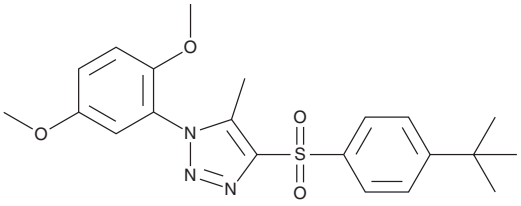
PRODUCT INFORMATION

SPA70

Item No. 34490

CAS Registry No.: 931314-31-7
Formal Name: 1-(2,5-dimethoxyphenyl)-4-[[4-(1,1-dimethylethyl)phenyl]sulfonyl]-5-methyl-1H-1,2,3-triazole
Synonym: Specific PXR Antagonist 70
MF: $C_{21}H_{25}N_3O_4S$
FW: 415.5
Purity: ≥90%
UV/Vis.: λ_{max}: 234 nm
Supplied as: A 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

SPA70 is supplied as a solid. A stock solution may be made by dissolving the SPA70 in the solvent of choice, which should be purged with an inert gas. SPA70 is soluble in the organic solvent chloroform at a concentration of approximately 10 mg/ml.

Description

SPA70 is a pregnane X receptor (PXR) antagonist (IC_{50} = 0.51 µM).[1] It is selective for PXR over 10 additional nuclear receptors at concentrations greater than 5 µM, as well as over a panel of 384 kinases at 10 µM. SPA70 (0.1-10 µM) inhibits PXR activation induced by rifampicin (Item No. 14423) in HEK293 cells expressing the human receptor. It also inhibits rifampicin-induced activity of the PXR target cytochrome P450 (CYP) isoform 3A4 (CYP3A4) in primary human hepatocytes. SPA70 (200 mg/kg) inhibits PXR agonist-induced CYP3A4-mediated metabolism of midazolam and paclitaxel (Item No. 10461) in human PXR transgenic (hPXR-tg) mice.

Reference

1. Lin, W., Wang, Y.-M., Chai, S.C., *et al.* SPA70 is a potent antagonist of human pregnane X receptor. *Nat. Commun.* **8(1)**, 741 (2017).

CAYMAN CHEMICAL
1180 EAST ELLSWORTH RD
ANN ARBOR, MI 48108 · USA
PHONE: [800] 364-9897
[734] 971-3335
FAX: [734] 971-3640
CUSTSERV@CAYMANCHEM.COM
WWW.**CAYMANCHEM**.COM