## 1. Product and Company Identification

<table>
<thead>
<tr>
<th>Product Name:</th>
<th>ASA 175BAY</th>
</tr>
</thead>
<tbody>
<tr>
<td>Material Number:</td>
<td>53991</td>
</tr>
<tr>
<td>Chemical Family:</td>
<td>Alkenyl Succinic Anhydride</td>
</tr>
</tbody>
</table>

## 2. Hazards Identification

### Emergency Overview

**WARNING!**
- **Color:** Clear, Light, Orange, Brown
- **Form:** liquid
- **Odor:** Not Established.

May cause eye, skin, and respiratory tract irritation. May cause allergic skin reaction.

### Potential Health Effects

**Primary Routes of Entry:** Skin Contact, Eye Contact, Ingestion, Inhalation

**Medical Conditions Aggravated by Exposure:** Eyes, Skin disorders, Respiratory disorders

### HUMAN EFFECTS AND SYMPTOMS OF OVEREXPOSURE

#### Acute Inhalation
For Component: **Alkenyl Succinic Anhydride**
May cause respiratory tract irritation with symptoms of coughing, sore throat and runny nose.

#### Acute Skin
For Component: **Alkenyl Succinic Anhydride**
May cause irritation with symptoms of reddening and itching. May cause allergic skin reaction with symptoms of reddening, itching, swelling, and rash.

#### Acute Eye
For Component: **Alkenyl Succinic Anhydride**
May cause irritation with symptoms of reddening, tearing and stinging.

#### Ingestion
**Acute Ingestion**
For Product: **ASA 175BAY**
Expected to be essentially non-toxic.

For Component: **Alkenyl Succinic Anhydride**
May cause irritation; Symptoms may include abdominal pain, nausea, vomiting, and diarrhea.
General Effects of Exposure
Chronic Effects of Exposure
For Product: ASA 175BAY
No applicable information was found concerning any adverse chronic health effects from overexposure to this product.

Carcinogenicity:
No Carcinogenic substances as defined by IARC, NTP and/or OSHA

3. Composition/Information on Ingredients

Hazardous Components

<table>
<thead>
<tr>
<th>Weight %</th>
<th>Components</th>
<th>CAS-No.</th>
</tr>
</thead>
<tbody>
<tr>
<td>99 - 100%</td>
<td>Alkenyl Succinic Anhydride</td>
<td></td>
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</table>

4. First Aid Measures

Eye Contact
In case of contact, immediately flush eyes with plenty of water for at least 15 minutes. Use fingers to ensure that eyelids are separated and that the eye is being irrigated. Call a physician immediately.

Skin Contact
In case of skin contact, wash affected areas with soap and water. Immediately remove contaminated clothing and shoes. Get medical attention. Wash clothing and shoes before reuse.

Inhalation
If inhaled, remove to fresh air. If breathing is difficult, give oxygen. If not breathing, give artificial respiration. Get medical attention.

Ingestion
If ingested, do not induce vomiting unless directed to do so by medical personnel. Get medical attention.

5. Fire-Fighting Measures

Suitable Extinguishing Media: All extinguishing media are suitable.

Special Fire Fighting Procedures
Firefighters should be equipped with self-contained breathing apparatus to protect against potentially toxic and irritating fumes. Use cold water spray to cool fire-exposed containers to minimize risk of rupture.

Unusual Fire/Explosion Hazards
Toxic and irritating gases/fumes may be given off during burning or thermal decomposition.
6. Accidental release measures

Spill and Leak Procedures
Cleanup personnel must use appropriate personal protective equipment. Cover spill with inert material (e.g., dry sand or earth) and collect for proper disposal.

7. Handling and Storage

Storage Temperature:
- minimum: -20 °C (-4 °F)
- maximum: 29.44 °C (85 °F)

Storage Period
Not Established

Handling/Storage Precautions
Avoid breathing dust, vapor, or mist. Avoid contact with skin or clothing. Avoid contact with eyes. Use only with adequate ventilation/personal protection. Wash thoroughly after handling. Keep container closed when not in use. Protect from freezing. Stir before using.

8. Exposure Controls / Personal Protection

Country specific exposure limits have not been established or are not applicable

Industrial Hygiene/Ventilation Measures
General dilution and local exhaust as necessary to control airborne vapors, mists, dusts and thermal decomposition products below appropriate airborne concentration standards/guidelines.

Respiratory Protection
In case of insufficient ventilation wear suitable respiratory equipment.

Hand Protection
Permeation resistant gloves.

Eye Protection
goggles.

Skin and body protection
Permeation resistant clothing and foot protection.

Additional Protective Measures
Employees should wash their hands and face before eating, drinking, or using tobacco products. Educate and train employees in the safe use and handling of this product. Emergency showers and eye wash stations should be available.

9. Physical and chemical properties

Form: liquid
Color: Clear, Light, Orange, Brown
Odor: Not Established  

pH: Not Established  

Freezing Point: -20 °C (-4 °F)  

Boiling Point/Range: 250 °C (482 °F)  

Flash Point: 203.89 °C (399 °F) (Pensky-Martens Closed Cup (ASTM D-93))  

Vapor Pressure: < 1 mmHg @ 20 °C (68 °F)  

Specific Gravity: 0.94 - 0.98  

Solubility in Water: Insoluble  

Viscosity, Dynamic: not applicable  

10. Stability and Reactivity

Hazardous Reactions
Hazardous polymerization does not occur.

Stability
Stable

Materials to avoid
Oxidizing agents, Reducing agents

Hazardous decomposition products
By Fire: Carbon oxides, sulfur oxides, other potentially toxic fumes

11. Toxicological Information

Toxicity Data for ASA 175BAY

Toxicity Note
Toxicity data is based on a similar product.

Acute Oral Toxicity
LD50: > 5,000 mg/kg (Rat)

Acute dermal toxicity
LD50: > 5,000 mg/kg (rabbit)

12. Ecological Information

No information available.

13. Disposal considerations

Waste Disposal Method
Waste disposal should be in accordance with existing federal, state and local environmental control laws.

Empty Container Precautions
Recondition or dispose of empty container in accordance with governmental regulations. Do not reuse empty container without proper cleaning. Label precautions also apply to this container when empty.
14. Transportation information

Land transport (DOT)
Non-Regulated

Sea transport (IMDG)
Non-Regulated

Air transport (ICAO/IATA)
Non-Regulated

15. Regulatory Information

United States Federal Regulations

OSHA Hazcom Standard Hazardous
Rating:

US. Toxic Substances Control Listed on the TSCA Inventory.
Act:

US. EPA CERCLA Hazardous Substances (40 CFR 302):
Components
None

SARA Section 311/312 Hazard Categories:
Acute Health Hazard

US. EPA Emergency Planning and Community Right-To-Know Act (EPCRA) SARA Title III Section 302 Extremely Hazardous Substance (40 CFR 355, Appendix A):
Components
None

US. EPA Emergency Planning and Community Right-To-Know Act (EPCRA) SARA Title III Section 313 Toxic Chemicals (40 CFR 372.65) - Supplier Notification Required:
Components
None

If discarded in its purchased form, this product would not be a hazardous waste either by listing or by characteristic. However, under RCRA, it is the responsibility of the product user to determine at the time of disposal, whether a material containing the product or derived from the product should be classified as a hazardous waste. (40 CFR 261.20-24)

State Right-To-Know Information
The following chemicals are specifically listed by individual states; other product specific health and safety data in other sections of the MSDS may also be applicable for state requirements. For details on your regulatory requirements you should contact the appropriate agency in your state.

**Massachusetts, New Jersey or Pennsylvania Right to Know Substance Lists:**

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**California Prop. 65:**

To the best of our knowledge, this product does not contain any of the listed chemicals, which the state of California has found to cause cancer, birth defects or other reproductive harm.

### 16. Other Information

<table>
<thead>
<tr>
<th><strong>NFPA 704M Rating</strong></th>
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<tr>
<td><strong>Health</strong></td>
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<tr>
<td><strong>Flammability</strong></td>
<td>1</td>
</tr>
<tr>
<td><strong>Reactivity</strong></td>
<td>0</td>
</tr>
<tr>
<td><strong>Other</strong></td>
<td></td>
</tr>
<tr>
<td>0=Insignificant 1=Slight 2=Moderate 3=High 4=Extreme</td>
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<td><strong>Physical Hazard</strong></td>
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<td>0=Minimal 1=Slight 2=Moderate 3=Serious 4=Severe</td>
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</tr>
<tr>
<td>* = Chronic Health Hazard</td>
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MSDS date - March 10, 2006
Reason for change - new company name
Contact: HS&E Group

The information and recommendations contained in this Material Safety Data Sheet have been compiled from sources believed to be reliable and to represent the best opinion on the subject as of the date on this sheet. However, no warranty, guarantee or representation, express or implied, is made by Kemira as to the correctness or sufficiency of this information or to the results to be obtained from the use thereof.