

## SECTION 1: Identification de la substance/du mélange et de la société/l'entreprise

### 1.1. Identificateur de produit

Forme du produit : Mélange  
 Nom : SUPERPHOSPHATE  
 Code du produit : AOP118

### 1.2. Utilisations identifiées pertinentes de la substance ou du mélange et utilisations déconseillées

#### 1.2.1. Utilisations identifiées pertinentes

Catégorie d'usage principal : Utilisation industrielle, Utilisation professionnelle  
 Utilisation de la substance/mélange : Fertilisant  
 Fonction ou catégorie d'utilisation : Engrais

Titre	Descripteurs d'utilisation
Usage industriel et professionnel en fertilisant (Source: Rapport sur la sécurité Chimique des composants)	SU3, SU10, PC12, PC19, PC20, PROC1, PROC2, PROC3, PROC5, PROC8a, PROC8b, PROC9, ERC2, ERC6a
Usage professionnel en fertilisant (Source: Rapport sur la sécurité Chimique des composants)	SU21, SU22, PC12, PC20, PROC2, PROC8a, PROC8b, PROC9, PROC13, PROC19, ERC8b, ERC8d, ERC8e

Texte intégral des descripteurs d'usage : voir section 16.

#### 1.2.2. Usages déconseillés

Pas d'informations complémentaires disponibles

### 1.3. Renseignements concernant le fournisseur de la fiche de données de sécurité

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 24 avenue Marcel DASSAULT  
 31505 Toulouse cedex - FRANCE  
 T +33 5 61 36 01 23  
[contact@arterris.fr](mailto:contact@arterris.fr) - [www.arterris.fr](http://www.arterris.fr)

### 1.4. Numéro d'appel d'urgence

Pays	Organisme/Société	Adresse	Numéro d'urgence
Europe/Middle-East/Africa	3E (24h/7d)		+1-760-476-3961 (Access code : 333021)
France	ORFILA		+33 1 45 42 59 59

## SECTION 2: Identification des dangers

### 2.1. Classification de la substance ou du mélange

#### Classification selon le règlement (CE) N° 1272/2008 [CLP]

Eye Dam. 1 H318

Texte complet des phrases H: voir section 16

### 2.2. Éléments d'étiquetage

#### Étiquetage selon le règlement (CE) N° 1272/2008 [CLP]

Pictogrammes de danger (CLP) :



GHS05

Mention d'avertissement (CLP) : Danger  
 Composants dangereux : Superphosphate triple, Superphosphate simple  
 Mentions de danger (CLP) : H318 - Provoque des lésions oculaires graves  
 Conseils de prudence (CLP) : P280 - Porter des gants de protection/des vêtements de protection/un équipement de protection des yeux/un équipement de protection du visage  
 P305+P351+P338 - EN CAS DE CONTACT AVEC LES YEUX: rincer avec précaution à l'eau pendant plusieurs minutes. Enlever les lentilles de contact si la victime en porte et si elles peuvent être facilement enlevées. Continuer à rincer

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P310 - Appeler immédiatement un CENTRE ANTIPOISON ou un médecin

### 2.3. Autres dangers

Autres dangers qui n'entraînent pas la classification : Un contact prolongé ou répété avec la peau peut provoquer irritation, dermatites de contact. Peut causer une eutrophisation à très faible concentration.

## SECTION 3: Composition/informations sur les composants

### 3.1. Substance

Non applicable

### 3.2. Mélange

Nom	Identificateur de produit	%	Classification selon la directive 67/548/CEE	Classification selon le règlement (CE) N° 1272/2008 [CLP]
Superphosphate triple	(n° CAS) 65996-95-4 (Numéro CE) 266-030-3 (N° REACH) 01-2119493057-33	>= 3	Xi; R41	Eye Dam. 1, H318
Superphosphate simple	(n° CAS) 8011-76-5 (Numéro CE) 232-379-5 (N° REACH) 01-2119488967-11	>= 3	Xi; R41	Eye Dam. 1, H318

Textes des phrases R et H: voir section 16

## SECTION 4: Premiers secours

### 4.1. Description des premiers secours

Premiers soins après inhalation : Amener la victime à l'air frais. Troubles respiratoires: consulter un médecin/service médical.  
Premiers soins après contact avec la peau : Après contact avec la peau, se laver immédiatement et abondamment avec de l'eau.  
Premiers soins après contact oculaire : EN CAS DE CONTACT AVEC LES YEUX: rincer avec précaution à l'eau pendant plusieurs minutes. Enlever les lentilles de contact si la victime en porte et si elles peuvent être facilement enlevées. Continuer à rincer. Consulter un ophtalmologue si l'irritation persiste.  
Premiers soins après ingestion : En cas d'ingestion rincer la bouche avec de l'eau (seulement si la personne est consciente). Ne pas faire vomir. Ne rien donner à boire. Consulter un médecin.

### 4.2. Principaux symptômes et effets, aigus et différés

Symptômes/lésions : Voir 2.1 / 2.3.

### 4.3. Indication des éventuels soins médicaux immédiats et traitements particuliers nécessaires

Aucune donnée / information disponible.

## SECTION 5: Mesures de lutte contre l'incendie

### 5.1. Moyens d'extinction

Moyens d'extinction appropriés : Eau, dioxyde de carbone (CO2), poudre et mousse.  
Agents d'extinction non appropriés : Aucun.

### 5.2. Dangers particuliers résultant de la substance ou du mélange

Danger d'incendie : Non combustible. Par décomposition thermique, le produit peut dégager des oxydes de soufre, de l'ammoniac, des oxydes de phosphore (Ex : P2O5).

### 5.3. Conseils aux pompiers

Protection en cas d'incendie : Ne pas pénétrer ou rester dans la zone dangereuse sans vêtements de protection. Le port d'un appareil respiratoire isolant autonome est recommandé pour pénétrer dans la zone dangereuse.  
Autres informations : Eviter le rejet des eaux d'incendie dans les égouts.

## SECTION 6: Mesures à prendre en cas de déversement accidentel

### 6.1. Précautions individuelles, équipement de protection et procédures d'urgence

Mesures générales : Eviter la production de poussières. Eviter le contact avec la peau et les yeux. Voir la rubrique 8 en ce qui concerne les protections individuelles à utiliser.

#### 6.1.1. Pour les non-secouristes

Pas d'informations complémentaires disponibles

#### 6.1.2. Pour les secouristes

Pas d'informations complémentaires disponibles

### 6.2. Précautions pour la protection de l'environnement

Empêcher la pollution du sol et de l'eau.

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### 6.3. Méthodes et matériel de confinement et de nettoyage

Procédés de nettoyage : Recueillir le produit répandu. Recueillir soigneusement les résidus. Mettre le produit absorbé dans un récipient qui se referme. Ce produit et son récipient doivent être éliminés de manière sûre, conformément à la législation locale. Rincer les surfaces souillées abondamment à l'eau. Ne pas rejeter les déchets à l'égout.

### 6.4. Référence à d'autres sections

Pour plus d'informations, se reporter à la section 8 : "Contrôle de l'exposition-protection individuelle". Pour l'élimination des résidus, se reporter à la section 13 : Considérations relatives à l'élimination".

## SECTION 7: Manipulation et stockage

### 7.1. Précautions à prendre pour une manipulation sans danger

Précautions à prendre pour une manipulation sans danger : Ne pas manger, boire ou fumer en manipulant ce produit. Se conformer à la réglementation en vigueur. Prévoir une ventilation suffisante pour réduire les concentrations de poussières. Eviter le contact avec la peau et les yeux.

Conditions de stockage : Conserver dans les conteneurs d'origine.  
Lieu de stockage : Conserver dans un endroit sec. Conserver à température ambiante.

### 7.3. Utilisation(s) finale(s) particulière(s)

(voir section(s) : 1.2. Utilisations recommandées & restrictions. ).

## SECTION 8: Contrôles de l'exposition/protection individuelle

### 8.1. Paramètres de contrôle

SUPERPHOSPHATE	
DNEL/DMEL (Travailleurs)	
A long terme - effets systémiques, cutanée	17,4 mg/kg de poids corporel/jour Superphosphate simple, superphosphate triple
A long terme - effets systémiques, inhalation	3,1 mg/m <sup>3</sup> Superphosphate simple, superphosphate triple
DNEL/DMEL (Population générale)	
A long terme - effets systémiques, orale	2,1 mg/kg de poids corporel/jour Superphosphate simple, superphosphate triple
A long terme - effets systémiques, inhalation	0,9 mg/m <sup>3</sup> Superphosphate simple, superphosphate triple
A long terme - effets systémiques, cutanée	10,4 mg/kg de poids corporel/jour Superphosphate simple, superphosphate triple
PNEC (Eau)	
PNEC aqua (eau douce)	1,7 mg/l Superphosphate simple, superphosphate triple
PNEC aqua (eau de mer)	0,17 mg/l Superphosphate simple, superphosphate triple
PNEC aqua (intermittente, eau de mer)	17 mg/l Superphosphate simple, superphosphate triple
PNEC (STP)	
PNEC station d'épuration	10 mg/l Superphosphate simple, superphosphate triple

Source : Rapports sur la sécurité chimique des composants

### 8.2. Contrôles de l'exposition

Équipement de protection individuelle : Dégagement de poussières: masque antipoussières filtre P2. Lunettes de protection.  
Protection des mains : En cas de contact répété ou prolongé, porter des gants. (conforme à la norme EN 374)  
Protection oculaire : Lunettes de sécurité avec protections latérales. (conforme à la norme EN 166)  
Protection de la peau et du corps : Prévoir une protection de la peau adaptée aux conditions d'utilisation  
Protection des voies respiratoires : En cas de risque de production excessive de poussières, porter un masque adéquat. Filtre anti-aérosol/poussières type P2 (conforme à la norme EN 143)



Autres informations : Se laver les mains après travail avec le produit. Enlever les vêtements contaminés et les laver avant réutilisation. Ne pas boire, manger ou fumer sur le lieu de travail.

## SECTION 9: Propriétés physiques et chimiques

### 9.1. Informations sur les propriétés physiques et chimiques essentielles

État physique : Solide  
Couleur : Gris(e).  
Odeur : inodore.  
Seuil olfactif : Aucune donnée disponible

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pH	: Aucune donnée disponible
Vitesse d'évaporation relative (acétate de butyle=1)	: Aucune donnée disponible
Point de fusion	: Non applicable
Point de congélation	: Aucune donnée disponible
Point d'ébullition	: Non applicable
Point d'éclair	: Aucune donnée disponible
Température d'auto-inflammation	: Non applicable
Température de décomposition	: > 100 °C
Inflammabilité (solide, gaz)	: Ininflammable
Pression de vapeur	: 8.4X10 <sup>-7</sup> Pa OECD 104, ECA.4
Densité relative de vapeur à 20 °C	: 2,09 OECD 109, ECA.3
Densité relative	: Aucune donnée disponible
Masse volumique	: 1200 - 1400 kg/m <sup>3</sup>
Solubilité	: Eau: 20°C 1 - 100 g/l
Log Pow	: Aucune donnée disponible
Viscosité, cinématique	: Non applicable
Viscosité, dynamique	: Non applicable
Propriétés explosives	: Le produit n'est pas explosif.
Propriétés comburantes	: Non comburant.
Limites d'explosivité	: Non applicable Non applicable

### 9.2. Autres informations

Pas d'informations complémentaires disponibles

## SECTION 10: Stabilité et réactivité

### 10.1. Réactivité

Pas d'informations complémentaires disponibles

### 10.2. Stabilité chimique

Stable à température ambiante et dans les conditions normales d'emploi.

### 10.3. Possibilité de réactions dangereuses

Aucune donnée / information disponible.

### 10.4. Conditions à éviter

Chaleur.

### 10.5. Matières incompatibles

Alcalis, acides forts, cuivre et autres alliages.

### 10.6. Produits de décomposition dangereux

En cas d'incendie : voir section 5.

## SECTION 11: Informations toxicologiques

### 11.1. Informations sur les effets toxicologiques

Toxicité aiguë : Non classé (Compte tenu des données disponibles, les critères de classification ne sont pas remplis)

<b>Superphosphate triple (65996-95-4)</b>	
DI 50 cutanée rat	≥ 5000 mg/kg (OECD 402 avec hydrogénéorthophosphate de diammonium; EPA avec calcium bis (dihydrogénéorthophosphate))
DL50 cutanée lapin	≥ 2000 mg/kg (OECD 425 avec hydrogénéorthophosphate de diammonium; EPA avec calcium bis (dihydrogénéorthophosphate))
CL50 inhalation rat (mg/l)	≥ 5 mg/l/4h (OECD 403 avec hydrogénéorthophosphate de diammonium; EPA avec calcium bis (dihydrogénéorthophosphate))
<b>Superphosphate simple (8011-76-5)</b>	
DI 50 cutanée rat	≥ 5000 mg/kg (OECD 402 avec hydrogénéorthophosphate de diammonium; EPA avec calcium bis (dihydrogénéorthophosphate))
DL50 cutanée lapin	≥ 2000 mg/kg (OECD 425 avec hydrogénéorthophosphate de diammonium; EPA avec calcium bis (dihydrogénéorthophosphate))
CL50 inhalation rat (mg/l)	≥ 5 mg/l/4h (OECD 403 avec hydrogénéorthophosphate de diammonium; EPA avec calcium bis (dihydrogénéorthophosphate))

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Corrosion cutanée/irritation cutanée	: Non classé (Compte tenu des données disponibles, les critères de classification ne sont pas remplis) Un contact prolongé ou répété avec la peau peut provoquer irritation, dermatites de contact.
Lésions oculaires graves/irritation oculaire	: Provoque des lésions oculaires graves.
Sensibilisation respiratoire ou cutanée	: Non classé (Compte tenu des données disponibles, les critères de classification ne sont pas remplis) Les poussières éventuelles du produit peuvent provoquer une irritation respiratoire à la suite d'une exposition excessive par inhalation
Mutagénicité sur les cellules germinales	: Non classé (Compte tenu des données disponibles, les critères de classification ne sont pas remplis)
Cancérogénicité	: Non classé (Compte tenu des données disponibles, les critères de classification ne sont pas remplis)
Toxicité pour la reproduction	: Non classé (Compte tenu des données disponibles, les critères de classification ne sont pas remplis)
Toxicité spécifique pour certains organes cibles (exposition unique)	: Non classé (Compte tenu des données disponibles, les critères de classification ne sont pas remplis)
Toxicité spécifique pour certains organes cibles (exposition répétée)	: Non classé (Compte tenu des données disponibles, les critères de classification ne sont pas remplis)
Danger par aspiration	: Non classé (Compte tenu des données disponibles, les critères de classification ne sont pas remplis)

## SECTION 12: Informations écologiques

### 12.1. Toxicité

Ecologie - général : Aucune étude n'a été réalisée sur le mélange pour le moment. Eviter le rejet de grandes quantités du produit dans l'environnement.

Superphosphate triple (65996-95-4)	
CL50 poisson 1	85,9 mg/l
CL50 autres organismes aquatiques 1	87,6 mg/l
CE50 autres organismes aquatiques 2	1790 mg/l
Source	Rapports sur la sécurité chimique des composants
Superphosphate simple (8011-76-5)	
CL50 poisson 1	85,9 mg/l
CL50 autres organismes aquatiques 1	87,6 mg/l
CE50 autres organismes aquatiques 2	1790 mg/l
Source	Rapports sur la sécurité chimique des composants

### 12.2. Persistance et dégradabilité

SUPERPHOSPHATE	
Persistance et dégradabilité	Les composants principaux du mélange ont une bonne dégradation.

### 12.3. Potentiel de bioaccumulation

SUPERPHOSPHATE	
Potentiel de bioaccumulation	Aucune donnée / information disponible.

### 12.4. Mobilité dans le sol

SUPERPHOSPHATE	
Ecologie - sol	Les composants principaux du mélange sont entièrement solubles dans l'eau.

### 12.5. Résultats des évaluations PBT et VPVB

Pas d'informations complémentaires disponibles

### 12.6. Autres effets néfastes

Autres effets néfastes : Aucune donnée disponible.

## SECTION 13: Considérations relatives à l'élimination

### 13.1. Méthodes de traitement des déchets

Législation régionale (déchets)	: Elimination à effectuer conformément aux prescriptions légales.
Méthodes de traitement des déchets	: Détruire conformément aux règlements de sécurité locaux/nationaux en vigueur.
Indications complémentaires	: Eliminer par incinération ou récupérer l'emballage pour recyclage après élimination des résidus du produit. Recyclage ou incinération par une entreprise agréée.

## SECTION 14: Informations relatives au transport

Conformément aux exigences de ADR / RID / IMDG / IATA / ADN

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### 14.1. Numéro ONU

Non réglementé pour le transport

### 14.2. Nom d'expédition des Nations unies

Désignation officielle de transport (ADR) : Non applicable  
Désignation officielle de transport (IMDG) : Non applicable  
Désignation officielle de transport (IATA) : Non applicable  
Désignation officielle de transport (ADN) : Non applicable  
Désignation officielle de transport (RID) : Non applicable

### 14.3. Classe(s) de danger pour le transport

#### ADR

Classe(s) de danger pour le transport (ADR) : Non applicable

#### IMDG

Classe(s) de danger pour le transport (IMDG) : Non applicable

#### IATA

Classe(s) de danger pour le transport (IATA) : Non applicable

#### ADN

Classe(s) de danger pour le transport (ADN) : Non applicable

#### RID

Classe(s) de danger pour le transport (RID) : Non applicable

### 14.4. Groupe d'emballage

Groupe d'emballage (ADR) : Non applicable  
Groupe d'emballage (IMDG) : Non applicable  
Groupe d'emballage (IATA) : Non applicable  
Groupe d'emballage (ADN) : Non applicable  
Groupe d'emballage (RID) : Non applicable

### 14.5. Dangers pour l'environnement

Dangereux pour l'environnement : Non  
Polluant marin : Non  
Autres informations : Pas d'informations supplémentaires disponibles

### 14.6. Précautions particulières à prendre par l'utilisateur

#### - Transport par voie terrestre

Aucune donnée disponible

#### - Transport maritime

Aucune donnée disponible

#### - Transport aérien

Aucune donnée disponible

#### - Transport par voie fluviale

Non soumis à l'ADN : Non

#### - Transport ferroviaire

Transport interdit (RID) : Non

### 14.7. Transport en vrac conformément à l'annexe II de la convention MARPOL 73/78 et au recueil IBC

Non applicable

## SECTION 15: Informations réglementaires

### 15.1. Réglementations/législation particulières à la substance ou au mélange en matière de sécurité, de santé et d'environnement

#### 15.1.1. Réglementations UE

Ne contient aucune substance soumise aux restrictions de l'Annexe XVII

Ne contient aucune substance de la liste candidate REACH

Ne contient aucune substance listée à l'Annexe XIV de REACH

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Autres informations, restrictions et dispositions légales : Tous les composants de cette préparation sont inscrits à l'inventaire EINECS ou sur la liste ELINCS.

### 15.1.2. Directives nationales

S'assurer que toutes les réglementations nationales ou locales sont respectées.

### 15.2. Évaluation de la sécurité chimique

Une évaluation de la sécurité chimique a été réalisée pour les substances suivantes de ce mélange

Superphosphate triple  
Superphosphate simple

SSP

N° CAS : 8011-76-5

N° EC : 232-379-5

## SECTION 16: Autres informations

Indications de changement:

1.2	Utilisations identifiées pertinentes	Modifié	
1.4	Numéro d'appel d'urgence	Modifié	
2.3	Autres dangers qui n'entraînent pas la classification	Modifié	
3.2	Numéro d'enregistrement REACH	Ajouté	
4.1	Premiers soins après contact avec la peau	Modifié	
4.1	Premiers soins après ingestion	Modifié	
4.1	Premiers soins après contact oculaire	Modifié	
7.3	Indications complémentaires	Modifié	
11.1	Informations sur les effets toxicologiques	Modifié	
12.	Source	Modifié	

Sources des données : Les informations des sections 1.2, 8.1, 11 & 12 sont établies sur la base des rapports d'évaluation sur la sécurité chimique des composants et/ou informations fournisseurs des composants.

Autres informations : conforme au Règlement (CE) n° 1907/2006 (REACH).

Textes des phrases R-, H- et EUH:

Eye Dam. 1	Lésions oculaires graves/irritation oculaire, Catégorie 1
H318	Provoque des lésions oculaires graves
ERC2	Formulation de préparations
ERC6a	Utilisation industrielle ayant pour résultat la fabrication d'une autre substance (utilisation d'intermédiaires)
ERC8b	Utilisation intérieure à grande dispersion de substances réactives en systèmes ouverts
ERC8d	Utilisation extérieure à grande dispersion d'adjuvants de fabrication en systèmes ouverts
ERC8e	Utilisation extérieure à grande dispersion de substances réactives en systèmes ouverts
PC12	Engrais
PC19	Intermédiaire
PC20	Produits tels que régulateurs de pH, floculants, précipitants, agents de neutralisation
PROC1	Utilisation dans des processus fermés, exposition improbable
PROC13	Traitement d'articles par trempage et versage
PROC19	Mélange manuel entraînant un contact intime avec la peau; seuls des EPI sont disponibles
PROC2	Utilisation dans des processus fermés continus avec exposition momentanée maîtrisée
PROC3	Utilisation dans des processus fermés par lots (synthèse ou formulation)
PROC5	Mélange dans des processus par lots pour la formulation de préparations et d'articles (contacts multiples et/ou importants)

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PROC8a	Transfert de substance ou de préparation (chargement/déchargement) à partir de récipients ou de grands conteneurs, ou vers ces derniers, dans des installations non spécialisées
PROC8b	Transfert de substance ou de préparation (chargement/déchargement) à partir de récipients ou de grands conteneurs, ou vers ces derniers, dans des installations spécialisées
PROC9	Transfert de substance ou préparation dans de petits conteneurs (chaîne de remplissage spécialisée, y compris pesage)
SU10	Formulation [mélange] de préparations et/ou reconditionnement (sauf alliages)
SU21	Utilisations par des consommateurs: Ménages privés (= grand public = consommateurs)
SU22	Utilisations professionnelles: Domaine public (administration, éducation, spectacle, services, artisans)
SU3	Utilisations industrielles: Utilisations de substances en tant que telles ou en préparations* sur sites industriels

FDS UE (Annexe II REACH)

*Ces informations sont basées sur nos connaissances actuelles et décrivent le produit pour les seuls besoins de la santé, de la sécurité et de l'environnement. Elles ne devraient donc pas être interprétées comme garantissant une quelconque propriété spécifique du produit*



EC number:  
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Superphosphates

CAS number:  
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Table 37. Short description of all identified uses with their use descriptors and life cycle stage

Number (IU)	Short description of identified use	Product Category (PC)	Life Cycle Stage(s) covered by the IU						Sector of use (SU)	Process Category (Proc)	Article Category (AC)	Environmental Release Category (ERC)
			Manufacture	Formulation	End Use			Service Life (for article)				
					Industrial	Professional	Consumer					
1	Manufacturing of the substance	-	X						SU8	PROC1, PROC2, PROC3	-	ERC1
2	Sampling, loading, filling, transfer, dumping, bagging of substance (charging/discharging) at non-dedicated facilities. Industrial setting.	PC12, PC20		X	X				SU3	PROC8a	-	ERC2, ERC6A
3	Sampling, loading, filling, transfer, dumping, bagging of substance (charging/discharging) at dedicated facilities. Industrial setting.	PC12, PC20		X	X				SU3	PROC8b	-	ERC2, ERC6A
4	Transfer of substance into small containers (dedicated filling line, including weighing). Industrial setting.	PC12, PC20		X	X				SU3	PROC9		ERC2, ERC6A
5	Use as intermediate to synthesise other substances	PC19			X				SU3	PROC1, PROC2, PROC3	-	ERC6a
6	Formulation of mixtures	PC12		X					SU3	PROC2, PROC3, PROC5	-	ERC2

EC number:  
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Superphosphates

CAS number:  
8011-76-5

Number (IU)	Short description of identified use	Product Category (PC)	Life Cycle Stage(s) covered by the IU					Sector of use (SU)	Process Category (Proc)	Article Category (AC)	Environmental Release Category (ERC)	
			Manufacture	Formulation	End Use							Service Life (for article)
					Industrial	Professional	Consumer					
7	Sampling, loading, filling, transfer, dumping, bagging of substance (charging/discharging) at non-dedicated facilities. Professional setting	PC12				X		SU22	PROC8a	-	ERC8B ERC8E	
8	Sampling, loading, filling, transfer, dumping, bagging of substance (charging/discharging) at dedicated facilities. Professional setting.	PC12				X		SU22	PROC8b	-	ERC8B ERC8E	
9	Transfer of substance into small containers (dedicated filling line, including weighing). Professional setting.	PC12				X		SU22	PROC9		ERC8B ERC8E	
10	Professional use of fertilizers containing SSP – surface spreading or incorporation through pipes at open field and in greenhouse	PC12				X		SU22	PROC13		ERC8B ERC8E	
11	Professional use of fertilizers containing SSP – leaf spray at open fields	PC12				X		SU22	PROC8a	-	ERC8E	
12	Professional use of fertilizers containing SSP – greenhouse application	PC12				X		SU22	PROC8b	-	ERC8b	
13	Professional use of fertilizers containing SSP – fertigation at open field	PC12				X		SU22	PROC2	-	ERC8B	
14	Use in stables as anti bacterial aid and to bind nitrogen	PC20				X		SU22	PROC19	-	ERC8b ERC8d	

EC number:  
232-379-5

Superphosphates

CAS number:  
8011-76-5

Number (IU)	Short description of identified use	Product Category (PC)	Life Cycle Stage(s) covered by the IU					Sector of use (SU)	Process Category (Proc)	Article Category (AC)	Environmental Release Category (ERC)	
			Manufacture	Formulation	End Use							Service Life (for article)
					Industrial	Professional	Consumer					
15	Consumer use of fertilizers containing SSP – surface spreading at home gardens (solid/liquid fertilizers) and indoor use	PC12					X		SU21	-	-	ERC8B, ERC8E

Table 38, as it is proposed above, contains the identified uses. It also contains all the information necessary for a Tier 1 exposure assessment with ECETOC TRA (workers and consumers). However, as explained in the introduction a qualitative assessment will be performed for man, as the leading effect is eye irritation from which no dose-response curve can be established and a DNEL cannot be set. Normally the information from table 35 is used to derive a table listing the target group template needed to build the exposure scenarios based on the Tier 1 method: for worker (PROC driver of Tier 1 exposure estimate) and for consumer (PC or AC driver of Tier 1 exposure estimate). In this table IUs with the same driver of exposure/release would be grouped. However, as in this case a qualitative assessment will be done the reported uses will be grouped into the main sector of uses as the applicable RMMs will be comparable for all processes within a specific sector. The following exposure scenarios will be described:

Table 38. Overview on exposure scenarios and corresponding use descriptors

Exposure scenario	Short description of ES	Linked to IU	PC	SU	PROC	AC	ERC
ES1	manufacturing	1	-	3, 8	1, 2, 3	-	1
ES2	industrial use including distribution and other activities related to the processes in industrial settings	2, 3, 4, 5, 6	12, 19, 20	3, 10	1, 2, 3, 5, 8a, 8b, 9,	-	2, 6a
ES3	professional end use of fertilizers and other	7, 8, 9, 10, 11, 12, 13, 14	12, 20	22	2, 8a, 8b, 9, 13, 19	-	8b, 8d, 8e
ES4	consumer end use of fertilizers	15	12	21	-	-	8b, 8e

## 9.1. Manufacturing of the substance

### 9.1.1. Exposure scenario

#### 9.1.1.1. Description of activities and processes covered in the exposure scenario.

Manufacturing of the substance: SU3/8, PROC1/2/3, ERC1

#### 9.1.1.2. Control of workers exposure

Table 39. Worst case operational conditions and risk management measures

Frequency and duration of use			
	Value	Unit	Remarks
Duration of worker exposure	> 4	hours/day	

Product characteristics			
Physical state of the substance/product	Solid	solid/liquid	
Volatility of the substance/product	low	hPa	volatility of the substance
Relative molecular weight of the substance	-		Needed to calculate from ppm to mg/m <sup>3</sup>
Concentration of substance in product	-	%	Not relevant
Operational conditions not accessible for risk management			
Is the activity performed inside or outside?	Inside		
Conditions and measures at process level (source) to prevent/limit release/exposure			
Conditions and measures related to control of dispersion towards the worker			
Is local exhaust ventilation needed?	No		
Conditions and measures related to personal protective equipment and hygiene			
Is respiratory protection needed?	No		
Is skin protection needed?	No		

SSP is classified corrosive to eyes (R41 under 67/548/EEC and H318 under CLP). Exposure of the eye to dust at concentrations leading to irritation/corrosion during manufacturing of SSP can occur.

### 9.1.1.3. Risk management measures

The risk management measures related to workers can be found in Table 40. Because SSP is corrosive to eyes, the risk management measures for human health aim to avoid direct contact with the substance.

Table 40. Risk management measures related to workers at industrial sites

Information type	Data field	Explanation
Containment and local exhaust ventilation		
Containment plus good work practice required	Containment as appropriate	
Local exhaust ventilation required plus good work practise	Good standard of general ventilation	
Personal protective equipment (PPE)		
Type of PPE (gloves, respirator, face-shield etc)	Chemical goggles	To reduce exposure of the eye to a negligible level
Other risk management measures related to workers		
	Minimise number of staff exposed	
	Segregation of the emitting process	
	Effective contaminant extraction	
	Minimisation of manual phases	
	Avoidance of contact with contaminated tools and objects	
	Regular cleaning of equipment and work area	
	Management/supervision in place to check that the RMMs in place are being used correctly and OCs followed	
	Training for staff on good practice	
	Good standard of personal hygiene	

Additional good practices (Operational Conditions and Risk Management Measures) beyond the REACH Chemical Safety Assessment established within Chemical Industry are also advised and communicated through Safety Data Sheets but are not necessarily required to control risk as laid out above.

## 9.2. Industrial use of SSP for formulation of preparations, intermediate use and end-use in industrial settings, including distribution and other activities related to the processes in industrial settings

### 9.2.1. Exposure scenario

#### 9.2.1.1. Description of activities and processes covered in the exposure scenario.

Industrial use of SSP for formulation of preparations, intermediate use and end-use in industrial settings: SU3/10, PC12/19/20, PROC1/2/3/5/8a/8b/9, ERC2/6a

#### 9.2.1.2. Control of workers exposure

Table 41. Worst case operational conditions and risk management measures

Frequency and duration of use			
	Value	Unit	Remarks
Duration of worker exposure	> 4	hours/day	
Product characteristics			
Physical state of the substance/product	Solid/liquid	solid/liquid	
Volatility of the substance/product	low	hPa	volatility of the substance
Relative molecular weight of the substance	-		Needed to calculate from ppm to mg/m <sup>3</sup>
Concentration of substance in product	-	%	Substance as such
Operational conditions not accessible for risk management			
Is the activity performed inside or outside?	Inside		
Conditions and measures at process level (source) to prevent/limit release/exposure			
Conditions and measures related to control of dispersion towards the worker			
Is local exhaust ventilation needed?	No		
Conditions and measures related to personal protective equipment and hygiene			
Is respiratory protection needed?	No		
Is skin protection needed?	No		

SSP is classified corrosive to eyes (R41 under 67/548/EEC and H318 under CLP). Exposure of the eye to dust/splashes at concentrations leading to irritation/corrosion during industrial use of SSP can occur.

#### 9.2.1.3. Risk management measures

The risk management measures related to workers can be found in Table 42. Because SSP is corrosive to eyes, the risk management measures for human health aim to avoid direct contact with the substance.

Table 42. Risk management measures related to workers at industrial sites

Information type	Data field	Explanation
Containment and local exhaust ventilation		
Containment plus good work practice required	Containment as appropriate	
Local exhaust ventilation required plus good work practise	Good standard of general ventilation	

Information type	Data field	Explanation
Personal protective equipment (PPE)		
Type of PPE (gloves, respirator, face-shield etc)	Chemical goggles	To reduce exposure of the eye to a negligible level
Other risk management measures related to workers		
	Minimise number of staff exposed	
	Segregation of the emitting process	
	Effective contaminant extraction	
	Minimisation of manual phases	
	Avoidance of contact with contaminated tools and objects	
	Regular cleaning of equipment and work area	
	Management/supervision in place to check that the RMMs in place are being used correctly and OCs followed	
	Training for staff on good practice	
	Good standard of personal hygiene	

Additional good practices (Operational Conditions and Risk Management Measures) beyond the REACH Chemical Safety Assessment established within Chemical Industry are also advised and communicated through Safety Data Sheets but are not necessarily required to control risk as laid out above.

### 9.3. Professional use of SSP in fertilizers and others

#### 9.3.1. Exposure scenario

##### 9.3.1.1. Description of activities and processes covered in the exposure scenario.

Professional use of SSP in fertilizers and others: SU22, PC12, PROC2/8a/8b/9/13/19, ERC8b/8d/8e

##### 9.3.1.2. Control of workers exposure

Table 43. Worst case operational conditions and risk management measures

Frequency and duration of use			
	Value	Unit	Remarks
Duration of worker exposure	> 4	hours/day	
Product characteristics			
Physical state of the substance/product	Solid/liquid	solid/liquid	
Volatility of the substance/product	low	hPa	volatility of the substance
Relative molecular weight of the substance	-		Needed to calculate from ppm to mg/m <sup>3</sup>
Concentration of substance in product	>25	%	SSP can occur in different concentrations in the endproducts
Operational conditions not accessible for risk management			
Is the activity performed inside or outside?	Inside/outside		
Conditions and measures at process level (source) to prevent/limit release/exposure			

Conditions and measures related to control of dispersion towards the worker			
Is local exhaust ventilation needed?	No		
Conditions and measures related to personal protective equipment and hygiene			
Is respiratory protection needed?	No		
Is skin protection needed?	No		

SSP is classified corrosive to eyes (R41 under 67/548/EEC and H318 under CLP). Exposure of the eye to dust/splashes at concentrations leading to irritation/corrosion during professional use of SSP can occur. However, it has to be noted that the endproducts are further diluted which can lead to levels at which no eye irritation/corrosion will occur.

### 9.3.1.3. Risk management measures related to professionals

Because SSP is irritating/corrosive to eyes, the risk management measures for human health should focus on the prevention of direct contact with the substance. Product related design measures preventing direct eye contact with SSP and preventing formation of dust and splashes are more important in addition to the personal protective equipment measures.

Product related operational measures are required. These include specific dispensers and pumps etc specifically designed to prevent splashes/spills/exposure to occur.

Table 44 gives an overview of the personal protective equipment recommendations. The degree of restriction depends on the concentration of SSP in the preparation.

Table 44. Risk management measures related to workers in professional settings

Information type	Data field	Explanation
Containment and local exhaust ventilation		
Containment plus good work practice required	Containment as appropriate	
Local exhaust ventilation required plus good work practise	Good standard of general ventilation	
Personal protective equipment (PPE)		
Type of PPE (gloves, respirator, face-shield etc)	Chemical goggles	To reduce exposure of the eye to a negligible level
Other risk management measures related to workers		
	Minimise number of staff exposed	
	Segregation of the emitting process	
	Effective contaminant extraction	
	Minimisation of manual phases	
	Avoidance of contact with contaminated tools and objects	
	Regular cleaning of equipment and work area	
	Management/supervision in place to check that the RMMs in place are being used correctly and OCs followed	
	Training for staff on good practice	
	Good standard of personal hygiene	



Additional good practices (Operational Conditions and Risk Management Measures) beyond the REACH Chemical Safety Assessment established within Chemical Industry are also advised and communicated through Safety Data Sheets but are not necessarily required to control risk as laid out above.

### 9.3.2. Exposure estimation

Not performed, qualitative assessment.

## 9.4. Consumer end-use of fertilizers

### 9.4.1. Exposure scenario

#### 9.4.1.1. Description of activities and processes covered in the exposure scenario.

Consumer end-use of fertilizers: SU21, PC12, ERC8b/8e

#### 9.4.1.2. Control of consumers exposure

Table 45: Risk management measures related to consumers' use

Information type	Data field	Explanation
Personal protective equipment (PPE) required under regular conditions of consumer use		
Type of PPE (gloves, etc)	goggles	To reduce exposure of the eye to a negligible level
Instructions addressed to consumers		
	Product labelling	

SSP is classified corrosive to eyes (R41 under 67/548/EEC and H318 under CLP). Exposure of the eye to dust/splashes at concentrations leading to irritation/corrosion during consumer use of SSP can occur. However, it has to be noted that the endproducts are further diluted which can lead to levels at which no eye irritation will occur.

Exposure to eye irritating dilutions of SSP can occur during consumer use of fertilizers. It is assumed that during normal use exposure will only occur incidentally. Furthermore, it is assumed that existing controls (i.e. personal protective equipment based on classification and labelling with R41/H318) are applied for these exposure situations.

### 9.4.2. Exposure estimation

Not performed, qualitative assessment.

EC number:  
266-030-3

Superphosphate, concd.

CAS number:  
65996-95-4

Table 35. Short description of all identified uses with their use descriptors and life cycle stage

Number (IU)	Short description of identified use	Product Category (PC)	Life Cycle Stage(s) covered by the IU						Sector of use (SU)	Process Category (Proc)	Article Category (AC)	Environmental Release Category (ERC)
			Manufacture	Formulation	End Use			Service Life (for article)				
					Industrial	Professional	Consumer					
1	Manufacturing of the substance	-	X						SU8	PROC1, PROC2, PROC3	-	ERC1
2	Sampling, loading, filling, transfer, dumping, bagging of substance (charging/discharging) at non-dedicated facilities. Industrial setting.	PC9b, PC12, PC19		X	X				SU3	PROC8a	-	ERC2, ERC3, ERC6A
3	Sampling, loading, filling, transfer, dumping, bagging of substance (charging/discharging) at dedicated facilities. Industrial setting.	PC9b, PC12, PC19		X	X				SU3	PROC8b	-	ERC2, ERC3, ERC6A
4	Transfer of substance into small containers (dedicated filling line, including weighing). Industrial setting.	PC9b, PC12, PC19		X	X				SU3	PROC9		ERC2, ERC3, ERC6A
5	Use as intermediate to synthesise other substances	PC19			X				SU3	PROC1, PROC2, PROC3, PROC4	-	ERC6a
6	Blending of fertilizers in an industrial setting including tableting, compression, extrusion, pelletisation	PC12		X					SU3	PROC2, PROC3, PROC5, PROC14	-	ERC2

EC number:  
266-030-3

Superphosphate, concd.

CAS number:  
65996-95-4

Number (IU)	Short description of identified use	Product Category (PC)	Life Cycle Stage(s) covered by the IU					Sector of use (SU)	Process Category (Proc)	Article Category (AC)	Environmental Release Category (ERC)	
			Manufacture	Formulation	End Use							Service Life (for article)
					Industrial	Professional	Consumer					
7	Blending of plasters in batch processes with significant exposure	PC9b		X				SU3	PROC5	-	ERC3	
8	Sampling, loading, filling, transfer, dumping, bagging of substance (charging/discharging) at non-dedicated facilities. Professional setting	PC12				X		SU22	PROC8a	-	ERC8B, ERC8E, ERC9B	
9	Sampling, loading, filling, transfer, dumping, bagging of substance (charging/discharging) at dedicated facilities. Professional setting.	PC12				X		SU22	PROC8b	-	ERC8B, ERC8E, ERC9B	
10	Blending of fertilizers in batch processes with significant exposure – professional setting	PC12				X		SU22	PROC5	-	ERC9b	
11	Professional use of fertilizers containing TSP – outdoor mixing	PC12				X		SU22	PROC19	-	ERC8E	
12	Professional use of fertilizers containing TSP – surface spreading or incorporation through pipes at open field and in greenhouse	PC12				X		SU22	PROC13	-	ERC8B, ERC8E	
13	Professional use of fertilizers containing TSP – leaf spray at open fields	PC12				X		SU22	PROC11	-	ERC8E	

EC number:  
266-030-3

Superphosphate, concd.

CAS number:  
65996-95-4

Number (IU)	Short description of identified use	Product Category (PC)	Life Cycle Stage(s) covered by the IU					Sector of use (SU)	Process Category (Proc)	Article Category (AC)	Environmental Release Category (ERC)	
			Manufacture	Formulation	End Use							Service Life (for article)
					Industrial	Professional	Consumer					
14	Professional use of fertilizers containing TSP – fertigation at open field	PC12				X		SU22	PROC2	-	ERC9B	
15	Professional use of plaster containing TSP	PC9b				X		SU22	PROC19	-	ERC8F, ERC10A	
16	Consumer use of TSP in fertilizers – surface spreading at home gardens (solid/liquid fertilizers) and indoor use	PC12					X	SU21	-	-	ERC8B, ERC8E	
17	Consumer use of plaster containing TSP	PC9b					X	SU21	-	-	ERC8F, ERC10A	

Table 35 as it is proposed above, contains the identified uses. It also contains all the information necessary for a Tier 1 exposure assessment with ECETOC TRA (workers and consumers). However, as explained in the introduction a qualitative assessment will be performed for man, as the leading effect is eye irritation from which no dose-response curve can be established and a DNEL cannot be set. Normally the information from table 34 is used to derive a table listing the target group template needed to build the exposure scenarios based on the Tier 1 method: for worker (PROC driver of Tier 1 exposure estimate) and for consumer (PC or AC driver of Tier 1 exposure estimate). In this table IUs with the same driver of exposure/release would be grouped. However, as in this case a qualitative assessment will be done the reported uses will be grouped into the main sector of uses as the applicable RMMs will be comparable for all processes within a specific sector. The following exposure scenarios will be described:

Table 36. Overview on exposure scenarios and corresponding use descriptors

Exposure scenario	Short description of ES	Linked to IU	PC	SU	PROC	AC	ERC
ES1	manufacturing	1	-	3, 8	1, 2, 3	-	1
ES2	industrial use including distribution and other activities related to the processes in industrial settings	2, 3, 4, 5, 6, 7	9b, 12, 19	3, 10	1, 2, 3, 4, 5, 8a, 8b, 9, 14	-	2, 3, 6a
ES3	professional end use of fertilizers and plaster	8, 9, 10, 11, 12, 13, 14, 15	9b, 12	22	2, 5, 8a, 8b, 11, 13, 19	-	8b, 8e, 8f, 9b, 10a
ES4	consumer end use of fertilizers and plaster	16, 17	9b, 12	21	-	-	8b, 8e, 8f, 10a

## 9.1. Manufacturing of the substance

### 9.1.1. Exposure scenario

#### 9.1.1.1. Description of activities and processes covered in the exposure scenario.

Manufacturing of the substance: SU3/8, PROC1/2/3, ERC1

#### 9.1.1.2. Control of workers exposure

Table 37. Worst case operational conditions and risk management measures

Frequency and duration of use			
	Value	Unit	Remarks
Duration of worker exposure	> 4	hours/day	
Product characteristics			

Physical state of the substance/product	Solid	solid/liquid	
Volatility of the substance/product	low	hPa	volatility of the substance
Relative molecular weight of the substance	-		Needed to calculate from ppm to mg/m <sup>3</sup>
Concentration of substance in product	-	%	Substance as such
Operational conditions not accessible for risk management			
Is the activity performed inside or outside?	Inside		
Conditions and measures at process level (source) to prevent/limit release/exposure			
Conditions and measures related to control of dispersion towards the worker			
Is local exhaust ventilation needed?	No		
Conditions and measures related to personal protective equipment and hygiene			
Is respiratory protection needed?	No		
Is skin protection needed?	No		

TSP is classified corrosive to eyes (R41 under 67/548/EEC and H318 under CLP). Exposure of the eye to dust at concentrations leading to irritation during manufacturing of TSP can occur.

### 9.1.1.3. Risk management measures

The risk management measures related to workers can be found in Table 38. Because TSP is corrosive to eyes, the risk management measures for human health aim to avoid direct contact with the substance.

Table 38. Risk management measures related to workers at industrial sites

Information type	Data field	Explanation
Containment and local exhaust ventilation		
Containment plus good work practice required	Containment as appropriate	
Local exhaust ventilation required plus good work practise	Good standard of general ventilation	
Personal protective equipment (PPE)		
Type of PPE (gloves, respirator, face-shield etc)	Chemical goggles	To reduce exposure of the eye to a negligible level
Other risk management measures related to workers		
	Minimise number of staff exposed	
	Segregation of the emitting process	
	Effective contaminant extraction	
	Minimisation of manual phases	
	Avoidance of contact with contaminated tools and objects	
	Regular cleaning of equipment and work area	
	Management/supervision in place to check that the RMMs in place are being used correctly and OCs followed	
	Training for staff on good practice	
	Good standard of personal hygiene	

Additional good practices (Operational Conditions and Risk Management Measures) beyond the REACH Chemical Safety Assessment established within Chemical Industry are also advised and communicated through Safety Data Sheets but are not necessarily required to control risk as laid out above.

## 9.2. Industrial use of TSP for formulation of preparations/articles, intermediate use and end-use in industrial settings, including distribution and other activities related to the processes in industrial settings

### 9.2.1. Exposure scenario

#### 9.2.1.1. Description of activities and processes covered in the exposure scenario.

Industrial use of TSP for formulation of preparations/articles, intermediate use and end-use in industrial settings: SU3/10, PC9b/12/19, PROC1/2/3/4/5/8a/8b/9/14, ERC2/3/6a

#### 9.2.1.2. Control of workers exposure

Table 39. Worst case operational conditions and risk management measures

Frequency and duration of use			
	Value	Unit	Remarks
Duration of worker exposure	> 4	hours/day	
Product characteristics			
Physical state of the substance/product	Solid/liquid	solid/liquid	
Volatility of the substance/product	low	hPa	volatility of the substance
Relative molecular weight of the substance	-		Needed to calculate from ppm to mg/m <sup>3</sup>
Concentration of substance in product	-	%	Substance as such
Operational conditions not accessible for risk management			
Is the activity performed inside or outside?	Inside		
Conditions and measures at process level (source) to prevent/limit release/exposure			
Conditions and measures related to control of dispersion towards the worker			
Is local exhaust ventilation needed?	No		
Conditions and measures related to personal protective equipment and hygiene			
Is respiratory protection needed?	No		
Is skin protection needed?	No		

TSP is classified corrosive to eyes (R41 under 67/548/EEC and H318 under CLP). Exposure of the eye to dust/splashes at concentrations leading to irritation/corrosion during industrial use of TSP can occur.

### 9.2.1.3. Risk management measures

The risk management measures related to workers can be found in Table 40. Because TSP is corrosive to eyes, the risk management measures for human health aim to avoid direct contact with the substance.

Table 40. Risk management measures related to workers at industrial sites

Information type	Data field	Explanation
Containment and local exhaust ventilation		
Containment plus good work practice required	Containment as appropriate	
Local exhaust ventilation required plus good work practise	Good standard of general ventilation	

Information type	Data field	Explanation
Personal protective equipment (PPE)		
Type of PPE (gloves, respirator, face-shield etc)	Chemical goggles	To reduce exposure of the eye to a negligible level
Other risk management measures related to workers		
	Minimise number of staff exposed	
	Segregation of the emitting process	
	Effective contaminant extraction	
	Minimisation of manual phases	
	Avoidance of contact with contaminated tools and objects	
	Regular cleaning of equipment and work area	
	Management/supervision in place to check that the RMMs in place are being used correctly and OCs followed	
	Training for staff on good practice	
	Good standard of personal hygiene	

Additional good practices (Operational Conditions and Risk Management Measures) beyond the REACH Chemical Safety Assessment established within Chemical Industry are also advised and communicated through Safety Data Sheets but are not necessarily required to control risk as laid out above.

### 9.3. Professional use of TSP in fertilizers and plaster

#### 9.3.1. Exposure scenario

9.3.1.1. Description of activities and processes covered in the exposure scenario.

Professional use of TSP in fertilizers and plaster: SU22, PC9b/12, PROC2/5/8a/8b/11/13/19, ERC8b/8e/8f/9b/10a

9.3.1.2. Control of workers exposure

Table 41. Worst case operational conditions and risk management measures

Frequency and duration of use			
	Value	Unit	Remarks
Duration of worker exposure	> 4	hours/day	
Product characteristics			
Physical state of the substance/product	Solid/liquid	solid/liquid	
Volatility of the substance/product	low	hPa	volatility of the substance
Relative molecular weight of the substance	-		Needed to calculate from ppm to mg/m <sup>3</sup>
Concentration of substance in product	>25	%	TSP can occur in different concentrations in the end products
Operational conditions not accessible for risk management			
Is the activity performed inside or outside?	Inside/outside		
Conditions and measures at process level (source) to prevent/limit release/exposure			



Conditions and measures related to control of dispersion towards the worker			
Is local exhaust ventilation needed?	No		
Conditions and measures related to personal protective equipment and hygiene			
Is respiratory protection needed?	No		
Is skin protection needed?	No		

TSP is classified corrosive to eyes (R41 under 67/548/EEC and H318 under CLP). Exposure of the eye to dust/splashes at concentrations leading to irritation/corrosion during professional use of TSP can occur. However, it has to be noted that the endproducts are further diluted which can lead to levels at which no eye irritation/corrosion will occur.

### 9.3.1.3. Risk management measures related to professionals

Because TSP is irritating/corrosive to eyes, the risk management measures for human health should focus on the prevention of direct contact with the substance. Product related design measures preventing direct eye contact with TSP and preventing formation of dust and splashes are more important in addition to the personal protective equipment measures.

Product related operational measures are required. These include specific dispensers and pumps etc specifically designed to prevent splashes/spills/exposure to occur.

Table 42 gives an overview of the personal protective equipment recommendations. The degree of restriction depends on the concentration of TSP in the preparation.

Table 42. Risk management measures related to workers in professional settings

Information type	Data field	Explanation
Containment and local exhaust ventilation		
Containment plus good work practice required	Containment as appropriate	
Local exhaust ventilation required plus good work practise	Good standard of general ventilation	
Personal protective equipment (PPE)		
Type of PPE (gloves, respirator, face-shield etc)	Chemical goggles	To reduce exposure of the eye to a negligible level
Other risk management measures related to workers		
	Minimise number of staff exposed	
	Segregation of the emitting process	
	Effective contaminant extraction	
	Minimisation of manual phases	
	Avoidance of contact with contaminated tools and objects	
	Regular cleaning of equipment and work area	
	Management/supervision in place to check that the RMMs in place are being used correctly and OCs followed	
	Training for staff on good practice	
	Good standard of personal hygiene	

Additional good practices (Operational Conditions and Risk Management Measures) beyond the REACH Chemical Safety Assessment established within Chemical Industry are also advised and communicated through Safety Data Sheets but are not necessarily required to control risk as laid out above.

### 9.3.2. Exposure estimation

Not performed, qualitative assessment.

## 9.4. Consumer end-use of fertilizers and plaster

### 9.4.1. Exposure scenario

9.4.1.1. Description of activities and processes covered in the exposure scenario.

Consumer end-use of fertilizers: SU21, PC9b/12, ERC8b/8e/8f/10a

9.4.1.2. Control of consumers exposure

Table 43: Risk management measures related to consumers' use

Information type	Data field	Explanation
Personal protective equipment (PPE) required under regular conditions of consumer use		
Type of PPE (gloves, etc)	goggles	To reduce exposure of the eye to a negligible level
Instructions addressed to consumers		
	Product labelling	

TSP is classified corrosive to eyes (R41 under 67/548/EEC and H318 under CLP). Exposure of the eye to dust/splashes at concentrations leading to irritation/corrosion during consumer use of TSP can occur. However, it has to be noted that the endproducts are further diluted which can lead to levels at which no eye irritation will occur.

Exposure to eye irritating dilutions of TSP can occur during consumer use of fertilizers and plaster. It is assumed that during normal use exposure will only occur incidentally. Furthermore, it is assumed that existing controls (i.e. personal protective equipment based on classification and labelling with R41/H318) are applied for these exposure situations.

### 9.4.2. Exposure estimation

Not performed, qualitative assessment.