

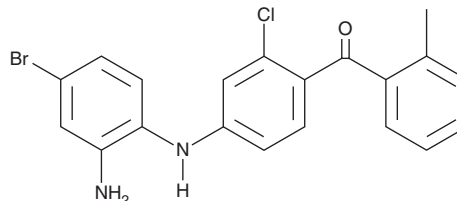
# PRODUCT INFORMATION



## p38 MAPK Inhibitor VIII

Item No. 21229

**CAS Registry No.:** 321351-00-2  
**Formal Name:** [4-[(2-amino-4-bromophenyl)amino]-2-chlorophenyl](2-methylphenyl)-methanone  
**Synonyms:** EO 1428, p38 MAP Kinase Inhibitor VIII, p38 Mitogen-activated Protein Kinase Inhibitor VIII  
**MF:** C<sub>20</sub>H<sub>16</sub>BrClN<sub>2</sub>O  
**FW:** 415.7  
**Purity:** ≥98%  
**UV/Vis.:** λ<sub>max</sub>: 241, 339 nm  
**Supplied as:** A crystalline solid  
**Storage:** -20°C  
**Stability:** ≥4 years



Information represents the product specifications. Batch specific analytical results are provided on each certificate of analysis.

### Laboratory Procedures

p38 MAPK inhibitor VIII is supplied as a crystalline solid. A stock solution may be made by dissolving the p38 MAPK inhibitor VIII in the solvent of choice. p38 MAPK inhibitor VIII is soluble in organic solvents such as ethanol and DMSO, which should be purged with an inert gas. The solubility of p38 MAPK inhibitor VIII in these solvents is approximately 50 and 100 mM, respectively.

### Description

p38 MAP kinase inhibitor VIII is an inhibitor of p38α (IC<sub>50</sub> = 39 nM) and p38β MAP kinases with 82 and 93% inhibition, respectively, in a kinase assay when used at a concentration of 1 μM.<sup>1</sup> It is selective for p38α and 38β, lacking activity at p38γ, p38δ, ERK1/2, and JNK1 at a concentration of 1 μM. p38 MAP kinase inhibitor VIII inhibits IL-1β, TNF-α, IL-6, IL-8, and IL-10, but not IFN-γ release from human peripheral blood mononuclear cells (PBMCs; IC<sub>50</sub>s = 30, 5, 17, 4, 10, and >1,000 nM, respectively). It also decreases ear swelling in mouse models of allergic and chronic irritative contact dermatitis when administered topically at a dose of 0.5 mg/ear.

### Reference

- Ottosen, E.R., Sørensen, M.D., Björkling, F., *et al.* Synthesis and structure-activity relationship of aminobenzophenones. A novel class of p38 MAP kinase inhibitors with high antiinflammatory activity. *J. Med. Chem.* **46**(26), 5651-5662 (2003).

#### WARNING

THIS PRODUCT IS FOR RESEARCH ONLY - NOT FOR HUMAN OR VETERINARY DIAGNOSTIC OR THERAPEUTIC USE.

#### SAFETY DATA

This material should be considered hazardous until further information becomes available. Do not ingest, inhale, get in eyes, on skin, or on clothing. Wash thoroughly after handling. Before use, the user must review the complete Safety Data Sheet, which has been sent via email to your institution.

#### WARRANTY AND LIMITATION OF REMEDY

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