

## **Data Sheet**

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Product Name:ZafirlukastCat. No.:PC-45294CAS No.:107753-78-6Molecular Formula:C31H33N3O6SMolecular Weight:575.6752

Target : Leukotriene Receptor Solubility : 10 mM in DMSO

## **Biological Activity**

Zafirlukast (ICI-204219) is a potent, selective, orally active cysteinyl leukotriene 1 (**CysLT1**) receptor antagonist with IC50 of 14 nM in cell-based calcium mobilization assays.

Zafirlukast is selective for CysLT1 over CysLT2 receptors (IC50=58 uM).

Zafirlukast inhibits mucus secretion induced by leukotriene D4 (LTD4) in isolated guinea pig trachea (IC50=0.6  $\mu$ M). Zafirlukast (5  $\mu$ M) inhibits ovalbumin-induced increases in tracheal mucus secretion in ovalbumin-sensitized guinea pigs by 65%.

Zafirlukast inhibits LTD4-induced bronchoconstriction in anesthetized guinea pigs (ED50 = 61 nmol/kg, i.v.).

## References

Buckner CK, et al. *J Pharmacol Exp Ther.* 1990 Jan;252(1):77-85.

Spector SL, et al. *Am J Respir Crit Care Med.* 1994 Sep;150(3):618-23.

Kidney JC, et al. Am Rev Respir Dis. 1993 Jan;147(1):215-7.

Caution: Product has not been fully validated for medical applications. Lab Use Only!

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