

# Produktinformation



Forschungsprodukte & Biochemikalien



Zellkultur & Verbrauchsmaterial



Diagnostik & molekulare Diagnostik



Laborgeräte & Service

Weitere Information auf den folgenden Seiten! See the following pages for more information!



# Lieferung & Zahlungsart

siehe unsere Liefer- und Versandbedingungen

# Zuschläge

- Mindermengenzuschlag
- Trockeneiszuschlag
- Gefahrgutzuschlag
- Expressversand

## SZABO-SCANDIC HandelsgmbH

Quellenstraße 110, A-1100 Wien

T. +43(0)1 489 3961-0

F. +43(0)1 489 3961-7

mail@szabo-scandic.com

www.szabo-scandic.com

linkedin.com/company/szaboscandic in



# PRODUCT INFORMATION



CP 690,550-d<sub>2</sub> Item No. 25046

Formal Name: (3R,4R)-4-methyl-3-(methyl-d<sub>3</sub>-7H-

> pyrrolo[2,3-d]pyrimidin-4R-ylamino)β-oxo-1-piperidinepropanenitrile, 2-hydroxy-1,2,3-propanetricarboxylate

Tofacitinib citrate-d<sub>3</sub>

Synonym: MF: C<sub>16</sub>H<sub>17</sub>D<sub>3</sub>N<sub>6</sub>O • C<sub>6</sub>H<sub>8</sub>O<sub>7</sub>

FW: 507.5

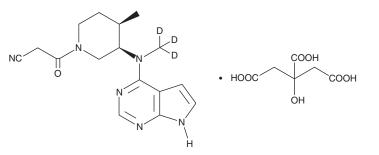
**Chemical Purity:** ≥98% (CP 690,550)

Deuterium

Incorporation:  $\geq$ 99% deuterated forms (d<sub>1</sub>-d<sub>3</sub>);  $\leq$ 1% d<sub>0</sub>

Supplied as: A solid Storage: -20°C Stability: ≥2 years

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



### **Laboratory Procedures**

CP 690,550-d<sub>3</sub> is intended for use as an internal standard for the quantification of CP 690,550 (Item No. 11598) by GC- or LC-MS. The accuracy of the sample weight in this vial is between 5% over and 2% under the amount shown on the vial. If better precision is required, the deuterated standard should be quantitated against a more precisely weighed unlabeled standard by constructing a standard curve of peak intensity ratios (deuterated versus unlabeled).

CP 690,550-d<sub>3</sub> is supplied as a solid. A stock solution may be made by dissolving the CP 690,550-d<sub>3</sub> in the solvent of choice. CP  $690,550-d_3$  is soluble in the organic solvent DMSO, which should be purged with an inert gas, at a concentration of approximately 5 mg/ml.

#### Description

CP 690,550 is a potent, cell-permeable inhibitor of all JAK isoforms (IC $_{50}$ s = 6.1, 12, and 8 nM for JAK1, JAK2, and JAK3, respectively). It is selective for JAK1-3 over ROCK- $\frac{1}{2}$  and Lck (IC<sub>50</sub>s = 3,400 and 3,870 nM, respectively) as well as 28 additional kinases in enzyme assays ( $IC_{50}$ s = >10,000 nM). It inhibits IL-2-mediated phosphorylation of JAK3 and STAT5 when used at a concentration of 30 ng/ml.<sup>2</sup> CP 690,550 prevents rejection and prolongs survival in murine and cynomolgus monkey models of heterotopic heart and kidney transplantation, respectively. Formulations containing CP 690,550 have been used in the prevention of organ allograft rejection as well as in the treatment of the inflammatory or autoimmune components of a host of diseases, including rheumatoid arthritis and ulcerative colitis.<sup>2-5</sup>

#### References

- 1. Haan, C., Rolvering, C., Raulf, F., et al. Chem. Biol. 18(3), 314-323 (2011).
- Changelian, P.S., Flanagan, M.E., Ball, D.J., et al. Science 302(5646), 875-878 (2003).
- 3. Flanagan, M.E., Blumenkopf, T.A., Brissette, W.H., et al. J. Med. Chem. 53(24), 8468-8484 (2010).
- 4. Cutolo, M. Ther. Adv. Musculoskelet. Dis. 5(1), 3-11 (2013).
- 5. Sandborn, W.J., Ghosh, S., Panes, J., et al. N. Engl. J. Med. 367(7), 616-624 (2012).

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

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

subject to Cayman's Terms and Conditions. Complete Terms and Conditions including Warranty and Limitation of Liability information Buyer agrees to purchase the material can be found on our website.

Copyright Cayman Chemical Company, 07/19/2021

#### **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