

Hello Bio, Inc.  
304 Wall St., Princeton, NJ 08540 USA

T. 609-683-7500  
F. 609-228-4994

customercare-usa@hellobio.com



## DATASHEET

DPN

### Product overview

<b>Name</b>	DPN
<b>Cat No</b>	HB2489
<b>Alternative names</b>	Diarylpropionitrile
<b>Biological action</b>	Agonist
<b>Purity</b>	>98%
<b>Description</b>	Selective ER $\beta$ estrogen receptor agonist

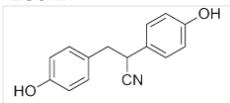
### Biological Data

<b>Biological description</b>	Selective ER $\beta$ estrogen receptor agonist ( $K_d$ values are 5 and 400 nM at ER $\beta$ and ER $\alpha$ respectively). Shows 70-fold selectivity at ER $\beta$ over ER $\alpha$ . Shows neuroprotective effects. Active <i>in vivo</i> .
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### Solubility & Handling

<b>Storage instructions</b>	-20°C (desiccate)
<b>Solubility overview</b>	Soluble in DMSO (100 mM) and in ethanol (100 mM)
<b>Important</b>	This product is for RESEARCH USE ONLY and is not intended for therapeutic or diagnostic use. Not for human or veterinary use.

### Chemical Data

<b>Chemical name</b>	2,3-bis(4-Hydroxyphenyl)-propionitrile
<b>Molecular Weight</b>	239.27
<b>Chemical structure</b>	
<b>Molecular Formula</b>	C <sub>15</sub> H <sub>13</sub> NO <sub>2</sub>
<b>CAS Number</b>	1428-67-7
<b>PubChem identifier</b>	102614
<b>SMILES</b>	C1=CC(=CC=C1CC(C#N)C2=CC=C(C=C2)O)O
<b>InChi</b>	InChI=1S/C15H13NO2/c16-10-13(12-3-7-15(18)8-4-12)9-11-1-5-14(17)6-2-11/h1-8,13,17-18H,9H2
<b>InChiKey</b>	GHZHWADWADLAIQ-UHFFFAOYSA-N
<b>MDL number</b>	MFCD01695412

### References

**Estrogen receptor-beta potency-selective ligands: structure-activity relationship studies of diarylpropionitriles and their acetylene and polar analogues.**

Meyers MJ *et al* (2001) J Med Chem 44(24)

PubMedID [11708925](#)

**Estrogen receptor subtypes alpha and beta contribute to neuroprotection and increased Bcl-2 expression in primary hippocampal neurons.**

Zhao L *et al* (2004) Brain Res 1010(1-2)

**PubMedID** [15126114](#)

**The possible role of estrogen and selective estrogen receptor modulators in a rat model of Parkinson's disease.**

Baraka AM *et al* (2011) Life Sci 88(19-20)

**PubMedID** [21420980](#)

**Pharmacokinetics of the estrogen receptor subtype-selective ligands, PPT and DPN: quantification using UPLC-ES/MS/MS.**

Sepehr E *et al* (2012) J Pharm Biomed Anal 71

**PubMedID** [22981216](#)

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