

Supplementary 1 Drug sensitivity analysis of SPATS2L

correlation	pvalue	type	label
0.343756177	1.02E-23	Camptothecin	positive
0.444936432	1.34E-37	Vinblastine	positive
0.415157354	3.14E-33	Cisplatin	positive
0.399314309	4.84E-30	Cytarabine	positive
0.324789043	1.75E-36	Docetaxel	positive
0.199172001	3.86E-08	Gefitinib	positive
0.33747791	2.35E-21	Navitoclax	positive
0.499295701	7.54E-49	Vorinostat	positive
0.461753163	4.35E-41	Nilotinib	positive
0.422780246	3.21E-34	Olaparib	positive
0.185306122	0.202404728	Axitinib	non-significant
0.303249176	1.25E-17	AZD7762	positive
0.0126078	0.904526267	SB216763	non-significant
-0.092813721	0.530371632	KU-55933	non-significant
0.23445345	1.83E-11	Afatinib	positive
0.089263839	0.013275934	Staurosporine	positive
0.214161914	1.09E-09	PLX-4720	positive
0.030758557	0.837384393	NU7441	non-significant
0.291890225	0.049032255	Doramapimod	positive
0.44656812	3.87E-38	Weel Inhibitor	positive
0.415291406	2.04E-33	Nutlin-3a (-)	positive
0.448763192	2.90E-37	Mirin	positive
0.421653128	6.71E-34	PD173074	positive
-0.297525439	0.042249121	ZM447439	negative
0.378672628	3.34E-26	Alisertib	positive
-0.034520191	0.815817323	R0-3306	non-significant
0.345291245	6.74E-23	MK-2206	positive
0.346229841	5.40E-23	Palbociclib	positive
0.199127964	3.89E-08	Dactolisib	positive
0.166460469	3.79E-06	Pictilisib	positive
0.024603861	0.814909328	AZD8055	non-significant
0.025055736	0.478864671	PD0325901	non-significant
0.291725933	1.04E-15	Obatoclax Mesylate	positive
0.261169258	5.67E-14	5-Fluorouracil	positive
-0.124756368	0.000581118	Dasatinib	negative
0.372566096	3.07E-26	Paclitaxel	positive
0.343003982	1.15E-21	Crizotinib	positive
0.273064147	3.73E-14	Rapamycin	positive
0.531394936	3.57E-56	Sorafenib	positive
-0.161884627	0.299676041	BI-2536	non-significant
0.389864258	2.29E-30	Irinotecan	positive

0.402180382	2.47E-60	Oxaliplatin	positive
0.099125336	0.006627435	BMS-536924	positive
0.414959306	1.47E-34	GSK1904529A	positive
-0.191055145	0.193327742	Tozasertib	non-significant
0.084020842	0.570188007	PF-4708671	non-significant
0.399952098	2.90E-29	PRIMA-1MET	positive
0.184295524	3.80E-07	Erlotinib	positive
0.439025653	1.46E-35	Niraparib	positive
0.354016761	4.92E-24	MK-1775	positive
0.339078801	5.78E-21	Dinaciclib	positive
0.306028215	8.65E-18	Gemcitabine	positive
0.278007306	7.86E-15	Bortezomib	positive
0.164893617	0.262717922	GSK269962A	non-significant
0.021475626	0.888640259	SB505124	non-significant
0.414823099	1.12E-32	Tamoxifen	positive
0.363736683	9.80E-48	Fulvestrant	positive
0.471911634	1.70E-45	EPZ004777	positive
0.438088432	1.80E-36	YK-4-279	positive
0.422299615	7.23E-18	Daporinad	positive
0.382257563	1.13E-26	BMS-345541	positive
0.325786533	2.44E-19	AZ960	positive
0.363607828	1.05E-24	Talazoparib	positive
0.290834878	1.28E-15	XAV939	positive
-0.212424599	2.83E-09	Trametinib	negative
0.329460728	1.60E-20	Dabrafenib	positive
0.429842379	6.07E-35	Temozolomide	positive
0.348728312	3.47E-22	AZD5438	positive
0.360735487	1.22E-23	IAP_5620	positive
0.183542888	6.38E-07	AZD2014	positive
0.496306955	2.39E-46	AZD1208	positive
0.130313115	0.000431258	AZD1332	positive
0.393281164	2.87E-28	Ruxolitinib	positive
0.341048666	3.07E-23	Linsitinib	positive
0.387388161	3.15E-28	Epirubicin	positive
0.453395742	3.37E-39	Cyclophosphamide	positive
0.349912042	6.15E-23	Pevonedistat	positive
0.048165919	0.173514412	Sapitinib	non-significant
0.291228902	3.32E-30	Uprosertib	positive
0.344972943	1.09E-21	LCL161	positive
0.233408971	8.68E-11	Lapatinib	positive
0.270580688	6.61E-15	Luminespib	positive
0.224158354	1.40E-10	Alpelisib	positive
0.128429441	0.000268196	Taselisib	positive
0.46877019	7.74E-45	EPZ5676	positive

-0.080221625	0.02326101	SCH772984	negative
0.468498305	7.84E-41	IWP-2	positive
0.404635923	5.64E-30	Leflunomide	positive
0.413491971	1.34E-31	Entinostat	positive
0.374414119	3.83E-10	OSI-027	positive
0.421845425	7.36E-36	LGK974	positive
0.345150513	9.72E-22	VE-822	positive
0.25160374	6.05E-12	WZ4003	positive
0.389914666	8.93E-28	CZC24832	positive
0.299567786	2.86E-16	AZD5582	positive
0.348302347	6.20E-22	GSK2606414	positive
0.44949679	2.15E-37	PFI3	positive
0.409658842	9.44E-31	PCI-34051	positive
0.412045912	4.00E-31	Wnt-C59	positive
0.32262945	5.04E-19	I-BET-762	positive
0.389497126	1.12E-27	RVX-208	positive
0.259991117	1.11E-12	OTX015	positive
0.431233844	3.41E-34	GSK343	positive
0.454019427	3.32E-38	ML323	positive
0.169548988	4.35E-06	Entospletinib	positive
0.272292094	8.29E-14	PRT062607	positive
0.194202899	0.195923728	Ribociclib	non-significant
0.468363144	7.34E-41	AGI-6780	positive
0.449706869	1.97E-37	Picolinici-acid	positive
0.310292586	1.21E-17	AZD5153	positive
0.332972294	3.13E-20	CDK9_5576	positive
0.362244174	6.68E-24	CDK9_5038	positive
0.426552006	2.77E-33	Eg5_9814	positive
0.027246816	0.463546337	ERK_2440	non-significant
-0.009086621	0.806908193	ERK_6604	non-significant
0.334187185	2.11E-20	IRAK4_4710	positive
0.39788612	5.94E-29	JAK1_8709	positive
0.499499942	7.93E-47	AZD5991	positive
0.291804751	1.07E-15	PAK_5339	positive
0.346019753	8.08E-22	TAF1_5496	positive
0.310485317	1.21E-17	ULK1_4989	positive
0.193555953	1.47E-07	VSP34_8731	positive
-0.082734615	0.025799598	Selumetinib	negative
0.186286282	4.38E-07	IGF1R_3801	positive
0.274210619	5.46E-14	JAK_8517	positive
0.398394542	4.74E-30	AZD4547	positive
0.242849744	3.76E-11	Ibrutinib	positive
0.497147355	1.38E-46	Zoledronate	positive
0.1280973	0.000540539	Acetalax	positive

0.471950038	1.52E-41	Carmustine	positive
0.334058172	2.19E-20	Topotecan	positive
0.423924567	4.99E-33	Teniposide	positive
0.381536697	1.42E-26	Mitoxantrone	positive
0.263563221	1.13E-24	Dactinomycin	positive
0.394635277	1.81E-28	Fludarabine	positive
0.467539476	1.19E-40	Nelarabine	positive
0.466968879	2.83E-40	Vincristine	positive
0.44609194	8.62E-37	Podophyllotoxin bromide	positive
0.266037095	3.40E-13	Dihydrorotenone	positive
0.448462546	3.28E-37	Gallibiscoquinazole	positive
0.437280203	2.91E-35	Elephantin	positive
0.393800512	2.40E-28	Sinularin	positive
0.480839583	3.68E-43	Sabutoclax	positive
0.394664316	1.79E-28	LY2109761	positive
0.329922357	6.78E-20	OF-1	positive
0.317410424	1.86E-18	MN-64	positive
0.389581563	9.98E-28	KRAS (G12C) Inhibitor-12	positive
0.164018485	4.83E-06	MG-132	positive
0.256381973	1.05E-12	BDP-00009066	positive
0.338629103	1.50E-21	Buparlisib	positive
0.141474663	3.95E-08	Ulixertinib	positive
0.466170113	6.85E-42	Venetoclax	positive
0.323550902	1.09E-19	ABT737	positive
0.328841752	2.54E-20	Afuresertib	positive
0.435423117	5.30E-36	AGI-5198	positive
0.219012023	1.13E-09	AZD3759	positive
0.287802991	9.44E-16	AZD5363	positive
0.341545819	6.42E-22	AZD6738	positive
0.104336249	0.00425654	AZD8186	positive
0.213449005	3.63E-09	Osimertinib	positive
0.247651557	6.25E-12	Cediranib	positive
0.275695394	1.57E-14	Ipatasertib	positive
0.414699842	1.71E-32	GDC0810	positive
0.115554032	0.001701297	GNE-317	positive
0.427210213	1.39E-34	GSK2578215A	positive
0.457670505	4.75E-40	I-BRD9	positive
0.374074067	2.73E-26	Telomerase Inhibitor IX	positive
0.517930504	1.43E-52	MIRA-1	positive
0.331452218	1.16E-20	NVP-ADW742	positive
0.420599616	1.82E-33	P22077	positive
0.368224431	1.96E-25	Savolitinib	positive
0.316695915	6.54E-19	UMI-77	positive
0.206538354	1.19E-08	WIKI4	positive

0.14160068	0.000100889	Sepantronium bromide	positive
0.431141289	2.95E-35	MIM1	positive
0.245844341	8.98E-12	WEHI-539	positive
0.29175808	3.66E-16	BPD-00008900	positive
0.247971168	6.26E-12	Foretinib	positive
0.41298704	4.32E-32	BIBR-1532	positive
0.406981052	3.62E-31	Pyridostatin	positive
0.418739497	6.02E-33	AMG-319	positive
0.394012273	4.08E-29	MK-8776	positive
0.41123878	8.28E-32	Vinorelbine	positive
0.08441963	0.021372001	VX-11e	positive
0.417390881	1.10E-32	LJI308	positive
0.325919228	7.57E-20	AZ6102	positive
0.365216178	7.89E-25	GSK591	positive
0.392822621	9.43E-29	VE821	positive
-0.092275671	0.537304748	AZD6482	non-significant
0.311288024	3.90E-18	AT13148	positive
0.253276956	0.097144952	BMS-754807	non-significant
0.054810361	0.714426396	JQ1	non-significant