ERK

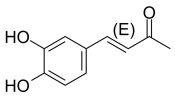
Extracellular signal regulated kinases

ERKs (Extracellular-signal-regulated kinases) are widely expressed protein kinase intracellular signalling molecules that are involved in functions including the regulation of meiosis, mitosis, and postmitotic functions in differentiated cells. Many different stimuli, including growth factors, cytokines, virus infection, ligands for heterotrimeric G protein-coupled receptors, transforming agents, and carcinogens, activate the ERK pathway. In the MAPK/ERK pathway, Ras activates c-Raf, followed by mitogen-activated protein kinase kinase (abbreviated as MKK, MEK, or MAP2K) and then MAPK1/2 (below). Ras is typically activated by growth hormones through receptor tyrosine kinases and GRB2/SOS, but may also receive other signals. ERKs are known to activate many transcription factors, such as ELK1, and some downstream protein kinases. Disruption of the ERK pathway is common in cancers, especially Ras, c-Raf and receptors such as HER2.

(E)-Osmundacetone

Cat. No.: HY-N1966

(E)-Osmundacetone is the isomer of Osmundacetone. Osmundacetone significantly suppresses the phosphorylation of MAPKs, including JNK, ERK, and p38 kinases. Osmundacetone has a neuroprotective effect against oxidative stress.

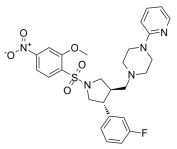


Purity: ≥99.0%
Clinical Data: No Development Reported
Size: 5 mg, 10 mg, 25 mg, 50 mg

(rel)-AR234960

Cat. No.: HY-120006A

(rel)-AR234960 is an active relative configuration of AR234960. AR234960, a non-peptide **MAS** (a G protein-coupled receptor) agonist, increases both mRNA and protein levels of CTGF via ERK1/2 signaling in HEK293-MAS cells and adult human cardiac fibroblasts.

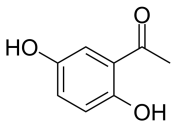


Purity: 99.47%
Clinical Data: No Development Reported
Size: 5 mg, 10 mg, 50 mg, 100 mg

2,5-Dihydroxyacetophenone

Cat. No.: HY-W001174

2,5-Dihydroxyacetophenone, isolated from Rehmanniae Radix Preparata, inhibits the production of inflammatory mediators in activated macrophages by blocking the **ERK1/2** and **NF-κB** signaling pathways.



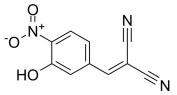
Purity: 99.56%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 100 mg

AG126

(Tyrphostin AG126)

Cat. No.: HY-108330

AG126 is a **tyrosine kinase inhibitor** which can prevent the activation of mitogen-activated protein kinase **p42MAPK** (**ERK2**).

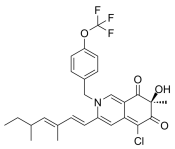


Purity: ≥98.0%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 5 mg, 10 mg, 25 mg, 50 mg, 100 mg

AKT-IN-11

Cat. No.: HY-144253

AKT-IN-11 is one of the most effective antibacterial agents against human hepatoma BEL-7402 cell line with an IC_{50} value of 1.15μM.



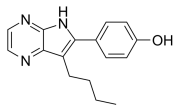
Purity: >98%
Clinical Data: No Development Reported
Size: 1 mg, 5 mg

Aloisine A

(RP107)

Cat. No.: HY-112363

Aloisine A (RP107) is a a potent cyclin-dependent kinase (CDK) inhibitor with IC_{50}s of 0.15 μM, 0.12 μM, 0.4 μM, 0.16 μM for CDK1/cyclin B, CDK2/cyclin A, CDK2/cyclin E, CDK5/p35, respectively. Aloisine A ininhibits GSK-3α (IC_{50}=0.5 μM) and GSK-3β (IC_{50}=1.5 μM).

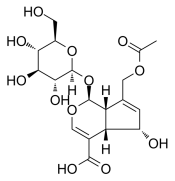


Purity: >98%
Clinical Data: No Development Reported
Size: 1 mg, 5 mg

Asperulosidic Acid

Cat. No.: HY-N6246

Asperulosidic Acid (ASPA), a bioactive iridoid glycoside, is extracted from the herbs of Hedyotis diffusa Willd. Asperulosidic Acid (ASPA) has anti-tumor, anti-oxidant, and anti-inflammatory activities.

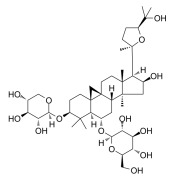


Purity: >98%
Clinical Data: No Development Reported
Size: 5 mg, 10 mg

Astragaloside IV

Cat. No.: HY-N0431

Astragaloside IV, an active component isolated from Astragalus membranaceus, suppresses the activation of **ERK1/2** and **JNK**, and downregulates matrix metalloproteases **(MMP)-2, (MMP)-9** in MDA-MB-231 breast cancer cells.

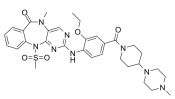


Purity: ≥98.0%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 10 mg, 50 mg, 100 mg

AX-15836

Cat. No.: HY-101846

AX-15836 is a potent and selective **ERK5** inhibitor with an IC_{50} of 8 nM.

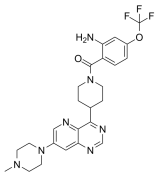


Purity: 99.96%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 2 mg, 5 mg, 10 mg, 25 mg, 50 mg

BAY885

Cat. No.: HY-112082

BAY885 is a highly potent and selective **ERK5** inhibitor with an IC_{50} of 35 nM. BAY885 shows weak inhibition on others kinases.

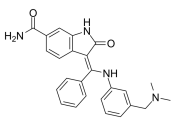


Purity: 99.15%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 5 mg, 10 mg, 50 mg, 100 mg

BIX02188

Cat. No.: HY-12055

BIX02188 is a potent **MEK5**-selective inhibitor with an IC_{50} of 4.3 nM. BIX02188 inhibits **ERK5** catalytic activity, with an IC_{50} of 810 nM.

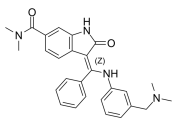


Purity: 99.59%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 5 mg, 10 mg, 50 mg, 100 mg

BIX02189

Cat. No.: HY-12056

BIX02189 is a potent and selective **MEK5** inhibitor with an IC_{50} of 1.5 nM. BIX02189 also inhibits **ERK5** catalytic activity with an IC_{50} of 59 nM.

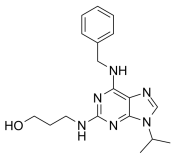


Purity: 99.99%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 5 mg, 10 mg, 50 mg, 100 mg

Bohemine

Cat. No.: HY-12843

Bohemine is a purine analogue and is a synthetic and selective **CDK** inhibitor with IC_{50}s of 4.6 μM, 83 μM, and 2.7 μM for **Cdk2/cyclin E**, **Cdk2/cyclin A**, and **Cdk9/cyclin T1**, respectively.



Purity: ≥98.0%
Clinical Data: No Development Reported
Size: 5 mg

C16-PAF

(PAF (C16))

Cat. No.: HY-108635

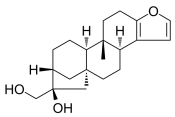
C16-PAF (PAF (C16)), a phospholipid mediator, is a platelet-activating factor and ligand for PAF G-protein-coupled receptor (**PAFR**). C16-PAF exhibits anti-apoptotic effect and inhibits caspase-dependent death by activating the PAFR.

Purity: ≥98.0%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 5 mg, 10 mg

Cafestol

Cat. No.: HY-N6257

Cafestol, one of the major components of coffee, is a coffee-specific diterpene from. Cafestol is a **ERK** inhibitor for AP-1-targeted activity against PGE_2 production and the mRNA expression of **cyclooxygenase (COX)-2** in LPS-activated RAW264.7 cells.

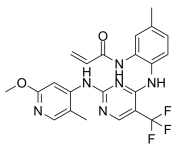


Purity: 99.91%
Clinical Data: No Development Reported
Size: 5 mg, 10 mg, 20 mg

CC-90003

Cat. No.: HY-112570

CC-90003 is an irreversible and selective inhibitor of **ERK 1/2** with antitumor activity.

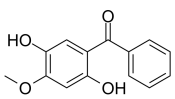


Purity: 99.41%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 5 mg, 10 mg, 25 mg, 50 mg, 100 mg

Cearoin

Cat. No.: HY-N8418

Cearoin increases **autophagy** and **apoptosis** through the production of **ROS** and the activation of **ERK**.

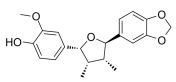


Purity: ≥98.0%
Clinical Data: No Development Reported
Size: 1 mg

Chicanine

Cat. No.: HY-N2270

Chicanine is a lignan compound of Schisandra chinesis, inhibits LPS-induced phosphorylation of **p38 MAPK**, **ERK 1/2** and **IκB-α**, with anti-inflammatory activity.

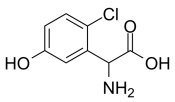


Purity: >98%
Clinical Data: No Development Reported
Size: 5 mg, 10 mg

CHPG

Cat. No.: HY-101364

CHPG is a selective **mGluR5** agonist, and attenuates SO_2-induced oxidative stress and inflammation through **TSG-6/NF-κB** pathway in BV2 microglial cells.

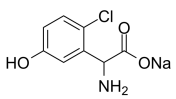


Purity: ≥98.0%
Clinical Data: No Development Reported
Size: 5 mg

CHPG sodium salt

Cat. No.: HY-101364A

CHPG sodium salt is a selective **mGluR5** agonist, and attenuates SO_2-induced oxidative stress and inflammation through **TSG-6/NF-κB** pathway in BV2 microglial cells.

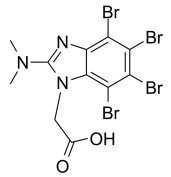


Purity: 99.17%
Clinical Data: No Development Reported
Size: 5 mg

CK2/ERK8-IN-1

Cat. No.: HY-135906

CK2/ERK8-IN-1 is a dual **casein kinase 2 (CK2)** (K_i of 0.25 μM) and **ERK8** (MAPK15, ERK7) inhibitor with IC_{50}s of 0.50 μM. CK2/ERK8-IN-1 also binds to **PIM1**, **HIPK2** (**homeodomain-interacting protein kinase 2**), and **DYRK1A** with K_is of 8.65 μM, 15.25 μM, and 11.9 μM, respectively.



Purity: 98.82%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 10 mg, 50 mg, 100 mg

CKLF1-C27

Cat. No.: HY-P3418

CKLF1-C27, a C-terminal peptide of CKLF1, binds to **CCR4** receptor and activates **ERK1/2** pathway. CKLF1-C27 can abrogate the effect of CKLF1 on cells by competing for CCR4 receptor. CKLF1-C27 shows great effect on promoting proliferation on HUVECs.

Purity: >98%
Clinical Data: No Development Reported
Size: 1 mg, 5 mg

CKLF1-C27 TFA

Cat. No.: HY-P3418A

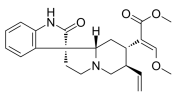
CKLF1-C27, a C-terminal peptide of CKLF1, binds to **CCR4** receptor and activates **ERK1/2** pathway. CKLF1-C27 can abrogate the effect of CKLF1 on cells by competing for CCR4 receptor. CKLF1-C27 shows great effect on promoting proliferation on HUVECs.

Purity: >98%
Clinical Data: No Development Reported
Size: 1 mg, 5 mg

Corynoxeine

Cat. No.: HY-N0590

Corynoxeine, isolated from the hook of Uncaria rhynchophylla, is a potent **ERK1/ERK2** inhibitor of key PDGF-BB-induced vascular smooth muscle cells (VSMCs) proliferation.

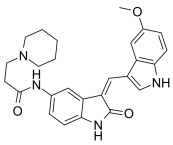


Purity: 99.91%
Clinical Data: No Development Reported
Size: 5 mg, 10 mg

DEL-22379

Cat. No.: HY-18932

DEL-22379 is an **ERK dimerization** Inhibitor. DEL-22379 readily binds to ERK2 with a K_d estimated in the low micromolar range, though binding is detectable even at low nanomolar concentrations. **ERK2 dimerization** is progressively inhibited with an IC_{50} of ~0.5 μM.

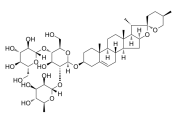


Purity: 99.76%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 5 mg, 10 mg, 50 mg, 100 mg

Deltonin

Cat. No.: HY-N2283

Deltonin, a steroidal saponin, isolated from Dioscorea zingiberensis Wright, with antitumor activity; Deltonin inhibits **ERK1/2** and **AKT** activation.

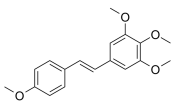


Purity: 99.93%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 5 mg

DMU-212

Cat. No.: HY-137977

DMU-212 is a methylated derivative of Resveratrol (HY-16561), with antimitotic, anti-proliferative, antioxidant and apoptosis promoting activities. DMU-212 induces mitotic arrest via induction of **apoptosis** and activation of **ERK1/2** protein. DMU-212 has orally active.

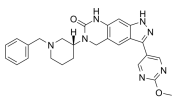


Purity: 99.91%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 10 mg, 25 mg, 50 mg

Edaxeterkib

Cat. No.: HY-139571

Edaxeterkib is a potent **extracellular signal-regulated kinase (ERK)** inhibitor for the research of cancer.

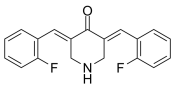


Purity: >98%
Clinical Data: No Development Reported
Size: 1 mg, 5 mg

EF24

Cat. No.: HY-119272

EF24 is a curcumin analogue with greater anti-tumor efficacy and oral bioavailability via deactivation of the MAPK/ERK signaling pathway in oral squamous cell carcinoma (OSCC).

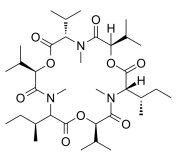


Purity: >98%
Clinical Data: No Development Reported
Size: 5 mg, 10 mg, 25 mg, 50 mg, 100 mg

Enniatin A1

Cat. No.: HY-N6704

Enniatin A1 isolated from Fusarium mycotoxins is a cyclic hexadepsipeptide consisting of alternating D-α-hydroxyisovaleric acids and N-methyl-L-amino acids.

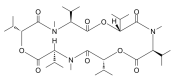


Purity: >98%
Clinical Data: No Development Reported
Size: 5 mg

Enniatin B

Cat. No.: HY-N3806

Enniatin B is a Fusarium mycotoxin. Enniatin B inhibits acyl-CoA: cholesterol acyltransferase (**ACAT**) activity with an IC_{50} of 113 μM in an enzyme assay using rat liver microsomes. Enniatins B decreases the activation of **ERK** (p44/p42).

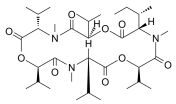


Purity: >98%
Clinical Data: No Development Reported
Size: 5 mg

Enniatin B1

Cat. No.: HY-N3807

Enniatin B1 is a Fusarium mycotoxin. Enniatin B1 inhibits acyl-CoA: cholesterol acyltransferase (**ACAT**) activity with an IC_{50} of 73 μM in an enzyme assay using rat liver microsomes. Enniatin B1 crosss the blood-brain barrier.

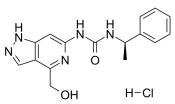


Purity: >98%
Clinical Data: No Development Reported
Size: 5 mg

ERK-IN-2

Cat. No.: HY-133084

ERK-IN-2 is a **ERK2** inhibitor probe with an IC_{50} value of 1.8 nM. ERK-IN-2 might lead to off-target toxicity and/or off-target activity at dose >10 μM.

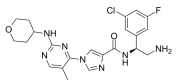


Purity: >98%
Clinical Data: No Development Reported
Size: 1 mg, 5 mg

ERK-IN-3

Cat. No.: HY-136579

ERK-IN-3 is a potent and orally active inhibitor of **ERK**. ERK-IN-3 inhibits **ERK1/2** with low single-digit nM IC_{50} values. ERK-IN-3 can be used for the research of cancers driven by RAS mutations.

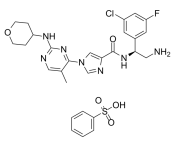


Purity: 99.02%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 5 mg, 10 mg, 25 mg, 50 mg, 100 mg

ERK-IN-3 benzenesulfonate

Cat. No.: HY-136579A

ERK-IN-3 benzenesulfonate is a potent and orally active inhibitor of **ERK**. ERK-IN-3 benzenesulfonate inhibits **ERK1/2** with low single-digit nM IC_{50} values. ERK-IN-3 benzenesulfonate can be used for the research of cancers driven by RAS mutations.

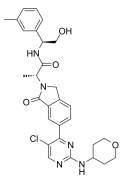


Purity: 98.06%
Clinical Data: No Development Reported
Size: 5 mg, 10 mg, 25 mg, 50 mg, 100 mg

ERK1/2 inhibitor 1

Cat. No.: HY-112287

ERK1/2 inhibitor 1 is a potent, orally bioavailable **ERK1/2** inhibitor, showing 60% inhibition at 1 nM and an IC_{50} of 3.0 nM against ERK1 and ERK2, respectively.

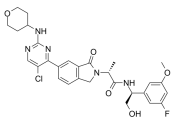


Purity: 99.16%
Clinical Data: No Development Reported
Size: 5 mg, 10 mg, 50 mg, 100 mg

ERK1/2 inhibitor 2

Cat. No.: HY-126288

ERK1/2 inhibitor 2 (Example 1) is a potent dual **ERK1/2** inhibitor. ERK1/2 inhibitor 2 has anti-cancer activity.

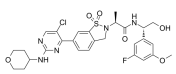


Purity: 99.75%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 5 mg, 10 mg, 25 mg, 50 mg, 100 mg

ERK1/2 inhibitor 3

Cat. No.: HY-145025

ERK1/2 inhibitor 3 is a potent inhibitor of **ERK1/2**. Mitogen-activated protein kinase (MAPK) plays an extremely important role in the signal transduction pathway, and extracellular signal regulated kinase (ERK) is a member of the MAPK family.

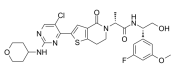


Purity: >98%
Clinical Data: No Development Reported
Size: 1 mg, 5 mg

ERK1/2 inhibitor 4

Cat. No.: HY-145026

ERK1/2 inhibitor 5 is a potent inhibitor of **ERK1/2**. Mitogen-activated protein kinase (MAPK) plays an extremely important role in the signal transduction pathway, and extracellular signal regulated kinase (ERK) is a member of the MAPK family.

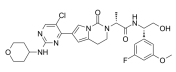


Purity: >98%
Clinical Data: No Development Reported
Size: 1 mg, 5 mg

ERK1/2 inhibitor 5

Cat. No.: HY-145027

ERK1/2 inhibitor 5 is a potent inhibitor of **ERK1/2**. Mitogen-activated protein kinase (MAPK) plays an extremely important role in the signal transduction pathway, and extracellular signal regulated kinase (ERK) is a member of the MAPK family.

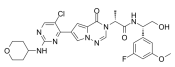


Purity: >98%
Clinical Data: No Development Reported
Size: 1 mg, 5 mg

ERK1/2 inhibitor 6

Cat. No.: HY-145028

ERK1/2 inhibitor 6 is a potent inhibitor of **ERK1/2**. Mitogen-activated protein kinase (MAPK) plays an extremely important role in the signal transduction pathway, and extracellular signal regulated kinase (ERK) is a member of the MAPK family.

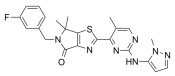


Purity: >98%
Clinical Data: No Development Reported
Size: 1 mg, 5 mg

ERK1/2 inhibitor 7

Cat. No.: HY-142433

ERK1/2 inhibitor 7 is a potent **ERK** inhibitor with an IC_{50} of 0.94 nM for ERK2 (WO2021110168A1, WX006).

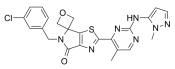


Purity: >98%
Clinical Data: No Development Reported
Size: 1 mg, 5 mg

ERK1/2 inhibitor 8

Cat. No.: HY-142437

ERK1/2 inhibitor 8 is a potent **ERK** inhibitor with an IC_{50} of 0.48 nM for ERK2 (WO2021110168A1, WX007).

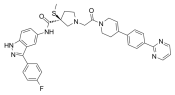


Purity: >98%
Clinical Data: No Development Reported
Size: 1 mg, 5 mg

ERK2 IN-1

Cat. No.: HY-112300

ERK2 IN-1 is a selective **ERK2** inhibitor with an IC_{50} of 7 nM.

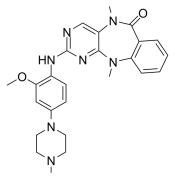


Purity: >98%
Clinical Data: No Development Reported
Size: 1 mg, 5 mg

ERK5-IN-1

Cat. No.: HY-14403

ERK5-IN-1 is a potent **ERK5** inhibitor with an IC_{50} of 87±7 nM. ERK5-IN-1 also inhibits **LRRK2**[G2019S] with an IC_{50} of 26 nM.

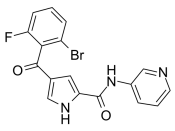


Purity: 99.92%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 5 mg, 10 mg, 50 mg, 100 mg

ERK5-IN-2

Cat. No.: HY-128341

ERK5-IN-2 is an orally active, sub-micromolar, selective **ERK5** inhibitor with IC_{50}s of 0.82 μM, 3 μM for **ERK5** and **ERK5 MEF2D**, respectively. ERK5-IN-2 does not interact with the BRD4 bromodomain.

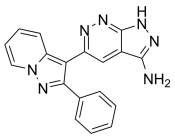


Purity: 98.97%
Clinical Data: No Development Reported
Size: 5 mg, 10 mg, 25 mg, 50 mg, 100 mg

FR 180204

Cat. No.: HY-12275

FR 180204 is an ATP-competitive and selective **ERK** inhibitor. FR 180204 inhibits **ERK1** and **ERK2** with IC_{50}s of 0.51 μM (K_i=0.31 μM) and 0.33 μM (K_i=0.14 μM), respectively.

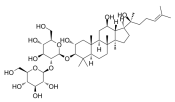


Purity: 99.47%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 5 mg, 10 mg, 50 mg

Gypenoside L

Cat. No.: HY-N8211

Gypenoside L is a saponin that can be found in Gynostemma pentaphyllum. Gypenoside L increases the SA-β-galactosidase activity, promotes the production of senescence-associated secretory cytokines.

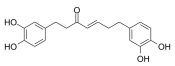


Purity: 99.42%
Clinical Data: No Development Reported
Size: 5 mg

Hirsutenone

Cat. No.: HY-N4042

Hirsutenone is an active botanical diarylheptanoid present in Alnus species and exhibits many biological activities, including anti-inflammatory, anti-tumor promoting and anti-atopic dermatitis effects.



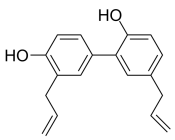
Purity: >98%
Clinical Data: No Development Reported
Size: 1 mg, 5 mg

Honokiol

(NSC 293100)

Cat. No.: HY-N0003

Honokiol is a bioactive, biphenolic phytochemical that possesses potent antioxidative, anti-inflammatory, antiangiogenic, and anticancer activities by targeting a variety of signaling molecules. It inhibits the activation of **Akt**.

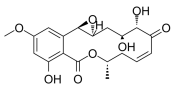


Purity: 99.90%
Clinical Data: Phase 3
Size: 10 mM × 1 mL, 50 mg, 100 mg, 200 mg

Hypothemycin

Cat. No.: HY-107417

Hypothemycin, a fungal polyketide, is a multikinase inhibitor with K_is of 10/70 nM, 17/38 nM, 90 nM, 900 nM/1.5 μM, and 8.4/2.4 μM for **VEGFR2/VEGFR1**, **MEK1/MEK2**, **FLT-3**, **PDGFRβ/PDGFRα**, and **ERK1/ERK2**, respectively.

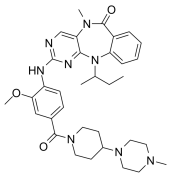


Purity: 96.10%
Clinical Data: No Development Reported
Size: 1 mg

JWG-071

Cat. No.: HY-108886

JWG-071 is the first reported kinase-selective chemical probe for **ERK5**. JWG-071 improves ERK5 activity and BRD4 selectivity. JWG-071 will be a much-needed chemical probe for deconvoluting ERK5 and BRD4 pharmacology.

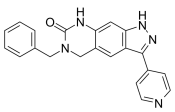


Purity: 99.78%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 5 mg, 10 mg, 25 mg, 50 mg, 100 mg

KO-947

Cat. No.: HY-112181

KO-947 is a potent and selective inhibitor of **ERK1/2** kinases with potential utility in MAPK pathway dysregulated tumors.



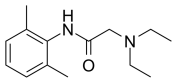
Purity: 99.45%
Clinical Data: Phase 1
Size: 5 mg, 10 mg, 25 mg, 50 mg, 100 mg

Lidocaine

(Lignocaine)

Cat. No.: HY-B0185

Lidocaine (Lignocaine) inhibits **sodium channels** involving complex voltage and using dependence.



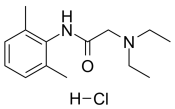
Purity: 99.96%
Clinical Data: Launched
Size: 10 mM × 1 mL, 500 mg, 5 g, 10 g

Lidocaine hydrochloride

(Lignocaine hydrochloride)

Cat. No.: HY-B0185A

Lidocaine hydrochloride (Lignocaine hydrochloride) inhibits **sodium channels** involving complex voltage and using dependence.

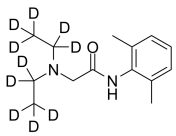


Purity: 99.81%
Clinical Data: Launched
Size: 10 mM × 1 mL, 500 mg, 5 g, 10 g

Lidocaine-d10

Cat. No.: HY-B0185S1

Lidocaine-d10 is the deuterium labeled Lidocaine. Lidocaine (Lignocaine) inhibits **sodium channels** involving complex voltage and using dependence.

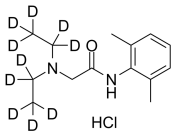


Purity: >98%
Clinical Data: No Development Reported
Size: 1 mg, 5 mg

Lidocaine-d10 hydrochloride

Cat. No.: HY-B0185AS

Lidocaine-d10 (Lignocaine-d10) hydrochloride is the deuterium labeled Lidocaine hydrochloride. Lidocaine hydrochloride (Lignocaine hydrochloride) inhibits **sodium channels** involving complex voltage and using dependence.

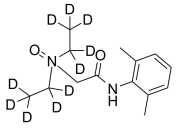


Purity: >98%
Clinical Data: No Development Reported
Size: 5 mg, 50 mg

Lidocaine-d10 N-Oxide

Cat. No.: HY-B0185S

Lidocaine-d10 N-Oxide is the deuterium labeled Lidocaine. Lidocaine (Lignocaine) inhibits **sodium channels** involving complex voltage and using dependence.



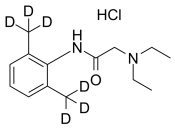
Purity: >98%
Clinical Data: No Development Reported
Size: 2.5 mg, 25 mg

Lidocaine-d6 hydrochloride

(Lignocaine-d6 hydrochloride)

Cat. No.: HY-B0185AS1

Lidocaine-d6 (hydrochloride) is deuterium labeled Lidocaine (hydrochloride). Lidocaine hydrochloride (Lignocaine hydrochloride) inhibits sodium channels involving complex voltage and using dependence.

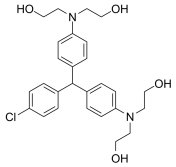


Purity: >98%
Clinical Data: No Development Reported
Size: 1 mg, 5 mg

LM22B-10

Cat. No.: HY-104047

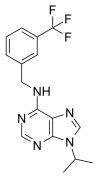
LM22B-10 is an activator of **TrkB/TrkC** neurotrophin receptor, and can induce **TrkB**, **TrkC**, **AKT** and **ERK** activation in vitro and in vivo.



Purity: 99.72%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 2 mg, 5 mg, 10 mg, 50 mg, 100 mg

Longdaysin

Cat. No.: HY-18285

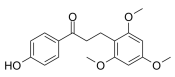


Longdaysin is a inhibitor of the Wnt/β-catenin signaling pathway, which exerts antitumor effect through blocking CK1δ/ε-dependent Wnt signaling. Longdaysin inhibits **CK1α**, **CK1δ**, **CDK7**, and **ERK2** with IC_{50}s of 5.6 μM, 8.8 μM, 29 μM, and 52 μM, respectively.

Purity: 99.87%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 5 mg, 10 mg, 25 mg, 50 mg, 100 mg

Loureirin B

Cat. No.: HY-N1504

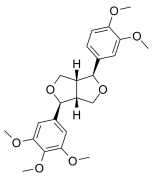


Loureirin B, a flavonoid extracted from **Dracaena cochinchinensis**, is an inhibitor of plasminogen activator inhibitor-1 (**PAI-1**), with an IC_{50} of 26.10μM; Loureirin B also inhibits K_{ATP}, the phosphorylation of **ERK** and **JNK**, and has anti-diabetic activity.

Purity: 99.16%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 5 mg

Magnolin

Cat. No.: HY-N1374

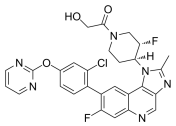


Magnolin, a major component of Magnolia flos (Shin-Yi), inhibits the Ras/ERKs/RSK2 signaling axis by targeting the active pocket of **ERK1** and **ERK2** with IC_{50}s of 87 nM and 16.5 nM, respectively.

Purity: 99.98%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 5 mg, 10 mg, 25 mg, 50 mg

MAP855

Cat. No.: HY-145702



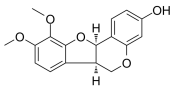
MAP855 is a highly potent, selective, ATP-competitive and orally active **MEK1/2** kinase inhibitor (MEK1 ERK2 cascade IC_{50}=3 nM, pERK EC_{50}=5 nM). MAP855 shows equipotent inhibition of wild-type and mutant MEK1/2.

Purity: >98%
Clinical Data: No Development Reported
Size: 1 mg, 5 mg

Methylnissolin

(Astrapterocarpan)

Cat. No.: HY-N2484



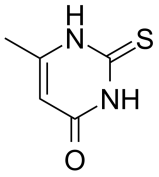
Methylnissolin (Astrapterocarpan), isolated from Astragalus membranaceus, inhibits **platelet-derived growth factor (PDGF)**-BB-induced cell proliferation with an IC_{50} of 10 μM.

Purity: 99.64%
Clinical Data: No Development Reported
Size: 1 mg, 5 mg, 10 mg

Methylthiouracil

(MTU)

Cat. No.: HY-B0513



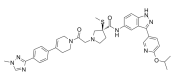
Methylthiouracil is an antithyroid agent. Methylthiouracil suppresses the production **TNF-α** and **IL-6**, and the activation of **NF-κB** and **ERK1/2**.

Purity: ≥98.0%
Clinical Data: Launched
Size: 10 mM × 1 mL, 50 mg, 100 mg

MK-8353

(SCH900353)

Cat. No.: HY-111407

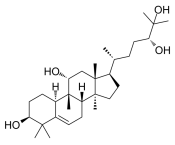


MK-8353 (SCH900353) is a potent, selective and orally available **ERK1/2** inhibitor, with IC_{50}s of 23.0 nM and 8.8 nM, respectively; MK-8353 has antitumor activity.

Purity: >98%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 5 mg, 10 mg, 50 mg

Mogrol

Cat. No.: HY-N2312

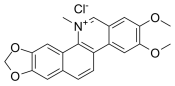


Mogrol is a biometabolite of mogrosides, and acts via inhibition of the **ERK1/2** and **STAT3** pathways, or reducing **CREB** activation and activating **AMPK** signaling.

Purity: 99.25%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 1 mg, 5 mg, 10 mg, 25 mg

Nitidine chloride

Cat. No.: HY-N0498

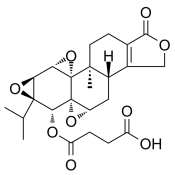


Nitidine chloride, a potential **anti-malarial** lead compound derived from Zanthoxylum nitidum (Roxb) DC, exerts potent anticancer activity through diverse pathways, including inducing **apoptosis**, inhibiting **STAT3** signaling cascade, **DNA topoisomerase 1 and 2A**, **ERK** and...

Purity: 99.61%
Clinical Data: No Development Reported
Size: 5 mg, 10 mg, 20 mg

Omtriptolide

Cat. No.: HY-16363



Omtriptolide (PG490-88) is a derivative prodrug of triptolide purified from the Chinese herb.

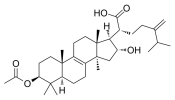
Purity: 98.23%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 1 mg, 5 mg, 10 mg, 25 mg

Pachymic acid

(3-O-Acetyltumulosic acid)

Cat. No.: HY-N0371

Pachymic acid is a lanostrane-type triterpenoid from P. cocos. Pachymic acid inhibits **Akt** and **ERK** signaling pathways.

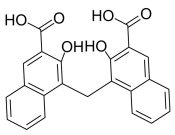


Purity: ≥98.0%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 5 mg, 10 mg, 50 mg

Pamoic acid

Cat. No.: HY-W008613

Pamoic acid is a potent **GPR35** agonist with an EC_{50} of 79 nM. Pamoic acid exhibits neuroprotective and anti-inflammatory properties.

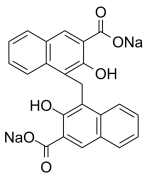


Purity: >98%
Clinical Data: No Development Reported
Size: 1 g

Pamoic acid disodium

Cat. No.: HY-W010907

Pamoic acid disodium is a potent **GPR35** agonist with an EC_{50} value of 79 nM. Pamoic acid disodium induces **GPR35** internalization and activates **ERK1/2** with EC_{50} values of 22 nM and 65 nM, respectively.

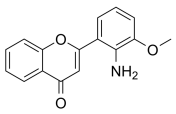


Purity: ≥98.0%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 100 mg

PD98059

Cat. No.: HY-12028

PD98059 is a potent and selective **MEK** inhibitor with an IC_{50} of 5 μM. PD98059 binds to the inactive form of **MEK**, thereby preventing the activation of **MEK1** (IC_{50} of 2-7 μM) and **MEK2** (IC_{50} of 50 μM) by upstream kinases. PD98059 is a **ERK1/2** signaling inhibitor.



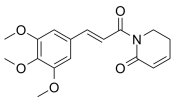
Purity: 99.94%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 10 mg, 50 mg, 100 mg

Piperlongumine

(Piplartine)

Cat. No.: HY-N2329

Piperlongumine is a alkaloid, possesses ant-inflammatory, antibacterial, antiangiogenic, antioxidant, antitumor, and antidiabetic activities. Piperlongumine induces ROS, and induces apoptosis in cancer cell lines.



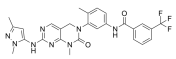
Purity: 99.19%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 10 mg

Pluripotin

(SC1)

Cat. No.: HY-10579

Pluripotin is a dual inhibitor of **ERK1** and **RasGAP** with K_Ds of 98 nM and 212 nM, respectively. Pluripotin also inhibits **RSK1**, **RSK2**, **RSK3**, and **RSK4** with IC_{50}s of 0.5, 2.5, 3.3, and 10.0 μM, respectively.



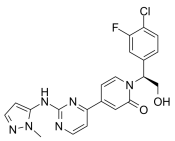
Purity: 98.86%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 2 mg, 5 mg, 10 mg, 25 mg, 50 mg, 100 mg

Ravoxertinib

(GDC-0994)

Cat. No.: HY-15947

Ravoxertinib (GDC-0994) is an orally active **ERK** kinase inhibitor with an IC_{50} of 6.1 nM and 3.1 nM for **ERK1** and **ERK2**, respectively.



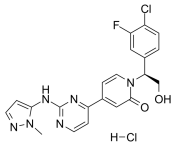
Purity: 99.75%
Clinical Data: Phase 1
Size: 10 mM × 1 mL, 5 mg, 10 mg, 50 mg

Ravoxertinib hydrochloride

(GDC-0994 hydrochloride)

Cat. No.: HY-15947A

Ravoxertinib hydrochloride (GDC-0994 hydrochloride) is an orally bioavailable inhibitor selective for **ERK** kinase activity with IC_{50} of 6.1 nM and 3.1 nM for **ERK1** and **ERK2**, respectively.

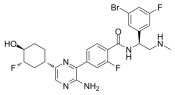


Purity: 98.99%
Clinical Data: Phase 1
Size: 10 mM × 1 mL, 5 mg, 10 mg, 50 mg

Rineterkib

Cat. No.: HY-114491

Rineterkib (compound B) is an orally active **RAF** and **ERK1/2** inhibitor in the study of a proliferative disease characterized by activating mutations in the MAPK pathway.

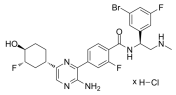


Purity: 99.21%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 5 mg, 10 mg, 25 mg, 50 mg, 100 mg

Rineterkib hydrochloride

Cat. No.: HY-114491A

Rineterkib hydrochloride (compound B) is an orally active **RAF** and **ERK1/2** inhibitor in the treatment of a proliferative disease characterized by activating mutations in the MAPK pathway.

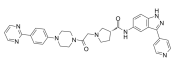


Purity: 99.76%
Clinical Data: No Development Reported
Size: 5 mg, 10 mg, 25 mg, 50 mg, 100 mg

SCH772984

Cat. No.: HY-50846

SCH772984 is a highly selective and ATP-competitive **ERK** inhibitor, with IC_{50}s of 4 and 1 nM for ERK1 and ERK2, respectively. SCH772984 has antitumor activity in MAPK inhibitor-naïve and MAPK inhibitor-resistant cells containing **BRAF** or **RAS** mutations.

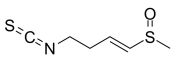


Purity: 98.69%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 5 mg, 10 mg, 50 mg, 100 mg, 200 mg

Sulforaphene

Cat. No.: HY-N2450

Sulforaphene, isolated from radish seeds, exhibits an ED_{50} against velvetleaf seedlings approximately 2 x 10^{-4} M. Sulforaphene promotes cancer cells apoptosis and inhibits migration via inhibiting **EGFR**, **p-ERK1/2**, **NFκB** and other signals.



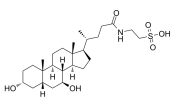
Purity: 99.26%
Clinical Data: No Development Reported
Size: 5 mg, 10 mg, 25 mg

Tauroursodeoxycholate

(Tauroursodeoxycholic acid; TUDCA; UR 906)

Cat. No.: HY-19696

Tauroursodeoxycholate (Tauroursodeoxycholic acid) is an endoplasmic reticulum (ER) stress inhibitor. Tauroursodeoxycholate significantly reduces expression of apoptosis molecules, such as **caspase-3** and **caspase-12**. Tauroursodeoxycholate also inhibits **ERK**.

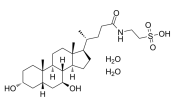


Purity: ≥98.0%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 50 mg

Tauroursodeoxycholate dihydrate (Tauroursodeoxycholic acid dihydrate; TUDCA dihydrate; UR 906 dihydrate)

Cat. No.: HY-19696B

Tauroursodeoxycholate (Tauroursodeoxycholic acid; TDUCA) dihydrate is an endoplasmic reticulum (ER) stress inhibitor. Tauroursodeoxycholate significantly reduces expression of apoptosis molecules, such as **caspase-3** and **caspase-12**. Tauroursodeoxycholate also inhibits **ERK**.

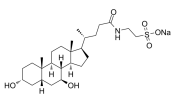


Purity: ≥98.0%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 50 mg

Tauroursodeoxycholate sodium (Tauroursodeoxycholic acid sodium; TUDCA sodium; UR 906 sodium)

Cat. No.: HY-19696A

Tauroursodeoxycholate (Tauroursodeoxycholic acid; TUDCA) sodium is an endoplasmic reticulum (ER) stress inhibitor. Tauroursodeoxycholate significantly reduces expression of apoptosis molecules, such as **caspase-3** and **caspase-12**. Tauroursodeoxycholate also inhibits **ERK**.



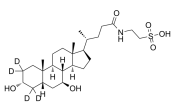
Purity: 98.63%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 100 mg, 500 mg

Tauroursodeoxycholate-d4

(Tauroursodeoxycholic acid-d4; TUDCA-d4; UR 906-d4)

Cat. No.: HY-19696S1

Tauroursodeoxycholate-d4 is deuterium labeled Tauroursodeoxycholate. Tauroursodeoxycholate (Tauroursodeoxycholic acid) is an endoplasmic reticulum (ER) stress inhibitor.

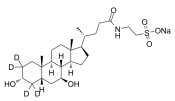


Purity: >98%
Clinical Data: No Development Reported
Size: 1 mg, 5 mg

Tauroursodeoxycholate-d4 sodium (Tauroursodeoxycholic acid-d4 sodium; TUDCA-d4 sodium; UR 906-d4 sodium)

Cat. No.: HY-19696AS

Tauroursodeoxycholate-d4 (Tauroursodeoxycholic acid-d4) sodium is the deuterium labeled Tauroursodeoxycholate sodium. Tauroursodeoxycholate (Tauroursodeoxycholic acid; TUDCA) sodium is an endoplasmic reticulum (ER) stress inhibitor.



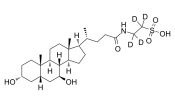
Purity: >98%
Clinical Data: No Development Reported
Size: 1 mg, 5 mg

Tauroursodeoxycholate-d4-1

(Tauroursodeoxycholic acid-d4-1; TUDCA-d4-1; UR 906-d4-1)

Cat. No.: HY-19696S2

Tauroursodeoxycholate-d4-1 is the deuterium labeled Tauroursodeoxycholate. Tauroursodeoxycholate (Tauroursodeoxycholic acid) is an endoplasmic reticulum (ER) stress inhibitor.

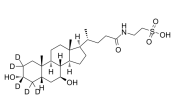


Purity: >98%
Clinical Data: No Development Reported
Size: 1 mg, 5 mg

Tauroursodeoxycholate-d5

Cat. No.: HY-19696S

Tauroursodeoxycholate-d5 is the deuterium labeled Tauroursodeoxycholate. Tauroursodeoxycholate (Tauroursodeoxycholic acid) is an endoplasmic reticulum (ER) stress inhibitor.



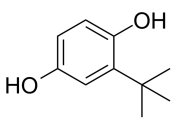
Purity: >98%
Clinical Data: No Development Reported
Size: 1 mg, 5 mg, 10 mg

TBHQ

(tert-Butylhydroquinone)

Cat. No.: HY-100489

TBHQ (tert-Butylhydroquinone) is a widely used **Nrf2** activator, protects against Doxorubicin (DOX)-induced cardiotoxicity through activation of **Nrf2**.



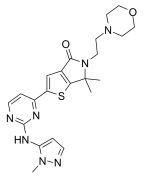
Purity: 99.76%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 500 mg, 1 g

Temuterkib

(LY3214996)

Cat. No.: HY-101494

Temuterkib (LY3214996) is a highly selective inhibitor of **ERK1** and **ERK2**, with IC_{50} of 5 nM for both enzymes in biochemical assays. Temuterkib potently inhibits cellular p-RSK1 in BRAF and RAS mutant cancer cell lines.

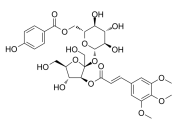


Purity: 99.85%
Clinical Data: Phase 2
Size: 10 mM × 1 mL, 1 mg, 5 mg, 10 mg, 50 mg, 100 mg

Tenuifoliside A

Cat. No.: HY-N6076

Tenuifoliside A is isolated from Polygala tenuifolia, has anti-apoptotic and antidepressant-like effects. Tenuifoliside A exhibits its neneurotrophic effects and promotes cell proliferation through the **ERK/CREB/BDNF** signal pathway in C6 cells.



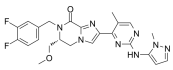
Purity: 98.07%
Clinical Data: No Development Reported
Size: 5 mg, 10 mg

Tizaterkib

(AZD0364)

Cat. No.: HY-111483

Tizaterkib (AZD0364) is a potent and selective **ERK2** inhibitor extracted from patent WO2017080979A1, compound example 18, has an IC_{50} of 0.6 nM.

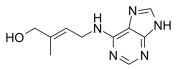


Purity: 99.71%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 5 mg, 10 mg, 25 mg, 50 mg

trans-Zeatin

Cat. No.: HY-19700

trans-Zeatin is a plant cytokinin, which plays an important role in cell growth, differentiation, and division; trans-Zeatin also inhibits UV-induced **MEK/ERK** activation.

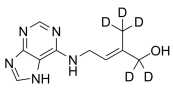


Purity: 99.69%
Clinical Data: No Development Reported
Size: 10 mg, 50 mg

trans-Zeatin-d5

Cat. No.: HY-19700S

trans-Zeatin-d5 is deuterium labeled trans-Zeatin. trans-Zeatin is a plant cytokinin, which plays an important role in cell growth, differentiation, and division; trans-Zeatin also inhibits UV-induced MEK/ERK activation.



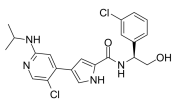
Purity: >98%
Clinical Data: No Development Reported
Size: 1 mg, 5 mg

Ulixertinib

(BVD-523; VRT752271)

Cat. No.: HY-15816

Ulixertinib (BVD-523; VRT752271) is a potent, orally active, highly selective, ATP-competitive and reversible covalent inhibitor of **ERK1/2** kinases, with an IC_{50} of <0.3 nM against ERK2.



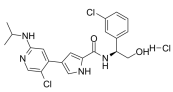
Purity: 99.92%
Clinical Data: Phase 2
Size: 10 mM × 1 mL, 5 mg, 10 mg, 50 mg, 100 mg, 200 mg

Ulixertinib hydrochloride

(BVD-523 hydrochloride; VRT752271 hydrochloride)

Cat. No.: HY-15816A

Ulixertinib hydrochloride (BVD-523 hydrochloride) is a potent, orally active, highly selective, ATP-competitive and reversible covalent inhibitor of **ERK1/2** kinases, with an IC_{50} of <0.3 nM against ERK2.

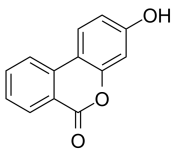


Purity: 99.89%
Clinical Data: Phase 2
Size: 10 mM × 1 mL, 5 mg, 10 mg, 50 mg, 100 mg

Urolithin B

Cat. No.: HY-126307

Urolithin B is one of the gut microbial metabolites of ellagitannins, and has anti-inflammatory and antioxidant effects.

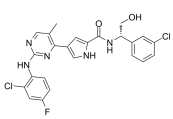


Purity: 99.86%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 10 mg, 50 mg, 100 mg

VX-11e

Cat. No.: HY-14178

VX-11e is a potent, selective, and orally bioavailable inhibitor of **ERK** with K_i < 2 nM.

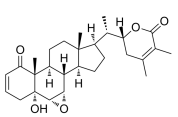


Purity: 99.12%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 5 mg, 10 mg, 50 mg, 100 mg

Withanolide B

Cat. No.: HY-129566

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**.



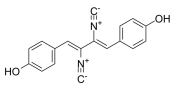
Purity: >98%
Clinical Data: No Development Reported
Size: 5 mg, 10 mg, 25 mg

Xantocillin

(Xanthocillin X)

Cat. No.: HY-122404

Xantocillin (Xanthocillin X) is a marine agent extracted from Penicillium commune, induces **autophagy** through inhibition of the **MEK/ERK** pathway.

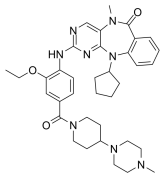


Purity: >98%
Clinical Data: No Development Reported
Size: 5 mg, 10 mg, 25 mg

XMD17-109

Cat. No.: HY-15665

XMD17-109 is a novel, specific **ERK-5** inhibitor, with an IC_{50} of 162 nM.

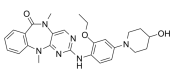


Purity: 99.14%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 5 mg, 10 mg, 50 mg, 100 mg

XMD8-92

Cat. No.: HY-14443

XMD8-92 is a potent **ERK5 (BMK1)/BRD4** inhibitor with K_ds of 80 and 190 nM, respectively. XMD8-92 inhibits DCAMKL2, PLK4 and TNK1 with K_ds of 190, 600 and 890 nM, respectively. Anti-cancer activity.



Purity: 99.93%
Clinical Data: No Development Reported
Size: 10 mM × 1 mL, 10 mg, 50 mg, 100 mg