1490 Lammers Pike Batesville, IN 47006 http://www.riccachemical.com 1-888-GO-RICCA

customerservice@riccachemical.com

Certificate of Analysis

Nitric Acid, 50% (v/v)

Lot Number: 4402K46 Product Number: 5350

Manufacture Date: FEB 22, 2024

Expiration Date: FEB 2026

| Name | CAS# | Grade | |
|-------------|-----------|-----------------|--|
| Water | 7732-18-5 | ACS/ASTM/USP/EP | |
| Nitric Acid | 7697-37-2 | ACS | |

| Test | Specification | Result | NIST SRM# |
|--|----------------------------------|--------------|-----------|
| Appearance | Colorless to light yellow liquid | Passed | |
| Assay (vs. Sodium Hydroxide/Phenolphthalein) | 49.7-50.3 % (v/v) | 50.3 % (v/v) | 84 |

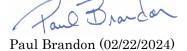
| Specification | Reference |
|----------------------------|----------------------|
| Nitric Acid (1+1) | ASTM (D 2907 A) |
| Nitric Acid (1+1) | ASTM (D 2972 A) |
| Nitric Acid (1+1) | ASTM (D 3859 B) |
| Nitric Acid (1+1) | ASTM (D 2972 B) |
| Nitric Acid (1+1) | ASTM (D 1091) |
| Nitric acid, 1 + 1 | APHA (3030 F) |
| Nitric acid, 1 + 1 | APHA (3113 B) |
| Nitric Acid (1+1) | ASTM (D 4453) |
| Nitric Acid (1+1) | ASTM (D 3559 D) |
| Nitric Acid (1:1) | EPA (SW-846) (6010B) |
| Nitric Acid (1+1) | ASTM (D 808) |
| Nitric Acid (1+1) | EPA (200.7) |
| Nitric Acid (1:1) | EPA (METALS) |
| Nitric Acid (1+1) | ASTM (D 4190) |
| Nitric Acid Solution (1+1) | ASTM (D 3865) |
| Nitric Acid (1+1) | ASTM (D 5811) |
| Nitric Acid (1+1) | ASTM (D 4309) |
| Nitric Acid (1+1) | ASTM (D 1498) |
| Nitric Acid (1+1) | ASTM (D 3697) |

Volumetric glassware complies with Class A tolerance requirements of ASTM E 288 and NIST Circular 434; it is calibrated before first use and recalibrated regularly in accordance with ASTM E 542 and NIST Procedure NBSIR 74-461. Balances are calibrated regularly with weights certified traceable to the NIST national mass standard. Thermometers and temperature probes are calibrated before first use and recalibrated regularly with a thermometer traceable to NIST standards. All products are prepared according to master documents that assure manufacture according to validated methods. Batch records document raw material traceability and production and testing history for each lot manufactured.

| Part Number | Size / Package Type | Shelf Life (Unopened Container) |
|-------------|----------------------------|---------------------------------|
| 5350-16 | 500 mL safety-coated glass | 24 months |
| 5350-32 | 1 L safety-coated glass | 24 months |
| 5350-5PT | 2.5 L safety-coated glass | 24 months |

Recommended Storage: $15^{\circ}\text{C} - 30^{\circ}\text{C} (59^{\circ}\text{F} - 86^{\circ}\text{F})$

Version: 1.3 Lot Number: 4402K46 Product Number: 5350 Page 1 of 2



Production Manager

This document is designed to comply with ISO Guide 31 "Reference Materials $^{\rm --}$ Contents of Certificates and Labels."

This test report shall not be reproduced, except in full, without the written approval of Ricca Chemical Company.

Version: 1.3 Lot Number: 4402K46 Product Number: 5350 Page 2 of 2