

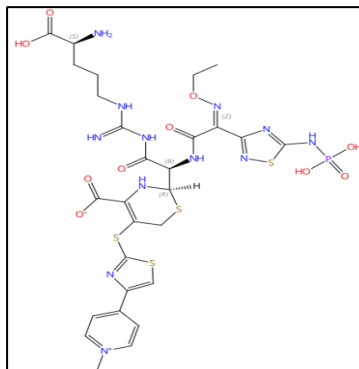
Analysis Date: 19-05-2025

Re-test Date: 19-05-2028

## CEFTAROLINE IMPURITY 11

### Identification

<b>Chemical Name</b>	: (R)-2-((8R,16S,Z)-16-amino-16-carboxy-11-imino-6,9-dioxo-5-(5-(phosphonoamino)-1,2,4-thiadiazol-3-yl)-3-oxa-4,7,10,12-tetraazahexadec-4-en-8-yl)-5-((4-(1-methylpyridin-1-ium-4-yl)thiazol-2-yl)thio)-3,6-dihydro-2H-1,3-thiazine-4-carboxylate
<b>CAT No</b>	: ALL-CEF-0035
<b>CAS No</b>	: 1277090-03-5
<b>Molecular Formula</b>	: C <sub>28</sub> H <sub>35</sub> N <sub>12</sub> O <sub>10</sub> PS <sub>4</sub>
<b>Molecular Weight</b>	: 858.9



### Analytical Information

<b>Batch Code</b>	: ALL-CEF-0035	<b>HPLC Purity</b>	: 98.02%
<b>Solubility</b>	: MeOH: ACN	<b>Potency</b>	: 95.38%
<b>Appearance of Product</b>	: Off White Solid	<b>Mass</b>	: Confirm
<b>Long Term Storage</b>	: 2-8 °C	<b>IR Analysis</b>	: Confirm
<b>Weight Content By TGA</b>	: 1.426%	<b><sup>1</sup>H NMR</b>	: Confirm
<b>Residue Of Ignition</b>	: 1.262%		

### Additional Information

$$\% \text{Potency} = [100 - (\text{Inorganic Impurities \%} + \text{Water \%}) \times \text{Chromatographic Purity \%}] / 100 =$$

$$[100 - (1.224 + 0.962 \times 98.02)] / 100 = 95.38\%$$

**Recommendation** : Released

	Department	Name	Signature
Prepared and Reviewed by	Analytical	Mr. Vipul Khadse Jr. Executive	
Approved By	QA&QC	Dr. Ashish Keche Director QA&QC	

**Attachment** : HPLC, Mass, <sup>1</sup>H NMR, IR, TGA

**Shipping Condition** : All Product are stable to be shipped at room temperature, unless otherwise specified

#### Corporate Office