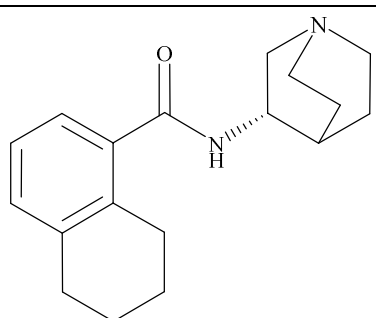


## Certificate of Analysis

Certificate No.: **20171018010**

Date: October 18, 2017

Retest date: October 12, 2020

<b>Compound Name:</b> Palonosetron Impurity 3		
<b>TLC Catalogue Number:</b>	P-5311	
<b>CAS Number:</b>	135729-78-1	
<b>Molecular Weight:</b>	284.40	
<b>Molecular Formula:</b>	C <sub>18</sub> H <sub>24</sub> N <sub>2</sub> O	
<b>Source:</b>	TLC Pharmaceutical Standards	
<b>Source Lot No.:</b>	2747-027A4	
<b>Storage Conditions:</b>	Store at 2-8 °C.	

Test Description	Specifications	Results
<b>Visual Description</b>	White to off-white solid	<b>Conforms</b>
<b>Identification</b>		
MS	Conforms to structure	<b>Conforms</b>
<sup>1</sup> H NMR	Conforms to structure	<b>Conforms</b>
<b>Purity (HPLC)</b>	Not less than 98.0%	<b>99.4%</b>
<b>[α]<sub>D</sub><sup>25.0</sup> (c=0.56, CHCl<sub>3</sub>)</b>	-38.0 ~ -45.0°	<b>-41.2°</b>
<b>Residual Solvents (NMR)</b>	0.2% acetonitrile	
<b>Recommendation:</b>	<b>Released.</b>	

Name	Department	Signature	Date
Reviewed and approved by:	Analytical Services		
Approved by:	Quality Assurance		

**Attachments:** HPLC, MS and NMR spectra.