Technical Data Sheet

# Methanol / DI Water Solution 30/70 (v/v)

Technical · 30% (v/v)

| Alliance Code | Revised | Revision |
|---|---|---|
| MEOH-30-70-VV-DIW | 2026-11-18 | 1.1 |

| Grade | |
|---|---|
| Technical · 30% (v/v) | |

## IDENTITY & COMPOSITION

PRODUCT NAME
Methanol / DI Water Solution 30/70 (v/v)

ALLIANCE CODE
MEOH-30-70-VV-DIW

GRADE
Technical

CONCENTRATION
30% (v/v)

PRODUCT TYPE
Solution

## SPECIFICATIONS

**Not yet characterized** — Specification limits for this product have not been published yet. Contact Technical Services for the current specification and available lot-specific documentation.

## PHYSICAL & CHEMICAL PROPERTIES

| PROPERTY | VALUE | SOURCE |
|---|---|---|
| Appearance | Clear, colorless liquid | Published reference |
| Form | liquid | Published reference |
| Specific Gravity | 0.96 | Published reference |
| Flash Point | About 38 °C (100 °F), closed cup (interpolated, Astbury et al. 2004) | Published reference |
| Solubility (water) | Completely miscible with water | Published reference |

Polar solvent — purity vs. intended end-use (electronics, pharma, general industrial) is the dominant grade consideration. See application guidance for grade selection.

## MATERIALS OF CONSTRUCTION SERVICE ENVELOPE ≈ 30%

| MATERIAL | RATING | MAX T (°C) | NOTES | SOURCE |
|---|---|---|---|---|
| Buna-N (NBR) Elastomer | Fair | 60 | Acceptable for alcohols; poor for ketones. | Parker O-ring Chemical Compatibility |
| EPDM Elastomer | Fair | — | Good for alcohols, poor for esters | Cole-Parmer Chemical Compatibility |
| Viton (FKM) Elastomer | Fair | 80 | Swells in acetone and esters; avoid for those. | Parker O-ring Chemical Compatibility |
| FFKM (Kalrez) Fluoropolymer | Excellent | 200 | Premium ester / ketone sealing | Cole-Parmer Chemical Compatibility |
| PTFE Fluoropolymer | Excellent | 200 | Universal solvent compatibility. | Cole-Parmer Chemical Compatibility |

| MATERIAL | RATING | MAX T (°C) | NOTES | SOURCE |
|---|---|---|---|---|
| Borosilicate Glass<br>Glass Ceramic | Excellent | 100 | Universally inert. | Cole-Parmer Chemical Compatibility |
| 316L Stainless Steel<br>Metal | Excellent | 80 | Inert; preferred for high-purity solvent service. | Cole-Parmer Chemical Compatibility |
| Aluminium<br>Metal | Good | 40 | Acceptable; avoid prolonged wet contact | Cole-Parmer Chemical Compatibility |
| Carbon Steel<br>Metal | Fair | 50 | Trace moisture causes rust; flash-rust prevention required. | Cole-Parmer Chemical Compatibility |
| HDPE<br>Thermoplastic | Fair | 40 | Swells with many polar solvents; verify per solvent. | Cole-Parmer Chemical Compatibility |
| PP<br>Thermoplastic | Good | 50 | Acceptable but watch swelling with esters | Cole-Parmer Chemical Compatibility |
| PVC<br>Thermoplastic | Fair | 25 | Esters soften PVC; avoid for esters | Cole-Parmer Chemical Compatibility |

Ratings reflect the service envelope (concentration × temperature) shown. Always confirm against your specific duty cycle and contact-time before equipment selection. The most cautious rating across overlapping references is shown.

## REGULATORY & TRANSPORT

### DOT / 49 CFR

UN NUMBER
UN1987 Calculated

HAZARD CLASS
3 Calculated

PACKING GROUP
III Calculated

PROPER SHIPPING NAME
Alcohols, n.o.s. (Methanol) Calculated

### GHS / OSHA HCS 2024

SIGNAL WORD
Danger Calculated

H-CODES (HAZARD STATEMENTS)
— no canonical

P-CODES (PRECAUTIONARY STATEMENTS)
— no canonical

### OCCUPATIONAL EXPOSURE LIMITS

OSHA PEL (29 CFR 1910.1000)
— no canonical

ACGIH TLV
— no canonical

NIOSH REL
— no canonical

NIOSH IDLH
— no canonical

Transport descriptions reflect 49 CFR 172.101 lookup at time of publication. Sourced data: NIOSH Pocket Guide for REL/IDLH, OSHA Z-Tables for PEL. Always verify against the latest regulatory text before shipment-critical decisions.

## APPLICATION GUIDANCE

Methanol / DI Water Solution 30/70 (v/v) (Technical) is a polar solvent. Grade selection (technical, ACS, electronics, USP) determines acceptable residue and impurity levels for the intended end-use.

- Cleaning and degreasing (technical-grade)
- Coatings, inks, and adhesives formulation
- Reaction solvent for chemical synthesis
- Pharmaceutical manufacturing (USP-grade)
- Electronics-grade cleaning and rinse applications

Flammable. Bond and ground equipment during transfer. Verify grade matches end-use specification before substitution.

## STORAGE & HANDLING

RECOMMENDED STORAGE

Cool, well-ventilated flammable-liquid storage area. Tightly sealed original containers. Segregate from oxidizers and acids. Bond and ground bulk storage.

Class-level guidance — not product-specific; the SDS controls.

HANDLING PRECAUTIONS

Use chemical-resistant gloves and splash goggles. Bond and ground during transfer to prevent static accumulation. Eliminate ignition sources within vapor envelope.

Class-level guidance — not product-specific; the SDS controls.

INCOMPATIBILITIES

Strong oxidizers, strong acids, isocyanates, anhydrides. Hygroscopic — protect from atmospheric moisture for water-sensitive end uses.

Class-level guidance — not product-specific; the SDS controls.

SHELF LIFE

Consult Technical Services for product-specific shelf life

For full hazard, PPE, and emergency response guidance, refer to the Safety Data Sheet (SDS) for this product. The SDS controls in all cases where guidance differs.

## PACKAGING & LOGISTICS

### SHIPPING DESCRIPTION (US DOT)

```
UN1987, Alcohols, n.o.s. (Methanol), 3, PG III
```

Sourced from 49 CFR 172.101. Confirm against shipping documents and carrier requirements before tender.

| NMFC CLASS | PLACARD | PACKING GROUP |
|---|---|---|
| 77.5 | Flammable Liquid | PG III |

## REVISION HISTORY

| VERSION | DATE | CHANGE | TRIGGER |
|---|---|---|---|
| 1.1 | 2026-11-18 | Canonical data updated: 10 fields changed via the provenance/adjudication pipeline.<br>• unNumber · canonical change (coa.data_provenance / adjudication)<br>• hazardClass · canonical change (coa.data_provenance / adjudication)<br>• packingGroup · canonical change (coa.data_provenance / adjudication)<br>• signalWord · canonical change (coa.data_provenance / adjudication)<br>• dotProperShippingName · canonical change (coa.data_provenance / adjudication)<br>• ghsClassification · canonical change (coa.data_provenance / adjudication)<br>• casNumber · canonical change (coa.data_provenance / adjudication)<br>• formula · canonical change (coa.data_provenance / adjudication)<br>• molecularWeight · canonical change (coa.data_provenance / adjudication)<br>• physicalProperties · canonical change (coa.data_provenance / adjudication) | canonical_change |

This Technical Data Sheet is provided for technical reference. The Safety Data Sheet (SDS) controls in all cases where guidance differs. Values reflect Alliance Chemical canonical data at time of generation; subsequent revisions are recorded in the Revision History above.