

## Certificate of Analysis

Date of Testing: 2022-07-01 09:22:58  
Date of Next Testing: 2024-06-30 09:22:58  
Product Name: **Ethanesulfonyl Chloride**  
CAS Number: 594-44-5  
Specifications & Purity:  $\geq 98.0\%$   
Lot #: F2229042  
SKU #: **E136203**  
**Analysis:** **093930**  
Storage Temperature: Argon charged

Parameter	Limit Values	Result
Refractive index n <sub>20</sub> /D	1.453-1.455	1.45
Purity (Argentmetric Titration)	98-100 (%)	99.50 %
Purity(GC)	98-100 (%)	98.85 %
Density (20°C)	1.358-1.362	1.36
Appearance (E136203)	Colorless to light yellow liquid	Colorless to light yellow liquid
Infrared spectrum	Conforms to Structure	Conforms to Structure



John Su  
QA & QC Manager