



SAFETY DATA SHEET

Product Name: MARATHON Se Oral

SECTION 1: IDENTIFICATION OF THE SUBSTANCE AND SUPPLIER

Product name:	MARATHON Se Oral Drench for Sheep
Pack Sizes	1L, 2.5L, 5L, 10L, 20L
Recommended use:	For the treatment of gastrointestinal and pulmonary nematodes and itchmite of sheep. Also provides an aid in the supplementation of selenium.
Company name:	Alleva Animal Health Limited
Address:	1/116a Harris Road, East Tamaki, Auckland, 2013, New Zealand
Telephone:	0064-9-4181405
Emergency telephone number:	National Poisons Centre: 0800 764 766 (0800 POISON) Fire Service, Ambulance: Dial 111
Date of Preparation	24 November 2021
Restrictions of Use	Refer to Section 15

SECTION 2: HAZARDS IDENTIFICATION

This substance is hazardous according to the EPA Hazardous Substances (Classification) Notice 2020

EPA Approval Code: Veterinary Medicines (Non-Dispersive Closed System Application) – HSR100758

Pictograms:



Signal Word: **WARNING**

GHS Classification and Category	Hazard Code	Hazard Statement
Skin sensitisation Cat. 1	H317	May cause an allergic skin reaction.



Reproductive toxicity Cat. 2	H361	Suspected of damaging fertility or the unborn child.
Effects on or via lactation	H362	May cause harm to breast-fed children.
Hazardous to the aquatic environment acute/chronic Cat. 1	H400/H410	Very toxic to aquatic life with long lasting effects.
Hazardous to soil organisms	H423	Hazardous to soil organisms
Hazardous to terrestrial invertebrates	H443	Hazardous to terrestrial invertebrates

Prevention Code Prevention Statement

P102	Keep out of reach of children.
P103	Read label before use.
P201	Obtain special instructions before use.
P202	Do not handle until all safety precautions have been read and understood.
P260	Do not breathe fumes, mist, vapours or spray.
P263	Avoid contact during pregnancy/while nursing.
P264	Wash hands thoroughly after handling.
P270	Do not eat, drink or smoke when using this product.
P272	Contaminated work clothing should not be allowed out of the workplace.
P273	Avoid release to the environment.
P280	Wear protective clothing.
P281	Use personal protective equipment as required.

Response Code Response Statement

P101	If medical advice is needed, have product container or label at hand.
P363	Wash contaminated clothing before reuse.
P391	Collect spillage.
P302 + P352	IF ON SKIN: Wash with plenty of soap and water.
P308 + P313	IF exposed or concerned: Get medical advice/ attention.
P333 + P313	If skin irritation or rash occurs: Get medical advice/attention.

Storage Code Storage Statement

P405	Store locked up.
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Disposal Code Disposal Statement

P501	Dispose of according to Local Regulations or Authorities
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SECTION 3: COMPOSITION

Product Components:		
Name	CAS #	Concentration



Moxidectin	113507-06-5	0.1%
Selenium	13410-01-0	0.05%
Propylene glycol	57-55-6	<40%
Non-hazardous ingredients		To 100%

SECTION 4: FIRST AID MEASURES

Necessary first aid measures:	<p>Skin Contact: Remove any contaminated clothing and wash the affected area immediately with soap and water. If symptoms develop seek medical advice immediately.</p> <p>Eye Contact: In case of contact, flush eye with plenty of water for at least 15 minutes. If symptoms develop seek medical advice immediately.</p> <p>Ingestion: If the patient is conscious wash mouth out with water. Do not give anything by mouth to an unconscious person. Seek medical advice if needed.</p> <p>Inhalation: In case of accidental overexposure, get to fresh air. If irritation occurs or persists, get medical attention.</p>
Most important symptoms and effects, both acute and delayed	<p>Symptoms:</p> <p>May cause an allergic skin reaction.</p> <p>Suspected of damaging fertility or the unborn child.</p> <p>May cause harm to breast-fed children.</p>
Hygiene Practices:	Do not eat, drink or smoke while using this product. Wash hands and exposed skin before eating, drinking or smoking and after work. Wash any protective clothing after use.

SECTION 5: FIRE FIGHTING MEASURES

Type of hazard:	This product is non-flammable, non-combustible and non-explosive.
Extinguishing media and methods:	Use extinguishing media suitable for surrounding area.
Hazchem code:	3Z
Recommended protective clothing:	Fire-fighters should wear full protective gear.



SECTION 6: ACCIDENTAL RELEASE MEASURES

Personal Precautions:	Personnel involved in clean-up should wear appropriate personal protective equipment to minimise exposure. Evacuate non-essential personally.
Environmental Precautions:	Prevent material from entering surface water drains or waterways. If a significant quantity of material enters drains, advise emergency services.
Procedure for Spills:	Absorb spill with absorbent material such as sand, soil or absorbent granules and place in a sealable container for disposal.
Procedure for Disposal:	Contaminated material must be disposed of at an approved landfill or other approved facility in accordance with local, regional and national requirements. Refer to Section 13.

SECTION 7: HANDLING AND STORAGE

Precautions for safe handling:	<ul style="list-style-type: none">• Read label before use.• Obtain special instructions before use.• Do not handle until all safety precautions have been read and understood.• Do not breathe fumes, mist, vapours or spray.• Avoid contact during pregnancy/while nursing.• Wash hands thoroughly after handling.• Do not eat, drink or smoke when using this product.• Contaminated work clothing should not be allowed out of the workplace.• Avoid release to the environment.• Wear protective clothing.• Use personal protective equipment as required.
Conditions for safe storage:	<ul style="list-style-type: none">• Keep out of reach of children.




Packaging:	<ul style="list-style-type: none"> • Store below 25°C (Room Temperature). • Keep away of sunlight. • Keep away from incompatible materials listed in Section 10. <p>Packaging Schedule 3 (UN Packing Group III) for quantities > 5 L (Hazardous Substances Packaging Regulations 2001).</p>
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SECTION 8: EXPOSURE CONTROL/PERSONAL PROTECTION

WORKPLACE EXPOSURE STANDARDS (provided for guidance only)

Substance	TWA		STEL	
	ppm	mg/m ³	ppm	mg/m ³
Propane-1,2-diol, Particulates Only [57-55-6]	-	10	-	-
Propane-1,2-diol, Vapour and Particulates [57-55-6]	150	474	-	-

Workplace Exposure Standard – Time Weighted Average (WES-TWA). The time-weighted average exposure standard designed to protect the worker from the effects of long-term exposure. Workplace Exposure Standard – Short-Term Exposure Limit (WESSTEL). The 15-minute average exposure standard. Applies to any 15- Minute period in the working day and is designed to protect the worker against adverse effects of irritation, chronic or irreversible tissue change, or narcosis that may increase the likelihood of accidents. The WES-STEL is not an alternative to the WES-TWA; both the short-term and time-weighted average exposures apply. Workplace Exposure Standards and Biological Exposure Indices NOV 2020 12TH EDITION.

Engineering controls:	Engineering controls should be used as the primary means to control exposures. Use process enclosures, local exhaust ventilation, or other engineering controls to maintain airborne levels below recommended exposure limits.
Personal protection: 	<p>Respiratory protection: Respiratory protection is not normally required.</p> <p>Hand protection: Impervious protective gloves should be worn when handling this product to prevent irritation.</p> <p>Eye protection: Safety glasses are recommended if there is a potential for direct eye contact.</p>



General Hygiene:	Change work clothes regularly. Do not eat, drink or smoke while handling this product. Wash hands and exposed skin before eating, drinking or smoking and after work. Wash any protective clothing after use.
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SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES

Appearance	Pale yellow solution
Odour	Not available
Odour Threshold	Not applicable
pH	~6
Boiling Point	Not available
Freezing/Melting Point	Not available
Flash Point	Not available
Flammability	Not flammable
Upper and Lower Exposure Limits	Not applicable
Vapour Pressure	Not available
Vapour Density	Not applicable
Specific Gravity	~1.04
Solubilities	Soluble in water
Partition Coefficient:	Not applicable
Auto-ignition Temperature	Not available
Volatiles	Not available
Kinematic Viscosity	Not applicable
Particle Characteristics	Not applicable

SECTION 10: STABILITY AND REACTIVITY

Stability of the substance:	This product is stable under normal storage conditions.
Conditions to avoid:	None known.
Material to avoid:	No data available
Hazardous decomposition products:	None known.

SECTION 11: TOXICOLOGICAL INFORMATION

Acute effects:	
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Swallowed	Not applicable.
Dermal	Not applicable.
Inhalation	Not applicable.
Eye	Not applicable.
Skin	May cause an allergic skin reaction.
Chronic and long-term effects:	
Reproductive	Suspected of damaging fertility or the unborn child.
Systemic	
Carcinogenicity	Not applicable.
Germ Cell Mutagenicity	May cause harm to breast-fed children.
STOT/RE	Not applicable.

Acute Effects:

Moxidectin:

Moxidectin is a macrocyclic lactone, structurally similar to ivermectin, abamectin and milbemycin. Moxidectin is an acute oral toxin with nervous system effects [LD50 (oral, mice) 42 mg/kg, LD50 (dermal) is >2000 mg/kg]. Only mild signs of skin irritation were seen (rabbit, exposure for up to 72 hrs). Moderate eye irritation was noted (rabbit), but signs resolved 48-72 hrs after treatment.

Sodium selenate:

Sodium selenate is acutely toxic [LD50 (oral) 25mg/kg]. Dusts are toxic if inhaled and irritant to eyes. Acute poisoning exhibits as dyspnea, spasms and death from respiratory failure. Selenium poisoning in humans has been described and gastrointestinal and neurological symptoms predominated. Potential mutagen. Repeated dose testing in laboratory species identified a lowest NOAEL of 0.37mg/kg/day (liver toxicity).

Chronic Exposure:

Moxidectin: Laboratory rodent reproductive studies reported foetal malformations, decreased number of live births, reduced pup weights and neonatal & lactational deaths [lowest NOEL 0.4 mg/kg/day]. A chronic feeding study (90 days; 0 to 1.6 mg/kg/d) induced toxicity in dogs. At the highest dose lacrimation, tremors, salivation, slight ataxia and a languid appearance were reported. Dose dependant reductions in absolute body weight and food consumption were noted [NOEL 0.3 mg/kg]. In a second study (52 weeks; 0-1.15 mg/kg/d), no signs of toxicity occurred and body weights remained comparable to controls throughout the study [NOEL 1.15 mg/kg]. Moxidectin is not mutagenic or carcinogenic.



SECTION 12: ENVIRONMENTAL INFORMATION

Ecotoxicity effects:	Very toxic to aquatic life with long lasting effects. Hazardous to soil organisms Hazardous to terrestrial invertebrates
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Persistence and degradability	No data available
Bioaccumulation	No data available
Mobility in Soil	No data available
Other adverse effects	No data available

Moxidectin: Moxidectin is very toxic to aquatic life [Bluegill sunfish LC50 (96 hrs) 0.62 ppb; Rainbow trout LC50 (96 hrs) 0.16 ppb; Daphnia magna EC50 (48 hrs) 30 ppt; bioaccumulative] and soil life [Dung beetle EC50's are 2.5677 mg/kg; 0.4693 mg/kg & 0.134 mg/kg. Soil DT50 > 30 days]. Moxidectin is also very toxic to terrestrial vertebrates [LD50 (mice) = 42 mg/kg] and bees [LD50 (oral) = 0.46 ug/bee; LD50 (contact) 0.025 ug/bee].

Do not allow to enter waterways.

SECTION 13: DISPOSAL CONSIDERATIONS

Product disposal:	Preferably dispose of product by use in accordance with label directions. Otherwise dispose of product and packaging at an approved landfill or other approved facility. Crush and bury in an approved landfill if an approved recycling system is not available. Do not burn. Do NOT use container for any other purpose. Avoid contamination of any water supply with product. Ensure containers holding waste product or contaminated spill media are labelled "Hazardous Waste - Ecotoxic", have the appropriate pictograms from section 2, and your business name, address and phone number.
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SECTION 14: TRANSPORT INFORMATION

This product is classified as a Dangerous Good for transport in NZ; NZS 5433:2012



Road and Rail Transport

UN No: 3082
Class-primary 9
Packing Group III
Proper Shipping Name: ENVIRONMENTALLY HAZARDOUS SUBSTANCE,
LIQUID, N.O.S. (Moxidectin, Selenium)

Air Transport

UN No: 3082
Class-primary 9
Packing Group III
Proper Shipping Name: ENVIRONMENTALLY HAZARDOUS SUBSTANCE,
LIQUID, N.O.S. (Moxidectin, Selenium)

Marine Transport

UN No: 3082
Class-primary 9
Packing Group III
Proper Shipping Name: ENVIRONMENTALLY HAZARDOUS SUBSTANCE,
LIQUID, N.O.S. (Moxidectin, Selenium)

NOT RESTRICTED UNDER SPECIAL PROVISION A197 (375): These substances when transported in single or combination packagings containing a net quantity per single or inner packaging of 5 L or less for liquids or having a net mass of 5 kg or less for solids, are not subject to any other provisions of these Regulations provided the packagings meet the general provisions of 5.0.2.4.1, 5.0.2.6.1.1 and 5.0.2.8.

SECTION 15: REGULATORY INFORMATION

Regulatory status:	EPA Approval No: Veterinary Medicines (Non-Dispersive Closed System Application) – HSR100758 Registered pursuant to the ACVM Act 1997 Approval No: A011903 See www.foodsaftely.govt.nz for registration conditions.
HSW (HS) Regulations 2017	Trigger Quantity
Certified Handler	Not required
Location Certificate	Not required
Tracking Trigger Quantities	Not required



Signage Trigger Quantities	100L
Emergency Response Plan	100L
Secondary Containment	100L
Restriction of Use	None
Hazardous Property Controls Notice 2017	
HPC Notice Part 4 Clause 47	Equipment for class 9 substances must be appropriate
HPC Notice Part 4 Clause 48	Records of application of class 9 pesticides and plant growth regulators
HPC Notice Part 4 Subpart A	Site and storage controls for class 9 substances
HPC Notice Part 3	Hazardous substances in a place other than a workplace.

SECTION 16: OTHER INFORMATION

Glossary

CAT	Category
EC50	Median effective concentration.
EEL	Environmental Exposure Limit.
EPA	Environmental Protection Authority
HSNO	Hazardous Substances and New Organisms.
HSW	Health and Safety at Work.
LC50	Lethal concentration that will kill 50% of the test organisms inhaling or ingesting it.
LD50	Lethal dose to kill 50% of test animals/organisms.
LEL	Lower explosive level.
OSHA	American Occupational Safety and Health Administration.
TEL	Tolerable Exposure Limit.
TLV	Threshold Limit Value-an exposure limit set by responsible authority.
UEL	Upper Explosive Level
WES	Workplace Exposure Limit

References:

1. EPA Hazardous Substances (Safety Data Sheets) Notice 2017
2. Workplace Exposure Standards and Biological Exposure Indices Nov 2020 12th edition.
3. Assigning a hazardous substance to a HSNO Approval (Aug 2013).
4. Transport of Dangerous goods on land NZS 5433:2012
5. HSW (Hazardous Substances) Regulations 2017

This Safety Data Sheet summarises our best knowledge of the health and safety hazard information of the product and how to safely handle and use the product in the



workplace. ALLEVA Animal Health Limited makes no warranty with respect hereto and disclaims all liability from reliance thereon.

Each user should read this SDS and consider the information in the context of how the product will be handled and used in the workplace including in conjunction with other products.

PLEASE READ ALL LABELS CAREFULLY BEFORE USING PRODUCT.

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