



NIGROX

Support Cardiovascular Health & Function

100% Herbal

For Pets

Oral Solution

Ingredients:

- Hawthorn extract
- Garlic extract



Cardiovascular diseases in pets are among the leading causes of reduced quality of life and shortened lifespan. Timely diagnosis plays a crucial role in managing and improving the well-being of affected animals. These conditions often progress gradually and may remain asymptomatic in the early stages. Early clinical signs are commonly observed as chronic coughing, dyspnea, loss of appetite, or exercise intolerance.

The complexity of diagnosis and treatment, nonspecific clinical signs, potential drug-related complications, delayed manifestation of symptoms, and even sudden death highlight the vital importance of prevention and supportive care.

NIGROX®, with its unique formulation based on bioactive plant extracts, helps maintain the normal function of the cardiovascular system and supports the management of cardiac disorders and heart failure in companion animals.

Mode of action:

The active constituents of **NIGROX®**, including flavonoids (such as hyperoside, quercetin, vitexin) and proanthocyanidins, enhance intracellular calcium concentration in cardiomyocytes through:

1. Inhibition of cAMP phosphodiesterase and subsequent increase in intracellular cAMP levels.
2. Inhibition of Na⁺/K⁺-ATPase, leading to improved myocardial contractility.

Furthermore, the phytochemicals in **NIGROX®**—particularly hawthorn extract—inhibit both phosphodiesterase and angiotensin-converting enzyme (ACE), thereby regulating blood pressure and improving coronary circulation.

The strong antioxidant properties of its flavonoids protect the heart by neutralizing free radicals, preventing oxidative damage and apoptosis in cardiac tissues. **NIGROX®** exerts these antioxidant effects by:

- Increasing nitric oxide (NO) levels,
- Decreasing hydrogen peroxide (H₂O₂) and malondialdehyde (MDA),
- Enhancing antioxidant enzymes such as nitric oxide synthase and catalase (CAT),
- Inhibiting the formation of reactive oxygen species (ROS).

NIGROX® also inhibits cardiac remodeling, including pathological changes in wall thickness and chamber size, thereby preserving normal heart function.

Its bioactive sulfur compounds such as allicin and ajoene exert antihypertensive, antiplatelet, antithrombotic, and hypolipidemic effects. By promoting vasodilation and fibrinolytic activity, these compounds prevent thrombosis and directly reduce the risk of atherosclerosis and myocardial infarction. Moreover, by inhibiting lipid synthesis and lowering triglyceride and cholesterol levels, they help prevent obesity, metabolic disorders, and cardiovascular complications.

In addition, **NIGROX®** demonstrates anti-inflammatory properties by suppressing COX-2, NF-κB, pro-inflammatory cytokines (TNF-α), and the NLRP3 inflammasome complex, contributing to reduced myocardial inflammation, improved management of chronic heart failure, protection against vascular injury, and prevention of inflammation-induced thrombosis.



Benefits of Use:

- Increase cardiac output
- Heart failure management
- Hypertrophic cardiomyopathy
- Myocardial infarction (heart attack)
- Endocarditis (inflammation of the inner heart layer)
- Myocarditis (inflammation of the heart muscle)
- Pericarditis (inflammation of the pericardium)
- Aortic or pulmonary stenosis
- Valvular heart diseases
- Arrhythmias
- Reduction of cough associated with heart failure
- Pulmonary pressure reduction
- Management of enteritis related to heart failure
- Resolution of edema and ascites
- Correction of hypoxia (low blood oxygen)
- Treatment of cardiac nervous system disorders

Dosage and Administration:

- **Pets:**
0.5–1 mL (equivalent to 10–20 drops) per 10 kg of body weight.
(For the treatment of ascites and edema due to cardiac disorders, concurrent administration of **Lavar Ren[®]** is also recommended.)
- **Companion Birds:** 1 to 3 drops daily.

Recommended Administration Methods:

1. Administer the recommended dose directly into the animal's mouth without mixing with water.
2. Mix the recommended dose with 5 cc (or 1 tablespoon) of water, draw it into a syringe (without a needle), and administer it into the animal's mouth. Ensure the entire dose is consumed.

*Avoid mixing the medication with other substances without consulting a veterinarian.





Contraindications:

None

Drug Interactions:

No known interactions.

Fully compatible with all types of feed components including antibiotics, enzymes, probiotics, and prebiotics.

Side Effects:

Completely natural formulation.

No side effects or risk of resistance development.

Withdrawal Period:

None

Storage Conditions:

Store in a dry place, below 25°C and away from direct sunlight.

Packaging:

30 ml bottle

Shelf Life:

2 years from production date.



Tehran, Iran



+982166597230-31



manager@makiandampars.com



www.makiandampars.com



@mmdpp



@makiandampars



@makiandampars



Our Website