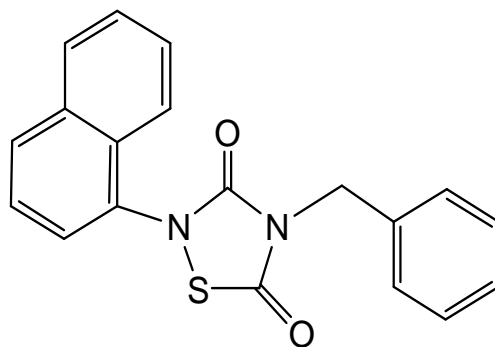


Tideglusib inhibition on GSK-3 β

Supplemental Fig. 1: chemical structure of tideglusib



Tideglusib inhibition on GSK-3 β

Supplemental Table 1: kinases used to compare the inhibition caused by tideglusib and hypothemycin at 10 μ M.

Kinase	Conserved Cys	% Inhib. caused by Tideglusib	% Inhib. caused by Hypothemycin	Assay type	Assay technology	ATP conc.
ABL1	No	23.74	60.37	Activity	Z'-LYTE (TM)	Km
AKT1	No	73.88	6.42	Activity	Z'-LYTE (TM)	Km
ALK4	No	2.78	88.67	Activity	Z'-LYTE (TM)	Km
AMPK A1/B1/G1	No	75.99	40.39	Activity	Z'-LYTE (TM)	Km
Aurora A	No	87.64	48.03	Activity	Z'-LYTE (TM)	Km
BTK	No	12.16	31.78	Activity	Z'-LYTE (TM)	Km
CDK1/cyclin B	No	2.72	29.51	Activity	Z'-LYTE (TM)	Km
CHEK1	No	10.22	0.00	Activity	Z'-LYTE (TM)	Km
CK1 gamma 2	No	9.63	6.42	Activity	Z'-LYTE (TM)	Km
CK2 alpha 1	No	8.48	8.23	Activity	Z'-LYTE (TM)	Km
cMet	No	53.35	0.00	Activity	Z'-LYTE (TM)	Km
DYRK3	No	14.90	5.80	Activity	Z'-LYTE (TM)	Km
EGFR	No	13.77	10.57	Activity	Z'-LYTE (TM)	Km
EPHA2	No	0.00	94.80	Activity	Z'-LYTE (TM)	Km
ERBB2	No	0.00	0.00	Activity	Z'-LYTE (TM)	Km
ERK1	Yes	6.17	93.22	Activity	Z'-LYTE (TM)	Km
ERK2	Yes	0.55	87.00	Activity	Z'-LYTE (TM)	Km
FGFR1	No	0.00	11.47	Activity	Z'-LYTE (TM)	Km
FLT1	Yes	4.80	103.15	Activity	Z'-LYTE (TM)	Km
FLT3	Yes	88.66	100.28	Activity	Z'-LYTE (TM)	Km
FLT4	Yes	7.88	102.81	Activity	Z'-LYTE (TM)	Km
GSK3 alpha	Yes	29.50	18.48	Activity	Z'-LYTE (TM)	Km
GSK3 beta	Yes	73.74	49.73	Activity	Z'-LYTE (TM)	Km
HGK	No	62.69	77.51	Activity	Z'-LYTE (TM)	Km
IGF1R	No	0.00	0.00	Activity	Z'-LYTE (TM)	Km
IKK beta	No	97.32	0.00	Activity	Z'-LYTE (TM)	Km
INSR	No	0.59	0.00	Activity	Z'-LYTE (TM)	Km
IRAK4	No	0.00	81.89	Activity	Z'-LYTE (TM)	Km
JAK3	No	86.67	48.57	Activity	Z'-LYTE (TM)	Km
JNK1	No	12.82	10.26	Activity	Z'-LYTE (TM)	100 μ M
KDR	Yes	99.77	102.64	Activity	Z'-LYTE (TM)	Km
KIT	Yes	0.00	57.27	Activity	Z'-LYTE (TM)	Km
LCK	No	1.33	82.33	Activity	Z'-LYTE (TM)	Km
MAPKAPK2	No	96.90	0.00	Activity	Z'-LYTE (TM)	Km
MARK2	No	6.40	18.73	Activity	Z'-LYTE (TM)	Km
MEK1	Yes	14.43	89.78	Activity	Z'-LYTE (TM)	100 μ M
MEK2	Yes	25.67	91.33	Activity	Z'-LYTE (TM)	100 μ M
MEK3	Yes	11.23	87.52	Binding	Lantha-Screen (TM)	-

Tideglusib inhibition on GSK-3 β

Kinase	Conserved Cys	% Inhib. caused by Tideglusib	% Inhib. caused by Hypothemycin	Assay type	Assay technology	ATP conc.
MNK1	Yes	0.00	94.25	Activity	Z'-LYTE (TM)	Km
MNK2	Yes	57.03	100.66	Binding	Lantha-Screen (TM)	-
mTOR	No	25.49	4.24	Activity	Z'-LYTE (TM)	Km
NEK1	No	11.95	0.00	Activity	Z'-LYTE (TM)	Km
NIK	Yes	49.71	102.27	Binding	Lantha-Screen (TM)	-
NLK	Yes	36.14	102.59	Binding	Lantha-Screen (TM)	-
p38 alpha	No	33.21	0.00	Activity	Z'-LYTE (TM)	100 μ M
p70S6K	No	34.01	0.00	Activity	Z'-LYTE (TM)	Km
PAK4	No	38.75	7.91	Activity	Z'-LYTE (TM)	Km
PDGFR alpha	Yes	0.00	100.51	Activity	Z'-LYTE (TM)	Km
PDGFR beta	Yes	0.47	100.23	Activity	Z'-LYTE (TM)	Km
PHKG2	No	64.56	16.33	Activity	Z'-LYTE (TM)	Km
PIM1	No	31.83	12.19	Activity	Z'-LYTE (TM)	Km
PKA	No	17.53	3.30	Activity	Z'-LYTE (TM)	Km
PKC beta I	No	29.89	6.09	Activity	Z'-LYTE (TM)	Km
PKD2	Yes	87.87	99.34	Activity	Z'-LYTE (TM)	Km
PLK1	No	3.02	4.25	Activity	Z'-LYTE (TM)	Km
PRAK	Yes	69.85	89.98	Activity	Z'-LYTE (TM)	Km
RET	No	24.18	73.61	Activity	Z'-LYTE (TM)	Km
ROCK1	No	52.76	0.00	Activity	Z'-LYTE (TM)	Km
RSK1	Yes	15.46	19.50	Activity	Z'-LYTE (TM)	Km
RSK2	Yes	31.32	16.46	Activity	Z'-LYTE (TM)	Km
RSK3	Yes	0.00	14.85	Activity	Z'-LYTE (TM)	Km
RSK4	Yes	86.51	30.82	Activity	Z'-LYTE (TM)	Km
SRC	No	0.00	72.30	Activity	Z'-LYTE (TM)	Km
SYK	No	75.47	97.06	Activity	Z'-LYTE (TM)	Km
TAK1-TAB1	Yes	93.49	96.20	Binding	Lantha-Screen (TM)	-
Tie2	No	0.00	21.74	Activity	Z'-LYTE (TM)	Km
TRKA	No	39.12	91.75	Activity	Z'-LYTE (TM)	Km
ZAK	Yes	81.38	101.17	Binding	Lantha-Screen (TM)	-