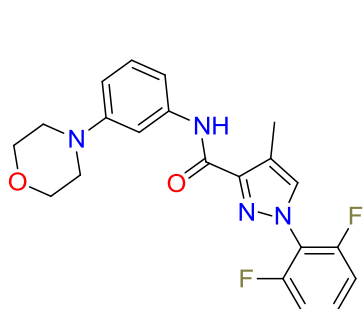


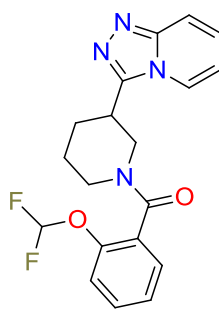
DCLK1 modulators

DCLK1 kinase is a homologue of DCX kinase, a microtubule-associated protein, crucial for neuronal migration and developing of nervous system. The *N* terminus of DCLK1 encodes a MT-binding domain with high homology to DCX, the C terminus of DCLK1 is unique and encodes a domain similar to Ca²⁺/calmodulin-dependent kinases (CaMKs).¹ DCLK is a PSD component and plays role in synaptic functions. Understanding its importance, we have created a library of DCLK1 modulators.

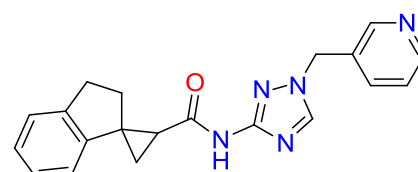
All in-stock compounds, possessing activity towards DCLK1 was chosen basing on the similarity approach and then clustered. 4 clusters were obtained and a pharmacophore model for each cluster was built.^{2,3} Additionally, exclusion of pharmacophore's volume due to bound ligand was performed. As a result, we obtained library, which contains 2286 compounds.



PB1815887882



BBV-50241796



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Physicochemical profiles of **UORSY DCLK1 modulators**:

300<MW<500; 2<HbA<9; 0<HbD<3; 0<logP<6; RotBonds≤8; TPSA<145.

UORSY DCLK1 modulators are available as powders, dry films or DMSO solutions. All compounds have a minimum purity of 90% assessed by ¹H NMR; analytical data is provided.

For more information, please contact us at screenlibs@uorsy.com

¹Shin, E. et. al, *Nat. Commun.* **2013**, 4, 1440.

²Lindvall, M. et. al, *ACS Med. Chem. Lett.* **2011**, 2, 720–723.

³Zheng, Y. et. al, *Bioorg. Med. Chem. Lett.* **2013**, 23, 3523–3530.