Athletes - orally (capsules), 0.5-1 g, 2 times daily before training. The duration of the preparatory period - 14-21 days, during the period of competition - 10-14 days.

Alcoholism: orally (capsules), 0.5 g 4 times a day; intravenously 5 ml injection 2 times per day. The course of treatment - 7-10 days.

Overdose

Cases of overdose are unknown.

Manufacturer

PJSC «Grindex» (Grindeks), Latvia.

Storage

The temperature is not above 25 ° C.

Keep out of the reach of children.

Shelf-life of the drug is 4 years.