Ashland always solving	Page: 1
SAFETY DATA SHEET	Revision Date: 08/26/2020
	Print Date: 11/24/2020
	SDS Number: R0702842
Aqualon [™] CMC 9H4F Cellulose Gum [™] Trademark, Ashland or its subsidiaries, registered in various countries 414372	Version: 1.6

29 CFR 1910.1200 (OSHA HazCom 2012)

SECTION 1. PRODUCT AND COMPANY IDENTIFICATION

Product identifier Trade name :	Aqualon™ CMC 9H4F Cellulose Gum ™ Trademark, Ashland or its subsidiaries, registered in various countries
Substance name	HIGH PURITY SODIUM CARBOXYMETHYLCELLULOSE, SODIUM CMC, 99,5%
Substance No. CAS-No.	9004-32-4
Recommended use : F	stance or mixture and uses advised against Rheology modifier n Food

Details of the supplier of the safety data sheet Ashland P.O. Box 2219 Columbus, OH 43216 United States of America (USA) 1-614-790-3333	Emergency telephone number 1-800-ASHLAND (1-800-274-5263) Regulatory information 1-614-790-3333 (customer service) Product Information
EHSProductSafety@ashland.com	1-614-790-3333

GHS Classification Combustible Dust	:
GHS label elements Signal Word	: Warning
Hazard Statements	: May form combustible dust concentrations in air.

Ashland always solving	Page: 2
SAFETY DATA SHEET	Revision Date: 08/26/2020
	Print Date: 11/24/2020
	SDS Number: R0702842
Aqualon [™] CMC 9H4F Cellulose Gum [™] Trademark, Ashland or its subsidiaries, registered in various countries 414372	Version: 1.6

Precautionary Statements

: **Prevention:** Keep dust/air mixtures away from ignition sources.

Other hazards

None known.

SECTION 3. COMPOSITION/INFORMATION ON INGREDIENTS

Chemical nature : organic

Hazardous components

No hazardous ingredients

SECTION 4. FIRST AID MEASURES

General advice	: No hazards which require special first aid measures.
If inhaled	 If breathed in, move person into fresh air. If unconscious, place in recovery position and seek medical advice. If symptoms persist, call a physician.
In case of skin contact	: First aid is not normally required. However, it is recommended that exposed areas be cleaned by washing with soap and water.
In case of eye contact	: Remove contact lenses. Protect unharmed eye.
If swallowed	 Do not give milk or alcoholic beverages. Never give anything by mouth to an unconscious person. If symptoms persist, call a physician.
Most important symptoms and effects, both acute and delayed	: The most important known symptoms and effects are described in the labelling (see Section 2.2) and/or Section 11.
Notes to physician	: No hazards which require special first aid measures.

Ashland always solving	Page: 3
SAFETY DATA SHEET	Revision Date: 08/26/2020
	Print Date: 11/24/2020
	SDS Number: R0702842
Aqualon [™] CMC 9H4F Cellulose Gum [™] Trademark, Ashland or its subsidiaries, registered in various countries 414372	Version: 1.6

SECTION 5. FIREFIGHTING MEASURES

Suitable extinguishing media	circu	extinguishing measures that are appropriate to local Imstances and the surrounding environment. er spray m
Specific hazards during firefighting	mixt	anic dusts at sufficient concentration can form explosive ures in air. not allow run-off from fire fighting to enter drains or water ses.
Hazardous combustion products		oon dioxide (CO2) oon monoxide
Specific extinguishing methods	:	
	Proc	luct is compatible with standard fire-fighting agents.
Further information	: Star	dard procedure for chemical fires.
Special protective equipment for firefighters	: In th	e event of fire, wear self-contained breathing apparatus.

SECTION 6. ACCIDENTAL RELEASE MEASURES

Personal precautions, protective equipment and emergency procedures	:	Avoid dust formation. Avoid breathing dust. Material can create slippery conditions. Persons not wearing protective equipment should be excluded from area of spill until clean-up has been completed.
Environmental precautions	:	Prevent further leakage or spillage if safe to do so.
Methods and materials for containment and cleaning up	:	Pick up and arrange disposal without creating dust. Keep in suitable, closed containers for disposal.
Other information	:	Comply with all applicable federal, state, and local regulations.

SECTION 7. HANDLING AND STORAGE

Advice on protection against : Take measures to prevent the build up of electrostatic charge.

Ashland always solving	Page: 4
SAFETY DATA SHEET	Revision Date: 08/26/2020
	Print Date: 11/24/2020
	SDS Number: R0702842
Aqualon [™] CMC 9H4F Cellulose Gum [™] Trademark, Ashland or its subsidiaries, registered in various countries 414372	Version: 1.6

fire and explosion	Provide appropriate exhaust ventilation at places where dust is formed.	
Advice on safe handling	Avoid dust formation. Ensure all equipment is electrically grounded and bonded before beginning transfer operations. The material can accumulate static charge and can therefore cause electrical ignition of flammable atmospheres. Smoking, eating and drinking should be prohibited in the application area. For personal protection see section 8. Maintain good housekeeping. Do not permit dust layers to accumulate, for example, on floors, ledges, and equipment, order to avoid any potential for dust explosion hazards.	
	For further guidance on prevention of dust explosions, refer to National Fire Protection Association (NFPA) 654: "Standard for the Prevention of Fire and Dust Explosions, from the Manufacturing, Processing and Handling of Combustible Particulate Solids".	
Conditions for safe storage	No smoking.	
Materials to avoid	No materials to be especially mentioned.	
Further information on storage stability	Keep in a dry place.	

SECTION 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Components with workplace control parameters Contains no substances with occupational exposure limit values.

Engineering measures :	Provide appropriate exhaust ventilation at places where dust is formed. General room ventilation should be adequate for normal conditions of use. However, if unusual operating conditions exist, provide sufficient mechanical (general and/or local exhaust) ventilation to maintain exposure below exposure guidelines (if applicable) or below levels that cause known, suspected or apparent adverse effects.
Personal protective equipment Respiratory protection :	In the case of dust or aerosol formation use respirator with an approved filter within the capabilities of the respirator/filter

combination.

Ashland always solving	Page: 5
SAFETY DATA SHEET	Revision Date: 08/26/2020
	Print Date: 11/24/2020
	SDS Number: R0702842
Aqualon [™] CMC 9H4F Cellulose Gum [™] Trademark, Ashland or its subsidiaries, registered in various countries 414372	Version: 1.6

Where concentrations are above recommended limits or are unknown, or a cartridge type respirator is not adequate, wear a positive-pressure supplied-air respirator.

Hand protection Material Break through time Glove thickness	:	butyl-rubber 480 min > 0.5 mm
Remarks	:	The exact break through time can be obtained from the protective glove producer and this has to be observed. Gloves should be discarded and replaced if there is any indication of degradation or chemical breakthrough.
Eye protection	:	Safety glasses
Skin and body protection	:	Wear as appropriate: Safety shoes Wear resistant gloves (consult your safety equipment supplier).
Hygiene measures	:	Avoid breathing dust.

SECTION 9. PHYSICAL AND CHEMICAL PROPERTIES

Appearance	: powder
	solid
Physical state	: solid
Colour	: off-white
Odour	: odourless
Odour Threshold	: Not applicable
рН	: 6.5 - 8.5 (as aqueous solution)
Melting point/freezing point	: not determined
Boiling point/boiling range	: not determined
Flash point	: Not applicable

Ashland always solving	Page: 6
SAFETY DATA SHEET	Revision Date: 08/26/2020
	Print Date: 11/24/2020
	SDS Number: R0702842
Aqualon [™] CMC 9H4F Cellulose Gum [™] Trademark, Ashland or its subsidiaries, registered in various countries 414372	Version: 1.6

Evaporation rate	: Not applicable
Flammability (solid, gas)	: Combustible Dust
Upper explosion limit	: Upper explosion limit not determined
Lower explosion limit	: Lower explosion limit not determined
Vapour pressure	: Not applicable
Relative vapour density	: Not applicable
Relative density	: No data available
Density	: <1 g/cm3
Bulk density	: 550 - 1,000 kg/m3
Solubility(ies) Water solubility	: soluble, Limited by viscosity
Solubility in other solvents	: No data available
Partition coefficient: n- octanol/water	: not determined
Auto-ignition temperature	: 360 °C
Thermal decomposition	: No data available
Viscosity Viscosity, dynamic	: Not applicable
Viscosity, kinematic	: Not applicable
Oxidizing properties	: Not applicable

SECTION 10. STABILITY AND REACTIVITY

Reactivity	: No decomposition if stored and applied as directed.
Chemical stability	: Stable under recommended storage conditions.
Possibility of hazardous reactions	: Dust may form explosive mixture in air.

Ashland always solving	Page: 7
SAFETY DATA SHEET	Revision Date: 08/26/2020
	Print Date: 11/24/2020
	SDS Number: R0702842
Aqualon [™] CMC 9H4F Cellulose Gum [™] Trademark, Ashland or its subsidiaries, registered in various countries 414372	Version: 1.6

Conditions to avoid	: UV light. Exposure to sunlight.
	Keep away from heat, flame, sparks and other ignition sources.
Incompatible materials	: Acids Bases Oxidizing agents
Hazardous decomposition products	Carbon monoxide Carbon dioxide (CO2)

SECTION 11. TOXICOLOGICAL INFORMATION

Information on likely routes of exposure	:	Inhalation Skin contact Eye Contact Ingestion
Acute toxicity Not classified based on availab Product:	le	information.
Acute oral toxicity	:	LD50 (Rat): 27,000 mg/kg
Acute inhalation toxicity	:	LC50 (Rat): > 5,800 mg/l Test atmosphere: dust/mist
Acute dermal toxicity	:	LD50 (Rabbit): > 2,000 mg/kg
		Assessment: Net also ified as southly too

Assessment: Not classified as acutely toxic by dermal absorption under GHS.

Skin corrosion/irritation

Not classified based on available information.

Serious eye damage/eye irritation

Not classified based on available information.

Product:

Remarks: Unlikely to cause eye irritation or injury., Product dust may be irritating to eyes, skin and respiratory system.

Respiratory or skin sensitisation

Skin sensitisation: Not classified based on available information. Respiratory sensitisation: Not classified based on available information.

Ashland always solving	Page: 8
SAFETY DATA SHEET	Revision Date: 08/26/2020
	Print Date: 11/24/2020
	SDS Number: R0702842
Aqualon [™] CMC 9H4F Cellulose Gum [™] Trademark, Ashland or its subsidiaries, registered in various countries 414372	Version: 1.6

Germ cell mutagenicity Not classified based on available information. Carcinogenicity Not classified based on available information. Reproductive toxicity Not classified based on available information. STOT - single exposure Not classified based on available information. STOT - repeated exposure Not classified based on available information. Aspiration toxicity Not classified based on available information. <u>Product:</u> No aspiration toxicity classification Further information <u>Product:</u> Remarks: No data available		
Carcinogenicity: IARC	No component of this product present at levels greater than or equal to 0.1% is identified as probable, possible or confirmed human carcinogen by IARC.	
OSHA	No component of this product present at levels greater than or equal to 0.1% is on OSHA's list of regulated carcinogens.	
NTP	No component of this product present at levels greater than or equal to 0.1% is identified as a known or anticipated carcinogen by NTP.	

SECTION 12. ECOLOGICAL INFORMATION

Ecotoxicity <u>Product:</u> Toxicity to fish	 LC50 (Oncorhynchus mykiss (rainbow trout)): > 100 mg/l Exposure time: 96 h Test Type: static test LC50 (Lepomis macrochirus (Bluegill sunfish)): > 100 mg/l Exposure time: 96 h Test Type: static test
Ecotoxicology Assessment Short-term (acute) aquatic	: Not classified based on available information.

Ashland always solving	Page: 9
SAFETY DATA SHEET	Revision Date: 08/26/2020
	Print Date: 11/24/2020
	SDS Number: R0702842
Aqualon [™] CMC 9H4F Cellulose Gum [™] Trademark, Ashland or its subsidiaries, registered in various countries 414372	Version: 1.6

hazard

Long-term (chronic) aquatic : Not classified based on available information. hazard

Persistence and degradabilityNo data availableBioaccumulative potentialNo data availableMobility in soilNo data availableOther adverse effectsNo data availableProduct:Additional ecologicalinformation

SECTION 13. DISPOSAL CONSIDERATIONS

Disposal methods	
General advice	: Dispose of in accordance with all applicable local, state and federal regulations.
Contaminated packaging	: Empty remaining contents.

SECTION 14. TRANSPORT INFORMATION

International transport regulations

REGULATION

ID NUMBER	PROPER SHIPPING NAME	*HAZARD	SUBSIDIARY	PACKING	MARINE	
		CLASS	HAZARDS	GROUP	POLLUTANT /	
					LTD. QTY.	

U.S. DOT - ROAD

Not dangerous goods	

CFR_RAIL_C

Not dangerous goods

U.S. DOT - INLAND WATERWAYS

Not dangerous goods

Ashland always solving	Page: 10
SAFETY DATA SHEET	Revision Date: 08/26/2020
	Print Date: 11/24/2020
	SDS Number: R0702842
Aqualon [™] CMC 9H4F Cellulose Gum [™] Trademark, Ashland or its subsidiaries, registered in various countries 414372	Version: 1.6

TDG_ROAD_C

Not dangerous goods

TDG_RAIL_C

Not dangerous goods

TDG_INWT_C

Not dangerous goods

INTERNATIONAL MARITIME DANGEROUS GOODS

Not dangerous goods

INTERNATIONAL AIR TRANSPORT ASSOCIATION - CARGO

Not dangerous goods

INTERNATIONAL AIR TRANSPORT ASSOCIATION - PASSENGER

Not dangerous goods

MX_DG

Not dangerous goods

*ORM = ORM-D, CBL = COMBUSTIBLE LIQUID

Marine pollutant		no
------------------	--	----

Dangerous goods descriptions (if indicated above) may not reflect quantity, end-use or region-specific exceptions that can be applied. Consult shipping documents for descriptions that are specific to the shipment.

SECTION 15. REGULATORY INFORMATION

TSCA list

No substances are subject to TSCA 12(b) export notification requirements.

Ashland always solving	Page: 11
SAFETY DATA SHEET	Revision Date: 08/26/2020
	Print Date: 11/24/2020
	SDS Number: R0702842
Aqualon [™] CMC 9H4F Cellulose Gum [™] Trademark, Ashland or its subsidiaries, registered in various countries 414372	Version: 1.6

EPCRA - Emergency Planning and Community Right-to-Know Act

CERCLA Reportable Quantity

Components	CAS-No.	Component RQ	Calculated product RQ
		(lbs)	(lbs)
METHANOL	67-56-1	5000	*

*: Calculated RQ exceeds reasonably attainable upper limit.

SARA 304 Extremely Hazardous Substances Reportable Quantity This material does not contain any components with a section 304 EHS RQ.

SARA 311/312 Hazards	: Combustible Dust
SARA 302	: This material does not contain any components with a section 302 EHS TPQ.
SARA 313	This material does not contain any chemical components with known CAS numbers that exceed the threshold (De Minimis) reporting levels established by SARA Title III, Section 313.
US State Regulations	

Pennsylvania Right To Know SODIUM CARBOXYMETHYL CELLULOSE 9004-32-4

New Jersey Right To Know SODIUM CARBOXYMETHYL CELLULOSE 9004-32-4

California Prop. 65

This product contains a chemical that is at or below California Propositions 65's "safe harbor level" as determined via a risk assessment. Therefore, the chemical is not required to be listed as a Prop 65 chemical on the SDS or label.

The components of this product are reported in the following inventories:DSL: All components of this product are on the Canadian DSL		
AICS	: On the inventory, or in compliance with the inventory	
ENCS	: On the inventory, or in compliance with the inventory	

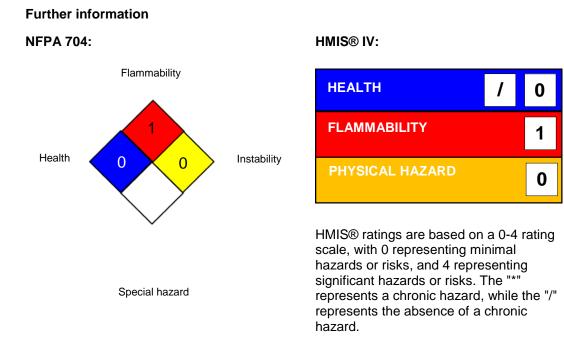
Ashland always solving	Page: 12
SAFETY DATA SHEET	Revision Date: 08/26/2020
	Print Date: 11/24/2020
	SDS Number: R0702842
Aqualon [™] CMC 9H4F Cellulose Gum [™] Trademark, Ashland or its subsidiaries, registered in various countries 414372	Version: 1.6

KECI	: On the inventory, or in compliance with the inventory
PICCS	: On the inventory, or in compliance with the inventory
IECSC	: On the inventory, or in compliance with the inventory
TCSI	: On the inventory, or in compliance with the inventory
TSCA	: On or in compliance with the active portion of the TSCA inventory

Inventories

AICS (Australia), DSL (Canada), IECSC (China), REACH (European Union), ENCS (Japan), ISHL (Japan), KECI (Korea), NZIoC (New Zealand), PICCS (Philippines), TCSI (Taiwan), TSCA (USA) - On or in compliance with the active portion of the TSCA inventory

SECTION 16. OTHER INFORMATION



Full text of H-Statements

Ashland always solving	Page: 13
SAFETY DATA SHEET	Revision Date: 08/26/2020
	Print Date: 11/24/2020
	SDS Number: R0702842
Aqualon [™] CMC 9H4F Cellulose Gum [™] Trademark, Ashland or its subsidiaries, registered in various countries 414372	Version: 1.6

Full text of other abbreviations

AICS - Australian Inventory of Chemical Substances: ASTM - American Society for the Testing of Materials; bw - Body weight; CERCLA - Comprehensive Environmental Response, Compensation, and Liability Act; CMR - Carcinogen, Mutagen or Reproductive Toxicant; DIN -Standard of the German Institute for Standardisation; DOT - Department of Transportation; DSL -Domestic Substances List (Canada); ECx - Concentration associated with x% response; EHS -Extremely Hazardous Substance; ELx - Loading rate associated with x% response; EmS -Emergency Schedule; ENCS - Existing and New Chemical Substances (Japan); ErCx -Concentration associated with x% growth rate response; ERG - Emergency Response Guide; GHS - Globally Harmonized System; GLP - Good Laboratory Practice; HMIS - Hazardous Materials Identification System; IARC - International Agency for Research on Cancer; IATA -International Air Transport Association; IBC - International Code for the Construction and Equipment of Ships carrying Dangerous Chemicals in Bulk; IC50 - Half maximal inhibitory concentration; ICAO - International Civil Aviation Organization; IECSC - Inventory of Existing Chemical Substances in China; IMDG - International Maritime Dangerous Goods; IMO -International Maritime Organization; ISHL - Industrial Safety and Health Law (Japan); ISO -International Organisation for Standardization; KECI - Korea Existing Chemicals Inventory; LC50 -Lethal Concentration to 50 % of a test population; LD50 - Lethal Dose to 50% of a test population (Median Lethal Dose); MARPOL - International Convention for the Prevention of Pollution from Ships; MSHA - Mine Safety and Health Administration; n.o.s. - Not Otherwise Specified; NFPA -National Fire Protection Association; NO(A)EC - No Observed (Adverse) Effect Concentration; NO(A)EL - No Observed (Adverse) Effect Level; NOELR - No Observable Effect Loading Rate; NTP - National Toxicology Program; NZIoC - New Zealand Inventory of Chemicals; OECD -Organization for Economic Co-operation and Development; OPPTS - Office of Chemical Safety and Pollution Prevention; PBT - Persistent, Bioaccumulative and Toxic substance; PICCS -Philippines Inventory of Chemicals and Chemical Substances; (Q)SAR - (Quantitative) Structure Activity Relationship; RCRA - Resource Conservation and Recovery Act; REACH - Regulation (EC) No 1907/2006 of the European Parliament and of the Council concerning the Registration, Evaluation, Authorisation and Restriction of Chemicals; RQ - Reportable Quantity; SADT - Self-Accelerating Decomposition Temperature; SARA - Superfund Amendments and Reauthorization Act; SDS - Safety Data Sheet; TCSI - Taiwan Chemical Substance Inventory; TSCA - Toxic Substances Control Act (United States); UN - United Nations; UNRTDG - United Nations Recommendations on the Transport of Dangerous Goods; vPvB - Very Persistent and Very **Bioaccumulative**

This sds has been prepared by Ashland. (http://www.ashland.com)

Sources of key data used to compile the Safety Data Sheet	:	Ashland internal data including own and sponsored test reports European Union Law with content from the Official Journal of the European Union. European Chemicals Agency; the EU authority implementing the EU's chemicals legislation for companies. The German Water Hazard Classes. ReachCentrum; a series of support services to help comply with REACH regulations.
---	---	---

Ashland always solving	Page: 1
SAFETY DATA SHEET	Revision Date: 08/26/202
	Print Date: 11/24/202
	SDS Number: R070284
Aqualon [™] CMC 9H4F Cellulose Gum [™] Trademark, Ashland or its subsidiaries, registered in various countries 414372	Version: 1.

The European Commission; proposing legislation, administering and implementing EU policies, and enforcing EU law. The UNECE administers regional agreements implementing harmonised classification for labelling (GHS) and transport. Cefic, the European Chemical Industry Council. ESIS European Chemical Substances Information System

Revision Date

: 08/26/2020

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. US / EN