



Material Safety Data Sheet

According to Regulation No 1907/2006/EC – REACH, No. 2020/878 and No 1272/2008/EC - CLP

Date of revision : 08/05/2022

Version No: 7.0
Replaced version No: 6.3

SECTION 1	Identification of the substance/mixture and of the company/undertaking	
1.1	Product identifier	FOMATOL P Velký díl/Big part
	#Other name or labelling of product:	FOMATOL PW Velký díl/Big part FOMATOL P(W14) Velký díl/Big part FOMATOL PW(W24) Velký díl/Big part (W14)Velký díl/Big part (W24) Velký díl/Big part RETRO Speciál Velký díl/Big part
	#UFI	K820-Y0FS-T001-0QWS
1.2	#Relevant identified uses of the substance or mixture and uses advised against	
	FOMATOL P, FOMATOL PW, W14, W24: Two-part powder positive developer designed for processing black and white photo papers RETRO Special: Two-piece special powder negative metho-hydroquinone developer designed for manual processing of black and white negative films, especially Retropan 320 soft films	
1.3	Details of the supplier of the safety data sheet	
	Supplier : Downstream User (Producer Mixture)	FOMA BOHEMIA spol. s r.o.(Ltd.) J. Krušinky 1737/6, 500 02 Hradec Králové tel: 495 733 111
	E-mail address and phone number	ilona.spackova@foma.cz +420495733368
1.4	Emergency telephone number	EU Poison Information Centres – see section 16

SECTION 2	Hazards identification	
2.1	Classification of the substance or mixture	
	(according to Regulation No 1272/2008 – CLP) Eye Irrit 2;H319 <i>Classification and full text of H-statements, see section 16</i>	
	<u>The most important adverse physicochemical, human health and environmental effects:</u> May irritate eyes	

2.2	Label elements (according to Regulation No 1272/2008/EC– CLP)	
hazard pictogram		

<i>signal word</i>		Warning
<i>hazard statement(s) (H-, EUH phrases)</i>	H319	Causes serious eye irritation
<i>precautionary statement (P- phrases)</i>	P102 P280 P305+P351+P338	Keep out of reach of children Wear eye protection IF IN EYES: Rinse continuously with water for several minutes. Remove contact lenses if present and easy to do. Continue rinsing.
2.3	Other hazards	
	#The substance does not belong to the category of PBT, vPvB and are not included in the list drawn up in accordance with Article 59 (1) of REACH	

SECTION 3		Composition/information on ingredients			
3.2		#Mixtures			
Folder name	Identification number		Content % mass	Classification	SCL, M, ATE, note
Sodium carbonate	CAS number ES number Index number Registration number	497-19-8 207-838-8 011-005-00-2 Not available	< 50	Eye Irrit2;H319	For substance there are Union workplace exposure limits – see to 8.1
Potassium bromide	CAS number ES number Index number Registration number	7758-02-3 231-830-3 Not available 01-2119962195-33-xxxx	< 5	Eye Irrit2;H319	Not available

(Full text H-phrases... section 16)

SECTION 4	First aid measures
4.1	<p>Description of first aid measures</p> <p>#Immediate help is needed in case of eye contact</p> <p>After contact with skin: Rinse the affected area thoroughly with water.</p> <p>Eye Contact: Remove any contact lenses and wash eyes with plenty of water as soon as possible. If necessary, use force to open tightly closed eyelids. Take care not to rinse contaminated water into the non-affected eye. Do not neutralize. Seek medical advice if symptoms persist</p> <p>Exposure by inhalation: Remove patient to fresh air, seek medical advice if symptoms persist</p> <p>Ingestion: Soothe the affected person, rinse the mouth with clean water. If conscious, give 0.25-0.5 liters of lukewarm water. Do not induce vomiting. If the affected person vomits spontaneously, check to avoid inhalation of vomit. Do not administer activated charcoal or any neutralizing agent. Seek medical attention if symptoms persist.</p> <p>#Personal protection for first aid providers: If exposure to first aid is possible, use protective equipment listed in section 8.</p>
4.2	<p>Most important symptoms and effects, both acute and delayed</p> <p>Irritant - Irritating to eyes in direct contact. Vomiting, diarrhea, enamel damage, dermatitis, see section 11 for more detailed information on adverse reactions.</p>
4.3	Indication of any immediate medical attention and special treatment needed

#There are no specific instructions, treatment symptomatically

SECTION 5	Firefighting measures
5.1	Extinguishing media The product (liquid) is not flammable. Extinguishing agents must be adapted to burning substances in surrounding. Inappropriate extinguishing media: N.a.
5.2	Special hazards arising from the substance or mixture No known. In case of fire after evaporation of water, dangerous decomposition products may be formed - sulfur dioxide and carbon oxides
5.3	Advice for firefighters #Due to possible decomposition products see 5.2 and 10.6 it is necessary to use special breathing technique, chemical suit

SECTION 6	Accidental release measures
6.1	Personal precautions, protective equipment and emergency procedures Take persons not participating in removing the consequences of the accident out of reach. Ventilate enclosed spaces. Use the prescribed personal protective equipment when removing the consequences of the accident. Use breathing apparatus and complete protective suit when working on the disposal of the accident. Smoking and manipulation with open fire is prohibited.
6.2	Environmental precautions Do not allow substance to enter soil, sewage system, surface and groundwater.
6.3	Methods and material for containment and cleaning up The spilled product by mechanical collection. According to the extent of leakage select the appropriate tools: broom, dustpan, vacuum equipment, etc. Minimize dust. Gather into a suitable labeled container for further processing or disposal. Spill site with water. Contaminated washing water contain and remove.
6.4	Reference to other sections #See section 8 and 13

SECTION 7	Handling and storage
7.1	Precautions for safe handling Follow the safety rules while working. Wear recommended personal protective equipment. Avoid contact with eyes. Eating, drinking, smoking, working with burning materials and open fire is prohibited while working. Equipment must contain fire extinguishers in enclosed areas, ventilation must be ensured naturally or mechanically in enclosed spaces. Workplaces must be kept clean and escape routes must remain free.
7.2	Conditions for safe storage, including any incompatibilities Store in original container in a cool, dry and well ventilated place. Containers should be stored separately from food. The working solution must be prepared according to the instructions.
7.3	Specific end use(s) See in 1.2. , Other uses – not available

SECTION 8	Exposure controls/personal protection																																																									
8.1	<p>#Control parameters</p> <p>International limit values for chemical agents (Occupational exposure limits, OELs):</p> <p>Sodium carbonate International limit values for chemical agents (Occupational exposure limits, OELs)</p> <table border="1"> <thead> <tr> <th colspan="2">Limit value - Eight hours</th> <th colspan="2">Limit value - Short term</th> </tr> <tr> <th></th> <th>ppm</th> <th>mg/m³</th> <th>mg/m³</th> </tr> </thead> <tbody> <tr> <td>People's Republic of China</td> <td></td> <td>3</td> <td>6 (1)</td> </tr> <tr> <td>Romania</td> <td></td> <td>1</td> <td>3 (1)</td> </tr> <tr> <td></td> <td>Remarks</td> <td></td> <td></td> </tr> <tr> <td>People's Republic of China</td> <td>(1) 15 minutes average value</td> <td></td> <td></td> </tr> <tr> <td>Romania</td> <td>(1) 15 minutes average value</td> <td></td> <td></td> </tr> </tbody> </table> <p>Potassium bromide-International limit values for chemical agents (Occupational exposure limits, OELs) – not available</p> <p>Laying down limit values of biological exposure tests: not available</p> <p>Potassium bromide DNELs</p> <table border="1"> <thead> <tr> <th></th> <th>Consumers</th> </tr> </thead> <tbody> <tr> <td>Route of exposure</td> <td>Chronic effects systemic</td> </tr> <tr> <td>Inhalation</td> <td>6.9x10⁻⁹ mg/m³</td> </tr> <tr> <td>Dermal</td> <td>1.4 mg/kg bw/day</td> </tr> </tbody> </table> <p>PNECs</p> <table border="1"> <thead> <tr> <th>Environmental protection target</th> <th>PNEC</th> </tr> </thead> <tbody> <tr> <td>Fresh water</td> <td>0.0147 mg/L</td> </tr> <tr> <td>Freshwater sediments</td> <td>0.67mg/kg sediment dw</td> </tr> <tr> <td>Marine water</td> <td>0.0015 mg/L</td> </tr> <tr> <td>Microorganisms in sewage treatment</td> <td>0.002mg/L</td> </tr> <tr> <td>Soil (agricultural)</td> <td>0.08 mg/kg sediment dw</td> </tr> </tbody> </table> <p>Sodium carbonate DNEL</p> <table border="1"> <thead> <tr> <th></th> <th>Workers</th> <th>Consumers</th> </tr> </thead> <tbody> <tr> <td>Route of exposure</td> <td>Chronic effects local</td> <td>Acute effect local</td> </tr> <tr> <td>Inhalation</td> <td>10 mg/m³</td> <td>10 mg/m³</td> </tr> </tbody> </table> <p>PNEC- Not available</p>	Limit value - Eight hours		Limit value - Short term			ppm	mg/m ³	mg/m ³	People's Republic of China		3	6 (1)	Romania		1	3 (1)		Remarks			People's Republic of China	(1) 15 minutes average value			Romania	(1) 15 minutes average value				Consumers	Route of exposure	Chronic effects systemic	Inhalation	6.9x10 ⁻⁹ mg/m ³	Dermal	1.4 mg/kg bw/day	Environmental protection target	PNEC	Fresh water	0.0147 mg/L	Freshwater sediments	0.67mg/kg sediment dw	Marine water	0.0015 mg/L	Microorganisms in sewage treatment	0.002mg/L	Soil (agricultural)	0.08 mg/kg sediment dw		Workers	Consumers	Route of exposure	Chronic effects local	Acute effect local	Inhalation	10 mg/m ³	10 mg/m ³
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8.2	<p>Exposure controls</p> <p>Individual protection measures, incl. protective equipment</p> <p>Technical measures: Working place must be equipped with a local suction and a source of running water if the eyes irrigation and washing of hands or affected parts of skin is needed. Tightly closed containers and equipment, natural and mechanical ventilation. Avoid contact with eyes and mouth, avoid inhalation and skin staining. Eating, drinking and smoking is prohibited while working. Avoid contact with food substances and drinks. After work wash hands with soap and water. Take off polluted clothes if needed.</p> <p>Resory Respiratory protection: No need for normal handling. For sensitive persons (due to possible respiratory irritation) it is recommended to use a respirator when handling the mixture.</p> <p>#Hand protection: Not required under normal handling</p> <p>#Eye protection: protective glasses / shield (EN166)</p> <p>#Skin protection: not required, long-sleeved protective clothing recommended</p> <p>Environmental exposure: Secure the spaces against the leakage into watercourses, soil and sewage system.</p>																																																									

SECTION 9	Physical and chemical properties	
9.1	Information on basic physical and chemical properties	
	Appearance	White powder
	Odour	Nonspecific
	#pH	about 11 (6 %)
	Melting point/freezing point	Information not available
	Initial boiling point and boiling range	Irrelevant
	Flash point	Irrelevant
	Flammability	Incombustible
	Upper/lower flammability or explosive limits	Irrelevant
	Vapour pressure	Irrelevant
	Relative vapour density	Irrelevant
	Absolute density	Information not available
	Solubility – water	cca 200g/l
	Partition coefficient: n-octanol/water	Irrelevant
	Auto-ignition temperature	Irrelevant
	Decomposition temperature	Irrelevant
	Kinematic viscosity;	Irrelevant
Particle characteristics	Information not available	
9.2	Other information	Not available

SECTION 10	Stability and reactivity	
10.1	Reactivity	#Under normal conditions, there is no danger of reactivity. Reaction with acids may release sulfur dioxide
10.2	Chemical stability	Under normal conditions the product is stable
10.3	Possibility of hazardous reactions	Not known
10.4	Conditions to avoid	#The conditions under which dangerous reactions could occur are not known. Protect from direct long-term exposure to heat and sunlight - the product may be degraded.
10.5	Incompatible materials	Acids
10.6	Hazardous Decomposition Products	

#They do not form under normal conditions. In case of fire, sulfur dioxide and carbon oxides are formed - see section 5.
Possible evolution of sulfur dioxide at higher temperatures and reactions with acids

SECTION 11	Toxicological information	
11.1	#Information on hazard classes as defined in Regulation (EC) No 1272/2008	
Acute toxicity	Based on available data, the criteria for this classification are not match up. No direct toxic effects are expected under normal use Potassium bromide LD50 / oral /rat : >2000 mg/kg LD50 / dermal/ rabbit: >2000 mg/kg Sodium carbonate LD50 /oral/rat: 2800 mg/kg bw LD50 /dermal/rabbit: >2000 mg/kg bw LC50 /inhal/rat/ 2 hr: 2.3mg/L air	
Skin corrosion/irritation	Based on available data, the criteria for this classification are not match up	
Serious eye damage/eye irritation	Causes serious eye irritation on direct contact	
Respiratory or skin sensitisation	Based on available data, the criteria for this classification are not match up. The ingredients have no sensitizing effects.	
Germ cell mutagenicity	Based on available data, the criteria for this classification are not match up. The ingredients are not mutagenic	
Carcinogenicity	Based on available data, the criteria for this classification are not match up. The ingredients do not have a carcinogenic effect	
Reproductive toxicity	Based on available data, the criteria for this classification are not match up. The components have no potential for reproductive toxicity	
Specific target organ toxicity — single exposure	Based on available data, the criteria for this classification are not match up. There is no presumption of toxic effects on specific target organs	
Aspiration hazard	Based on available data, the criteria for this classification are not match up. In normal use, inhalation hazard is not expected	
<u>Likely routes of exposure and symptoms related to the physical, chemical and toxicological characteristics:</u>		
No adverse health effects are to be expected under normal use in accordance with the instructions and in accordance with generally applicable hygiene principles.		
#Toxicity oral. (ingestion / swallowing): If swallowed, may cause irritation of the upper respiratory tract and gastrointestinal disorders - abdominal pain, vomiting, diarrhea.		
#Inhalation toxicity (inhalation): Not expected under normal use. With strong heating the possibility of irritation of the mucous membranes, cough, shortness of breath.		
Toxicity dermal (skin): Not expected under normal use Are not listed		
Eye Contact: Causes serious eye irritation on direct contact		
Immediate, delayed and chronic effects of short and long term exposure: data not available N.a.		
11.2	Information on other hazards	
	#Information not available	

SECTION 12	Ecological information
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12.1	Toxicity
	#Not determined for the mixture. Due to its composition, no adverse effects on the environment are expected under normal use. Potassium bromide* LC50, freshwater fish/96 hr : >440 mg/L EC50, marine algae/72 hr: >440 mg/L EC50, freshwater microorganisms/3 hr: >1g/L *source: http://echa.europa.eu/ - Brief profile Sodium carbonate LC50 (Fish-Lepomis macrochirus)/96 hr: 300 mg/L EC50 (freshwater invertebrates)/48 hr: 200-227 mg/L
12.2	Persistence and degradability
	No information available for the mixture. It is a mixture of mostly inorganic substances
12.3	Bioaccumulative potential
	No information available for the mixture. The ingredients have no bioaccumulation potential.
12.4	Mobility in soil
	No information available for the mixture. The mixture is soluble in water
12.5	Results of PBT and vPvB assessment
	No information available for the mixture. Substances are not identified as PBT or vPvB
12.6.	# Endocrine disrupting properties
	The mixture doesn't contain endocrine disrupting substances
12.7	Other adverse effects
	Not known

SECTION	Disposal considerations	
13		
13.1	Waste treatment methods	
	Code and type of waste	09 01 01* – aqueous developer solutions 15 01 10 * - packaging containing residues of hazardous substances
	The recommended method of disposal of the substance/preparation:	The spilled product by mechanical collection. Minimize dust. Gather into a suitable labeled container for further processing or disposal. Spill site with water. Contaminated washing water and mix the solution contain and remove. Spilled product let soak up with inert absorbent material and pass the person authorized to remove. Must not be disposed of with household or other waste. Do not wash into sewerage.
	# Physical / chemical properties that may affect waste management	Labeling according to Annex III of Directive 2008/98 / EC: For the product used containing silver compounds HP4- "Irritant-skin irritation and eye damage"
	The recommended method of disposal of contaminated product packaging:	Emptied containers pass to the authorized person
	Waste legislation	Directive No. 2008/98/ES

SECTION 14	Transport information
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Land transport (road / rail) ADR/RID , Maritime transport IMDG, Air transport ICAO-TI and IATA-DGR:

For the transport of the product **is not** classified as a dangerous thing (goods).

14.1	#UN number or ID number	Not applicable
14.2	UN proper shipping name	Not applicable
14.3	Transport hazard class(es)	Not applicable
14.4	Packing group	Not applicable
	Labels	
14.5	Environmental hazard	Not , see to section 12
	Marine pollutant	Not
14.6	Special precautions for user	See to section 8
14.7	#Maritime transport in bulk according to IMO instruments	Not applicable

SECTION 15	Regulatory information
15.1	Safety, health and environmental regulations/legislation specific for the substance or mixture Regulation (EC) No 1907/2006, registration, evaluation, authorisation, restriction chemicals (REACH) #Regulation (EU) 2020/878 of 18 June 2020 amending Annex II to Regulation (EC) No 1907/2006 Regulation (EC) No 1272/2008 of the European Parliament and of the Council on classification, labelling and packaging of substances and mixtures Commission Decision 2014/955/EU amending Decision 2000/532/EC on the list of waste pursuant to Directive 2008/98/EC of the European Parliament and of the Council European Agreement concerning the international carriage of dangerous goods (ADR) International Maritime Dangerous Goods Code (IMDG Code) IATA Dangerous Goods Regulations (DGR)
	15.2

SECTION 16	Other information
Abbreviations, symbols	
Eye Irrit.2	Eye irritation(category 2)

CLP: Regulation (EC) č.1272/2008
 REACH: Registration, Evaluation, Authorisation and Restriction of Chemicals
 SVHC: Substance of very high concerns
 PBT: Persistent, bioaccumulative and toxic
 vPvB :(very) Persistent, (very) Bioaccumulative
 RID: Regulations Concerning the International Transport of Dangerous Goods by Rail
 ICAO: International Civil Aviation Organisation
 ADR: European Agreement concerning the International Carriage of Dangerous Goods by Road
 IMDG: International Maritime Code for Dangerous Goods
 IATA: International Air Transport Association
 EINECS: European Inventory of Existing Commercial Chemical Substances
 CAS: Chemical Abstracts Service (division of the American Chemical Society)
 DNEL: Derived No-Effect Level
 PNEC: Predicted No-Effect Concentration
 LC50: Lethal concentration, 50 percent
 LD50: Lethal dose, 50 percent
 EC50: Median Effective Concentration
 LOAEL: Lowest observed adverse effect level
 NOAEL: No Observed Adverse Effect Level
 NOEC: No Observed Effect Concentration
 NPK-P, PEL: Hygienic limits of chemical substances for working environment (the Czech Republic)
 N.a.: not available
 #ATE: Acute Toxicity Estimate
 M: M- factors- multiplying factor
 #SCL: Specific Concentration Limit

Materials used for the processing of safety data sheet

Information provided by the producer-Material Safety Data Sheets (MSDS) for chemical substances
 GESTIS database (www.gdud.de), European Chemicals Agency <http://echa.europa.eu/>

Classification (according to Regulation No 1272/2008 – CLP): calculation method

H-phrases :

H319	Causes serious eye irritation
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Guidance regarding the training of workers:

Workers coming into contact with hazardous chemicals or products must have access to data which are presented in this MSDS and be familiar with them clearly.

Person transporting hazardous chemicals and preparations must be familiar with guidelines for emergency response in accordance with regulations on hazardous goods within the meaning of ADR / RID.

The information contained in this MSDS are currently valid data and best practices for use and handling of this substance under normal conditions. Any other use or handling of this mixture which is not consistent with those of MSDS excludes the responsibility for defects, more precisely for damage for which the producer, importer or retailer would be otherwise responsible.

EU Poison Information Centres

Country	Poison Centre	Tel number 24hour every day/ other time
Austria	Poison Information Center/Vergiftungsinformationszentrale	+ 43 1 406 43 43
Belgium	Cente Antipoisons-Antigifcentrum center	+32 70 245 245
Bulgaria	National Toxicology Information center- Hospital for Active Medical Treatment and Emergency Medicine 'N.I.Pirigov', Sofia	+359 2 9154 409
Croatia	Poison Information Center/ Centar za kontrolu otrovanja	+385 1 2348 342
Denmark	Poison Center Hotline	+45 82 12 12 12

Country	Poison Centre	Tel number 24hour every day/ other time
Estonia	Poisoning centre Hotline Mürgistusinfo	+372 16662
Finland	Poison Information Centre	+358 9 471977
France	Centre Antipoison et de Toxicovigilance de Paris	+33 1 40 05 48 48
Germany	Poison Information Centre in Berlin	+49 30 192 40
Greece	Poison Information Centre	+30 2107793777
Iceland	Poisons Information Center (Eitrunarmiðstöð)	+354 543 2222
Ireland	National Poisons Information Centre	+353 1 809 2566
Hungary	Poison Information Service (National Institute for chemical safety) Információszolgáltatás akut mérgezés eseeén)	+36 80 201 199
Italy	Poisons Center CAV-Centro Antiveleni Roma	+39 06 68593726, +39 06 3054343, +39 06 49978000
Latvia	Toksikoloģijas un sepses klīnikas Saindēšanās un zāļu informācijas centrs	+371 67042473
Lithuania	Poison Information Bureau -PIB	+370 8-5 236 20 52
Luxembourg	Belgian Poison Center	+352 8002 5500
Netherlands	National Poisons Information Center (nationaal vergiftigingen Informatie centrum,NVIC)	+031 (0) 30 274 8888
Norway	Poison center (Giftinformasjonen)	+47 22 59 13 00
Poland	National Poisons Information Centre Lodz	+48 42 63 14 724
Portugal	Centro de Informação Antivenenos	+351 808 250 143
Romania	National institute for Public Health (Centrum National de Informare Toxicologica)	+40 21 318 36 06
Slovakia	National Toxicological Information Centre (Národné toxikologické informačné centrum	+421 2 54 774 166
Spain	Toxicological Information Service (Servicio de Información toxicologica)	+34 91 562 04 20
Sweden	Giftinformationscentralen (Swedish poisons Information Centre)	112/ mon-fri 9.00-17.00 +46 10 456 6700
Switzerland	The Swiss Toxicological Information Centre (STIC)	145
United Kingdom	National Poisons Information Service -NPIS(Birmingham)	England, Wales, Scotland 111
Turkey	Toxicolog Department and Poisons Centre	+ 90 0312 433 7001,+90 0800 314 7900

Revised safety data sheet:

Version 7.0 : Assigned to UFI; change format safe sheet according to Commission Regulation (EU) No. 2020/878 and overall revision of the text and data. Merger of safety data sheets for mixtures Fomatol P big part/Big part, Fomatol PW big part/Big part and RETRO Special big part/Big part (replaced by Fomatol PW(W24) big part version 6.3 and RETRO Special big part version 2.1) Major changes in the document are marked with the symbol: #