

CERTIFICATE OF ANALYSIS

Product Name	Acalabrutinib	CAS	1420477-60-6
Batch No.	230501	Mfg Date:	2023.05.08
Quantity	10kg	Report Date	2023.05.12
Standard	In house	Retest Date	2025.05.07
Items	Specifications		Results
Appearance	White to light yellow powder		Conforms
Solubility	Soluble in 0.5N HCl and practically insoluble in water		Conforms
Identification	HPLC: The principal peak in the chromatogram obtained with the test solution is similar in position to the principal peak in the chromatogram obtained with reference solution. IR: Conform to the spectrum obtained with the reference standard.		Conforms
Polymorphic form	Form I		Conforms
Water (KF)	≤0.5%		0.3%
Residue on ignition	≤0.10%		0.07%
Melting point	212-217°C		Conforms
Heavy metal	≤20ppm		Conforms
Related substances	Any individual impurity≤0.15%		0.12%
	Total impurities≤1.0%		0.45%
Chiral purity	(R)-Optical isomer $\leq 0.15\%$		N.D.
Residual solvents	Methanol ≤ 3000ppm		Conforms
	Ethyl acetate ≤ 5000ppm		Conforms
	Dichloromethane ≤ 600ppm		Conforms
Microbial limit	Total Aerobe Bacteria ≤1000cfu/g		Conforms
	Total molds and yeast ≤100cfu/g		Conforms
Bulk Density	0.3-0.5g/ml		Conforms
Tapped Density	0.4-0.6g/ml		Conforms
Particle size	D90≤100μm		Conforms
Assay	98.5%~102.0% (anhydrous substance)		99.5%
Conclusion:	The product conforms to In house Standard.		