

**Product Name:** CG 428

**Catalog No.:** 7425

**Batch No.:** 1

CAS Number: 2412055-93-5

IUPAC Name: 2-(2,6-Dioxo-3-piperidiny)-4-[[[2-[3-[4-[6-[6-[(2*R*)-2-(3-fluorophenyl)-1-pyrrolidiny]imidazo[1,2-*b*]pyridazin-3-yl]-2-pyridiny]-1-piperaziny]-3-oxopropoxy]ethyl]amino]-1*H*-isoindole-1,3(2*H*)-dione

## 1. PHYSICAL AND CHEMICAL PROPERTIES

**Batch Molecular Formula:** C<sub>43</sub>H<sub>43</sub>FN<sub>10</sub>O<sub>6</sub>·<sup>3</sup>/<sub>4</sub>H<sub>2</sub>O

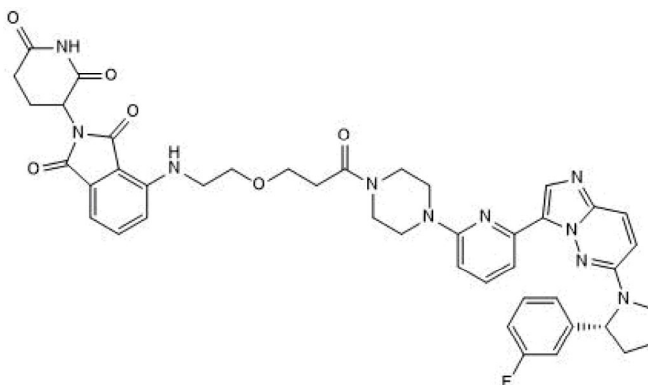
**Batch Molecular Weight:** 828.39

**Physical Appearance:** Bright yellow solid

**Solubility:** DMSO to 100 mM

**Storage:** Store at -20°C

**Batch Molecular Structure:**



## 2. ANALYTICAL DATA

**HPLC:** Shows 97.5% purity

**Chiral HPLC:** Shows 99.9% purity

**<sup>1</sup>H NMR:** Consistent with structure

**Mass Spectrum:** Consistent with structure

**Microanalysis:**

	Carbon	Hydrogen	Nitrogen
Theoretical	62.35	5.41	16.91
Found	62.14	5.41	16.88

Caution - Not Fully Tested • Research Use Only • Not For Human or Veterinary Use

**bio-techne.com**

info@bio-techne.com

techsupport@bio-techne.com

**North America**

Tel: (800) 343 7475

**China**

info.cn@bio-techne.com

Tel: +86 (21) 52380373

**Europe Middle East Africa**

Tel: +44 (0)1235 529449

**Rest of World**

www.tocris.com/distributors

Tel: +1 612 379 2956

**Product Name:** CG 428

**Catalog No.:** 7425

**1**

CAS Number: 2412055-93-5

IUPAC Name: 2-(2,6-Dioxo-3-piperidinyl)-4-[[2-[3-[4-[6-[6-[(2*R*)-2-(3-fluorophenyl)-1-pyrrolidinyl]imidazo[1,2-*b*]pyridazin-3-yl]-2-pyridinyl]-1-piperazinyl]-3-oxopropoxy]ethyl]amino]-1*H*-isoindole-1,3(2*H*)-dione

**Description:**

CG 428 is a potent tropomyosin receptor kinase (TRK) Degrador (uSMITE™) (DC<sub>50</sub> = 0.36 nM). CG 428 comprises an analog of the pan-TRK inhibitor GNF-8625 joined by a linker to the cereblon E3 ligase ligand pomalidomide (Cat. No. 6302). CG 428 shows selectivity for TRKA over TRKC and TRKB (K<sub>d</sub> values = 1nM, 4.2 nM and 28 nM, respectively). Inhibits growth of KM12 colon cancer cells (IC<sub>50</sub> =2.9 nM) and is bioavailable. Negative control CG 428-Neg (Cat. No. 7426), and TrkB antibodies validated for Simple Western™ (automated Western) instruments and Western Blot also available: Catalog # AF1494 and AF397. Please see product specific page on www.tocris.com for full description.

**Physical and Chemical Properties:**

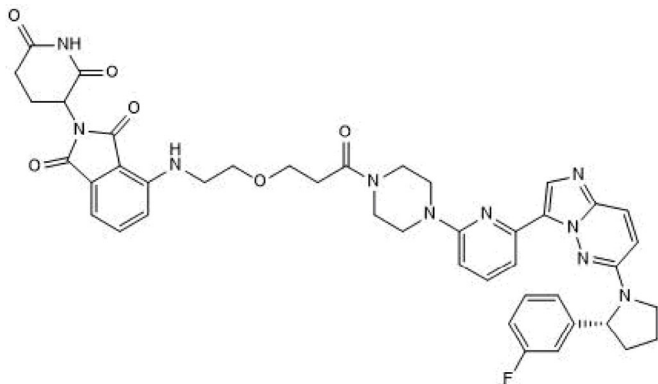
Batch Molecular Formula: C<sub>43</sub>H<sub>43</sub>FN<sub>10</sub>O<sub>6</sub>·¾H<sub>2</sub>O

Batch Molecular Weight: 828.39

Physical Appearance: Bright yellow solid

**Minimum Purity:** ≥98%

**Batch Molecular Structure:**



**References:**

Chen *et al* (2020) Discovery of first-in-class potent and selective tropomyosin receptor kinase degraders. *J.Med.Chem.* **63** 14562. PMID: 33058680.

**Storage:** Store at -20°C

**Solubility & Usage Info:**

DMSO to 100 mM

**Stability and Solubility Advice:**

Some solutions can be difficult to obtain and can be encouraged by rapid stirring, sonication or gentle warming (in a 45-60°C water bath).

Information concerning product stability, particularly in solution, has rarely been reported and in most cases we can only offer a general guide. \*Unless contradicted by product-specific protocols or instructions, our standard recommendations apply:

SOLIDS: Provided storage is as stated on the product label and the vial is kept tightly sealed, the product can be stored for up to 6 months from date of receipt.

SOLUTIONS: We recommend that stock solutions, once prepared, are stored aliquoted in tightly sealed vials at -20°C or below and used within 1 month. Wherever possible solutions should be made up and used on the same day.

**Licensing Information:**

Sold under license from Cullgen

Caution - Not Fully Tested • Research Use Only • Not For Human or Veterinary Use

**bio-techne.com**

info@bio-techne.com  
techsupport@bio-techne.com

**North America**

Tel: (800) 343 7475

**China**

info.cn@bio-techne.com  
Tel: +86 (21) 52380373

**Europe Middle East Africa**

Tel: +44 (0)1235 529449

**Rest of World**

www.tocris.com/distributors  
Tel:+1 612 379 2956