

ALADDIN SCIENTIFIC CORPORATION

14078 Meridian Parkway, Riverside, CA. 92518

## Certificate of Analysis

Date of Testing: 2022-09-27 14:44:07

Date of Next Testing: 2026-09-26 14:44:07

Product Name: **Tributyl citrate**

CAS Number: 77-94-1

Specifications &amp; Purity: 98%

Lot #: I2220572

SKU # **T105179****Analysis: 133988**

| Parameter                           | Limit Values                     | Result                           |
|-------------------------------------|----------------------------------|----------------------------------|
| Acidity (as citric acid)            | 0-0.02 (%)                       | 0.01 %                           |
| Sulfate Ash                         | 0-0.05 (%)                       | 0.03 %                           |
| Density (20°C)                      | 1.043-1.047                      | 1.04                             |
| Refractive index n <sub>20</sub> /D | 1.443-1.446                      | 1.45                             |
| Purity(GC)                          | 98-100 (%)                       | 99.57 %                          |
| Water by Karl Fischer               | 0-0.3 (%)                        | 0.12 %                           |
| Appearance (T105179)                | Colorless to light yellow liquid | Colorless to light yellow liquid |
| Infrared spectrum                   | Conforms to Structure            | Conforms to Structure            |

A handwritten signature in black ink that reads "John Su".John Su  
QA & QC Manager