

# *Material Safety Data Sheet*

## **A-C<sup>®</sup> Ethylene-Vinyl Acetate Copolymers**

### **1. CHEMICAL PRODUCT AND COMPANY IDENTIFICATION**

**PRODUCT NAME:** A-C<sup>®</sup> Ethylene-Vinyl Acetate Copolymers

**OTHER/GENERIC NAMES:** A-C<sup>®</sup> 400, 400A, 405(S), 405(M), 405(T), 415, 430, 440

**PRODUCT USE:** Multiple uses in many applications.

**MANUFACTURER:** Honeywell International Inc.  
101 Columbia Road  
P.O. Box 1139  
Morristown, New Jersey 07962-1139

**FOR MORE INFORMATION CALL:**  
(Monday-Friday, 8:00am-5:00pm)  
1-800-707-4555

**IN CASE OF EMERGENCY CALL:**  
(24 Hours/Day, 7 Days/Week)  
1-800-498-5701

**FOR TRANSPORTATION EMERGENCIES:**  
1-800-424-9300 (CHEMTREC – Domestic)  
1-613-996-6666 (CANUTEC – Canada)

### **2. COMPOSITION/INFORMATION ON INGREDIENTS**

<b>INGREDIENT NAME</b>	<b>CAS NUMBER</b>	<b>WEIGHT %</b>
Ethylene-Vinyl Acetate Copolymer	24937-78-8	~100
Vinyl Acetate	108-05-4	Trace

Trace impurities and additional material names not listed above may also appear in Section 15 towards the end of the MSDS. These materials may be listed for local "Right-To-Know" compliance and for other reasons.

While this material is not considered as hazardous under OSHA regulations, the MSDS contains valuable information critical to the safe handling and proper use of the product. This MSDS should be retained and available for employees and other users of this product.

### **3. HAZARDS IDENTIFICATION**

**EMERGENCY OVERVIEW:** A-C 430 is grease-like. All other products are white waxy solids in pellet, prill or powder form. Dust from this product may form an explosive mixture in air. Not considered hazardous under normal conditions of use. Can release irritating and/or toxic fumes and vapors if involved in a fire.

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**POTENTIAL HEALTH HAZARDS**

**SKIN:** May cause mechanical irritation if the product comes into contact with the skin. Contact with molten material may cause thermal burns.

**EYES:** May cause mechanical irritation if product comes into contact with the eye.

**INHALATION:** Not a probable route of exposure under normal conditions of use. Elevated processing temperatures may generate fumes and vapors which may cause irritation to the nose and throat.

**INGESTION:** Not a probable route of exposure. Not considered hazardous.

**DELAYED EFFECTS:** None known.

**Ingredients found on one of the OSHA designated carcinogen lists are listed below.**

<b><u>INGREDIENT NAME</u></b>	<b><u>NTP STATUS</u></b>	<b><u>IARC STATUS</u></b>	<b><u>OSHA LIST</u></b>
Vinyl Acetate	None.	2B	None.

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**4. FIRST AID MEASURES**

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**SKIN:** If in contact with solid material, wash with soap and water. If in contact with molten material, submerge injured area in cold water. Do not attempt to remove material adhering to the skin. Get medical attention if irritation develops or persists.

**EYES:** Flush eyes with plenty of water. Get medical attention if irritation develops or persists.

**INHALATION:** If exposed to vapors at elevated processing conditions, remove to fresh air. Get medical attention if irritation develops or persists.

**INGESTION:** Not a probable route of exposure.

**ADVICE TO PHYSICIAN:** No specific advice, treat symptomatically.

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**5. FIRE FIGHTING MEASURES**

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**FLAMMABLE PROPERTIES**

**FLASH POINT:** >515 °F (>270 °C)

**FLASH POINT METHOD:** Open cup.

**AUTOIGNITION TEMPERATURE:** Not determined.

**UPPER FLAME LIMIT (volume % in air):** Not applicable.

**LOWER FLAME LIMIT (volume % in air):** Not applicable.

**FLAME PROPAGATION RATE (solids):** Not determined.

**OSHA FLAMMABILITY CLASS:** Combustible solid.

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#### EXTINGUISHING MEDIA:

Use water fog, dry chemical, carbon dioxide or foam as appropriate for materials in surrounding fire. Avoid using direct streams of water on molten burning material as it may scatter and spread the fire.

#### UNUSUAL FIRE AND EXPLOSION HAZARDS:

Melts in proximity to fires resulting in slippery floors and stairs. Static charges on powders or powders in liquids may ignite combustible atmospheres. Airborne dusts of this product in an enclosed space and in the presence of an ignition source may constitute an explosion hazard. See NFPA Bulletin 654, "Standard for the Prevention of Fire and Dust Explosions from the Manufacturing, Processing, and Handling of Combustible Particulate Solids," for safe handling procedures.

#### SPECIAL FIRE FIGHTING PRECAUTIONS/INSTRUCTIONS:

As in any fire, wear NIOSH/MSHA approved positive pressure self-contained breathing apparatus and full protective clothing. Watch footing on floors and stairs because of possible spreading of molten material.

## 6. ACCIDENTAL RELEASE MEASURES

**IN CASE OF SPILL OR OTHER RELEASE:** (Always wear recommended personal protective equipment.) Avoid generating dust. Keep away from heat or flame. Collect material and place in a container for re-use or disposal. If material is molten, allow to cool. Use caution, as material may still be hot after solidification.

**Spills and releases may have to be reported to Federal and/or local authorities. See Section 15 regarding reporting requirements.**

## 7. HANDLING AND STORAGE

**NORMAL HANDLING:** (Always wear recommended personal protective equipment.) Under conditions of storage, vapors may collect in the headspace of the containers causing a sometimes pungent odor during unpacking of these products. Avoid breathing vapors when opening containers. Avoid spillage which can cause very slippery conditions on floors. Follow standard personal hygiene and housekeeping practices for an industrial environment.

#### STORAGE RECOMMENDATIONS:

To maintain product quality, store in a cool, dry area, away from direct heat or sunlight. Do not store near strong oxidizing agents and amines.

## 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

#### ENGINEERING CONTROLS:

General room ventilation is adequate for storage and ordinary handling. Use local exhaust at points of fume generation or if dusty conditions prevail to maintain exposure below the PEL/TLV exposure limits.

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#### **PERSONAL PROTECTIVE EQUIPMENT**

##### **SKIN PROTECTION:**

Not normally required. Use heat-protective clothing as needed for handling hot material.

##### **EYE PROTECTION:**

Wear safety glasses or goggles that conform to ANSI Z87.1 under normal conditions. Wear safety goggles and/or a full-face shield if there is potential for contact with molten material.

##### **RESPIRATORY PROTECTION:**

Not required for properly ventilated areas. If there is potential for inhalation of dust or vapor, wear a NIOSH approved respirator.

The respirator must be selected based on contamination levels and use conditions found in the workplace. Use conditions must not exceed the working limits of the respirator. The respirator must be used in accordance with the OSHA respiratory protection standard (29 CFR 1910.134).

##### **ADDITIONAL RECOMMENDATIONS:**

Provide safety showers and eyewash stations in close proximity to the work area.

#### **EXPOSURE GUIDELINES**

<b><u>INGREDIENT NAME</u></b>	<b><u>ACGIH TLV</u></b>	<b><u>OSHA PEL</u></b>	<b><u>OTHER LIMIT</u></b>
Particulates (insoluble or poorly soluble), Not Otherwise Specified	TWA = 10 mg/m <sup>3</sup> (8-hr day, inhalable fraction), TWA = 3 mg/m <sup>3</sup> (8-hr day, respirable fraction)	TWA = 15 mg/m <sup>3</sup> (8-hr day, total dust), TWA = 5 mg/m <sup>3</sup> (8-hr day, respirable fraction)	None.

\* = Limit established by Honeywell for internal use.

\*\* = Workplace Environmental Exposure Level (AIHA).

\*\*\* = Biological Exposure Index (ACGIH).

PEL values represent limits established by the 1989 Air Contaminants Rule (29 CFR 1910.1000, Subpart Z, Table Z-1-A) which was subsequently revoked on June 30, 1993. Several states continue to enforce Table Z-1-A limits.

##### **OTHER EXPOSURE LIMITS FOR POTENTIAL DECOMPOSITION PRODUCTS:**

<b><u>NAME</u></b>	<b><u>ACGIH TLV</u></b>	<b><u>OSHA PEL</u></b>	<b><u>OTHER LIMIT</u></b>
Vinyl Acetate	TWA = 10 ppm (8-hr day), STEL = 15 ppm (15-min exposure)	10 ppm, 30 mg/m <sup>3</sup> (8-hr day), STEL = 20 ppm, 60 mg/m <sup>3</sup>	None.

Traces of residual vinyl acetate monomer may be present in the product at concentrations up to 300 ppm. Under normal conditions of handling and use, this does not constitute a hazardous exposure potential. However, unusual processing conditions may result in product degradation and elevated acrylic acid exposures.

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**9. PHYSICAL AND CHEMICAL PROPERTIES**

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**APPEARANCE:** A-C 430 is grease like, other grades are white pellets, prills or powders.

**PHYSICAL STATE:** Solid.

**ODOR:** Characteristic waxy odor.

**SPECIFIC GRAVITY (water = 1.0):** 0.92 – 0.93

**SOLUBILITY IN WATER (weight %):** Negligible.

**pH:** Not applicable.

**BOILING POINT:** Not determined.

**MELTING POINT:** 167 – 216 °F (72 – 102 °C)

**VAPOR PRESSURE:** Not applicable.

**VAPOR DENSITY (air = 1.0):** Not applicable.

**EVAPORATION RATE:** Not determined.

**COMPARED TO:** Not applicable.

**% VOLATILES:** Not determined.

**FLASH POINT:** >515 °F (>270 °C)

(Flash point method and additional flammability data are found in Section 5.)

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**10. STABILITY AND REACTIVITY**

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**NORMALLY STABLE? (CONDITIONS TO AVOID)**

Normally stable. Avoid exposure to open flame or temperatures exceeding recommended processing conditions. Honeywell should be contacted if questions arise concerning specific processing conditions.

**INCOMPATIBILITIES:**

Strong oxidizing agents.

**HAZARDOUS DECOMPOSITION PRODUCTS:**

Thermal decomposition products may include carbon monoxide, carbon dioxide and combustion by-products (oxidized and non-oxidized hydrocarbons).

**HAZARDOUS POLYMERIZATION:**

Will not occur.

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**11. TOXICOLOGICAL INFORMATION**

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**IMMEDIATE (ACUTE) EFFECTS:**

Oral, rat LD<sub>50</sub>: >2,500 mg/kg

**DELAYED (SUBCHRONIC AND CHRONIC) EFFECTS:**

No data available.

**OTHER DATA:**

None.

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#### 12. ECOLOGICAL INFORMATION

No data available. Material is considered inert and not expected to be biodegradable.

#### 13. DISPOSAL CONSIDERATIONS

##### RCRA

**Is the unused product a RCRA hazardous waste if discarded?** No.

**If yes, the RCRA ID number is:** Not applicable.

##### **OTHER DISPOSAL CONSIDERATIONS:**

Dispose of in compliance with Federal, state and local government regulations. Disposal options include: recycling, incineration and landfilling.

The information offered here is for the product as shipped. Use and/or alterations to the product such as mixing with other materials may significantly change the characteristics of the material and alter the RCRA classification and the proper disposal method.

#### 14. TRANSPORT INFORMATION

**US DOT HAZARD CLASS:** Not regulated.

**US DOT ID NUMBER:** Not applicable.

For additional information on shipping regulations affecting this material, contact the information number found on Section 1.

#### 15. REGULATORY INFORMATION

##### TOXIC SUBSTANCES CONTROL ACT (TSCA)

**TSCA INVENTORY STATUS:** All components are listed on the TSCA Inventory.

**OTHER TSCA ISSUES:** None.

##### SARA TITLE III/CERCLA

"Reportable Quantities" (RQs) and/or "Threshold Planning Quantities" (TPQs) exist for the following ingredients.

##### INGREDIENT NAME

Vinyl Acetate

##### SARA/CERCLA RQ (lb)

5,000

##### SARA EHS TPQ (lb)

None.

**Spills resulting in the loss of any ingredient at or above its RQ requires immediate notification to the National Response Center (1-800-424-8802) and to your Local Emergency Planning Committee.**

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**SECTION 311 HAZARD CLASS:** None.

The following ingredients are SARA 313 "Toxic Chemicals". CAS numbers and weight percents are found in Section 2.

**INGREDIENT NAME**

Vinyl Acetate

**COMMENT**

Less than the de-minimis level of 0.1%.

**STATE RIGHT-TO-KNOW**

In addition to the ingredients found in Section 2, the following are listed for state right-to-know purposes.

**INGREDIENT NAME**

**WEIGHT %   COMMENT**

No ingredients listed in this section.

**ADDITIONAL REGULATORY INFORMATION**

**FOOD AND DRUG ADMINISTRATION (USA):**

See Honeywell Technical Data Bulletin GEN-002 for FDA-related information.

Honeywell does not promote or support the use of its products in applications which are intended for permanent implantation in the human body or in permanent contact with internal bodily tissues or fluids.

**WHMIS CLASSIFICATION (CANADA):**

Not a controlled product.

**FOREIGN INVENTORY STATUS:**

All components of this product are listed on the following inventories:

- Australian
- Canadian (DSL)
- Chinese
- European (EINECS)
- Japanese (ENCS)
- Korean
- Philippine (PICCS)

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**16. OTHER INFORMATION**

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**CURRENT ISSUE DATE:** April, 2005

**PREVIOUS ISSUE DATE:** February, 2005

**CHANGES TO MSDS FROM PREVIOUS ISSUE DATE ARE DUE TO THE FOLLOWING:**

Addition of A-C® 440 to product list and change in emergency contact information (Section 1).

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#### OTHER INFORMATION:

HMIS® III ratings for the product are as follows:

Health (H)	0
Flammability (F)	1
Physical Hazards (PH)	0

HMIS® III ratings are based on a 0-4 rating scale, with 0 representing minimal hazards or risks, and 4 representing significant hazards or risks. Recipients of this MSDS should not employ any recommended HMIS® III ratings in the absence of a fully implemented HMIS® III hazard communication program.

The above HMIS® III ratings are from the HMIS® Third Edition. There have been significant changes made to the system since the second edition. "Physical Hazards" or "PH" replaces the former "Reactivity" or "R" rating. For a more detailed explanation of the system and the ratings, please refer to the HMIS® Implementation Manual, Third Edition.