

Version Number 1.3 Revision Date 01/11/2024 Page 1 of 15 Print Date 01/12/2024

SAFETY DATA SHEET

T603.6 EP-521 COMPOUND PRECOL BLUE

Section 1. Identification	n	
GHS product identifier Chemical name CAS number Other means of identification Product type	: : : : :	T603.6 EP-521 COMPOUND PRECOL BLUE Mixture Mixture CC01060709 solid
<u>Relevant identified uses of the subs</u> Product use	tance :	or mixture and uses advised against Industrial applications. Plastics.
Supplier's details	:	Colorant Chromatics Chromatics, Inc. 19 Francis J. Clarke Circle, Bethel, CT 06801, USA
Emergency telephone number (with hours of operation)	:	+1 800 242 2296 CHEMTREC 1-800-424-9300 (24hrs for spill, leak, fire, exposure or accident).

Section 2. Hazards identification

This mixture has not been evaluated as a whole. Information provided on the health effects of this product is based on individual components. Fluoropolymers heated above 350 C can evolve hydrogen fluoride and carbonyl fluoride as degradation products. Processing at elevated temperatures may release fumes that can cause polymer fume fever. The end-user (fabricator) should take necessary precautions (mechanical ventilation, local exhaust, respiratory protection, etc.) to protect employees from exposure to any vapors or dusts that may be released during heating or fabrication. See Sections 8 and 11 for special precautions. After handling, always wash hands thoroughly with soap and water.

OSHA/HCS status	:	While this material is not considered hazardous by the OSHA Hazard Communication Standard (29 CFR 1910.1200), this SDS contains valuable information critical to the safe handling and proper use of the product. This SDS should be retained and available for employees and other users of this product.
Classification of the substance or mixture	:	Not classified.



Version Number 1.3 Revision Date 01/11/2024 Page 2 of 15 Print Date 01/12/2024

GHS label elements		
Signal word Hazard statements	:	No signal word. No known significant effects or critical hazards.
Precautionary statements		
	:	Not applicable.
Prevention	:	Not applicable.
Response	:	Not applicable.
Storage	:	Not applicable.
Disposal	:	Not applicable.
Supplemental label elements	:	None known.
Hazards not otherwise classified	:	None known.
		Not available.

Section 3. Composition/information on ingredients

Substance/mixture	:	Mixture
Chemical name	:	Mixture
Other means of identification	:	CC01060709

CAS number/other identifiers

Ingredient name	%	CAS number
Cobalt aluminate blue spinel (C.I. Pigment Blue 28)	>= 1 - <= 3	1345-16-0

Any concentration shown as a range is to protect confidentiality or is due to batch variation.

There are no additional ingredients present which, within the current knowledge of the supplier and in the concentrations applicable, are classified as hazardous to health or the environment and hence require reporting in this section.

Occupational exposure limits, if available, are listed in Section 8.

Section 4. First aid measures

Description of necessary first aid measures

Eye contact

: Immediately flush eyes with plenty of water, occasionally lifting the upper and lower eyelids. Check for and remove any contact lenses. Get medical attention if irritation occurs.



Version Number 1.3	Page 3 of 15
Revision Date 01/11/2024	Print Date 01/12/2024

Inhalation	:	Remove victim to fresh air and keep at rest in a position comfortable for breathing. Get medical attention if symptoms occur.
Skin contact	:	Flush contaminated skin with plenty of water. Remove contaminated clothing and shoes. Get medical attention if symptoms occur.
Ingestion	:	Wash out mouth with water. If material has been swallowed and the exposed person is conscious, give small quantities of water to drink. Do not induce vomiting unless directed to do so by medical personnel. Get medical attention if symptoms occur.

Most important symptoms/effects, acute and delayed

Potential acute health effects	
Evo contact	

Eye contact Inhalation Skin contact Ingestion <u>Over-exposure signs/symptoms</u>	:	No known significant effects or critical hazards. No known significant effects or critical hazards. No known significant effects or critical hazards. No known significant effects or critical hazards.
Eye contact	:	No specific data.
Inhalation	:	No specific data.
Skin contact	:	No specific data.
Ingestion	:	No specific data.
Indication of immediate medical a	attentio	n and special treatment needed, if necessary
Notes to physician	:	Treat symptomatically. Contact poison treatment specialist immediately if large quantities have been ingested or inhaled.
Specific treatments	:	No specific treatment.
Protection of first-aiders	:	No action shall be taken involving any personal risk or without suitable training.

See toxicological information (Section 11)

Section 5. Fire-fighting measures

Extinguishing media

Suitable extinguishing media Unsuitable extinguishing media	:	In case of fire, use water spray (fog), foam, dry chemical or CO ₂ . None known.
Specific hazards arising from the chemical	:	No specific fire or explosion hazard.



Version Number 1.3 Revision Date 01/11/2024 Page 4 of 15 Print Date 01/12/2024

Hazardous thermal decomposition products	:	Decomposition products may include the following materials: carbon dioxide carbon monoxide halogenated compounds metal oxide/oxides
Special protective actions for fire- fighters	:	Promptly isolate the scene by removing all persons from the vicinity of the incident if there is a fire. No action shall be taken involving any personal risk or without suitable training.
Special protective equipment for fire-fighters	:	Fire-fighters should wear appropriate protective equipment and self- contained breathing apparatus (SCBA) with a full face-piece operated in positive pressure mode.

Section 6. Accidental release measures

Personal precautions, protective equipment and emergency procedures

For non-emergency personnel For emergency responders	:	No action shall be taken involving any personal risk or without suitable training. Evacuate surrounding areas. Keep unnecessary and unprotected personnel from entering. Do not touch or walk through spilled material. Put on appropriate personal protective equipment. If specialized clothing is required to deal with the spillage, take note of any information in Section 8 on suitable and unsuitable materials. See also the information in "For non-emergency personnel".
Environmental precautions Methods and materials for containment	: nt an	Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers. Inform the relevant authorities if the product has caused environmental pollution (sewers, waterways, soil or air).
Wiethous and materials for containine	ii ai	
Small spill	:	Move containers from spill area. Vacuum or sweep up material and place in a designated, labeled waste container. Dispose of via a licensed waste disposal contractor.
Large spill	:	Move containers from spill area. Prevent entry into sewers, water courses, basements or confined areas. Vacuum or sweep up material and place in a designated, labeled waste container. Dispose of via a licensed waste disposal contractor. Note: see Section 1 for emergency contact information and Section 13 for waste disposal.

Section 7. Handling and storage

Precautions for safe handling



Version Number 1.3	Page 5 of 15
Revision Date 01/11/2024	Print Date 01/12/2024

Protective measures Advice on general occupational hygiene	:	Put on appropriate personal protective equipment (see Section 8). Eating, drinking and smoking should be prohibited in areas where this material is handled, stored and processed. Workers should wash hands and face before eating, drinking and smoking. Remove contaminated clothing and protective equipment before entering eating areas. See also Section 8 for additional information on hygiene measures.
Conditions for safe storage, including any incompatibilities	:	Store in accordance with local regulations. Store in original container protected from direct sunlight in a dry, cool and well-ventilated area, away from incompatible materials (see Section 10) and food and drink. Keep container tightly closed and sealed until ready for use. Containers that have been opened must be carefully resealed and kept upright to prevent leakage. Do not store in unlabeled containers. Use appropriate containment to avoid environmental contamination.

Section 8. Exposure controls/personal protection

Control parameters

Occupational exposure limits

Ingredient name	Exposure limits	
Cobalt aluminate blue spinel (C.I. Pigment Blue 28)	ACGIH TLV (1994-09-01) Inhalation sensitizer Skin sensitizer TWA 0.02 mg/m3 (CO)	
Appropriate engineering controls	: Good general ventilation should be sufficient to control worker exposure to airborne contaminants.	
Environmental exposure controls	: Emissions from ventilation or work process equipment should be checked to ensure they comply with the requirements of environmental protection legislation. In some cases, fume scrubbers, filters or engineering modifications to the process equipment will be necessary to reduce emissions to acceptable levels.	
Individual protection measures		
Hygiene measures	: Wash hands, forearms and face thoroughly after handling chemical products, before eating, smoking and using the lavatory and at the end of the working period. Appropriate techniques should be used to remove potentially contaminated clothing. Wash contaminated clothing before reusing. Ensure that eyewash stations and safety showers are close to the workstation location.	



Version Number 1.3	Page 6 of 15
Revision Date 01/11/2024	Print Date 01/12/2024

Eye/face protection	:	Safety eyewear complying with an approved standard should be used when a risk assessment indicates this is necessary to avoid exposure to liquid splashes, mists, gases or dusts. If contact is possible, the following protection should be worn, unless the assessment indicates a higher degree of protection: safety glasses with side-shields.
Skin protection		
Hand protection	:	Chemical-resistant, impervious gloves complying with an approved standard should be worn at all times when handling chemical products if a risk assessment indicates this is necessary.
Body protection	:	Personal protective equipment for the body should be selected based on the task being performed and the risks involved and should be approved by a specialist before handling this product.
Other skin protection	:	Appropriate footwear and any additional skin protection measures should be selected based on the task being performed and the risks involved and should be approved by a specialist before handling this product.
Respiratory protection	:	Based on the hazard and potential for exposure, select a respirator that meets the appropriate standard or certification. Respirators must be used according to a respiratory protection program to ensure proper fitting, training, and other important aspects of use.

Section 9. Physical and chemical properties

Appearance

Physical state	:	solid [Pellets.]
Color	:	BLUE
Odor	:	Not available.
Odor threshold	:	Not available.
pH	:	Not available.
Melting point	:	Not available.
Boiling point	:	Not available.
Flash point	:	Not applicable.
Burning time	:	Not available.
Burning rate	:	Not available.
Evaporation rate	:	Not available.
Flammability (solid, gas)	:	Not available.
Lower and upper explosive	:	Lower: Not applicable.
(flammable) limits		Upper: Not applicable.
Vapor pressure	:	Not available.



Version Number 1.3 Revision Date 01/11/2024 Page 7 of 15 Print Date 01/12/2024

Vapor density	:	Not applicable.
Relative density	:	Not available.
Solubility	:	Not available.
Solubility in water	:	Not available.
Partition coefficient: n-	:	Not applicable.
octanol/water		
Auto-ignition temperature	:	Not applicable.
Decomposition temperature		Not available.
SADT		Not available.
Viscosity	:	Dynamic: Not available. Kinematic: Not applicable.

Section 10. Stability and reactivity

Reactivity	:	No specific test data related to reactivity available for this product or its ingredients.
Chemical stability	:	Stable under recommended storage and handling conditions (see Section 7).
Possibility of hazardous reactions	:	Under normal conditions of storage and use, hazardous reactions will not occur.
Conditions to avoid	:	Keep away from extreme heat and oxidizing agents.
Incompatible materials	:	Keep away from strong acids. Oxidizer.
Hazardous decomposition products	:	Under normal conditions of storage and use, hazardous decomposition products should not be produced.

Section 11. Toxicological information

Information on toxicological effects

Acute toxicity		
Conclusion/Summary	:	Mixture.Not fully tested.
Irritation/Corrosion		
Conclusion/Summary		
Skin	:	Mixture.Not fully tested.
Eyes	:	Mixture.Not fully tested.
Respiratory	:	Mixture.Not fully tested.



Version Number 1.3 Revision Date 01/11/2024 Page 8 of 15 Print Date 01/12/2024

Sensitization

Conclusion/Summary		
Skin	:	Mixture.Not fully tested.
Respiratory	:	Mixture.Not fully tested.
<u>Mutagenicity</u>		
Conclusion/Summary	:	Mixture.Not fully tested.
Carcinogenicity		
Conclusion/Summary	:	Mixture.Not fully tested.

Classification

Product/ingredient name	OSHA	IARC	NTP
C.I. Pigment Blue 28 An	-	2B	Reasonably anticipated to be a human carcinogen.
inorganic pigment that is			
the reaction product of			
high temperature			
calcination in which cobalt			
(II) oxide and aluminum			
oxide in varying amounts			
are homogeneously and			
ionically interdiffused to			
form a crystalline matrix of			
spinel. Its composition			
may include any one or a			
combination of the			
modifiers MgO, ZnO,			
Li2O, or TiO2.			

Reproductive toxicity

Conclusion/Summary : Mixture.Not fully tested.

:

Teratogenicity

Conclusion/Summary

Mixture.Not fully tested.

Specific target organ toxicity (single exposure)

Not available.

Specific target organ toxicity (repeated exposure)



Version Number 1.3 Revision Date 01/11/2024 Page 9 of 15 Print Date 01/12/2024

Not available.

Aspiration hazard

Not available.

Information on the likely routes of : Not available. exposure

Potential acute health effects

Eye contact	:	No known significant effects or critical hazards.
Inhalation	:	No known significant effects or critical hazards.
Skin contact	:	No known significant effects or critical hazards.
Ingestion	:	No known significant effects or critical hazards.

Symptoms related to the physical, chemical and toxicological characteristics

Eye contact	:	No specific data.
Inhalation	:	No specific data.
Skin contact	:	No specific data.
Ingestion	:	No specific data.

Delayed and immediate effects and also chronic effects from short and long term exposure

Short term exposure

Potential immediate effects Potential delayed effects	:	Not available. Not available.
Long term exposure		
Potential immediate effects Potential delayed effects Potential chronic health effects	:	Not available. Not available.
Conclusion/Summary	:	Mixture.Not fully tested.
General Carcinogenicity Mutagenicity Teratogenicity Developmental effects Fertility effects	:	No known significant effects or critical hazards. No known significant effects or critical hazards.



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Version Number 1.3 Revision Date 01/11/2024 Page 10 of 15 Print Date 01/12/2024

Numerical measures of toxicity

<u>Acute toxicity estimates</u> N/A

Other information

This mixture has not been evaluated as a whole for health effects. Exposure effects listed are based on existing health data for the individual components which comprise the mixture.

Section 12. Ecological information

Toxicity

Product/ingredient name	Result	Species	Exposure
T603.6 EP-521 COMPOUND PI	RECOL BLUE		
Remarks - Acute - Aquatic invertebrates.:	Chemicals are not readily available as they are bound within the polymer matrix.		
Conclusion/Summary		micals are not readily available as they are mer matrix.	e bound within the
Persistence and degradability			
Conclusion/Summary		emicals are not readily available as they ar ymer matrix.	e bound within the
Conclusion/Summary		emicals are not readily available as they ar ymer matrix.	e bound within the
Bioaccumulative potential Not available.			
Mobility in soil			
Soil/water partition coefficien (KOC)	i t : Not	available.	
Other adverse effects	: No	known significant effects or critical hazar	ds.

10/15



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Version Number 1.3 Revision Date 01/11/2024

Page 11 of 15 Print Date 01/12/2024

Section 13. Disposal considerations

Disposal methods

The generation of waste should be avoided or minimized wherever possible. Disposal of this product, solutions and any by-products should at all times comply with the requirements of environmental protection and waste disposal legislation and any regional local authority requirements. Dispose of surplus and non-recyclable products via a licensed waste disposal contractor. Waste should not be disposed of untreated to the sewer unless fully compliant with the requirements of all authorities with jurisdiction. Waste packaging should be recycled. Incineration or landfill should only be considered when recycling is not feasible. This material and its container must be disposed of in a safe way. Empty containers or liners may retain some product residues. Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers.

United States - RCRA Acute hazardous waste "P" List: Not listed

United States - RCRA Toxic hazardous waste "U" List: Not listed

Section 14. Transport information

U.S.DOT 49CFR Ground/Air/Water	:	Not regulated for transportation.
International Air ICAO/IATA	:	Consult mode specific transport rules
International Water IMO/IMDG	:	Consult mode specific transport rules

Section 15. Regulatory information



Version Number 1.3	Page 12 of 15
Revision Date 01/11/2024	Print Date 01/12/2024

		United States - TSCA 6 - Final risk management: Not listed United States - TSCA 6 - Proposed risk management: Not listed United States - TSCA 8(a) - Chemical risk rules: Not listed United States - TSCA 8(a) - Dioxin/Furane precusor: Not listed United States - TSCA 8(a) - Chemical Data Reporting (CDR): Not determined
		United States - TSCA 8(a) - Preliminary assessment report (PAIR): Not listed
		United States - TSCA 8(c) - Significant adverse reaction (SAR): Not listed
		United States - TSCA 8(d) - Health and safety studies: Not listed United States - TSCA 5(a)2 - Final significant new use rules: Not listed
		United States - EPA Clean water act (CWA) section 307 - Priority pollutants: Not listed
		United States - EPA Clean water act (CWA) section 311 - Hazardous substances: Not listed
		United States - EPA Clean air act (CAA) section 112 - Accidental release prevention - Flammable substances: Not listed
		United States - EPA Clean air act (CAA) section 112 - Accidental release prevention - Toxic substances: Not listed
		United States - Department of commerce - Precursor chemical: Not listed
n 112(b) anta ($\mathbf{H} \mathbf{A} \mathbf{P}_{a}$)	:	Listed

Clean Air Act Section 112(b)	:	Listed
Hazardous Air Pollutants (HAPs) Clean Air Act Section 602 Class I		Not listed
Substances		
Clean Air Act Section 602 Class II Substances	:	Not listed
DEA List I Chemicals (Precursor	:	Not listed
Chemicals)		NT . 11 . 1
DEA List II Chemicals (Essential Chemicals)	:	Not listed

US. EPA CERCLA Hazardous Substances (40 CFR 302)

not applicable

SARA 311/312

Classification

: Not applicable.

Composition/information on ingredients

No products were found.



Version Number 1.3 Revision Date 01/11/2024 Page 13 of 15 Print Date 01/12/2024

Name	%	Classification
C.I. Pigment Blue 28 An	>= 1 - <= 3	CARCINOGENICITY - Category 2
inorganic pigment that is the		
reaction product of high		
temperature calcination in		
which cobalt (II) oxide and		
aluminum oxide in varying		
amounts are homogeneously		
and ionically interdiffused		
to form a crystalline matrix		
of spinel. Its composition		
may include any one or a		
combination of the		
modifiers MgO, ZnO, Li2O,		
or TiO2.		

<u>SARA 313</u>

Form R - Reporting requirements

Product name	CAS number	%
Cobalt aluminate blue spinel (C.I. Pigment Blue 28)	1345-16-0	>= 1 - < 5

SARA 313 notifications must not be detached from the SDS and any copying and redistribution of the SDS shall include copying and redistribution of the notice attached to copies of the SDS subsequently redistributed.

State regulations		
Massachusetts	:	None of the components are listed.
New York	:	None of the components are listed.
New Jersey	:	The following components are listed:
		Cobalt aluminate blue spinel (C.I. Pigment Blue 28)
Pennsylvania	:	The following components are listed:
		Cobalt aluminate blue spinel (C.I. Pigment Blue 28)
<u>California Prop. 65</u> This product does not require a Safe H United States inventory (TSCA 8b)		r warning under California Prop. 65. All components are active or exempted.
Canada inventory	:	Not determined.
International regulations Inventory list		



Version Number 1.3 Revision Date 01/11/2024 Page 14 of 15 Print Date 01/12/2024

Australia Canada China	:	Not determined. Not determined. All components are listed or exempted.
Eurasian Economic Union	:	Russian Federation inventory: Not determined.
Japan	:	Japan inventory (CSCL): All components are listed or exempted.
		Japan inventory (ISHL): Not determined.
New Zealand	:	Not determined.
Philippines	:	Not determined.
Republic of Korea	:	All components are listed or exempted.
Taiwan	:	All components are listed or exempted. All components are listed or exempted.
Thailand	:	Not determined.
Turkey	:	Not determined.
United States	:	All components are active or exempted.
Viet Nam	:	Not determined.

Section 16. Other information

Hazardous Material Information System (U.S.A.)

Health	/	0
Flammability		0
Physical hazards		0
•		

Caution: HMIS® ratings are based on a 0-4 rating scale, with 0 representing minimal hazards or risks, and 4 representing significant hazards or risks. Although HMIS® ratings and the associated label are not required on SDSs or products leaving a facility under 29 CFR 1910.1200, the preparer may choose to provide them. HMIS® ratings are to be used with a fully implemented HMIS® program. HMIS® is a registered trademark and service mark of the American Coatings Association, Inc.

The customer is responsible for determining the PPE code for this material. For more information on HMIS® Personal Protective Equipment (PPE) codes, consult the HMIS® Implementation Manual. History

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Date of issue/Date of revision	:	01/11/2024
Date of previous issue	:	11/29/2023
Version	:	1.3
Key to abbreviations	:	ATE = Acute Toxicity Estimate
·		BCF = Bioconcentration Factor
		GHS = Globally Harmonized System of Classification and Labelling of
		Chemicals
		IATA = International Air Transport Association
		IBC = Intermediate Bulk Container
		IMDG = International Maritime Dangerous Goods
		LogPow = logarithm of the octanol/water partition coefficient



Version Number 1.3 Revision Date 01/11/2024 Page 15 of 15 Print Date 01/12/2024

MARPOL = International Convention for the Prevention of Pollution From Ships, 1973 as modified by the Protocol of 1978. ("Marpol" = marine pollution) UN = United Nations Not available.

References

Notice to reader

To the best of our knowledge, the information contained herein is accurate. However, neither the abovenamed supplier, nor any of its subsidiaries, assumes any liability whatsoever for the accuracy or completeness of the information contained herein. Final determination of suitability of any material is the sole responsibility of the user. All materials may present unknown hazards and should be used with caution. Although certain hazards are described herein, we cannot guarantee that these are the only hazards that exist. Particularly this information may not be valid for such material used in conjunction with any other materials or in any process, unless specified in the text.