

Environmental Information Sheet

CRYSTAL MAFF/MAPP 13914



An emulsifiable concentrate containing 60 g/litre flufenacet (oxyacetamide herbicide) and 300 g/litre pendimethalin (dinitroaniline herbicide) for use in winter wheat and winter barley

Maximum individual dose: 4 l/ha (240 + 1200 g a.s./ha): Maximum total dose: 4 l/ha

Section	Profile
<p>1. WILDLIFE</p> <p>Mammals and Birds</p>	<p>Crystal is not classified as <i>"Harmful to game, wild birds and animals"</i>.</p> <p>No risk management necessary to protect wild mammals and birds. Pendimethalin is of low toxicity to mammals and of moderate toxicity to birds. Flufenacet is of moderate toxicity to mammals and birds. The risk to wild mammals and birds grazing on treated areas is low as is the risk due to exposure from other routes e.g. consumption of invertebrates such as insects.</p>
<p>2. BEES</p>	<p>No risk management is necessary. Crystal is of low risk to bees.</p>
<p>3. NON TARGET INSECTS AND OTHER ARTHROPODS</p>	<p>Risk management advised. Crystal can adversely affect some arthropod species commonly found in and around treated fields, e.g. aphid parasitoids and spiders.</p> <p><i>"Avoid spraying within 6 metres of the field boundary to reduce effects on non-target insects or other arthropods."</i></p>
<p>4. AQUATIC LIFE</p>	<p>Crystal is classified as <i>"Very toxic to aquatic organisms, may cause long term adverse effects in the aquatic environment."</i></p> <p>Crystal is of extreme toxicity to fish and algae and high toxicity to aquatic invertebrates, e.g. water flea.</p> <p><i>"Do not contaminate water with product or its container."</i></p> <p>Risk management is essential. Crystal can be used safely providing care is taken to prevent spray drift reaching surface waters. The following risk management practices must be carried out in order to ensure that there is adequate protection of aquatic species.</p> <p><i>"DO NOT ALLOW DIRECT SPRAY from horizontal boom sprayers to fall within 5 m of the top of the bank of a static or flowing water body, unless a Local Environment Risk Assessment for Pesticides (LERAP) permits a narrower buffer zone, or within 1 m of the top of a ditch which is dry at the time of application. DO NOT ALLOW DIRECT SPRAY from hand-held sprayers to fall within 1m of the top of the bank of a static or flowing waterbody. Aim spray away from water."</i></p> <p>LERAP Category B. Buffer zones maybe reduced (see LERAP Guidelines).</p>

Environmental Information Sheet

CRYSTAL MAFF/MAPP 13914



Section	Profile
<p>5. SOIL and GROUNDWATER</p> <p>Earthworms</p> <p>Soil Micro-organisms</p>	<p>No risk management necessary. Pendimethalin is very persistent in soil. Pendimethalin is strongly adsorbed to soil and is therefore not mobile. Flufenacet is moderately persistent in soil. It is of low to moderate mobility in soil. Field investigations have shown that use of Crystal as recommended presents low risk to ground water.</p> <p>No risk management necessary. Crystal is of moderate toxicity to earthworms, but at recommended application rates, the risk to earthworms is low.</p> <p>No risk management necessary. At the recommended application rate, Crystal has no effects on soil microbial respiration or nitrogen turnover. The risk to soil microbial activity is therefore low.</p>
<p>6. NON-TARGET PLANTS</p>	<p>Crystal is a herbicide with activity against annual grass and broadleaved weeds and may be harmful to some species of wild flowers which are found in the margins of fields. Therefore care should always be taken to minimise drift when applying Crystal close to field boundaries.</p>

ALWAYS READ THE LABEL: USE PESTICIDES SAFELY

Care must be taken to minimise the risk of surface water contamination from farmyard and field sources.

For further information about the environmental profile of this product contact:-

BASF plc, P.O. Box 4, Earl Road, Cheadle Hulme, Cheshire SK8 6QG
 Telephone: 0161 485 6222 Fax: 0161 486 0891

This Environmental Information Sheet was prepared in accordance with CPA Guidance Notes Version 4.

© copyright of BASF plc