Ketorolac
Item No. 9001148

CAS Registry No.: 74103-06-3
Formal Name: 5-benzoyl-2,3-dihydro-1H-pyrrolizine-1-carboxylic acid
Synonyms: Acular LS®, Acular PF®, RS 37619, Sprix®
MF: C₁₅H₁₃NO₃
FW: 255.3
Purity: ≥95%
Stability: ≥2 years at room temperature
Supplied as: A crystalline solid
UV/Vis.: λ_max: 245, 312 nm

Laboratory Procedures
For long term storage, we suggest that ketorolac be stored as supplied at room temperature. It should be stable for at least two years.

Ketorolac is supplied as a crystalline solid. A stock solution may be made by dissolving the ketorolac in the solvent of choice. Ketorolac is soluble in ethanol, which should be purged with an inert gas. The solubility of ketorolac in ethanol is approximately 1 mg/ml.

Ketorolac is a non-steroidal anti-inflammatory drug (NSAID) that belongs to the class of heteroaryl acetic acid derivatives. It is a non-selective cyclooxygenase (COX) inhibitor, being marketed as an analgesic to manage postoperative pain as well as an ophthalmic solution to treat ocular pain and inflammation.1 Ketorolac potently inhibits COX-1 and COX-2 (IC₅₀ = 20 nM) in vivo. In a mouse model of acute pain, ketorolac 30 mg/kg suppressed both pain and peripheral PGE₂ levels.2 As typical of many NSAIDs, ketorolac is a racemic mixture. (S)-Ketorolac exhibits potent COX1 and COX2 (IC₅₀ = 0.1 and 2.7 μM) inhibition, whereas (R)-ketorolac is >100-fold less active on both COX subtypes.3

References

Related Products
For a list of related products please visit: www.caymanchem.com/catalog/9001148

Safery Data
This material should be considered hazardous until information to the contrary becomes available. Do not ingest, swallow, or inhale. Do not get in eyes, on skin, or on clothing. Wash thoroughly after handling. This information contains some, but not all, of the information required for the safe and proper use of this material. Before use, the user must review the complete Safety Data Sheet, which has been sent via email to your institution.

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Cayman Chemical Company makes no warranty or guarantee of any kind, whether written or oral, expressed or implied, including without limitation, any warranty of fitness for a particular purpose, suitability and merchantability, which extends beyond the description of the chemicals heretofore. Cayman warrants only to the original customer that the material will meet our specifications at the time of delivery. Cayman will carry out its delivery obligations with due care and skill. Thus, in no event will Cayman have any obligation or liability, whether in tort (including negligence) or in contract, for any direct, indirect, incidental or consequential damages, even if Cayman is informed about their possible existence.

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