

β-catenin

Beta catenin

 β -catenin is a dual function protein, regulating the coordination of cell–cell adhesion and gene transcription. In humans, the CTNNB1 protein is encoded by the CTNNB1 gene. β -catenin is a subunit of the cadherin protein complex and acts as an intracellular signal transducer in the Wnt signaling pathway. It is a member of the catenin protein family and homologous to γ -catenin. Mutations and overexpression of β -catenin are associated with many cancers, including hepatocellular carcinoma, colorectal carcinoma, lung cancer, malignant breast tumors, ovarian and endometrial cancer. β -catenin is regulated and destroyed by the beta-catenin destruction complex, and in particular by the adenomatous polyposis coli (APC) protein, encoded by the tumour-suppressing APC gene. Therefore genetic mutation of the APC gene is also strongly linked to cancers, and in particular colorectal cancer resulting from familial adenomatous polyposis (FAP).

β-catenin Inhibitors, Agonists, Antagonists & Activators



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FzM1.8		ICG-001	
FzM1.8 derives from FzM1, is an allosteric agonist of FZD4 with pEC _{s0} of 6.4. FzM1.8 binds to FZD4 and activates the WNT/β-catenin pathway, by promoting TCF/LEF transcriptional activity in the absence of any WNT ligand. Purity: 98.20% Clinical Data: Size: 10 mM × 1 mL, 10 mg, 25 mg, 50 mg	Сат. No.: HY-117163	$\begin{array}{llllllllllllllllllllllllllllllllllll$	Cat. No.: HY-14428
iCRT-5	Cat. No.: HY-119383	КҮ1220	Cat. No.: HY-102028
iCRT-5 is a β-catenin-regulated transcription (CRT) inhibitor. iCRT-5 can block Wnt/β-catenin reporter activity and down regulate β-catenin expression. iCRT-5 can be used for the research of multiple myeloma. Purity: >98% Clinical Data: No Development Reported		KY1220 is a compound that destabilizes both β-catenin and Ras, via targeting the Wnt/β-catenin pathway; with an IC ₅₀ of 2.1 µM in HEK293 reporter cells. Purity: ≥98.0% Clinical Data: No Development Reported	N HN HO S NH
Size: 1 mg, 5 mg		Size: 10 mM × 1 mL, 2 mg, 5 mg, 10 mg, 25 mg, 50	mg, 100 mg
KY19382 (A3051)	Cat. No.: HY-131447	КҮА1797К	Cat. No. : HY-101090
KY19382 is a potent and orally active dual inhibitor of CXXC5-DVL and GSK3β, with IC _{so} s of 19 and 10 nM, respectively. KY19382 activates Wnt/β-catenin signaling through inhibitory effects on both CXXC5-DVL interaction and GSK3β activity. Purity: 98.04% Clinical Data: No Development Reported Size: 5 mg, 10 mg, 25 mg, 50 mg, 100 mg		KYA1797K is a potent and selective Wnt/β-catenin inhibitor with an IC ₅₀ of 0.75 μ M. Purity: \geq 98.0% Clinical Data: No Development Reported Size: 10 mM × 1 mL, 5 mg, 10 mg, 25 mg, 50 mg, 10	°, C, C, C, S,
L-Quebrachitol	Cat. No.: HY-N2375	Laduviglusib (CHIR-99021; CT99021)	Cat. No.: HY-10182
L-Quebrachitol is a natural product isolated from many plants, promotes osteoblastogenesis by uppregulation of BMP-2, runt-related transcription factor-2 (Runx2), MAPK (ERK, JNK, p38 α), and Wnt/ β -catenin signaling pathway.	HO HO HO	Laduviglusib (CHIR-99021) is a potent and selective $GSK-3\alpha/\beta$ inhibitor with $IC_{so}s$ of 10 nM and 6.7 nM. Laduviglusib shows >500-fold selectivity for $GSK-3$ over CDC2, ERK2 and other protein kinases.	
Purity: ≥98.0% Clinical Data: No Development Reported Size: 5 mg, 10 mg, 20 mg	ОН	Purity: 99.76% Clinical Data: No Development Reported Size: 10 mM × 1 mL, 5 mg, 10 mg, 50 mg, 100 mg	
Laduviglusib monohydrochloride (CHIR-99021 monohydrochloride; CT99021 monohydrochlo	oride)t. No.: HY-10182A	Laduviglusib trihydrochloride (CHIR-99021 trihydrochloride; CT99021 trihydrochloride)	Cat. No.: HY-10182B
Laduviglusib (CHIR-99021) monohydrochloride is a potent and selective GSK- $3\alpha/\beta$ inhibitor with IC ₅₀ s of 10 nM and 6.7 nM. Laduviglusib monohydrochloride shows >500-fold selectivity for GSK-3 over CDC2, ERK2 and other protein kinases.	N C N H-G	Laduviglusib (CHIR-99021) trihydrochloride is a potent and selective GSK-3 α / β inhibitor with IC ₅₀ s of 10 nM and 6.7 nM. Laduviglusib trihydrochloride shows >500-fold selectivity for GSK-3 over CDC2, ERK2 and other protein kinases.	
Purity: 99.93% Clinical Data: No Development Reported Size: 10 mM × 1 mL, 5 mg, 10 mg, 50 mg, 100 mg		Purity:98.68%Clinical Data:No Development ReportedSize:10 mM × 1 mL, 5 mg, 10 mg, 50 mg	

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LF3		MSAB	
	Cat. No.: HY-101486		Cat. No.: HY-120697
LF3 is an antagonist of the $\beta\text{-Catenin/TCF4}$ interaction with antitumor activity; has an $IC_{_{50}}$ of 1.65 $\mu\text{M}.$	QN^1 the state	MSAB is a potent and selective inhibitor of Wnt/ β -catenin signaling. MSAB binds to β -catenin promoting its degradation, and specifically downregulates Wnt/ β -catenin target genes. MSAB exhibits potent anti-tumor effects selectively on Wnt-dependent cancer cells.	
Purity: 99.55% Clinical Data: No Development Reported Size: 10 mM × 1 mL, 5 mg, 10 mg, 25 mg, 50 mg,	100 mg	Purity: 99.77% Clinical Data: No Development Reported Size: 10 mM × 1 mL, 5 mg, 10 mg, 25 mg, 50 mg, 30 mg,	100 mg
N-(3-Methoxybenzyl)-(9Z,12Z,15Z)-octadecatri	enamide Cat. No.: HY-N7702	N-Desmethylnefopam	Cat. No.: HY-133115
N-(3-Methoxybenzyl)-(9Z,12Z,15Z)-octadecatrienamid e is a macamide isolated from Maca (Lepidium meyenii Walp.	~~~~_ _j ^{p,Q,o.}	N-Desmethylnefopam is the main metabolite of Nefopam. N-Desmethylnefopam is a centrally-acting but non-opioid analgesic agent, for the relief of moderate to severe pain. Nefopam targets β -catenin protein level in mesenchymal cells in-vitro and in-vivo.	
Purity: >98% Clinical Data: No Development Reported Size: 5 mg, 10 mg, 25 mg		Purity: >98% Clinical Data: No Development Reported Size: 1 mg, 5 mg	Ĥ
N-Desmethylnefopam D5 hydrochloride		Nefopam D3 hydrochloride	
	Cat. No.: HY-133115AS		Cat. No.: HY-B1057S
N-Desmethylnefopam D5 hydrochloride is a deuterium labeled N-Desmethylnefopam hydrochloride. N-Desmethylnefopam hydrochloride is the main metabolite of Nefopam.		Nefopam D3 hydrochloride is the deuterium labeled Nefopam hydrochloride. Nefopam hydrochloride (Fenazoxine hydrochloride) is a centrally-acting but non-opioid analgesic drug, for the relief of moderate to severe pain.	H-CI
Purity:>98%Clinical Data:No Development ReportedSize:1 mg, 5 mg	H-CI	Purity:>98%Clinical Data:No Development ReportedSize:1 mg, 5 mg	
Nefonam hydrochloride		Nefonam-d3	
(Fenazoxine hydrochloride)	Cat. No.: HY-B1057	(Fenazoxine-d3)	Cat. No.: HY-B1057S2
Nefopam hydrochloride (Fenazoxine hydrochloride) is a centrally-acting but non-opioid analgesic drug, for the relief of moderate to severe pain. Nefopam hydrochloride targets β-catenin protein level in mesenchymal cells in-vitro and in-vivo.		Nefopam D3 (Fenazoxine D3) is a deuterium labeled Nefopam (Fenazoxine). Nefopam is a centrally-acting but non-opioid analgesic drug, and Nefopam targets β-catenin protein level in mesenchymal cells.	
Clinical Data: Launched Size: 10 mM × 1 mL, 10 mg, 50 mg	H-CI	Clinical Data: No Development Reported Size: 1 mg, 5 mg	D
Nefopam-d4 hydrochloride (Fenazoxine-d4 hydrochloride)	Cat. No.: HY-B1057S1	NLS-StAx-h	Cat. No.: HY-P2272
Nefopam-d4 (hydrochloride) is deuterium labeled Nefopam (hydrochloride). Nefopam hydrochloride (Fenazoxine hydrochloride) is a centrally-acting but non-opioid analgesic drug, for the relief of moderate to severe pain.		NLS-StAx-h is a selective, stapled peptide inhibitor of Wnt signaling with an IC ₅₀ of 1.4 μ M. NLS-StAx-h efficiently inhibits β -catenin-transcription factor interactions. NLS-StAx-h inhibits proliferation and migration of colorectal cancer cells.	HONOROGO PECCO AN EAS AN INTER
Purity: >98% Clinical Data: No Development Reported Size: 1 mg, 5 mg	HCI	Purity:>98%Clinical Data:No Development ReportedSize:100 μg	



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Tegatrabetan (BC2059)	Cat. No.: HY-109103	Teplinovivint	Cat. No.: HY-137454
Tegatrabetan (BC2059) is a β-Catenin antagonist. Tegatrabetan disrupts the binding of β -catenin with the scaffold protein transducin β -like 1 (TBL1).		Teplinovivint is a potent wnt/β-catenin signaling pathway inhibitor. Teplinovivint has anti-inflammatory activity and has the potential for tendinopathy research.	
Purity: 99.77% Clinical Data: Phase 2 Size: 5 mg, 10 mg, 50 mg, 100 mg		Purity:99.78%Clinical Data:No Development ReportedSize:5 mg, 10 mg, 25 mg, 50 mg, 100 mg	н
Toxoflavin	Cot. No : HV 100760	Toxoflavin-13C4	Cat No : HV 1007605
Toxoflavin (Xanthothricin) is an antagonist of transcription factor 4 (TCF4)/β-catenin complex, also acts as an inhibitor of KDM4A, with antitumor activity. Antibiotic properties.		Toxoflavin-13C4 is the 13C-labeled Toxoflavin. Toxoflavin (Xanthothricin) is an antagonist of transcription factor 4 (TCF4)/β-catenin complex , also acts as an inhibitor of KDM4A , with antitumor activity. Antibiotic properties.	$ \begin{array}{c} (1, N_{1}, N_{1$
Purity: 99.36% Clinical Data: No Development Reported Size: 10 mM × 1 mL, 5 mg, 10 mg, 25 mg	0	Purity: >98% Clinical Data: No Development Reported Size: 1 mg, 5 mg	0
Triptonide		UU-T02	
(NSC 165677; PG 492)	Cat. No.: HY-32736		Cat. No.: HY-117233
Triptonide (NSC 165677) is a natural product identified in Tripterygium wilfordii Hook F Triptonide is a Wnt signaling inhibitor with an IC _{so} of appropriately 0.3nM.		UU-T02 is a novel potent, selective small-molecule inhibitor of β -Catenin/T-cell factor protein-protein interaction (β -catenin/Tcf PPI) with a K _i of 1.36 μ M. UU-T02 inhibits canonical Wnt signaling and the growth of colorectal cancer cells.	
Purity: 99.73% Clinical Data: Phase 2 Size: 10 mM × 1 mL, 10 mg		Purity:>98%Clinical Data:No Development ReportedSize:1 mg, 5 mg	
WAY-262611	Cat. No. : HY-11035	WIKI4	Cat. No. : HY-16910
WAY-262611 is a wingless β-Catenin agonist that increases bone formation rate with an EC _{so} of 0.63 μ M in TCF-Luciferase assay. WAY-262611 is also a Dkk1 inhibitor.		WIKI4 is a potent tankyrase inhibitor with an IC_{s0} of 26 nM for TNKS2 . WIKI4 potently inhibits Wnt/β-catenin signaling and that its half-maximal response dose is 75 nM.	
Purity:99.24%Clinical Data:No Development ReportedSize:10 mM × 1 mL, 10 mg, 50 mg		Purity: 99.93% Clinical Data: No Development Reported Size: 10 mM × 1 mL, 5 mg, 10 mg, 25 mg, 50 mg	<u> </u>
Withanolide B	Cat. No.: HY-129566	Wnt/β-catenin agonist 2	Cat. No.: HY-141873
Withanolide B is an active component of W. somnifera Dunal. Withanolide B promotes osteogenic differentiation of hBMSCs via ERK1/2 and Wnt/β-catenin signaling pathways.		Wnt/ β -catenin agonist 2 is a potent Wnt agonist. Wnt/ β -catenin agonist 2 activates Wnt/ β -catenin signaling and can be used in the research of diseases related to the signal transduction. (From patent WO2007078113A1, compound 39).	$\mathbb{I}^{O}_{O-N} \xrightarrow{O}_{H} \mathbb{N}^{N=0}_{N \rightarrow 0}$
Purity:>98%Clinical Data:No Development ReportedSize:5 mg, 10 mg, 25 mg		Purity:99.80%Clinical Data:No Development ReportedSize:5 mg, 10 mg, 25 mg, 50 mg, 100 mg	

XAV-939		ZW4864	
	Cat. No.: HY-15147		Cat. No.: HY-132300
XAV-939 is a potent tankyrase inhibitor that targets Wnt/β-catenin signaling . XAV-939 stabilizes axin by inhibiting tankyrase 1 and tankyrase 2 (IC ₅₀ s of 5 and 2 nM, respectively), thereby stimulating β -catenin degradation.	S NH N F	ZW4864 is an orally active and selective β catenin/B-Cell lymphoma 9 protein–protein interaction (β catenin/BCL9 PPI) inhibitor. ZW4864 inhibits β catenin/BCL9 PPI with a K ₁ value of 0.76 μ M and an IC ₅₀ value of 0.87 μ M.	${}^{(M_{\mathcal{H}})} = \sum_{i \in \mathcal{H}} \sum_{j \in \mathcal{H}} \sum_{i \in \mathcal{H}} \sum_{i \in \mathcal{H}} \sum_{j \in \mathcal{H}} \sum_{i \in \mathcal{H}$
Purity: 98.71%	É	Purity: 97.08%	
Clinical Data: No Development Reported Size: 10 mM × 1 mL, 5 mg, 10 mg, 50 mg, 100 mg, 2	200 mg	Clinical Data: No Development Reported Size: 5 mg, 10 mg, 25 mg, 50 mg, 100 mg	
ZW4864 free base		β-catenin-IN-2	
	Cat. No.: HY-132300A		Cat. No.: HY-136464
ZW4864 (free base) is an orally active and selective β catenin/B-Cell lymphoma 9 protein–protein interaction (β catenin/BCL9 PPI) inhibitor. ZW4864 (free base) inhibits β catenin/BCL9 PPI with a K _i value of 0.76 μM and an IC ₅₀ value of 0.87 μM.	Martin Contraction	β -catenin-IN-2 is a potent β -catenin inhibitor, compound H1B1, extracted from patent US20150374662A1. β -catenin-IN-2 can be used for the study of colorectal cancer.	F
Purity: 99.38%		Purity: 99.80%	
Clinical Data: No Development Reported Size: 5 mg, 10 mg, 25 mg, 50 mg, 100 mg		Clinical Data: No Development Reported Size: 10 mM × 1 mL, 5 mg, 10 mg, 50 mg, 100 mg	
β-catenin-IN-3		β-catenin-IN-37	
•	Cat. No.: HY-147007		Cat. No.: HY-115543
β-catenin-IN-3 (compound C2) is a potent and selective $β$ -catenin inhibitor with a K _p value of 54.96 nM. $β$ -catenin-IN-3 acts by targeting a cryptic allosteric modulation site of $β$ -catenin. β-catenin-IN-3 can significantly reduce viability of $β$ -catenin-driven cancer cells. Purity: >98% Clinical Data: No Development Reported		β-catenin-IN-37 is a selective $β$ -Catenin/T-cell factor protein-protein interaction ($β$ -catenin/Tcf PPI) inhibitor. $β$ -catenin-IN-37 inhibits canonical Wnt signaling and the growth of colorectal cancer cells SW480 and HCT116 with the IC ₅₀ values of 20 μM and 31 μM, respectively. Purity: >98% Clinical Data: No Development Reported	HN-N.N N N N N N N N N N N N N N N N N N

Size:

. 1 mg, 5 mg

Size:

. 1 mg, 5 mg