

Coal Fillers Inc.

SAFETY DATA SHEET - (SDS)

Section 1 – Identification

Product Identifier: Ground, Low Volatile, Bituminous Coal

Synonyms: Clean Coal, Soft Coal, Washed Coal

Trade Name: Austin Black® 325

Product Chemical Name: Bituminous Coal, a naturally occurring mineral

Chemical Family: Aliphatic and Aromatic Hydrocarbons / Variable

Recommended use: Pigment and filler for rubber and plastic compounds

Manufacturer:

Coal Fillers Incorporated

271 St. Clairs Crossing

Bluefield, VA 24605

Emergency Telephone Number: (276) 322 – 4675

Section 2 – Hazard(s) Identification

Classification:

Ground bituminous coal dust has been evaluated by IARC as a Group 3: There is inadequate evidence in humans for the carcinogenicity of coal dust (IARC Monographs on the Evaluation of Carcinogenic Risks to Humans – Silica, Some Silicates, Coal Dust, and Para-Fibrils, Vol. 68 (1997), Pg. 393).

Ground bituminous coal is a naturally occurring mineral. This dust may contain up to 0.5% of Crystalline Silica (Quartz) (see section 11 for more information).

Hazard Class	Hazard Category	Signal Word	Hazard Statement	Hazard Statement Code	GHS Pictogram	Background Information
Combustible Dust	-	Warning	May cause combustible concentrations in air	-	-	OSHA 29 CFR 1910 1200 – HNOH Hazard Not Otherwise Classified
Specific Target Organ Toxicity following Repeated Exposure	2	Warning	May cause damage to lungs through prolonged and repeated inhalation exposure	H373	Health Hazard	

Section 3 – Composition / Information on Ingredients

Low Volatile Bituminous Coal (naturally occurring mineral)

Components	CAS Numbers	Percent Weight as Received
Moisture		1 % max
Ash	68131-74-8	Maximum 7.5 %
Total Sulfur	7446-09-5 (SO ₂)	Maximum 0.9 %
Fixed Carbon		Approximately 75 %
Volatiles		Maximum 20 %
Silica Quartz	14808-60-7	0.0 – 0.5 %

Section 4 – First-aid Measures

Inhalation: Temporary discomfort to upper respiratory tract may occur due to inhalation of high dust levels well above the 8 hour occupational exposure limit. Long term inhalation of coal dust may lead to pneumoconiosis. Remove to uncontaminated air. If not breathing give artificial respiration. Seek medical attention if symptoms appear.

Skin Contact: Wash contaminated skin with soap and water. Remove contaminated clothing and shoes. Clean and dry clothing before reuse.

Ingestion: If adverse effects occur after ingestion then seek medical attention. Do not induce vomiting or give anything by mouth to an unconscious person.

Eyes: High dust concentrations may cause mechanical irritation. Remove contact lenses if present and easy to do. Flush eyes immediately with large amounts of water, occasionally lifting upper and lower lids. If irritation develops, seek medical aid.

Section 5 – Fire-fighting Measures

Extinguishing Media:

Water spray (fog), foam, or carbon dioxide (CO₂), are the best extinguishing medium for fires.

Unsuitable Media:

Water stream

Lower Explosive Limit: Unknown

Upper Explosive Limit: Unknown

Flash Point: Not Applicable

Flammability Classification: Combustible Solid

Flame Propagation in Air: Slow burning solid

Ignition in Air¹: Above 1300° F (704° C)

Fire Fighting Instructions:

Normal fog nozzle water application and/or exclusion of air.

Combustion Hazards:

CO_x, SO_x and Methane.

Protective Equipment:

Normal fire-fighting equipment with appropriate respirator for CO_x, SO_x, and Methane

Unusual Fire Hazards:

It may not be noticed that the product is burning unless it is stirred and sparks are and sparks are apparent. Material that has been on fire should be watched closely to insure that no smoldering material is present.

Dust Explosion Potential²:

When high dust concentrations exist and a significant energy source is applied tests have determined that dust clouds and layers of 200mesh (0.075mm) coal dust and an air mixture can explode.

Minimum Ignition Temperature cloud > 1200° F (649° C)

Minimum Ignition Temperature layer > 350° F (177° C)

Sensitivity to Impact:

Not Applicable.

Sensitive to Static Charge:

Not Applicable.

¹Anonymous, Steam, Its Generation and Use, The Babcock and Wilcox Co., New York, 1955, pp. 2-15.

²Schrecengost, H.A. and Childers, "Fire and Explosion Hazards in Fluidized - Bed Thermal Coal Dryers," Circular No. 8258, U.S. Bureau of Mines 1965.

Section 6 - Accidental Release Measures

Personal Precautions:

Wear appropriate respiratory protection for the dust levels anticipated, see Section 10.

Spill Cleanup Measures:

In order to minimize dust, spills should be removed by vacuuming, or by lightly spraying with water and sweeping the mixture into a suitable container. Do not dry sweep.

Environmental Precautions:

Ground coal is not a hazardous waste. Dispose in a landfill, or by incineration in accordance with national and local laws and regulations.

Section 7 - Handling and Storage

Handling and Storage Precautions:

- Store in a dry clean area.
- Prevent exposure to high temperature and flames.
- Prevent exposure to strong oxidizers.

Hygienic Practices:

Avoid creating dust. Clean up all spills promptly. Wash exposed skin daily. Wash work clothes daily.

Section 8 – Exposure Controls / Personal Protection

Inhalation: In case of discomfort, remove the exposed individual to fresh air.

Respiratory Protection: Not required if dust levels are maintained below the PEL or TWA listed. For levels above the listed PEL and TWA an appropriate NIOSH/MSHA approved respirator should be used. Like any nuisance dust, Austin Black may aggravate certain pre-existing upper respiratory disorders, such as bronchitis or asthma.

Skin: Not hazardous. Wash exposed skin for hygienic purposes.

Ingestion: Not hazardous. Symptomatic treatment is recommended.

Eyes: Treat symptomatically for irritation. Flush lightly with water to remove the dust.

Section 9 - Physical and Chemical Properties

Physical State: Solid powder
Appearance: Grayish-black powder
Odor: None
Odor Threshold: Not determined
pH: 7
% Volatile by Volume: 20 % max. when heated to 950° C
Melting Point: Not Applicable
Boiling Point / Boiling Range: Not Applicable
Flash Point: Not Applicable
Evaporation Rate (BuAC = 1): Not Applicable
Flammability: Combustible
Upper / Lower Flammability or Explosive Limits: Unknown
Vapor Pressure (mm Hg): Not Applicable
Vapor Density (Air = 1): Not Applicable
Relative Density: 22 lbs / ft³ (386.5 kg / m³)
Solubility: Insoluble
Partition Coefficient: n-octanol / water: Not determined
Auto-ignition Temperature: Not determined, see Section 5 for ignition temperatures.
Decomposition Temperature: Not determined
Viscosity: Not Applicable

Section 10 - Stability and Reactivity

Chemical Stability: Stable
Conditions to Avoid: Contact with strong oxidizers, especially when heated. High temperatures or flames.
Incompatible Materials: Strong oxidizers.
Reactivity: May react exothermically upon contact with strong oxidizers.
Hazard Decomposition: Releases carbon monoxide (CO), carbon dioxide (CO₂), sulfur monoxide (SO), sulfur dioxide (SO₂), and Methane.
Hazard polymerization: Not applicable.

Section 11 – Toxicological information

Inhalation Standards CAS Number	Exposure Limits		Amount
	PEL	TLV	%
Coal, bituminous CAS # Not Applicable Naturally Occurring Mineral	*2.4 mg / m ³	* 0.9 mg / m ³	90 - 100
Silica (Quartz) CAS # 14808-60-7	$\frac{10 \text{ mg}}{\text{m}^3}$ % SiO ₂ + 2	* 0.05 mg / m ³	0.0 – 0.5
* Respirable fraction < 5% SiO ₂			

Personal Protective Equipment:

Gloves: None required.

Eye/Face Protection: None required.

Protective Clothing: None required. Confine work clothing to the workplace and wash daily.

Engineering Controls: Use sufficient ventilation in volume and pattern to maintain dust exposures below the TWA.

Other Protective Measures: Wash exposed skin before eating, drinking and smoking. Wash clothing daily.

Acute Effects:

Inhalation: None expected. Based on experience, temporary discomfort or mechanical irritation to upper respiratory tract may occur due to inhalation of dust concentrations well above the 8 hour TWA.

Ingestion: No adverse effects expected.

Eye: No adverse effects expected. High dust concentrations may cause mechanical irritation.

Skin: No adverse effects expected.

Chronic Effects:

Inhalation: Long term inhalation of coal dust may lead to the development of pneumoconiosis.

Carcinogenicity: Coal contains a small amount of Crystalline Silica (Quartz), however IARC has classified coal dust as a Group 3, "there is inadequate evidence in humans for carcinogenicity". The Occupational Safety and Health Administration, (OSHA) has not classified Silica (Quartz) as to its carcinogenicity.

Ingestion: No adverse effects expected.

Eye: No adverse effects expected.

Skin: No adverse effects known.

OECD Test Values:

Irritancy: Not Available

Sensitization: Not Available.

Mutagenicity: Not Available.

Reproductive Toxicity: Not Available.

Teratogenicity: Not Available.

Synergistic Materials: None expected

Section 12 – Ecological information

Austin Black is ground bituminous coal, which is a naturally occurring mineral. Keep product away from drains, sewers, streams, and rivers.

Ecotoxicity: Information not available.

Persistence and Degradability: Information not available.

Bioaccumulative Potential: Information not available.

Mobility in Soil: Information not available.

Other adverse effects: Information not available.

Section 13 – Disposal Considerations

The product may be disposed of by incineration, or deposited in a solid waste land fill, provided that these methods and facilities comply with local and national regulations.

Section 14 – Transport Information

Domestic: The U. S. Department of Transportation classifies this product as aerated coal, a non-hazardous product.

International: World Customs Organization, Harmonized Tariff Schedule, Schedule B Number: 2701.12 - Bituminous coal: Other

Section 15 – Regulatory Information

Resource Conservation and Recovery Act, (RCRA): All metals are below the TCLP listed levels.

UN Classification: Not classified

SARA TITLE III: This product does not contain any toxic chemicals subject to the reporting requirements of Section 313 of the Emergency Planning and Community Right-to-Know Act of 1986 and of CFR 372.

TSCA & DSL Inventories: This product is listed as a naturally occurring substance.

REACH, EU Legislation: Austin Black 325 is 100 % bituminous coal. No chemicals are used in the grinding process and no chemicals are added to the finished product. Austin Black 325 is classified as a naturally occurring mineral, and therefore exempt from this regulation.

California Proposition 65: This product contains crystalline Silica known to the State of California to cause cancer, birth defects and/or other reproductive harm.

Section 16 – Other Information

HMIS / NFPA Hazard Rating:

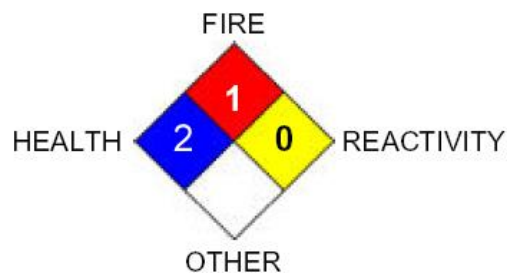
4=EXTREME

3= SERIOUS

2= MODERATE

1=SLIGHT

0=MINIMAL



Prepared by: Coal Fillers Inc.

Issue Number: 13 (in compliance with CFR 1910.1200(g) and WHMIS)

Date Revised: March 21, 2019

Previous Revision Date: June 06, 2018

Reason for Revision: Additional study information added about coal dust hazards.

There is no additional health and safety information available. It is the customers' responsibility to ensure that a suitable and sufficient assessment of the risks created by a work activity using this product is under taken before this product is used.

Disclaimer: The information contained herein is based on data available at this time and is believed to be accurate. However, no warranty is expressed or implied regarding the accuracy of these data or the results to be obtained from the use thereof. Since information contained herein may be applied under conditions beyond our control and with which we may be unfamiliar, no responsibility is assumed for the results of its use. The person receiving this information shall make his / her own determination of the suitability of the material for his / her particular purposes.