

ALADDIN SCIENTIFIC CORPORATION

14078 Meridian Parkway, Riverside, CA. 92518

## Certificate of Analysis

Date of Testing: 2023-01-13 09:42:24  
Date of Next Testing: 2025-01-02 09:42:24  
Product Name: **N,N,N',N'',N'''-Pentamethyldiethylenetriamine**  
CAS Number: 3030-47-5  
Specifications & Purity: 99%  
Lot #: D2109243  
SKU #: **P106715**  
**Analysis: 178484**  
Storage Temperature: Argon charged

| Parameter                           | Limit Values                     | Result                           |
|-------------------------------------|----------------------------------|----------------------------------|
| Refractive index n <sub>20</sub> /D | 1.441-1.444                      | 1.44                             |
| Density (20°C)                      | 0.828-0.83                       | 0.83                             |
| Purity(GC)                          | 99-100 (%)                       | 99.33 %                          |
| Appearance (P106715)                | Colorless to light yellow liquid | Colorless to light yellow liquid |
| Proton NMR spectrum                 | Conforms to Structure            | Conforms to Structure            |



John Su  
QA & QC Manager