Desco® Deflocculant

Version 1.8 Revision Date 2016-06-20

SECTION 1: Identification of the substance/mixture and of the company/undertaking

Product information

Product Name : Desco® Deflocculant
Material : 1016805

Company : Chevron Phillips Chemical Company LP
Drilling Specialties Company LLC
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The Woodlands, TX 77380

Local : Chevron Phillips Chemicals International N.V.
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Emergency telephone:

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Responsible Department : Product Safety and Toxicology Group
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SECTION 2: Hazards identification

Classification of the substance or mixture
REGULATION (EC) No 1272/2008

Eye irritation, Category 2	H319: Causes serious eye irritation.
Skin sensitization, Category 1	H317: May cause an allergic skin reaction.
Carcinogenicity, Category 1A	H350i: May cause cancer by inhalation.
Chronic aquatic toxicity, Category 3	H412: Harmful to aquatic life with long lasting effects.

Label elements

Labeling (REGULATION (EC) No 1272/2008)

Hazard pictograms :

Signal Word : Danger

Hazard Statements :

H317	May cause an allergic skin reaction.
H319	Causes serious eye irritation.
H350i	May cause cancer by inhalation.
H412	Harmful to aquatic life with long lasting effects.

Precautionary Statements :

Prevention:

P201	Obtain special instructions before use.
P202	Do not handle until all safety precautions have been read and understood.
P261	Avoid breathing dust/fume/gas/mist/vapors/spray.
P264	Wash hands thoroughly after handling.
P272	Contaminated work clothing must not be allowed out of the workplace.
P273	Avoid release to the environment.
P280	Wear protective gloves/ protective clothing/ eye protection/ face protection.

Response:

P302 + P352	IF ON SKIN: Wash with plenty of water.
P305 + P351 + P338	IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
P308 + P313	IF exposed or concerned: Get medical advice/ attention.
P333 + P313	If skin irritation or rash occurs: Get medical advice/ attention.
P337 + P313	If eye irritation persists: Get medical advice/ attention.
P363	Wash contaminated clothing before reuse.

Storage:

P405	Store locked up.

Disposal:

P501	Dispose of contents/ container to an approved waste disposal plant.

Hazardous ingredients which must be listed on the label:
- 1066-30-4 Chromium Acetate
- 14808-60-7 Crystalline Silica

SECTION 3: Composition/information on ingredients

Synonyms : Drilling Mud Deflocculant

Molecular formula : Mixture

Mixtures

Hazardous ingredients

Chemical name	CAS-No. EC-No. Index No.	Classification (REGULATION (EC) No 1272/2008)	Concentration [wt%]
Sulfomethylated Quebracho	**68201-64-9** **269-229-3**	Aquatic Chronic 3; H412	60 - 80
Ferrous Sulfate	17375-41-6	Acute Tox. 4; H302 Skin Irrit. 2; H315 Eye Irrit. 2; H319 Skin Irrit. 2; H315	5 - 9
Chromium Acetate	1066-30-4 213-909-4	Eye Irrit. 2; H319 Skin Sens. 1; H317	3 - 10
Crystalline Silica	14808-60-7 238-878-4	Carc. 1A; H350 STOT RE 1; H372	0,1 - 1

For the full text of the H-Statements mentioned in this Section, see Section 16.

SECTION 4: First aid measures

General advice : Move out of dangerous area. Show this material safety data sheet to the doctor in attendance.

If inhaled : Call a physician or poison control center immediately. If unconscious place in recovery position and seek medical advice.

In case of skin contact : If skin irritation persists, call a physician. If on skin, rinse well with water. If on clothes, remove clothes.

In case of eye contact : Immediately flush eye(s) with plenty of water. Remove contact lenses. Protect unharmed eye. Keep eye wide open while rinsing. If eye irritation persists, consult a specialist.

If swallowed	:	Keep respiratory tract clear. Never give anything by mouth to an unconscious person. If symptoms persist, call a physician. Take victim immediately to hospital.

SECTION 5: Firefighting measures

Flash point	:	Not applicable
Autoignition temperature	:	No data available
Unsuitable extinguishing media	:	High volume water jet.
Specific hazards during fire fighting	:	Do not allow run-off from fire fighting to enter drains or water courses.
Special protective equipment for fire-fighters	:	Wear self-contained breathing apparatus for firefighting if necessary.
Further information	:	Collect contaminated fire extinguishing water separately. This must not be discharged into drains. Fire residues and contaminated fire extinguishing water must be disposed of in accordance with local regulations.
Fire and explosion protection	:	Avoid dust formation. Provide appropriate exhaust ventilation at places where dust is formed.
Hazardous decomposition products	:	No data available.

SECTION 6: Accidental release measures

Personal precautions	:	Use personal protective equipment. Avoid dust formation. Avoid breathing dust. Ensure adequate ventilation.
Environmental precautions	:	Prevent product from entering drains. Prevent further leakage or spillage if safe to do so. If the product contaminates rivers and lakes or drains inform respective authorities.
Methods for cleaning up	:	Keep in suitable, closed containers for disposal.

SECTION 7: Handling and storage

Handling

Advice on safe handling	:	Avoid formation of respirable particles. Do not breathe vapors/dust. Avoid exposure - obtain special instructions before use. Avoid contact with skin and eyes. For personal protection see section 8. Smoking, eating and drinking should be prohibited in the application area. Provide sufficient air exchange and/or exhaust in work rooms. Dispose of rinse water in accordance with local and national regulations. Persons susceptible to skin sensitization problems or asthma, allergies, chronic or recurrent respiratory disease should not be

employed in any process in which this mixture is being used.

Advice on protection against fire and explosion : Avoid dust formation. Provide appropriate exhaust ventilation at places where dust is formed.

Storage

Requirements for storage areas and containers : Keep container tightly closed in a dry and well-ventilated place. Containers which are opened must be carefully resealed and kept upright to prevent leakage. Observe label precautions. Electrical installations / working materials must comply with the technological safety standards.

SECTION 8: Exposure controls/personal protection

Ingredients with workplace control parameters

SK

Zložka	Podstata	Hodnota	Kontrolné parametre	Poznámka
Crystalline Silica	SK OEL	TSH	0,1 mg/m3	1A, Merané ako respirabilná frakcia
	SK OEL	NPEL priemerný	0,1 mg/m3	TSH, 4, 3, Tabul'ka č. 2, 11, 1, 5, respirabilná frakcia
	SK OEL	NPEL priemerný	0,1 mg/m3	TSH, 4, 3, Tabul'ka č. 2, 11, 1, 5, Pevný aerosol, respirabilná frakcia

1 Za fibrogénny sa považuje nerozpustný pevný aerosól, vrátane kvapiek aerosólu, ktorý obsahuje viac ako 1 % fibrogénnej zložky a v pokuse na zvierati vykazuje zreteľnú fibrogénnu reakciu pľúcneho tkaniva. Ak je v aerosóle obsiahnutá fibrogénna zložka,musí sa stanoviť vždy jeho respirabilná frakcia a koncentrácia fibrogénnej zložky. V prípade, že aerosól obsahuje menej než 1 % SiO2 a neobsahuje azbest, považuje sa za aerosól s prevažne nešpecifickým účinkom
11 Pre pevné aerosóly, ktoré sú zároveň klasifikované ako karcinogény alebo mutagény kategórie 1A a kategórie 1B, sa stanovujú technické smerné hodnoty (TSH). Definíciu TSH upravuje nariadenie vlády Slovenskej republiky č. 356/2006 Z. z. o ochrane zamestnancov pred rizikami súvisiacimi s expozíciou karcinogénnym a mutagénnym faktorom pri práci v znení nariadenia vlády Slovenskej republiky č. 301/2007 Z. z. Požiadavky na meranie a hodnotenie azbestu upravuje nariadenie vlády Slovenskej republiky č. 253/2006 Z. z. o ochrane zamestnancov pred rizikami súvisiacimi s expozíciou azbestu pri práci.
1A Kategória 1A - Dokázaný karcinogén pre ľudí
3 Respirabilná frakcia je váhový podiel častíc pevného aerosólu <= 5 µm odobraného vo vzorke ovzdušia v dýchacej zóne zamestnanca. Spôsob a techniku odberu, stanovenie koncentrácie polietavého prachu v respirabilnej a inhalovateľnej frakcii v pracovnom ovzduší podľa prijatej Johanesburgskej konvencie upravuje STN EN 481. Stratégiu merania, výber vhodného postupu a spracovanie výsledkov upravuje STN EN 482 a STN EN 689.
4 Fr je obsah fibrogénnej zložky v percentách v respirabilnej frakcii. Fibrogénna zložka - kremeň, kristobalit, tridymit, gama - oxid hlinitý.
5 Kremeň, kristobalit, tridymit, gama-oxid hlinitý je 100 % fibrogénnej zložky.
Tabul'ka č. 2 pevné aerosóly s prevažne fibrogénnym účinkom
TSH Technické Smerné Hodnoty

SI

Sestavine	Osnova	Vrednost	Parametri nadzora	Pripomba
Crystalline Silica	SI OEL	MV	0,15 mg/m3	A, Y, Alveolarna frakcija

A Alveolarna frakcija - del vdihnjene suspendirane snovi, ki doseže alveole
Y Snovi, pri katerih ni nevarnosti za zarodek ob upoštevanju mejnih vrednosti in BAT vrednosti.

SE

Beståndsdelar	Grundval	Värde	Kontrollparametrar	Anmärkning
Chromium Acetate	SE AFS	NGV	0,5 mg/m3	2, Totalt damm
Crystalline Silica	SE AFS	NGV	0,1 mg/m3	2, C, M, Respirabelt
	SE AFS	NGV	0,1 mg/m3	2, C, M, (respirabelt damm)

2 Med respirabelt damm menas den dammfraktion som definieras i svensk standard SS-EN 481, Arbetsplatsluft. - Partikelstorleksfraktioner för mätning av luftburna partiklar, Utgåva 1, 1993, punkt 2.11 och som har en provtagningskaraktäristik enligt punkt 5.3. Med inhalerbart damm menas den dammfraktion som definieras i svensk standard SS-EN 481, Arbetsplatsluft - Partikelstorleksfraktioner för mätning av luftburna partiklar, Utgåva 1, 1993, punkt 2.3 och som har en provtagningskaraktäristik enligt punkt 5.1. Med respirabelt damm menas den dammfraktion som definieras i svensk standard SS-EN 481, Arbetsplatsluft - Partikelstorleksfraktioner för mätning av luftburna partiklar, Utgåva 1, 1993, punkt 2.11 och som har en provtagningskaraktäristik enligt punkt 5.3. Med totaldamm menas de partiklar (aerosoler) som fastnar på ett filter i den provtagare som beskrivs i Metodserien, Provtagning av totaldamm och respirabelt damm, Metod nr 1010, Arbetarskyddsstyrelsen, numera Arbetsmiljöverket. Filterdiametern är normalt 37 mm, men kan även vara 25 mm. Trots sitt namn provtas inte den totala mängden luftburna partiklar med denna metod.
C Ämnet är cancerframkallande.
M Medicinsk kontroll kan krävas för hantering av ämnet. Se vidare föreskrifterna om medicinska kontroller i arbetslivet. För vissa ämnen gäller kraven på medicinsk kontroll endast när ämnet används som härdplastkomponent. Se föreskrifterna om härdplaster.

RO

Componente	Bază	Valoare	Parametri de control	Notă
Crystalline Silica	RO OEL	TWA	0,1 mg/m3	fracţiunea de praf respirabilă

PT

Componentes	Bases	Valor	Parâmetros de controlo	Nota
Ferrous Sulfate	PT OEL	VLE-MP	1 mg/m3	irritação do TRS,
Chromium Acetate	PT OEL	VLE-MP	0,5 mg/m3	A4, irritação do TRS,
Crystalline Silica	PT OEL	VLE-MP	0,025 mg/m3	A2, Fração respirável

A2 Agente carcinogénico suspeito no Homem.
A4 Agente não classificável como carcinogénico no Homem.
irritação do TRS irritação do trato respiratório superior

PL

Składniki	Podstawa	Wartość	Parametry dotyczące kontroli	Uwaga
Chromium Acetate	PL NDS	NDS	0,5 mg/m3	
	PL NDS	NDS	0,5 mg/m3	
Crystalline Silica	PL NDS	NDS	1 mg/m3	Frakcja respirabilna, frakcja respirabilna
	PL NDS	NDS	0,3 mg/m3	Frakcja respirabilna, frakcja respirabilna
	PL NDS	NDS	4 mg/m3	frakcja wdychalna, (frakcja wdychana)
	PL NDS	NDS	2 mg/m3	frakcja wdychalna, (frakcja wdychana)

Frakcja respirabilna Frakcja respirabilna - frakcja aerozolu wnikająca do dróg oddechowych, która stwarza zagrożenie dla zdrowia po zdeponowaniu w obszarze wymiany gazowej.
frakcja wdychalna Frakcja wdychalna - frakcja aerozolu wnikająca przez nos i usta, która po zdeponowaniu w drogach oddechowych stwarza zagrożenie dla zdrowia.

NO

Komponenter	Grunnlag	Verdi	Kontrollparametere	Nota
Ferrous Sulfate	FOR-2011-12-06-1358	TWA	1 mg/m3	
Chromium Acetate	FOR-2011-12-06-1358	TWA	0,5 mg/m3	E,
Crystalline Silica	FOR-2011-12-06-1358	TWA	0,1 mg/m3	7, K, respirabelt støv
	FOR-2011-12-06-1358	TWA	0,3 mg/m3	7, K, totalstøv

7 Støv som inneholder α-kvarts, kristobalitt og/eller tridymitt vurderes ut fra summasjonsformel. Samtidig må verdiene for sjenerende støv overholdes.
E EU har en veiledende grenseverdi for stoffet
K Stoffer som skal betraktes som kreftfremkallende

NL

Bestanddelen	Basis	Waarde	Controleparameters	Opmerking
Crystalline Silica	NL WG	TGG-8 uur	0,075vezels per cm3	B1, Respirabel
	NL WG	TGG-8 uur	0,075vezels per cm3	B1, (respirabel stof)

B1 Kankerverwekkende stoffen, vastgesteld op basis van het drempelwaarde-effect

MK

Съставки	Основа	Стойност	Параметри на контрол	Бележка
Crystalline Silica	MK OEL	MV	0,15 mg/m3	Y, A, Alveolar fraction

A Alveolar fraction - the part of the inhaled suspended material that reaches the alveoli
Y Substances without teratogenic effects when respecting limit values and bat values.

LT

Komponentai	Pagrindas, bazė	Vertė	Kontrolės parametrai	Pastaba
Chromium Acetate	LT OEL	IPRD	2 mg/m3	
	LT OEL	IPRD	2 mg/m3	
Crystalline Silica	LT OEL	IPRD	0,1 mg/m3	Alveolinė

IS

Komponenter	Grunnlag	Verdi	Kontrollparametere	Nota
Ferrous Sulfate	IS OEL	TWA	1 mg/m3	
Chromium Acetate	IS OEL	TWA	0,5 mg/m3	
Crystalline Silica	IS OEL	TWA	0,3 mg/m3	Total
	IS OEL	TWA	0,1 mg/m3	Respirable
	IS OEL	TWA	0,1 mg/m3	(støv som kan innåndes)
	IS OEL	TWA	0,3 mg/m3	Totalt støv

IE

Ingredients	Basis	Value	Control parameters	Note
Ferrous Sulfate	IE OEL	OELV - 8 hrs (TWA)	1 mg/m3	
	IE OEL	OELV - 15 min (STEL)	2 mg/m3	
Chromium Acetate	IE OEL	OELV - 8 hrs (TWA)	2 mg/m3	IOELV,
Crystalline Silica	IE OEL	OELV - 8 hrs (TWA)	0,1 mg/m3	respirable
	IE OEL	OELV - 8 hrs (TWA)	0,1 mg/m3	(respirable dust)

IOELV Indicative Occupational Exposure Limit Value

HU

Komponensek	Bázis	Érték	Ellenőrzési paraméterek	Megjegyzés
Crystalline Silica	HU OEL	AK-érték	0,15 mg/m3	respirábilis por
	HU OEL	AK-érték	0,15 mg/m3	respirábilis por

HR

Sastojci	Temelj	Vrijednost	Nadzorni parametri	Bilješka
Ferrous Sulfate	HR OEL	GVI	1 mg/m3	
	HR OEL	STEL	2 mg/m3	
Crystalline Silica	HR OEL	GVI	0,1 mg/m3	

GR

Συστατικά	Βάση	Τιμή	Παράμετροι ελέγχου	Σημείωση
Ferrous Sulfate	GR OEL	TWA	1 mg/m3	
	GR OEL	STEL	2 mg/m3	
Chromium Acetate	GR OEL	TWA	0,5 mg/m3	

GB

Ingredients	Basis	Value	Control parameters	Note
Ferrous Sulfate	GB EH40	TWA	1 mg/m3	
	GB EH40	STEL	2 mg/m3	
Chromium Acetate	GB EH40	TWA	0,5 mg/m3	2,
Crystalline Silica	GB EH40	TWA	0,1 mg/m3	15, 44, 45, 46, 47, 2, Respirable
	GB EH40	TWA	0,1 mg/m3	15, 44, 45, 46, 47, 2, (respirable dust)

15 For the purposes of these limits, respirable dust and inhalable dust are those fractions of airborne dust which will be collected when sampling is undertaken in accordance with the methods described in MDHS14/3 General methods for sampling and gravimetric analysis of respirable and inhalable dust
2 Where no specific short-term exposure limit is listed, a figure three times the long-term exposure should be used
44 The COSHH definition of a substance hazardous to health includes dust of any kind when present at a concentration in air equal to or greater than 10 mg.m-3 8-hour TWA of inhalable dust or 4 mg.m-3 8-hour TWA of respirable dust. This means that any dust will be subject to COSHH if people are exposed above these levels. Some dusts have been assigned specific WELs and exposure to these must comply with the appropriate limit.
45 Most industrial dusts contain particles of a wide range of sizes. The behaviour, deposition and fate of any particular particle after entry into the human respiratory system and the body response that it elicits, depend on the nature and size of the particle. HSE distinguishes two size fractions for limit-setting purposes termed 'inhalable' and 'respirable'.
46 Inhalable dust approximates to the fraction of airborne material that enters the nose and mouth during breathing and is therefore available for deposition in the respiratory tract. Respirable dust approximates to the fraction that penetrates to the gas exchange region of the lung. Fuller definitions and explanatory material are given in MDHS14/3.
47 Where dusts contain components that have their own assigned WEL, all the relevant limits should be complied with.

FR

Composants	Base	Valeur	Paramètres de contrôle	Note
Crystalline Silica	FR VLE	VME	0,1 mg/m3	noir, Fraction de poussière alvéolaire

noir Valeurs limites réglementaires contraignantes

FI

Aineosat	Peruste	Arvo	Valvontaa koskevat muuttujat	Huomautus
Ferrous Sulfate	FI OEL	HTP-arvot 8h	1 mg/m3	
Chromium Acetate	FI OEL	HTP-arvot 8h	0,5 mg/m3	
Crystalline Silica	FI OEL	HTP-arvot 8h	0,2 mg/m3	-, alveolijae
	FI OEL	HTP-arvot 8h	0,05 mg/m3	alveolijae

\- Valtioneuvoston päätös räjäytys- ja louhintatyön järjestysohjeista [410/1986]

ES

Componentes	Base	Valor	Parámetros de control	Nota
Ferrous Sulfate	ES VLA	VLA-ED	1 mg/m3	c,
Crystalline Silica	ES VLA	VLA-ED	0,05 mg/m3	d, n, y, fracción respirable

c Los términos 'soluble' e 'insoluble' se entienden con referencia al agua.
d Véase UNE EN 481: Atmósferas en los puestos de trabajo. Definición de las fracciones por el tamaño de las partículas para la medición de aerosoles.
n En las industrias extractivas véase la Orden ITC 2585/2007, de 30 de agosto (BOE nº 315 de 7 de septiembre de 2007), por la que se aprueba la Instrucción Técnica Complementaria 2.0.02 del Reglamento General de Normas Básicas de Seguridad Minera.
y Reclasificado, por la International Agency for Research on Cancer (IARC) de grupo 2A (probablemente carcinogénico en

humanos) a grupo 1 (carcinogénico en humanos).

EE

Komponendid, osad	Alused	Väärtus	Kontrolliparameetrid	Märkused
Crystalline Silica	EE OEL	Piirnorm	0,1 mg/m3	1, Peentolm
	EE OEL	Piirnorm	0,1 mg/m3	1, Peentolm

1 Peentolm koosneb alla 2,5-mikromeetrise läbimõõduga osakestest, mis võivad jõuda koos sissehingatava õhuga kopsu alveoolidesse

DK

Komponenter	Basis	Værdi	Kontrolparametre	Note
Ferrous Sulfate	DK OEL	GV	1 mg/m3	
Chromium Acetate	DK OEL	GV	0,5 mg/m3	E,
Crystalline Silica	DK OEL	GV	0,1 mg/m3	K, (respirabelt støv)
	DK OEL	GV	0,3 mg/m3	Totalt støv

E At stoffet har en EF-grænseværdi
K Betyder, at stoffet er optaget på listen over stoffer, der anses for at være kræftfremkaldende.

DE

Inhaltsstoffe	Grundlage	Wert	Zu überwachende Parameter	Bemerkung
Chromium Acetate	DE TRGS 900	AGW	2 mg/m3	EU, 10, Einatembare Fraktion
	DE TRGS 900	AGW	2 mg/m3	EU, 10, Einatembare Fraktion

10 Der Arbeitsplatzgrenzwert bezieht sich auf den Elementgehalt des entsprechenden Metalls.
EU Europäische Union (Von der EU wurde ein Luftgrenzwert festgelegt: Abweichungen bei Wert und Spitzenbegrenzung sind möglich.)

CZ

Složky	Základ	Hodnota	Kontrolní parametry	Poznámka
Chromium Acetate	CZ OEL	PEL	0,5 mg/m3	I,
	CZ OEL	NPK-P	1,5 mg/m3	I,
Crystalline Silica	CZ OEL	PEL	0,1 mg/m3	Fr, vlákno, respirabilní frakce

Fr Fr = obsah fibrogenní složky v respirabilní frakci v procentech
I dráždí sliznice (oči, dýchací cesty) resp. kůži

CY

Συστατικά	Βάση	Τιμή	Παράμετροι ελέγχου	Σημείωση
Crystalline Silica	CY OEL 2	Μ.Ε.Σ.	10mg/m3 / % respirable quartz	

CH

Inhaltsstoffe	Grundlage	Wert	Zu überwachende Parameter	Bemerkung
Ferrous Sulfate	CH SUVA	MAK-Wert	1 mg/m3	OSHA, einatembarer Staub
Chromium Acetate	CH SUVA	MAK-Wert	0,5 mg/m3	S, NIOSH, HSE, einatembarer Staub
Crystalline Silica	CH SUVA	MAK-Wert	0,15 mg/m3	P, Carc.Cat.1, NIOSH, OSHA, HSE, SSc, alveolengängiger Staub

Carc.Cat.1 Krebserzeugende Stoffe Kategorie 1
HSE Health and Safety Executive (Occupational Medicine and Hygiene Laboratory)
NIOSH National Institute for Occupational Safety and Health
OSHA Occupational Safety and Health Administration
P Provisorische Festlegung - Die MAK-Werte für diese Substanzen sind aus verschiedenen Gründen noch nicht definitiv festgelegt.
S Sensibilisatoren, die mit S gekennzeichneten Substanzen führen besonders häufig zu Überempfindlichkeitsreaktionen (allergischen Krankheiten).
SSc Eine Schädigung der Leibesfrucht braucht bei Einhaltung des MAK-Wertes nicht befürchtet zu werden.

BG

Съставки	Основа	Стойност	Параметри на контрол	Бележка
Ferrous Sulfate	BG OEL	TWA	1 mg/m3	
Crystalline Silica	BG OEL	TWA	0,07 mg/m3	Респирабилна

BE

Bestanddelen	Basis	Waarde	Controleparameters	Opmerking
Ferrous Sulfate	BE OEL	TGG 8 hr	1 mg/m3	
Crystalline Silica	BE OEL	TGG 8 hr	0,1 mg/m3	inadembaar
	BE OEL	TGG 8 hr	0,1 mg/m3	(respirabel stof)

AT

Inhaltsstoffe	Grundlage	Wert	Zu überwachende Parameter	Bemerkung
Crystalline Silica	AT OEL	TMW	0,15 mg/m3	Alveolengängige Staubfraktion

SI

Ime snovi	Št. CAS	Parametri nadzora	Čas vzorčenja	Sprememba
Chromium Acetate	1066-30-4	krom: 65.27 µmol/mol kreatinina (Urin)	Enkratni vzorec ob koncu delovne izmene	2011-06-03
		krom: 30 µg/g kreatinina (Urin)	Enkratni vzorec ob koncu delovne izmene	2011-06-03

Engineering measures

Adequate ventilation to control airborned concentrations below the exposure guidelines/limits. Consider the potential hazards of this material (see Section 2), applicable exposure limits, job activities, and other substances in the work place when designing engineering controls and selecting personal protective equipment. If engineering controls or work practices are not adequate to prevent exposure to harmful levels of this material, the personal protective equipment listed below is recommended. The user should read and understand all instructions and limitations supplied with the equipment since protection is usually provided for a limited time or under certain circumstances.

Personal protective equipment

Respiratory protection : Wear a supplied-air NIOSH approved respirator unless ventilation or other engineering controls are adequate to maintain minimal oxygen content of 19.5% by volume under normal atmospheric pressure. Wear a NIOSH approved respirator that provides protection when working with this material if exposure to harmful levels of airborne material may occur, such as:. Dust safety masks are recommended when the dust concentration is excessive. Air-Purifying Respirator for Dusts and Mists / P100. Use a positive pressure, air-supplying respirator if there is potential for uncontrolled release, exposure levels are not known, or other circumstances where air-purifying respirators may not provide adequate protection.

Hand protection : The suitability for a specific workplace should be discussed with the producers of the protective gloves. Please observe the instructions regarding permeability and breakthrough time which are provided by the supplier of the gloves. Also take into consideration the specific local conditions under which the product is used, such as the danger of cuts, abrasion, and the contact time. Gloves should be discarded and replaced if there is any indication of degradation or chemical breakthrough.

Eye protection : Eye wash bottle with pure water. Safety glasses.

Skin and body protection : Choose body protection in relation to its type, to the concentration and amount of dangerous substances, and to the specific work-place. Wear as appropriate:. Remove and wash contaminated clothing before re-use. Skin should be washed after contact. Footwear protecting against chemicals.

Hygiene measures : When using do not eat or drink. When using do not smoke. Wash hands before breaks and at the end of workday.

SECTION 9: Physical and chemical properties

Information on basic physical and chemical properties

Appearance

Form	:	Powder
Physical state	:	Solid
Color	:	Reddish brown
Odor	:	Mild
Odor Threshold	:	No data available

Safety data

Flash point	:	Not applicable
Lower explosion limit	:	Not applicable
Upper explosion limit	:	Not applicable
Oxidizing properties	:	No
Autoignition temperature	:	No data available
Thermal decomposition	:	No data available
Molecular formula	:	Mixture
Molecular weight	:	Not applicable
pH	:	Not applicable
Pour point	:	No data available
Boiling point/boiling range	:	Not applicable
Vapor pressure	:	Not applicable
Relative density	:	Not applicable
Density	:	1,59 g/cm3
Water solubility	:	Partly soluble
Partition coefficient: n-octanol/water	:	No data available
Viscosity, kinematic	:	Not applicable
Relative vapor density	:	Not applicable

SECTION 10: Stability and reactivity

Chemical stability	:	This material is considered stable under normal ambient and anticipated storage and handling conditions of temperature and pressure.

Possibility of hazardous reactions

Conditions to avoid	:	No data available.
Thermal decomposition	:	No data available
Hazardous decomposition products	:	No data available
Other data	:	No decomposition if stored and applied as directed.

SECTION 11: Toxicological information

Desco® Deflocculant
Acute oral toxicity : Acute toxicity estimate: 3.310 mg/kg
Method: Calculation method

Acute toxicity estimate: > 2.000 mg/kg
Method: Calculation method

Desco® Deflocculant
Acute dermal toxicity : Acute toxicity estimate: > 5.000 mg/kg
Method: Calculation method

Desco® Deflocculant
Skin irritation : May cause skin irritation and/or dermatitis.

Desco® Deflocculant
Eye irritation : Irritating to eyes.

Desco® Deflocculant
Sensitization : Causes sensitization.

Repeated dose toxicity

Sulfomethylated Quebracho : Species: Rat, male
Sex: male
Application Route: oral gavage
Dose: 100, 300, 1000 mg/kg
Exposure time: 32 d
Number of exposures: Daily
NOEL: 1.000 mg/kg
Method: OECD Guideline 422
No adverse effects expected

Species: Rat, female
Sex: female
Application Route: oral gavage
Dose: 100, 300, 1000 mg/kg
Exposure time: 39 - 47 d
Number of exposures: Daily
NOEL: 1.000 mg/kg
Method: OECD Guideline 422
No adverse effects expected

Chromium Acetate Species: Mouse

Application Route: oral gavage
Dose: 5 ppm
Exposure time: lifetime
Number of exposures: in drinking water

Carcinogenicity

Chromium Acetate : Species: Rat
Dose: 5 mg/l
Exposure time: lifetime
Number of exposures: in drinking water
Remarks: no increase incidence of tumors

Reproductive toxicity

Sulfomethylated Quebracho : Species: Rat
Sex: male
Application Route: oral gavage
Dose: 100, 300, 1000 mg/kg
Exposure time: 32 d
Number of exposures: Daily
Method: OECD Guideline 422
NOAEL Parent: 1.000 mg/kg
NOAEL F1: 1.000 mg/kg
Fertility and developmental toxicity tests did not reveal any effect on reproduction.

Species: Rat
Sex: female
Application Route: oral gavage
Dose: 100, 300, 1000 mg/kg
Exposure time: 39 - 47 d
Number of exposures: Daily
Method: OECD Guideline 422
NOAEL Parent: 1.000 mg/kg
NOAEL F1: 1.000 mg/kg
Fertility and developmental toxicity tests did not reveal any effect on reproduction.

CMR effects

Crystalline Silica : Carcinogenicity: Human carcinogen.

Desco® Deflocculant
Further information : No data available.

SECTION 12: Ecological information

Toxicity to fish

Sulfomethylated Quebracho : LL50: > 1.800 mg/l
Exposure time: 96 h
Species: Scophthalmus maximus (Flatfish, Flounder)
Method: OECD Test Guideline 203

Ferrous Sulfate LL50: > 6,25 mg/l

Exposure time: 96 h
Species: Cyprinodon variegatus (sheepshead minnow)
Method: OECD Test Guideline 203

Chromium Acetate — LC50: > 100 mg/l
Exposure time: 96 h
Species: Danio rerio (Zebra Fish)
semi-static test Method: OECD Test Guideline 203

Toxicity to daphnia and other aquatic invertebrates

Sulfomethylated Quebracho : EL50: 73,2 mg/l
Exposure time: 48 h
Species: Acartia tonsa (Marine Copepod)
Method: ISO TC147/SC5/WG2

Ferrous Sulfate — LC50: 190 mg/l
Exposure time: 48 h
Species: Acartia tonsa (Marine Copepod)

Chromium Acetate — EC50: > 100 mg/l
Exposure time: 48 h
Species: Daphnia magna (Water flea)
semi-static test Method: OECD Test Guideline 202

Toxicity to algae

Sulfomethylated Quebracho : ErC50: > 100 mg/l
Exposure time: 72 h
Species: Desmodesmus subspicatus (green algae)
Method: OECD Test Guideline 201

EbC50: 79 mg/l
Exposure time: 72 h
Species: Desmodesmus subspicatus (green algae)
Method: OECD Test Guideline 201

Ferrous Sulfate — EL50: 45 mg/l
Exposure time: 72 h
Species: Skeletonema costatum (Marine Algae)

Elimination information (persistence and degradability)

Biodegradability : Taking into consideration the properties of several ingredients, the product is estimated not to be readily biodegradable according to OECD classification.

Ecotoxicology Assessment

Acute aquatic toxicity
Sulfomethylated Quebracho : Harmful to aquatic life.

Chromium Acetate : Harmful to aquatic life.

Chronic aquatic toxicity

Sulfomethylated Quebracho	:	Harmful to aquatic life with long lasting effects.
Results of PBT assessment	:	This substance/mixture contains no components considered to be either persistent, bioaccumulative and toxic (PBT), or very persistent and very bioaccumulative (vPvB) at levels of 0.1% or higher.
Additional ecological information	:	Harmful to aquatic life with long lasting effects.

SECTION 13: Disposal considerations

The information in this SDS pertains only to the product as shipped.

Use material for its intended purpose or recycle if possible. This material, if it must be discarded, may meet the criteria of a hazardous waste as defined by US EPA under RCRA (40 CFR 261) or other State and local regulations. Measurement of certain physical properties and analysis for regulated components may be necessary to make a correct determination. If this material is classified as a hazardous waste, federal law requires disposal at a licensed hazardous waste disposal facility.

Product	:	The product should not be allowed to enter drains, water courses or the soil. Do not contaminate ponds, waterways or ditches with chemical or used container. Send to a licensed waste management company.
Contaminated packaging	:	Empty remaining contents. Dispose of as unused product. Do not re-use empty containers.

SECTION 14: Transport information

The shipping descriptions shown here are for bulk shipments only, and may not apply to shipments in non-bulk packages (see regulatory definition).

Consult the appropriate domestic or international mode-specific and quantity-specific Dangerous Goods Regulations for additional shipping description requirements (e.g., technical name or names, etc.) Therefore, the information shown here, may not always agree with the bill of lading shipping description for the material. Flashpoints for the material may vary slightly between the SDS and the bill of lading.

US DOT (UNITED STATES DEPARTMENT OF TRANSPORTATION)
NOT REGULATED AS A HAZARDOUS MATERIAL OR DANGEROUS GOODS FOR TRANSPORTATION BY THIS AGENCY.

IMO / IMDG (INTERNATIONAL MARITIME DANGEROUS GOODS)
NOT REGULATED AS A HAZARDOUS MATERIAL OR DANGEROUS GOODS FOR TRANSPORTATION BY THIS AGENCY.

IATA (INTERNATIONAL AIR TRANSPORT ASSOCIATION)
NOT REGULATED AS A HAZARDOUS MATERIAL OR DANGEROUS GOODS FOR TRANSPORTATION BY THIS AGENCY.

ADR (AGREEMENT ON DANGEROUS GOODS BY ROAD (EUROPE))
NOT REGULATED AS A HAZARDOUS MATERIAL OR DANGEROUS GOODS FOR TRANSPORTATION BY THIS AGENCY.

RID (REGULATIONS CONCERNING THE INTERNATIONAL TRANSPORT OF DANGEROUS GOODS (EUROPE))

NOT REGULATED AS A HAZARDOUS MATERIAL OR DANGEROUS GOODS FOR TRANSPORTATION BY THIS AGENCY.

ADN (EUROPEAN AGREEMENT CONCERNING THE INTERNATIONAL CARRIAGE OF DANGEROUS GOODS BY INLAND WATERWAYS)

NOT REGULATED AS A HAZARDOUS MATERIAL OR DANGEROUS GOODS FOR TRANSPORTATION BY THIS AGENCY.

Transport in bulk according to Annex II of MARPOL 73/78 and the IBC Code

SECTION 15: Regulatory information

National legislation

Major Accident Hazard Legislation : 96/82/EC Update:
Not applicable

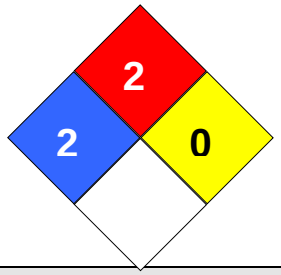
Water contaminating class (Germany) : WGK 2 water endangering

Notification status

Europe REACH	:	This mixture contains only ingredients which have been subject to a pre-registration according to Regulation (EU) No. 1907/2006 (REACH).
Switzerland CH INV	:	On the inventory, or in compliance with the inventory
United States of America TSCA	:	On the inventory, or in compliance with the inventory
Canada DSL	:	On the inventory, or in compliance with the inventory
Australia AICS	:	On the inventory, or in compliance with the inventory
New Zealand NZIoC	:	On the inventory, or in compliance with the inventory
Japan ENCS	:	Not in compliance with the inventory
Korea KECI	:	On the inventory, or in compliance with the inventory
Philippines PICCS	:	Not in compliance with the inventory
China IECSC	:	On the inventory, or in compliance with the inventory

SECTION 16: Other information

NFPA Classification : Health Hazard: 2
Fire Hazard: 2
Reactivity Hazard: 0



Further information

Legacy SDS Number : 59390

Significant changes since the last version are highlighted in the margin. This version replaces all previous versions.

The information in this SDS pertains only to the product as shipped.

The information provided in this Safety Data Sheet is correct to the best of our knowledge, information and belief at the date of its publication. The information given is designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered a warranty or quality specification. The information relates only to the specific material designated and may not be valid for such material used in combination with any other materials or in any process, unless specified in the text.

Key or legend to abbreviations and acronyms used in the safety data sheet			
ACGIH	American Conference of Government Industrial Hygienists	LD50	Lethal Dose 50%
AICS	Australia, Inventory of Chemical Substances	LOAEL	Lowest Observed Adverse Effect Level
DSL	Canada, Domestic Substances List	NFPA	National Fire Protection Agency
NDSL	Canada, Non-Domestic Substances List	NIOSH	National Institute for Occupational Safety & Health
CNS	Central Nervous System	NTP	National Toxicology Program
CAS	Chemical Abstract Service	NZIoC	New Zealand Inventory of Chemicals
EC50	Effective Concentration	NOAEL	No Observable Adverse Effect Level
EC50	Effective Concentration 50%	NOEC	No Observed Effect Concentration
EGEST	EOSCA Generic Exposure Scenario Tool	OSHA	Occupational Safety & Health Administration
EOSCA	European Oilfield Specialty Chemicals Association	PEL	Permissible Exposure Limit
EINECS	European Inventory of Existing Chemical Substances	PICCS	Philippines Inventory of Commercial Chemical Substances
MAK	Germany Maximum Concentration Values	PRNT	Presumed Not Toxic
GHS	Globally Harmonized System	RCRA	Resource Conservation Recovery Act
>=	Greater Than or Equal To	STEL	Short-term Exposure Limit
IC50	Inhibition Concentration 50%	SARA	Superfund Amendments and Reauthorization Act.
IARC	International Agency for Research on Cancer	TLV	Threshold Limit Value
IECSC	Inventory of Existing Chemical Substances in China	TWA	Time Weighted Average
ENCS	Japan, Inventory of Existing and New Chemical Substances	TSCA	Toxic Substance Control Act
KECI	Korea, Existing Chemical Inventory	UVCB	Unknown or Variable Composition, Complex Reaction Products, and Biological Materials
<=	Less Than or Equal To	WHMIS	Workplace Hazardous Materials Information System
LC50	Lethal Concentration 50%		

Full text of H-Statements referred to under sections 2 and 3.

H302	Harmful if swallowed.
H315	Causes skin irritation.
H317	May cause an allergic skin reaction.
H319	Causes serious eye irritation.
H350	May cause cancer.
H350i	May cause cancer by inhalation.
H372	Causes damage to organs through prolonged or repeated exposure if inhaled.
H412	Harmful to aquatic life with long lasting effects.