Sofalcone
Item No. 11882

CAS Registry No.: 64506-49-6
Formal Name: 2-[(3-methyl-2-buten-1-yl)oxy]-2-[3-[(3-methyl-2-buten-1-yl)oxy]phenyl]-1-oxo-2-propen-1-yl)phenoxy]-acetic acid

Synonyms: Solon, SU 88
MF: C_{27}H_{30}O_6
FW: 450.5
Purity: ≥98%
UV/Vis.: \lambda_{\text{max}}: 238, 348 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

Sofalcone is supplied as a crystalline solid. A stock solution may be made by dissolving the sofalcone in the solvent of choice, which should be purged with an inert gas. Sofalcone is soluble in organic solvents such as DMSO and dimethyl formamide. The solubility of sofalcone in these solvents is approximately 16 and 12 mg/ml, respectively.

Sofalcone is sparingly soluble in aqueous buffers. For maximum solubility in aqueous buffers, sofalcone should first be dissolved in DMSO and then diluted with the aqueous buffer of choice. Sofalcone has a solubility of approximately 0.5 mg/ml in a 1:1 solution of DMSO:PBS (pH 7.2) using this method. We do not recommend storing the aqueous solution for more than one day.

Description

Sofalcone is an anti-ulcer chalcone derivative.\(^1,2\) It blocks inflammation by suppressing the production of nitric oxide, TNF-α, and MCP-1 while inducing the expression of heme oxygenase-1 when used at 10-20 μM.\(^3\) Sofalcone (20-50 μM) induces VEGF expression in gastric epithelial cells and promotes gastric ulcer healing following eradication therapy for \textit{H. pylori}.\(^4-6\)

References