SECTION 1: IDENTIFICATION OF THE SUBSTANCE/MIXTURE AND OF THE COMPANY/UNDERTAKING

1.1 Product identifier

Product name: WAKIL XL
Design code: A9873C

1.2 Relevant identified uses of the substance or mixture and uses advised against

Use: Fungicide

1.3 Details of the supplier of the safety data sheet

Company: Syngenta UK Limited
CPC4, Capital Park
Fulbourn
Cambridge
CB21 5XE

Telephone: (01223) 883400
Telefax: (01223) 882195
Website: www.syngenta.co.uk

1.4 Emergency telephone number

: +44 1484 538444

SECTION 2: HAZARDS IDENTIFICATION

2.1 Classification of the substance or mixture

Classification according to Regulation (EU) 1272/2008

<table>
<thead>
<tr>
<th>Category</th>
<th>H-Statements</th>
</tr>
</thead>
<tbody>
<tr>
<td>2</td>
<td>H361fd</td>
</tr>
<tr>
<td>2</td>
<td>H373</td>
</tr>
<tr>
<td>2</td>
<td>H411</td>
</tr>
</tbody>
</table>

For the full text of the H-Statements mentioned in this Section, see Section 16.

2.2 Label elements

Labelling: Regulation (EC) No. 1272/2008

<table>
<thead>
<tr>
<th>Hazard pictogram</th>
</tr>
</thead>
<tbody>
<tr>
<td><img src="image" alt="" /></td>
</tr>
</tbody>
</table>

Signal word: Warning

Hazard Statements:

: H361fd Suspected of damaging fertility. Suspected of damaging the unborn child.
: H373 May cause damage to organs (blood, thymus) through prolonged or repeated exposure.
: H410 Very toxic to aquatic life with long lasting effects
### Precautions Statements
- **P102**: Keep out of reach of children.
- **P201**: Obtain special instructions before use.
- **P260**: Do not breathe dust/fume/gas/mist/vapours/spray.
- **P280**: Wear protective gloves/protective clothing.
- **P308/313**: IF exposed or concerned: Get medical advice/attention.
- **P391**: Collect spillage
- **P501**: Dispose of contents/container to a licensed hazardous waste disposal contractor or collection site except for empty clean containers which can be disposed of as non-hazardous waste.

### Supplemental Information
- **EUH208**: Contains cymoxanil. May produce an allergic reaction.
- **EUH401**: To avoid risks to human health and the environment comply with the instructions for use.

#### Hazardous components which must be listed on the label:
- cymoxanil

##### 2.3 Other hazards
May form flammable dust-air mixture.

### SECTION 3: COMPOSITION/INFORMATION ON INGREDIENTS

#### 3.2 Mixtures

<table>
<thead>
<tr>
<th>Chemical Name</th>
<th>CAS No. EC No. Registration Number</th>
<th>Classification (REGULATION (EC) No. 1272/2008)</th>
<th>Concentration</th>
</tr>
</thead>
<tbody>
<tr>
<td>Talc</td>
<td>14807-96-6 238-877-9</td>
<td>Acute Tox.4; H302 Eye Dam.1; H318</td>
<td>10 – 20 % w/w</td>
</tr>
<tr>
<td>Metalaxyl-m</td>
<td>70630-17-0</td>
<td>Acute Tox.4; H302 Eye Dam.1; H318</td>
<td>17.5 % w/w</td>
</tr>
<tr>
<td>Cymoxanil</td>
<td>57966-95-7 261-043-0</td>
<td>Acute Tox.4; H302 Skin Sens.1; H317 Repr.2; H361fd STOT RE2; H373 Aquatic Acute1; H400 Aquatic Chronic1; H410</td>
<td>10 % w/w</td>
</tr>
<tr>
<td>Fludioxonil</td>
<td>131341-86-1</td>
<td>Aquatic Acute1; H400 Aquatic Chronic1; H410</td>
<td>5 % w/w</td>
</tr>
<tr>
<td>Citric acid</td>
<td>5949-29-1 201-069-1</td>
<td>Eye Irrit.2; H319</td>
<td>1 – 5 % w/w</td>
</tr>
</tbody>
</table>

Substances for which there are Community workplace exposure limits.
For the full text of the H-Statements mentioned in this Section, see Section 16.

### SECTION 4: FIRST AID MEASURES

#### 4.1 Description of first aid measures
- **General Advice**: Have the product container, label or Material Safety Data Sheet with you when calling the Syngenta emergency number, a poison control centre or physician, or going for treatment.
- **Inhalation**: Move the victim to fresh air. If breathing is irregular or stopped, administer artificial respiration. Keep patient warm and at rest. Call a physician or Poison Control Centre immediately.
- **Skin Contact**: Take off all contaminated clothing immediately. Wash off immediately with plenty of water. If skin irritation persists, call a physician. Wash
contaminated clothing before re-use.

Eye Contact: Rinse immediately with plenty of water, also under the eyelids, for at least 15 minutes. Remove contact lenses. Immediate medical attention is required.

Ingestion: If swallowed, seek medical advice immediately and show this container or label. Do NOT induce vomiting.

4.2 Most important symptoms and effects, both acute and delayed Symptoms: No information available.

4.3 Indication of any immediate medical attention and special treatment needed
Medical advice: There is no specific antidote available. Treat symptomatically.

SECTION 5: FIREFIGHTING MEASURES

5.1 Extinguishing media
Extinguishing media - small fires
Use water spray, alcohol-resistant foam, dry chemical or carbon dioxide.

Extinguishing media - large fires
Use alcohol-resistant foam or water spray.
Do not use a solid water stream as it may scatter and spread fire.

5.2 Special hazards arising from the substance or mixture
As the product contains combustible organic components, fire will produce dense black smoke containing hazardous products of combustion (see section 10). Exposure to decomposition products may be a hazard to health.

5.3 Advice for fire-fighters:
Wear full protective clothing and self-contained breathing apparatus. Do not allow run-off from fire fighting to enter drains or water courses. Cool closed containers exposed to fire with water spray.

SECTION 6: ACCIDENTAL RELEASE MEASURES

6.1 Personal precautions, protective equipment and emergency procedures
Refer to protective measures listed in sections 7 and 8. Avoid dust formation.

6.2 Environmental precautions:
Do not flush into surface water or sanitary sewer system.

6.3 Methods and materials for containment and cleaning up
Contain spillage, pick up with an electrically protected vacuum cleaner or by wet-brushing and transfer to a container for disposal according to local regulations (see section 13). Do not create a powder cloud by using a brush or compressed air. Clean contaminated surface thoroughly. If the product contaminates rivers and lakes or drains inform respective authorities.

6.4 Reference to other sections
Refer to protective measures listed in sections 7 and 8.
Refer to disposal considerations listed in section 13.
SECTION 7: HANDLING AND STORAGE

7.1 Precautions for safe handling
This material is capable of forming flammable dust clouds in air, which, if ignited, can produce a dust cloud explosion. Flames, hot surfaces, mechanical sparks and electrostatic discharges can serve as ignition sources for this material. Electrical equipment should be compatible with the flammability characteristics of this material. The flammability characteristics will be made worse if the material contains traces of flammable solvents or is handled in the presence of flammable solvents. This material can become readily charged in most operations. Avoid contact with skin and eyes. When using, do not eat, drink or smoke. For personal protection see section 8.

7.2 Conditions for safe storage, including any incompatibilities
Keep containers tightly closed in a dry, cool and well-ventilated place. Keep out of the reach of children. Keep away from food, drink and animal feeding stuffs.

7.3 Specific end use(s)
Registered Crop Protection products: For proper and safe use of this product, please refer to the approval conditions laid down on the product label.

SECTION 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

8.1 Control parameters

<table>
<thead>
<tr>
<th>Components</th>
<th>Exposure limit(s)</th>
<th>Type of exposure limit</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Metalaxyl-m</td>
<td>10 mg/m³</td>
<td>8 h TWA</td>
<td>SYNGENTA</td>
</tr>
<tr>
<td>Cymoxanil</td>
<td>2 mg/m³</td>
<td>8 h TWA</td>
<td>SUPPLIER</td>
</tr>
<tr>
<td>Fludioxonil</td>
<td>10 mg/m³</td>
<td>8 h TWA</td>
<td>SYNGENTA</td>
</tr>
<tr>
<td>Talc</td>
<td>2 mg/m³ (respirable dust)</td>
<td>8 h TWA</td>
<td>DFG</td>
</tr>
<tr>
<td></td>
<td>2 mg/m³</td>
<td>8 h TWA</td>
<td>SUVA</td>
</tr>
<tr>
<td></td>
<td>1 mg/m³</td>
<td>8 h TWA</td>
<td>UK HSE</td>
</tr>
<tr>
<td></td>
<td>2 mg/m³</td>
<td>8 h TWA</td>
<td>ACGIH</td>
</tr>
</tbody>
</table>

The following recommendations for exposure controls/personal protection are intended for the manufacture, formulation and packaging of the product.

8.2 Exposure controls

Engineering Measures: Containment and/or segregation is the most reliable technical protection measure if exposure cannot be eliminated. The extent of these protection measures depends on the actual risks in use. If airborne mist or vapours are generated, use local exhaust ventilation controls. Assess exposure and use any additional measures to keep airborne levels below any relevant exposure limit. Where necessary, seek additional occupational hygiene advice.

Protective measures: The use of technical measures should always have priority over the use of personal protective equipment. When selecting personal protective equipment, seek appropriate professional advice. Personal protective equipment should be certified to appropriate standards.

Respiratory protection: No personal respiratory protective equipment normally required. A particulate filter respirator may be necessary until effective technical measures are installed.
Hand protection: Chemical resistant gloves are not usually required. Select gloves based on the physical job requirements.

Eye Protection: Eye protection is not usually required. Follow any site specific eye protection policies.

Skin and body protection: No special protective equipment required. Select skin and body protection based on the physical job requirements.

SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES

9.1 Information on basic physical and chemical properties

Physical State: Solid
Form: Granules
Colour: Light red to dark red
Odour: Smoky
Odour Threshold: No data available
pH: 4-8 at 1 % w/v
Melting point/range: No data available
Boiling point/boiling range: No data available
Flash point: No data available
Evaporation rate: No data available
Flammability (solid, gas): Not highly flammable
Lower explosion limit: No data available
Upper explosion limit: No data available
Vapour pressure: No data available
Relative vapour density: No data available
Density: No data available
Solubility in other solvents: Not soluble
Partition Coefficient: No data available
n-octanol/water: No data available
Autoignition temperature: 140 °C
Thermal decomposition: No data available
Viscosity, dynamic: No data available
Viscosity, kinematic: No data available
Explosive properties: Not explosive
Oxidizing properties: Not oxidising

9.2 Other information
Minimum ignition energy: 0.1 – 0.3 J
Bulk density: 0.4 – 0.6 g/cm³
Miscibility: Miscible
Surface Tension: 27.9 mN/m at 20 °C

SECTION 10: STABILITY AND REACTIVITY

10.1 Reactivity: No information available
10.2 Chemical Stability: No information available
10.3 Possibility of hazardous reactions: None known. Hazardous polymerisation does not occur.
10.4 Conditions to avoid: No information available
10.5 Incompatible materials: No information available
10.6 Hazardous decomposition products: Combustion or thermal decomposition will evolve toxic and irritant vapours.

SECTION 11: TOXICOLOGICAL INFORMATION

11.1 Information on toxicological effects

Acute oral toxicity: LD50 rat, > 2,000 mg/kg
Acute inhalational toxicity: Acute toxicity estimate, >5.0 mg/l
Acute dermal toxicity: LD50 rat, > 2,000 mg/kg
Skin corrosion/irritation: Rabbit: slightly irritating
Serious eye damage/eye irritation: Rabbit: non-irritating
Respiratory or skin sensitisation: Maximisation Test (GPMT) guinea pig: not sensitising
Germ cell mutagenicity: Metalaxyl-m, cymoxanil and fludioxonil did not show mutagenic effects in animal experiments.
Carcinogenicity: Metalaxyl-m, cymoxanil and fludioxonil did not show carcinogenic effects in animal experiments.
Teratogenicity: Metalaxyl-m did not show teratogenic effects in animal experiments.
Reproductive toxicity: Metalaxyl-m and fludioxonil did not show reproductive toxicity effects in animal experiments. Cymoxanil is suspected of damaging fertility and suspected of damaging the unborn child.
STOT – single exposure: Cymoxanil is not classified as specific target organ toxicant, single exposure.
STOT – repeated exposure: No adverse effect has been observed in chronic toxicity tests for metalaxyl-m and fludioxonil. Cymoxanil may cause damage to organs (blood, thymus) through prolonged or repeated exposure.

SECTION 12: ECOLOGICAL INFORMATION

12.1 Toxicity

Toxicity to fish: LC50 Oncorhynchus mykiss (rainbow trout), 11 mg/l, 96 h
Toxicity to aquatic invertebrates: EC50 Daphnia magna (water flea), 47.9 mg/l, 48 h
Toxicity to aquatic plants: EbC50 Desmodesmus subspicatus (green algae), 5.2 mg/l, 72 h ErC50 Desmodesmus subspicatus (green algae), 11 mg/l, 72 h

12.2 Persistence and degradability

Biodegradability: metalaxyl-m: Not readily biodegradable, cymoxanil: Not readily biodegradable, fludioxonil: Not readily biodegradable

12.3 Bioaccumulative potential

metalaxyl-m: Low potential for bioaccumulation, cymoxanil: Low potential for bioaccumulation.
\textbf{12.4 Mobility in soil}

- metalaxyl: Low to very high mobility in soil dependant on soil type.
- cymoxanil: Medium mobility in soil.
- fludioxonil: Immobile in soil.

\textbf{12.5 Results of PBT and vPvB assessment}

Metalaxyl-m, cymoxanil, fludioxonil:
- These substances are not considered to be persistent, bioaccumulating or toxic (PBT).
- These substances are not considered to be very persistent nor very bioaccumulating (vPvB).

\textbf{12.6 Other adverse effects}

Other information: Classification of the product is based on the summation of the concentrations of classified components.

\section*{SECTION 13: DISPOSAL CONSIDERATIONS}

\subsection*{13.1 Waste treatment methods}

**Product**: Do not contaminate ponds, waterways or ditches with chemical or used container. Do not dispose of waste into sewer. Where possible recycling is preferred to disposal or incineration. If recycling is not practicable, dispose of in compliance with local regulations.

**Contaminated packaging**: Empty remaining contents. Triple rinse containers. Empty containers should be taken for local recycling or waste disposal. Do not re-use empty containers.

\section*{SECTION 14: TRANSPORT INFORMATION}

\subsection*{Land transport (ADR/RID)}

<table>
<thead>
<tr>
<th>14.1 UN Number</th>
<th>:</th>
<th>UN 3077</th>
</tr>
</thead>
<tbody>
<tr>
<td>14.2 UN proper shipping name</td>
<td>:</td>
<td>ENVIRONMENTALLY HAZARDOUS SUBSTANCE, SOLID, N.O.S. (CYMOXANIL AND FLUDIOXONIL)</td>
</tr>
<tr>
<td>14.3 Transport hazard class(es)</td>
<td>:</td>
<td>9</td>
</tr>
<tr>
<td>14.4 Packing Group</td>
<td>:</td>
<td>III</td>
</tr>
<tr>
<td>14.5 Environmental hazards</td>
<td>:</td>
<td>Environmentally hazardous</td>
</tr>
<tr>
<td>Tunnel restriction code</td>
<td>:</td>
<td>E</td>
</tr>
</tbody>
</table>

\subsection*{Sea transport (IMDG)}

<table>
<thead>
<tr>
<th>14.1 UN Number</th>
<th>:</th>
<th>UN 3077</th>
</tr>
</thead>
<tbody>
<tr>
<td>14.2 UN proper shipping name</td>
<td>:</td>
<td>ENVIRONMENTALLY HAZARDOUS SUBSTANCE, SOLID, N.O.S. (CYMOXANIL AND FLUDIOXONIL)</td>
</tr>
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<td>14.3 Transport hazard class(es)</td>
<td>:</td>
<td>9</td>
</tr>
<tr>
<td>14.4 Packing Group</td>
<td>:</td>
<td>III</td>
</tr>
<tr>
<td>14.5 Environmental hazards</td>
<td>:</td>
<td>Marine pollutant</td>
</tr>
</tbody>
</table>

\subsection*{Air transport (IATA-DGR)}

<table>
<thead>
<tr>
<th>14.1 UN Number</th>
<th>:</th>
<th>UN 3077</th>
</tr>
</thead>
<tbody>
<tr>
<td>14.2 UN proper shipping name</td>
<td>:</td>
<td>ENVIRONMENTALLY HAZARDOUS SUBSTANCE, SOLID, N.O.S. (CYMOXANIL AND FLUDIOXONIL)</td>
</tr>
<tr>
<td>14.3 Transport hazard class(es)</td>
<td>:</td>
<td>9</td>
</tr>
<tr>
<td>14.4 Packing Group</td>
<td>:</td>
<td>III</td>
</tr>
</tbody>
</table>
14.6 Transport in bulk according to Annex II of MARPOL 73/78 and the IBC Code
not applicable

SECTION 15: REGULATORY INFORMATION

15.1 Safety, health and environmental regulations/legislation specific for the substance or mixture

GHS-Labelling

Hazard pictogram

Signal word : Warning

Hazard Statements :
H361fd Suspected of damaging fertility. Suspected of damaging the unborn child.
H373 May cause damage to organs (blood, thymus) through prolonged or repeated exposure.
H411 Toxic to aquatic life with long lasting effects

Precautions Statements :
P102 Keep out of reach of children.
P201 Obtain special instructions before use.
P260 Do not breathe dust/fume/gas/mist/vapours/spray.
P280 Wear protective gloves/protective clothing.
P308/313 IF exposed or concerned: Get medical advice/attention.
P301 Collect spillage
P501 Dispose of contents/container to a licensed hazardous-waste disposal contractor or collection site except for empty clean containers which can be disposed of as non-hazardous waste.

Supplemental Information :
EUH208 Contains cymoxanil. May produce an allergic reaction.
EUH401 To avoid risks to human health and the environment comply with the instructions for use.

Hazardous components which must be listed on the label:
- cymoxanil

15.2 Chemical Safety Assessment
A Chemical Safety Assessment is not required for this substance.

SECTION 16: OTHER INFORMATION

Further information
Approval number, MAPP 17217.
Use plant protection products safely. Always read the label and product information before use.
Based upon SDS release dated 27.02.2015, version 8 with local amendment.

Full text of H-Statements referred to under sections 2 and 3.
H302 Harmful if swallowed
H317 May cause an allergic skin reaction
<table>
<thead>
<tr>
<th>Code</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>H318</td>
<td>Causes serious eye damage</td>
</tr>
<tr>
<td>H319</td>
<td>Causes serious eye irritation</td>
</tr>
<tr>
<td>H361fd</td>
<td>Suspected of damaging fertility. Suspected of damaging the unborn child.</td>
</tr>
<tr>
<td>H373</td>
<td>May cause damage to organs (blood, thymus) through prolonged or repeated</td>
</tr>
<tr>
<td></td>
<td>exposure.</td>
</tr>
<tr>
<td>H400</td>
<td>Very toxic to aquatic life</td>
</tr>
<tr>
<td>H410</td>
<td>Very toxic to aquatic life with long lasting effects</td>
</tr>
<tr>
<td>H411</td>
<td>Toxic to aquatic life with long lasting effects</td>
</tr>
</tbody>
</table>

The information provided in this Safety Data Sheet is correct to the best of our knowledge, information and belief at the date of its publication. The information given is designed only as guidance for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered a warranty or quality specification. The information relates only to the specific material designated and may not be valid for such material used in combination with any other materials or in any process, unless specified in the text.

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