Hanwha Building, 86 Chenggyecheon-ro, Jung-gu, Seoul, Korea Tel: +82-2-729-3050, Fax: +82-2-729-1405

MATERIAL SAFETY DATA SHEET

Grade: CCBA 8735BK

Jun. 2011



MATERIAL SAFETY DATA SHEET

1. CHEMICAL PRODUCT AND COMPANY IDENTIFICATION

- 1.1 Product name: CCBA 8735BK
- 1.2 Intended use: Semi-conductive Insulation Shielding Compound for Medium Voltage Power Cables
- 1.3 Manufacturer
 - ▶ Manufacturers name: Hanwha Chemical Corporation
 - ▶ Address: 117 Yeosu Sandan 3-ro, Yeosu-si, Jeollanam-do, Korea (Yeosu plant)
 - ▶ Respondent: Wire And Cable Production Team

o Tel: +82-61-688-1687, Fax: +82-61-688-1677

- 1.4 Supplier
 - ▶ Supplier name: Hanwha Chemical Corporation
 - ▶ Address: Hanwha Building, 86 Chenggyecheon-ro, Jung-gu, Seoul, Korea (PO department)
 - ► Respondent: W&C Sales Team

o Tel: +82-2-729-3050, Fax: +82-2-729-1405

2. HAZARD IDENTIFICATION

2.1 Physical hazards: None

2.2 Health hazards: None

2.3 Fire hazards: None

- 2.4 Environment: The Product is not considered dangerous for the environment.
- 2.5 Read the entire MSDS for a more thorough evaluation of the hazards.

3. COMPOSITION/INFORMATION ON INGREDIENTS

- 3.1 Ethylene Vinyl Acetate copolymer: > 53%
- 3.2 Carbon Black : > 34%
- 3.3 Additives : < 13%

4. FIRST AID PROCEDURES

- 4.1 Inhalation: Move person to fresh air, if effects occur, consult a physician.
- 4.2 Skin contact: This product is not likely to be hazardous by skin contact, but after using wash the skin sufficiently with soap and water. If molten material comes in contact with the skin, immediately cool under ice water or running stream of water. Do not remove solidified product. Removal could result in severe tissue damage. Seek medical attention immediately.
- 4.3 No specific instruction needed.

5. FIRE FIGHTING MEASURES

- 5.1 Flash point : No data available
- 5.2 Extinguishing media: Use water spray or fine spray
- 5.3 Protective Equipment for fire fighting: In case of fire, wear a full face positive pressure self contained breathing apparatus and protective suit.

- 5.4 Special exposure hazards: If thermally decomposed, flammable/toxic released.
- 5.5 Additional information: Dust or fines dispersed in the air can be explosive if subjected to a strong ignition source. Use water spray to cool fire exposed surfaces.

6. ACCIDENTAL RELEASE MEASURES

- 6.1 Personal precautions: For open systems at ambient temperature where contact is likely, wear safety glasses with side shields. Where contact may occur with hot material, wear thermal resistant gloves, arm protection, and a face shield.
- 6.2 Environmental precautions: Prevent the product from spreading into the environment.

7. HANDLING AND STORAGE

- 7.1 Handling: During processing and thermal treatment of the product, small amounts of volatile hydrocarbons may be released. Provide adequate ventilation. Local exhaust ventilation may be necessary. Avoid inhalation of dust and decomposition fumes.
- 7.2 Storage: Store in a cool, dry and well-ventilated area away from incompatible substances. To maintain product quality, protect material from direct sunlight.

8. EXPOSURE CONTROLS/PERSONAL PROTECTION

- 8.1 Respiratory protection: Use an approved air-purifying respirator when vapors are generated at increased temperatures or when dust or mist is present.
- 8.2 Eye/Face protection: When handling this product, the use of safety glasses.
- 8.3 Skin protection: Negligible hazard at ambient temperatures.
- 8.4 Ventilation: Good general ventilation should be sufficient for most conditions.
- 8.5 General safety and hygiene measures: Always wash thoroughly after handling chemicals.

9. PHYSICAL AND CHEMICAL PROPERTIES

9.1 Physical state : Pellets9.2 Appearance : Solid, black

9.3 Odor: Characteristic

9.4 Evaporation rate : Not applicable9.5 Flash Point : No test data available9.6 Melting Temperature : 110~130°C

9.7 Density : $1.1 \sim 1.2 \text{ g/cm}^3$

10. STABILITY AND REACTIVITY

10.1 Chemical stability: Stable at ambient temperature and atmospheric pressure.

10.2 Conditions to avoid: Exposure to elevated temperatures can cause product to decompose.

10.3 Incompatible Materials : None known

10.4 Hazardous polymerization : Not applicable

11. TOXICOLOGICAL INFORMATION

11.1 Epidemiology : No data available

11.2 Tumorigenic data: Human no adequate data.

11.3 Etc: The product is not classified as dangerous preparation according to Directive 1999/45/EC.

However, inhalation of dust may irritate the respiratory tract.

12. ECOLOGICAL INFORMATION

12.1 The product is not considered dangerous for the environment.

13. DISPOSAL CONSIDERATIONS

13.1 Waste disposal : Dispose of waste in an approved incinerator or waste treatment/disposal site, in accordance with all applicable regulations.

14. TRANSPORT INFORMATION

14.1 The information in this section is for reference only and should not take the place of a shipping paper specific to an order. Please note that the proper shipping Name/Hazard Class may vary by packaging, properties and mode of transportation.

▶ US DOT : Not regulated.

► IMDG : Not regulated.

► IATA/ICAO : Not regulated.

► PACKING GROUP : Not regulated.

15. REGULATORY INFORMATION

- 15.1 Regulation under Industrial Safety and Health Law (ISHL) in Korea: Not Regulated.
- 15.2 Regulation under Toxic Chemical Control Law (TCCL) in Korea: Not Regulated.
- 15.3 International Chemical Regulation:
 - ▶ OSHA Hazard Communication Standard : This product is not a "Hazardous Chemical as defined by the OSHA Hazard Communication Standard, 29 CFR 1910.1200.
 - ► Toxic Substances Control (TSCA): All components of this product are on the TSCA Inventory or are exempt from TSCA Inventory requirements under 40 CFR 720.30
 - ▶ Registration, Evaluation and Authorization of Chemicals (REACH): This product in not contain any substance identified on the current provisional SVHC (Substances of very high concern) list.

NOTE: The regulatory information given above only indicates the principal regulations specifically applicable to the product described in the Material Safety Data Sheet. The user's attention is drawn to the possible existence of additional provisions which complete these regulations. Refer to all applicable national, international and local regulations or provisions.

16. OTHER INFORMATION

This information relates to the specific material designated and may not be valid for such material used in combination with any other materials or in any process. This information above is believed to be accurate and represents the best information currently available to us. However, no warranty or guarantee is made to its accuracy, reliability or completeness. It is the user's responsibility to satisfy himself as to the suitability and completeness of such information for his own particular use. We do not accept liability for any loss of damage that may occur from the use of this information nor do we offer warranty against patent infringement.

