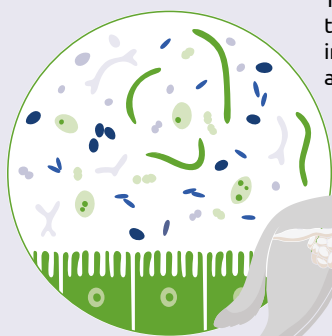
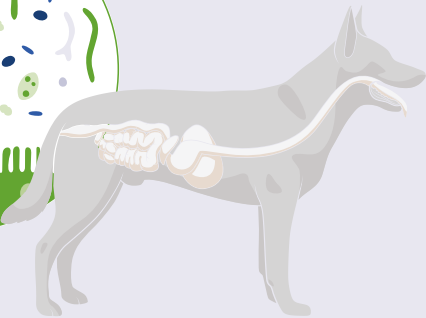


Supporting canine and feline gastrointestinal health

The healthy gut microbiome



The microbiome consists of trillions of micro-organisms including bacteria, viruses and fungi.



Understanding the microbiome

The gut microbiome is a complex ecosystem of micro-organisms that is essential for maintaining gastrointestinal health.

The intestinal epithelium, in turn, produces mucus which serves as a nutrient source for gut bacteria, creating a mutually beneficial relationship. A growing body of evidence suggests that the microbiome also has far-reaching effects on overall health, beyond the digestive system.

The pathophysiology of diarrhoea

Diarrhoea generally results from reduced water absorption (osmotic) or increased water secretion (secretory). Physiological disturbances include:

- Microbiome alteration
- Changes to the mucous lining of the GI tract
- Damage to enterocytes
- Dehydration
- Loss of electrolytes
- Inflammation

The gut microbiome is essential for:



Mineral absorption



Vitamin synthesis

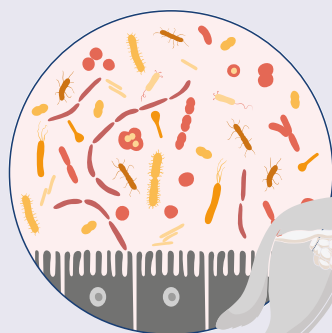


Energy regulation

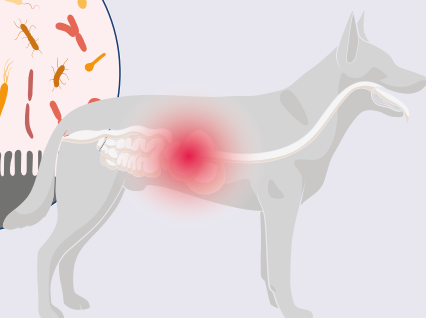


Immune function

Small intestinal dysbiosis:



Dysbiosis favours the growth of pathogenic bacteria.



When things go wrong

What is dysbiosis? Alterations in the composition of the gut microbiome,³ usually favouring the growth of potentially pathogenic bacteria.

Dogs and cats with dysbiosis often have chronic or intermittent diarrhoea. Dysbiosis has also been linked to conditions including obesity, metabolic diseases and cancer.⁴

Dysbiosis may result from:

- Dietary change
- Inflammation
- Immune deficiency
- Infection
- Antibiotics
- Toxins



The role of prebiotics and probiotics

	Role	Examples
Prebiotics	Indigestible carbohydrates that nourish the microbiome	Mannan oligosaccharides (MOS) and fructo oligosaccharides (FOS)
Probiotics	Live microorganisms that promote a healthy microbial balance	Enterococcus, Lactobacillus and Bifidobacterium species

Stabilising the gut: the role of adsorbents

Adsorbents such as Diosmectite (also known as bentonite or montmorillonite), are effective in managing diarrhoea by absorbing water and also adsorbing toxins and pathogens. Adsorbents can help:

- Stabilise the intestinal environment
- Support normal immune function
- Maintain mucosal integrity

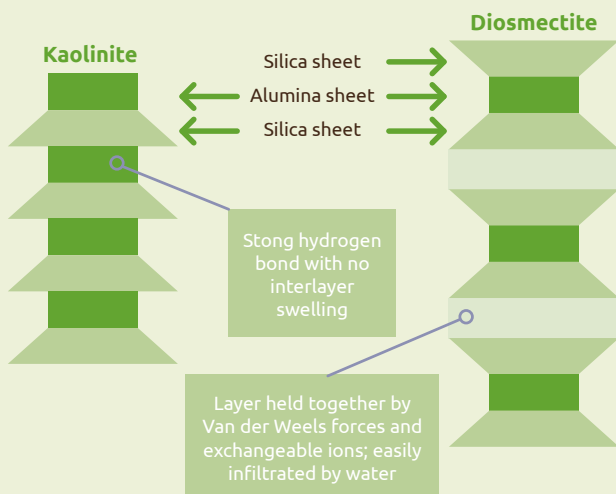
Most cases of acute diarrhoea are not caused by pathogenic bacteria⁵

Adsorbents

Diosmectite is 50 times more active than kaolinite.

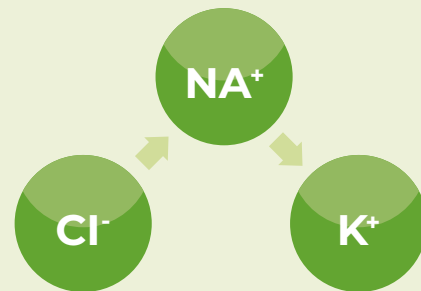
It helps to manage diarrhoea by:

- Absorbing water
- Adsorbing toxins and pathogens



Supporting the gut: providing energy

In cases of acute diarrhoea, water and electrolytes are lost resulting in dehydration and electrolyte imbalance. Providing oral electrolytes help restore and maintain normal electrolyte levels and replace lost salt.



Providing a low-fat source of support helps to support the gut in recovery from acute diarrhoea. Energy provided as dextrose and glucose provides an instance energy source and acts as fuel for rapidly dividing gut cells.

- ✓ Dextrose is easily absorbable when the digestive system is compromised
- ✓ Glutamine helps the absorption of water and salts
- ✓ Dextrose is an instant energy source
- ✓ Glutamine helps maintain and restore normal mucosal integrity

TOP TIPS for talking about gastrointestinal health

- Outline the treatment plan at the outset
- Include a plan B
- Acknowledge the owner's perspective
- Explain the rationale behind avoiding unnecessary antibiotic use
- Highlight the importance of supporting the microbiome
- Finish with a clear recommendation

Studies show no association between antibiotic use and resolution of signs⁶



Probiotic DIGESTIVE PASTE for cats & dogs

Probiotic Digestive Paste for cats & dogs is a complementary feed with a unique formulation to support gastrointestinal health.

- ✓ Contains Diosmectite, probiotics and prebiotics
- ✓ Low fat content supports recovery from acute diarrhoea
- ✓ Helps restore and maintain electrolytes
- ✓ With dextrose and glutamine as energy sources
- ✓ Easy to administer palatable paste



RAPID ACTION!

Diarrhoea normally stops after second administration.

Designed for ease of use



Paste in dial-a-dose syringe



15ml/30ml/60ml options



Palatable formulation



Wide syringe tip for ease of application

Diarrhoea is an extremely common problem in dogs and cats and has a variety of potential causes, for example:

- Dietary sensitivity and intolerance
- Worms (roundworms and tapeworms)
- Parasites (such as giardia and coccidia)
- Bacterial infection (such as salmonella and campylobacter)
- Viral infections (such as coronavirus, rotavirus and parvovirus)
- Pancreatic disease
- Inflammatory bowel disease

NVS Code	Description	Size	Price
929517	Probiotic Digestive Paste - Select	60ml	£8.36
929505	Probiotic Digestive Paste - Select	30ml	£6.87
929499	Probiotic Digestive Paste - Select	15ml	£4.62

Probiotic Digestive Paste is a complementary feed for the reduction of acute intestinal absorptive disorders during periods of and recovery from acute diarrhoea. **It is recommended that a veterinarian's opinion be sought before use.**



STABILISE + SUPPORT + ENERGISE



Introducing Duotox: The broad spectrum, multi-action adsorbent

Duotox is a broad spectrum toxin binder containing a combination of Activated Charcoal and Diosmectite.

- ✓ Complementary feed to help with absorption and excretion
- ✓ Available as both a paste and liquid
- ✓ This product is suitable for dogs, cats and fur animals
- ✓ Activated Charcoal (AC) and Diosmectite are powerful adsorbents which help maintain normal gut health
- ✓ Also contains Sorbitol and Glycerine that act as laxatives to support gastric emptying, and Curcumin and Piperine which exhibit antioxidant properties



Activated Charcoal is the most commonly administered adsorbent but has little to no affinity to many common substances. Relying on activated charcoal alone can create a gap.

The complementary adsorbitive properties of the Activated Charcoal and Diosmectite give broad spectrum cover over unwanted substances with widely differing chemical properties.



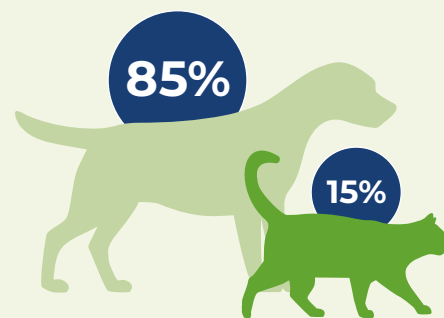
Available as liquid suspension and follow up paste.

www.nvsweb.co.uk | Orderline no. **01782 775555**
NVS, Spitfire House, Unit C250, Iron Place, Stoke-on-Trent, ST1 5FG

Rising pet poisonings: a growing concern

Accidental ingestion of unwanted substances remains a significant threat to our pets.

- In 2020, 7.1 million pets fell ill after eating something poisonous¹
- In 2021, the VPIS reported a 40% increase in the number of poisoning enquiries²
- The VPIS receives an average of 60 calls per day for assistance in cases involving suspected poisoning²
- Vets report seeing on average >3000 cases involving poisoning every week across the UK¹



Part no.	Description	Size	Price
393290	Duotox Liquid – Select	110ml	£11.55
393289	Duotox Paste – Select	30ml	£11.40

References

1. O'Neill, D.G. et al. (2020) Prevalence of commonly diagnosed disorders in UK dogs under primary veterinary care: results and applications. BMC Vet Res 17, 69
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4. Pilla, R. & Suchodolski, J.S. (2021) The Gut Microbiome of Dogs and Cats, and the Influence of Diet. Vet Clin North Am Small Anim Pract. 51(3):605-621
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