

## Material Safety Data Sheet

Printing date 03/16/2010

Reviewed on 10/08/2009

**1 Identification of substance:**

- **Product details:**
- **Trade name:** Nitrocellulose Paper 7X8.4 cm, 8 ea
- **Catalog or product number:** 1662807, 10005366, 10009401, 1662807EDU
- **Application of the substance / the preparation** Laboratory chemicals
- **Manufacturer/Supplier:**  
Bio-Rad Laboratories, Life Science Group  
2000 Alfred Nobel Drive  
Hercules, California 94547 (510)741-1000
- **Information department:** Technical services, customer support.
- **Emergency information:**  
1(800)424-9300 Use only in the event of a CHEMICAL EMERGENCY involving a SPILL, LEAK, FIRE, EXPLOSION or ACCIDENT.  
510-741-1000

**2 Composition/Information on components:**

- **Chemical characterization:**
- **CAS No. Description:**  
cellulose nitrate
- **Identification number(s):**
- **Index number:** 603-037-01-3
- **Additional information:** For the wording of the listed risk phrases refer to section 15.

**3 Hazards identification**

- **Emergency overview:**  
Flammable.  
F Highly flammable
- **Information pertaining to particular dangers for man and environment**  
R 11 Highly flammable.
- **Classification system**  
The classification was made according to OSHA 29CFR 1910.1200 and 1910.1030, and is expanded upon from company and/or literature information.

**4 First aid measures**

- **After inhalation** Supply fresh air; consult doctor in case of complaints.
- **After skin contact** Generally the product does not irritate the skin.
- **After eye contact** Rinse opened eye for several minutes under running water.
- **After swallowing** Induce vomiting and call for medical help.

**5 Fire fighting measures**

- **Suitable extinguishing agents** Use fire fighting measures that suit the environment.
- **For safety reasons unsuitable extinguishing agents** Water with full jet.

(Contd. on page 2)

USA

**Material Safety Data Sheet**

Printing date 03/16/2010

Reviewed on 10/08/2009

**Trade name: Nitrocellulose Paper 7X8.4 cm, 8 ea**

(Contd. of page 1)

· **Protective equipment:** No special measures required.

**6 Accidental release measures**

- **Person-related safety precautions:** Wear protective equipment (See section 8). Keep unprotected persons away.
- **Measures for environmental protection:** No special measures required.
- **Measures for cleaning/collecting:** Ensure adequate ventilation.

**7 Handling and storage**

- **Handling**
- **Information for safe handling:**  
No special measures required.  
No special precautions are necessary if used correctly.
- **Information about protection against explosions and fires:**  
Keep ignition sources away - Do not smoke.  
Protect against electrostatic charges.
- **Storage**
- **Requirements to be met by storerooms and receptacles:** Store in a cool location.
- **Information about storage in one common storage facility:** Not required.
- **Further information about storage conditions:**  
Keep receptacle tightly sealed.  
Store in cool, dry conditions in well sealed receptacles.

**8 Exposure controls and personal protection**

- **Additional information about design of technical systems:** No further data; see item 7.
- **Components with limit values that require monitoring at the workplace:** Not required.
- **Additional information:** The lists that were valid during the creation were used as basis.
- **Personal protective equipment**
- **General protective and hygienic measures** Wash hands before breaks and at the end of work.
- **Protection of hands:** Protective gloves.
- **Material of gloves** Synthetic gloves
- **Penetration time of glove material**  
The exact break through time has to be found out by the manufacturer of the protective gloves and has to be observed.
- **Eye protection:**  
Safety glasses  
Tightly sealed goggles.

**9 Physical and chemical properties:**

· **General Information**

<b>Form:</b>	Solid.
<b>Color:</b>	White
<b>Odor:</b>	Odorless

(Contd. on page 3)

**Material Safety Data Sheet**

Printing date 03/16/2010

Reviewed on 10/08/2009

**Trade name: Nitrocellulose Paper 7X8.4 cm, 8 ea**

(Contd. of page 2)

- **Change in condition**  
*Melting point/Melting range: undetermined*  
*Boiling point/Boiling range: undetermined*
- **Flash point:** > 100°C
- **Flammability (solid, gaseous)** Highly flammable.
- **Ignition temperature:** 180°C
- **Danger of explosion:** Product does not present an explosion hazard.
- **Explosion limits:**  
*Lower: 3.5 Vol %*  
*Upper: 15 Vol %*
- **Vapor pressure at 20°C:** 58.7 hPa
- **Density at 20°C:** 1.65 g/cm<sup>3</sup>
- **Bulk density at 20°C:** 0.25 kg/m<sup>3</sup>
- **Solubility in / Miscibility with**  
*Water: Insoluble*  
*Organic solvents: 0.0 %*
- **Solids content:** 100.0 %

**10 Stability and reactivity**

- **Thermal decomposition / conditions to be avoided:** No decomposition if used according to specifications.
- **Materials to be avoided:**
- **Dangerous reactions** No dangerous reactions known
- **Dangerous products of decomposition:** No dangerous decomposition products known

**11 Toxicological information**

- **Acute toxicity:**
- **Primary irritant effect:**  
*on the skin: No irritant effect.*  
*on the eye: No irritant effect.*
- **Sensitization:** No sensitizing effects known.

**12 Ecological information:**

- **Additional ecological information:**
- **General notes:** Generally not hazardous for water.

**Material Safety Data Sheet**

Printing date 03/16/2010

Reviewed on 10/08/2009

**Trade name: Nitrocellulose Paper 7X8.4 cm, 8 ea**

(Contd. of page 3)

**13 Disposal considerations**

- **Product:**
- **Recommendation**  
Must not be disposed of together with household garbage. Do not allow product to reach sewage system. Hand over to hazardous waste disposers.
- **Uncleaned packagings:**
- **Recommendation:** Disposal must be made according to official regulations.

**14 Transport information**

- **DOT regulations:**
- **Hazard class:** 4.1
- **Identification number:** UN3270
- **Packing group:** II
- **Proper shipping name (technical name):** NITROCELLULOSE MEMBRANE FILTER (less than 12.6% nitrogen by dry mass)
- **Label** 4.1
- **Land transport ADR/RID (cross-border)**
- **ADR/RID class:** 4.1 Flammable solids, self-reactive substances and solid desensitised explosives
- **Danger code (Kemler):** 46
- **UN-Number:** 3270
- **Packing group:** I
- **Label** 4.1+6.1
- **Description of goods:** 3270 NITROCELLULOSE MEMBRANE FILTER
- **Maritime transport IMDG:**
- **IMDG Class:** 4.1
- **UN Number:** 3270
- **Label** 4.1
- **Packing group:** II
- **EMS Number:** F-A,S-I
- **Marine pollutant:** No
- **Proper shipping name:** NITROCELLULOSE MEMBRANE FILTER
- **Air transport ICAO-TI and IATA-DGR:**
- **ICAO/IATA Class:** 4.1
- **UN/ID Number:** 3270
- **Label** 4.1
- **Packing group:** II
- **Proper shipping name:** NITROCELLULOSE MEMBRANE FILTER (less than 12.6% nitrogen by dry mass)

**Material Safety Data Sheet**

Printing date 03/16/2010

Reviewed on 10/08/2009

**Trade name: Nitrocellulose Paper 7X8.4 cm, 8 ea**

(Contd. of page 4)

**15 Regulations**

· **SARA (Superfund Amendments and Reauthorization Act of 1986 - USA)**

· **Section 302/304 (40CFR355.30 / 40CFR355.40):**

Substance not listed.

· **Section 313 (40CFR372.65):**

Substance is not listed.

· **TSCA (Toxic Substances Control Act):**

Substance is not listed.

· **Carcinogenic categories**

· **EPA (Environmental Protection Agency)**

Substance is not listed.

· **IARC (International Agency for Research on Cancer)**

Substance is not listed.

· **NTP (National Toxicology Program)**

Substance is not listed.

· **TLV (Threshold Limit Value established by ACGIH)**

Substance is not listed.

· **MAK (German Maximum Workplace Concentration)**

Substance is not listed.

· **NIOSH-Ca (National Institute for Occupational Safety and Health)**

Substance is not listed.

· **OSHA-Ca (Occupational Safety & Health Administration)**

Substance is not listed.

· **Markings according to EU guidelines:**

The product has been classified and marked in accordance with EU Directives / Ordinance on Hazardous Materials

· **Code letter and hazard designation of product:**

F Highly flammable

· **Risk phrases:**

11 Highly flammable.

· **Safety phrases:**

16 Keep away from sources of ignition - No smoking.

33 Take precautionary measures against static discharges.

37/39 Wear suitable gloves and eye/face protection.

· **National regulations**

· **Water hazard class:** Generally not hazardous for water.

**16 Other information:**

This information is based on our present knowledge. However, this shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.

· **Department issuing MSDS:** Environmental Health and Safety.

(Contd. on page 6)

**Material Safety Data Sheet**

Printing date 03/16/2010

Reviewed on 10/08/2009

**Trade name: Nitrocellulose Paper 7X8.4 cm, 8 ea**

(Contd. of page 5)

**· Contact:**

*Life Science Group, Environmental Health and Safety, 2000 Alfred Nobel Drive, Hercules, California, 94547: 1(510) 741-1000*

*Diagnostic Group, Environmental Health and Safety, 4000 Alfred Nobel Drive, Hercules, California, 94547: 1(510) 724-7000*

**· \* Data compared to the previous version altered.**

—USA—