

Chem-Impex International, Inc.

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Certificate of Analysis

Catalogue Number	04447
Lot Number	000127-1070815
Product	L-Pyroglutamic acid pentachlorophenyl ester
	L-Pyr-OPcp
CAS Number	28990-85-4
Molecular Formula	C ₁₁ H ₆ NO ₃ Cl ₅
Molecular Weight	377.4
Appearance	White powder
Appearance of Solution	Clear, colorless solution (50 mg/mL in chloroform/ methanol 1/1)
Melting Point	192 °C
Elemental Analysis (Theory)	C = 35.0%; H = 1.6; N = 3.7%
Elemental Analysis (Found)	C = 34.8%; H = 1.6%; N = 3.7%
TLC System	Chloroform/Methanol/Acetic acid (90:8:2) Chloroform/Methanol/Toluene/H ₂ O (8:8:8:1) Toluene/Dioxane/Acetic acid (95:25:4) Plate: Silica gel 60 F ₂₅₄ Detected by UV, ninhydrin, chlorine-tolidine
Optical Rotation	[α] _D ²⁴ = +20.5° (1% in DMF)
Assay	99.5% (Elemental Analysis)
Storage	Store at 0-8 °C

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Remarks

See material safety data sheet for additional information

For laboratory use only

The foregoing is a copy of the Certificate of Analysis as provided by our supplier

A handwritten signature in black ink, appearing to read 'Bala Kumar', with a stylized flourish at the end.

Bala Kumar
Quality Control Manager