

# Safety Data Sheet

## Armstrong S240 Part A

Revision Date: May 22, 2015

Version: 1

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### 1. Identification

**Product identifier used on the label**

**Armstrong S240** Part A

**Recommended use of the chemical and restriction on use:** 2-part system recommended for the installation of vinyl and rubber sheet goods, luxury vinyl tiles, and studded rubber and vinyl tiles on all clean and dry sub-floors, above, on or below grade.

**Details of the supplier of the safety data sheet**

Company:

Armstrong World Ind., Inc

2500 Columbia Ave

Lancaster, PA 17603

Telephone number: (800) 233-3823

**Emergency Telephone Number:** 1-800-255-3924

**Other Means of Identification**

Chemical Family: Epoxy

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### 2. Hazards identification

**According to regulation 2012 OSHA Hazard Communication Standard : 29 CFR Part 1910.1200**

**Classification of the Product:**

Irritant

**Label Elements**

Respiratory tract hazard

Eye and Skin Irritant

May cause allergic reaction to skin

May cause dermatitis

**According to Regulation 1994 OSHA Hazard Communication Standard : 29 CFR Part 1910.1200**

**Emergency Overview:**

Use proper ventilation. Do not mix with Part B until ready for use. Produces exothermic reaction. Do not mix in large quantities.

**Caution:**

May cause skin irritation if not removed after skin contact.

Use with Use with local exhaust ventilation.

Use protective equipment for eyes, skin protection.

**3. Composition / Information on Ingredients**

**According to Regulation 1994 OSHA Hazard Communication Standard : 29 CFR Part 1910.1200**

This product does not contain any components classified as hazardous under the referenced regulation.

**According to Regulation 1994 OSHA Hazard Communication Standard : 29 CFR Part 1910.1200**

<u>CAS Number</u>	<u>Content</u>	<u>Chemical Name</u>
25068-38-6	45 - 55	Epoxy resin
1317-65-3	30 - 40	Calcium Carbonate
41638135	1 - 10	Polymer of epichlorohydrinpolyglycol

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**4. First Aid Measures**

**Description of First Aid measures**

**First-aid measures general:**

Remove material from contact immediately and apply recommended first-aid procedure.

<b>First-aid measures after inhalation:</b>	Remove individual to fresh air. Administer oxygen if necessary. Seek medical attention.
<b>First-aid measures after skin contact:</b>	Remove from skin and wash with mild soap and water. If irritation persists, seek medical attention.
<b>First-aid measures after eye contact:</b>	Open eyelids and flush with running water for at least 15-20 minutes. If irritation persists, seek medical attention.
<b>First-aid measures after ingestion:</b>	Seek medical attention immediately. Do not induce vomiting. This might cause chemical pneumonitis.

**Most important symptoms and effects, both acute and delayed**

Acute: May cause headache, skin rash, and central nervous system depression.

Delayed/Chronic: May cause narcosis, unconsciousness from inhalation. May cause dermatitis from chronic skin contact.

**Indication of any immediate medical attention and special treatment needed**

Note to physician

Treatment: Symptomatic treatment

**5. Fire-Fighting Measures**

**Extinguishing Media**

Carbon dioxide, foam, dry chemicals

**Special hazards arising from the substance or mixture**

Do not expose to excessive heat, open flames or sparks. Turn off all pilot lights.

Advice for fire-fighters

Water may spread burning liquid. Avoid direct stream of water. Use water spray only to cool containers exposed to flames. Do not enter closed or confined work area without proper protective equipment. Use self-contained breathing apparatus and turn out gear. If leak or spill has not ignited, use water fog to disperse vapors.

**Further Information:**

Dispose fire debris and contaminated clothing in accordance with official regulations.

**6. Accidental release measures**

Further accidental release measures:

Fire and slippage hazard. Eliminate sources of ignition including electrical switches and motors, pilot lights, etc. Evacuate area and report incident immediately.

**Personal precautions, protective equipment and emergency procedures**

Use protective equipment when handling spills. Avoid contact with skin, eyes, inhalation or vapors.

**Environmental Precautions**

Dike and contain the area. Block all natural waterways entry during spill.

**Methods and material for containment and cleaning up**

Use absorbents (clay, sand) to remove large volume of material. Scrape residual amount and place in closed DOT approved containers for disposal.

**7. Handling and Storage**

**Precautions for Safe Handling**

Always use protective equipment when handling material to avoid direct contact. Keep out of reach of children.

**Conditions for safe storage, including any incompatibilities**

Product is flammable. Keep away from sources of ignition. Protect against physical damage. Store in a cool, dry place.

**8. Exposure Control/ Personal Protection**

**Advice on system design:**

Maintain proper ventilation. Keep away from sources of ignition. Avoid skin and eye contact. Use local exhaust. Do not use closed air circulating system. Open doors and windows if necessary.

**Personal protective equipment:**

**Respiratory protection:**

NIOSH respirator

**Skin protection:**

Chemical resistant gloves

**Eye protection:**

Safety glasses, goggles, or face shield if needed

**General safety and hygiene safety measures:**

Always wash hands after use. Remove contaminated clothing to avoid constant contact with skin. Launder contaminate clothing before re-use.

**9. Physical and Chemical Properties**

<b>Form:</b>	Semi solid paste
<b>Odor:</b>	Epoxy
<b>Odor threshold:</b>	No Data
<b>Color:</b>	Off white
<b>pH value:</b>	Not applicable
<b>Melting point:</b>	Not applicable
<b>Boiling point:</b>	> 392 degree F
<b>Flash point:</b>	200 – 437 degrees F
<b>Flammability:</b>	Material will burn
<b>Lower explosion:</b>	Not applicable
<b>Upper explosion:</b>	Not applicable
<b>Vapor pressure:</b>	Not determined
<b>Density:</b>	11.66 – 13.33 lbs. per gallon
<b>Relative density:</b>	1.4 – 1.6 grams / cm <sup>3</sup>
<b>Vapor density:</b>	Not applicable
<b>Partition Coefficient n-octanol/water (log Pow):</b>	No data
<b>Self-ignition temperature:</b>	Not determined
<b>Viscosity, dynamic:</b>	50,000 – 75,000 cps
<b>Solubility in water:</b>	Not soluble
<b>Miscibility in water:</b>	Not miscible
<b>Evaporation rate:</b>	Not determined
<b>Other information:</b>	

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## 10. Stability and Reactivity

**Reactivity:**

Stable

**Chemical stability:**

None known

**Possibility of hazardous reactions:**

Stable

**Conditions to avoid:**

Strong acids and bases in bulk at elevated temperatures

**Incompatible materials:**

Strong oxidizing agents

**Hazardous decomposition products:**

Oxides of carbon, water and organic compounds of unknown structures. Do not breathe smoke or fumes.

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**11. Toxicological Information**

**Primary routes of exposure:**

Respiratory, eyes, skin. Ingestion is not likely but might cause gastric disturbances.

**Acute Toxicity / Effects**

Acute toxicity: (compiled based on the data supplied by supplier)

May cause headache, skin rash, central nervous system depression.

Acute oral effects: > 2000 mg / kg, rat+

Acute dermal toxicity: (LD50): > 2000 mg / kg, rabbit

Sensitization: Moderate sensitizer

Skin: Moderate irritant

Eyes: Slight irritant

Reproduction: No effects when tested on rats

Teratogenicity: No adverse effects when tested on rabbits

Mutagenicity: No mutagenic effects in vivo test. In vitro test showed mutagenic effects.

Sub Chronic: No apparent system effect when tested on rats for 13 weeks except decreased body weight and gain weight.

**Chronic Toxicity Effects**

<u>Repeated dose toxicity:</u>	May cause narcosis, unconsciousness from inhalation. May cause dermatitis from chronic skin contact.
<u>Genetic toxicity:</u>	No data available
<u>Carcinogenicity:</u>	No data available
<u>Reproductive toxicity:</u>	No data available
<u>Teratogenicity:</u>	No data available
Other Information	

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## 12. Ecological Information

N/A

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## 13. Disposal Considerations

Abide by all State, federal and local regulations

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## 14. Transport Information

Proper Shipping name: None  
D.O.T. Hazard Classification: none  
D.O.T. Identification no.: none  
D.O.T Packaging Group: none  
D.O.T Labels required: none  
D.O.T. Placards required (CFR 172.504) : None  
Bill of Lading Description: **Adhesive, cement, NOI**

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## 15. Regulatory Information:

### Federal Regulations

#### **Registration status:**

TSCA: Chemicals contained in the product are either listed or exempt in the U.S. EPA TSCA inventory list.

SARA Title III, Section 312 Hazard Class: None

EPA SARA Title III Section 313: None

#### State regulations:

**16. Other Information**

**SDS prepared on:**

May, 22, 2015

It is believed the data set forth herein are accurate as of the date hereof. We make no warranty with respect thereto and expressly disclaim all liability for reliance thereon. Such data are offered solely for your consideration, investigation and verification.

# Safety Data Sheet

## Armstrong S240 Part B

Revision Date: May 22, 2015

Version: 1

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### 1. Identification

#### Product identifier used on the label

**Armstrong S240 Part B**

**Recommended use of the chemical and restriction on use:** 2-part system recommended for the installation of vinyl and rubber sheet goods, luxury vinyl tiles, and studded rubber and vinyl tiles on all clean and dry sub-floors, above, on or below grade.

#### Details of the supplier of the safety data sheet

##### Company:

Armstrong World Ind., Inc

2500 Columbia Ave

Lancaster, PA 17603

Telephone number: (800) 233-3823

**Emergency Telephone Number:** 1-800-255-3924

#### Other Means of Identification

Chemical Family: Amines

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### 2. Hazards identification

**According to regulation 2012 OSHA Hazard Communication Standard : 29 CFR Part 1910.1200**

#### Classification of the Product:

Irritant, Sensitizer, Kidney Toxin

#### Label Elements

Severe Eye irritant

Skin Irritant

Harmful in contact with skin

May cause dermatitis

Kidney Toxin

Labeling of special preparations (GHS):

Irritant

**According to Regulation 1994 OSHA Hazard Communication Standard : 29 CFR Part 1910.1200**

**Emergency Overview**

Use proper ventilation. Do not mix with Part A until ready for use. Produces exothermic reaction. Do not mix in large quantities.

Caution:

Will cause skin irritation if not removed after skin contact.

Use with Use with local exhaust ventilation.

Use protective equipment for eyes, skin protection.

**3. Composition / Information on Ingredients**

**According to Regulation 1994 OSHA Hazard Communication Standard : 29 CFR Part 1910.1200**

This product does not contain any components classified as hazardous under the referenced regulation.

**According to Regulation 1994 OSHA Hazard Communication Standard : 29 CFR Part 1910.1200**

<u>CAS Number</u>	<u>Content</u>	<u>Chemical Name</u>
Mixture	30 - 40	Modified Polyamide
1317-85-3	35 - 45	Calcium Carbonate

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**4. First Aid Measures**

**Description of First Aid measures**

**First-aid measures general:**

Remove material from contact immediately and apply recommended first-aid procedure.

**First-aid measures after inhalation:**

Remove individual to fresh air. Administer oxygen if necessary. Seek medical attention.

**First-aid measures after skin contact:**

Remove from skin and wash with mild soap and water. If irritation persists, seek medical attention.

**First-aid measures after eye contact:**

Open eyelids and flush with running water for at least 15-20 minutes. If irritation persists, seek medical attention.

**First-aid measures after ingestion:**

Seek medical attention immediately. Do not induce vomiting. This might cause chemical pneumonitis.

**Most important symptoms and effects, both acute and delayed**

Acute: May cause headache, skin rash, and central nervous system depression.

Delayed/Chronic: May cause narcosis, unconsciousness from inhalation. May cause dermatitis from chronic skin contact.

**Indication of any immediate medical attention and special treatment needed**

Note to physician

Treatment:

Symptomatic treatment

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**5. Fire-Fighting Measures**

**Extinguishing Media**

Carbon dioxide, foam, dry chemicals, water spray

**Special hazards arising from the substance or mixture**

Do not expose to excessive heat, open flames or sparks. Turn off all pilot lights.

Advice for fire-fighters

Water may spread burning liquid. Avoid direct stream of water. Use water spray only to cool containers exposed to flames. Do not enter closed or confined work area without proper protective equipment. Use self-contained breathing apparatus and turn out gear. If leak or spill has not ignited, use water fog to disperse vapors.

**Further Information:**

Dispose fire debris and contaminated clothing in accordance with official regulations.

**6. Accidental release measures**

Further accidental release measures:

Fire and slippage hazard. Eliminate sources of ignition including electrical switches and motors, pilot lights, etc. Evacuate area and report incident immediately. Keep Parts A and B separated.

**Personal precautions, protective equipment and emergency procedures**

Use protective equipment when handling spills. Avoid contact with skin, eyes, inhalation or vapors.

### Environmental Precautions

Dike and contain the area. Block all natural waterways entry during spill.

### Methods and material for containment and cleaning up

Use absorbents (clay, sand) to remove large volume of material. Scrape residual amount and place in closed DOT approved containers for disposal.

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## 7. Handling and Storage

### Precautions for Safe Handling

Always use protective equipment when handling material to avoid direct contact. Keep out of reach of children.

### Conditions for safe storage, including any incompatibilities

Product is flammable. Keep away from sources of ignition. Protect against physical damage. Store in a cool, dry place.

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## 8. Exposure Control/ Personal Protection

### Advice on system design:

Maintain proper ventilation. Keep away from sources of ignition. Avoid skin and eye contact. Use local exhaust. Do not use closed air circulating system. Open doors and windows if necessary.

### Personal protective equipment:

#### Respiratory protection:

NIOSH respirator

#### Skin protection:

Chemical resistant gloves

#### Eye protection:

Safety glasses, goggles, or face shield if needed

#### General safety and hygiene safety measures:

Always wash hands after use. Remove contaminated clothing to avoid constant contact with skin. Launder contaminate clothing before re-use.

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## 9. Physical and Chemical Properties

### Form:

Semi solid paste

### Odor:

Amine

### Odor threshold:

No Data

### Color:

Yellow to amber

<b>pH value:</b>	10
<b>Melting point:</b>	Not applicable
<b>Boiling point:</b>	> 400 degrees F
<b>Flash point:</b>	383 degrees F
<b>Flammability:</b>	Material will burn
<b>Lower explosion:</b>	Not applicable
<b>Upper explosion:</b>	Not applicable
<b>Vapor pressure:</b>	Not determined
<b>Density:</b>	11.11 lbs. per gallon
<b>Relative density:</b>	1.33 grams / cm <sup>3</sup>
<b>Vapor density:</b>	Not applicable
<b>Partition Coefficient n-octanol/water (log Pow):</b>	No data
<b>Self-ignition temperature:</b>	Not determined
<b>Viscosity, dynamic:</b>	25,000 – 50,000 cps
<b>Solubility in water:</b>	Not soluble
<b>Miscibility in water:</b>	Not miscible
<b>Evaporation rate:</b>	Not determined

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## 10. Stability and Reactivity

### Reactivity:

Stable

### Chemical stability:

N- nitrous amine (a potent carcinogen) may be formed when material comes in contact with nitrous acid, nitrites or atmosphere with high nitrous oxide concentrations.

### Possibility of hazardous reactions:

Stable

**Conditions to avoid:**

Strong acids and bases in bulk at elevated temperatures

**Incompatible materials:**

Strong oxidizing agents

**Hazardous decomposition products:**

Oxides of carbon, water and organic compounds of unknown structures. Do not breathe smoke or fumes.

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**11. Toxicological Information**

**Primary routes of exposure:**

Respiratory, eyes, skin. Ingestion is not likely but might cause gastric disturbances.

**Acute Toxicity / Effects**

Acute toxicity: (compiled based on the data supplied by supplier) Actual product was not tested.  
May cause headache, skin rash, central nervous system depression.

Acute oral effects: > 2000 mg / kg, rat

Acute dermal toxicity: Components

Phenol (LD50): 630 mg / kg, rabbit

Triethylenetetramine (LD50): 550 mg / kg, rabbit

Inhalation: LC50 (1hr): > 20 mg/l, rat

Sensitization: May cause sensitization upon skin contact. Sensitization has occurred in laboratory animals after repeated exposures.

Skin: irritant

Eyes: irritant

**Chronic Toxicity Effects Actual product was not tested.**

Repeated dose toxicity:

Absorption of phenol solution through skin could damage liver, kidney, spleen and pancreas and edema of the lungs.

Genetic toxicity:

Showed mutagenic activity on repeated short term tests.

<u>Carcinogenicity:</u>	No data available
<u>Reproductive toxicity:</u>	No data available
<u>Teratogenicity:</u>	No data available
<u>Mutagenicity</u>	Showed mutagenic activity on repeated short term tests.

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## 12. Ecological Information

Aquatic Toxicity: No data available

Toxicity to other organisms: No data available

Toxicity to Daphnia (components)

Phenol        EC50 (48hr) : 4.2 – 6.6 mg /l

Bioaccumulation: No data available

Bioaccumulation: Components (phenol) Low bioaccumulation potential

Mobility: No data available

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## 13. Disposal Considerations

Abide by all State, federal and local regulations

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## 14. Transport Information

Proper Shipping name: None

D.O.T. Hazard Classification: None

D.O.T. Identification no.: None

D.O.T Packaging Group: None

D.O.T Labels required: None

D.O.T. Placards required (CFR 172.504) : None

Bill of Lading Description: **Adhesive, cement, NOI**

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## 15. Regulatory Information:

### Federal Regulations

**Registration status:**

TSCA: Chemicals contained in the product are either listed or exempt in the U.S. EPA TSCA inventory list.

SARA Title III, Section 312 Hazard Class: Acute Health Hazard

EPA SARA Title III Section 313: None

**State regulations:**

**CA Prop 65: none**

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**16. Other Information**

**SDS prepared on:**

May, 22, 2015

It is believed the data set forth herein are accurate as of the date hereof. We make no warranty with respect thereto and expressly disclaim all liability for reliance thereon. Such data are offered solely for your consideration, investigation and verification.