Product datasheet

(S)-Ketoprofen, COX1/2 inhibitor ab141035

Overview

Product name  (S)-Ketoprofen, COX1/2 inhibitor
Description  Highly potent COX1/2 inhibitor. Non-steroidal anti-inflammatory drug (NSAID).
Biological description  Highly potent COX1/2 inhibitor (IC<sub>50</sub> values are 19 and 54 nM for COX1 and 2 respectively). Non-steroidal anti-inflammatory drug (NSAID). Blood-brain barrier permeable.
Purity  > 98%
CAS Number  22161-81-5
Chemical structure

Properties

Chemical name  (S)-(+)-3-Benzoyl-α-methylbenzeneacetic acid
Molecular weight  254.28
Molecular formula  C<sub>16</sub>H<sub>14</sub>O<sub>3</sub>
PubChem identifier  667550
Storage instructions  Store at +4°C. The product can be stored for up to 12 months.
Solubility overview  Soluble in DMSO to 100 mM and in ethanol to 100 mM
Handling  Wherever possible, you should prepare and use solutions on the same day. However, if you need to make up stock solutions in advance, we recommend that you store the solution as aliquots in tightly sealed vials at -20°C. Generally, these will be useable for up to one month. Before use, and prior to opening the vial we recommend that you allow your product to equilibrate to room temperature for at least 1 hour.
Toxic, refer to SDS for further information.
Need more advice on solubility, usage and handling? Please visit our frequently asked questions (FAQ) page for more details.
SMILES  C[C@H](C(=O)O)c1cccc(c1)C(=O)c2ccccc2
Source  Synthetic

Applications
DU145 cells were incubated at 37°C for 40h with vehicle control (0 µM) and different concentrations of (S)-Ketoprofen (ab141035) in DMSO. Decreased expression of pro-caspase 8 (ab49853) correlates with an increase in (S)-Ketoprofen concentration, as described in literature.

Whole cell lysates were prepared with RIPA buffer (containing protease inhibitors and sodium orthovanadate), 10 µg of each were loaded on the gel and the WB was run under reducing conditions. After transfer the membrane was blocked for an hour using 5% BSA before being incubated with ab49853 at 1 µg/ml and ab8227 at 1 µg/ml overnight at 4°C. Antibody binding was detected using an anti-rabbit antibody conjugated to HRP (ab97051) at 1/10000 dilution and visualised using ECL development solution.

Our Abpromise guarantee covers the use of ab141035 in the following tested applications.

The application notes include recommended starting dilutions; optimal dilutions/concentrations should be determined by the end user.

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