

**Supplementary Table S1. Summaries of the characteristics of the PKs in the kinome and the results obtained in the study.**

Symbol	Kinome Name	Group	Family	Subfamily	Origin of clone	CloneTypes	Clone ID	Ave. Luminescence signal <sub>-Buffer</sub>	Ave. Luminescence signal <sub>CAPS3 treatment</sub>	Luminescent signal (%) (Remaining signal after CASP3 treatment)	Immunoblotting in vitro	References
STK4	MST1	STE	STE20	MST	Hs	MGC	7939613	37163	256		Cleavage	1
MKNK2	MNK2	CAMK	MAPKAPK	MNK	Hs	MGC	6527053	49895	363		Cleavage	This study
MARK1	MARK1	CAMK	CAMKL	MARK	Hs	MGC	40036731	8695	281		Cleavage	This study
BUB1B	BUBR1	Other	BUB		Hs	MGC	4649881	7858	300		Cleavage	2
PRKX	PRKX	AGC	PKA		Hs	MGC	5485308	45320	2681		Cleavage	This study
PKN2	PKN2	AGC	PKN		Hs	MGC	40123309	22515	1553		Cleavage	3
LIMK1	LIMK1	TKL	LISK	LIMK	Hs	EU	NM_002314	12090	1125		Cleavage	4
Rock1	ROCK1	AGC	DMPK	ROCK	Mm	FANTOM	F630326J04	18901	3285		Cleavage	5
PAK2	PAK2	STE	STE20	PAKA	Hs	MGC	7262289	82235	15517		Cleavage	6
STK3	MST2	STE	STE20	MST	Hs	MGC	3868822	2660	549		Cleavage	7
BMPR1B	BMPR1B	TKL	STKR	Type1	Hs	MGC	6202951	37084	8345		Cleavage	This study
DCLK1	DCAMKL1	CAMK	DCAMKL		Hs	EU	NM_004734	3185	929		Cleavage	8
NUAK2	Nuak2	CAMK	CAMKL	Nuak	Hs	MGC	5088037	3589	1239		Cleavage	This study
Irak2	IRAK2	TKL	IRAK		Mm	FANTOM	4732448K15	56185	20365		Cleavage	This study
Map2k6	MAP2K6	STE	STE7		Mm	FANTOM	5730544D20	39328	14303		Cleavage	This study
RIOK3	RIOK3	Atypical	RIO	RIO3	Hs	MGC	5745005	51903	19743		Cleavage	This study
PCTK1	PCTAIRE1	CMGC	CDK	TAIRE	Hs	MGC	4762081	22643	8984		Cleavage	This study
Csk	CSK	TK	Csk		Mm	FANTOM	F830006C15	47585	19863		Cleavage	This study
DYRK3	DYRK3	CMGC	DYRK	Dyrk2	Hs	MGC	3913541	36585	17233		Cleavage	This study
PRKCI	PKCi	AGC	PKC	Iota	Hs	MGC	4823853	31071	16443		Cleavage	This study
RIOK1	RIOK1	Atypical	RIO	RIO1	Hs	MGC	3537086	64640	38059		Cleavage	This study
PIM2	PIM2	CAMK	PIM		Hs	MGC	3913552	8660	5505		Cleavage	This study
DCLK2	DCAMKL2	CAMK	DCAMKL		Hs	MGC	5532881	6632	4308		Cleavage	This study
CAMKK1	CaMKK1	Other	CAMKK	Meta	Hs	MGC	5175128	125241	84039		Cleavage	This study
PDPK1	PDK1	AGC	PKB		Hs	MGC	4561371	32915	22391		Cleavage	This study
Csnk1g1	CK1g1	CK1	CK1		Mm	FANTOM	G630030E07	40328	27528		Cleavage	This study
PTK2	FAK	TK	Fak		Hs	MGC	4999680	11452	7944		Cleavage	9
Akt2	AKT2	AGC	AKT		Mm	FANTOM	K430312O07	22952	16104		Cleavage	This study
RIPK3	RIPK3	TKL	RIPK		Hs	MGC	5213027	31515	22221		Cleavage	10
RPS6KB1	p70S6K	AGC	RSK	p70	Hs	MGC	6142009	43468	30852		Cleavage	11
MASTL	MASTL	AGC	MAST		Hs	MGC	3449913	504	359		Cleavage	This study
PRKCQ	PKCt	AGC	PKC	Delta	Hs	MGC	8322411	6920	4929		Cleavage	12
TWF1	A6	Atypical	A6		Hs	MGC	5297068	35848	25568		Cleavage	This study
TGFB1	TGFB1	TKL	STKR	Type1	Hs	MGC	30344890	29737	21248		Cleavage	This study
RPS6KA5	MSK1	AGC	RSK	MSK	Hs	MGC	3139114	48792	35100		Cleavage	This study
BMX	BMX	TK	Tec		Hs	MGC	3919253	25742	18878		Cleavage	13
ACVR1	ALK2	TKL	STKR	Type1	Hs	MGC	5209711	48228	35712		Cleavage	This study
TRIB3	Trb3	CAMK	Trbl		Hs	MGC	5104452	29934	22175		Cleavage	This study
PRKAA1	AMPKA1	CAMK	CAMKL	AMPK	Hs	MGC	4839033	34292	25496		Cleavage	This study
MAPK12	p38g	CMGC	MAPK	p38	Hs	MGC	4907996	41008	31378		Cleavage	This study
ULK4	ULK4	Other	ULK		Hs	MGC	4343362	53836	41640		Cleavage	This study
HSPB8	H11	Atypical	H11		Hs	MGC	3607117	82200	64444		Cleavage	This study
EEF2K	eEF2K	Atypical	Alpha	eEF2K	Hs	MGC	5553055	49312	38676		Cleavage	This study
PCTK2	PCTAIRE2	CMGC	CDK	TAIRE	Hs	MGC	4824359	12144	9591		No Cleavage	
CDK8	CDK8	CMGC	CDK	CDK8	Hs	MGC	40032854	4857	3837		No Cleavage	
HCK	HCK	TK	Src		Hs	MGC	40025497	63064	50069		No Cleavage	
Epha4	Epha4	TK	Eph		Mm	FANTOM	4632410M06	527	419		No Cleavage	
CDK15	PFTAIRE2	CMGC	CDK	TAIRE	Hs	MGC	5200755	16849	13409		No Cleavage	
CHEK1	CHK1	CAMK	CAMKL	CHK1	Hs	MGC	4091997	5479	4367		No Cleavage	
RPS6KA4	MSK2	AGC	RSK	MSK	Hs	MGC	5763859	70420	56204		ND	
Met	MET	TK	Met		Mm	FANTOM	G370067N04	2016	1612		No Cleavage	
ACVR1C	ALK7	TKL	STKR	Type1	Hs	MGC	4801219	23392	18763		No Cleavage	
CAMKK2	CaMKK2	Other	CAMKK	Meta	Hs	MGC	3842706	83971	67393		No Cleavage	
ALK	ALK	TK	Alk		Hs	EU	NM_004304	12514	10069		ND	
RAGE1	MOK	CMGC	RCK		Hs	EU	NM_014226	574	463		No Cleavage	
CDK3	CDK3	CMGC	CDK	CDC2	Hs	EU	NM_001258	7244	5888		No Cleavage	
NEK11	NEK11	Other	NEK		Hs	MGC	4829802	41827	34351		No Cleavage	
MAP3K2	MAP3K2	STE	STE11		Hs	EU	NM_006609	7913	6504		ND	
PRKD3	PKD3	CAMK	PKD		Hs	MGC	5266769	9689	7973		No Cleavage	
CSNK1D	CK1d	CK1	CK1		Hs	MGC	3546633	7840	6460		No Cleavage	
PTK2B	PYK2	TK	Fak		Hs	MGC	4343040	1680	1385		ND	
ARAF	ARAF	TKL	RAF		Hs	MGC	2966604	20607	17073		ND	
Ank1	Sgk288	TKL	RIPK		Mm	FANTOM	9930020N01	4806	3987		ND	
SIK1	SIK	CAMK	CAMKL	QIK	Hs	MGC	4831049	12716	10567		ND	
JAK1	JAK1	TK	JakA		Hs	MGC	40146751	564	472		No Cleavage	
MAP3K7	MAP3K7	STE	STE11		Hs	MGC	3906837	70576	59180		ND	
CDK9	CDK9	CMGC	CDK	CDK9	Hs	MGC	3460767	23071	19457		No Cleavage	
STYK1	SURTK106	TK	TK-Unique		Hs	MGC	7939669	22671	19151		No Cleavage	
CHEK2	CHK2	CAMK	RAD53		Hs	MGC	3532866	77236	65439		No Cleavage	
CLK3	CLK3	CMGC	CLK		Hs	MGC	3138580	1817	1540		No Cleavage	
RAF1	RAF1	TKL	RAF		Hs	MGC	3904404	20615	17483		No Cleavage	
NLK	NLK	CMGC	MAPK	nmo	Hs	MGC	6527673	30657	26129		No Cleavage	
CDKL1	CDKL1	CMGC	CDKL		Hs	MGC	8143980	6724	5744		No Cleavage	
Brd4	BRD4	Atypical	BRD		Mm	FANTOM	M5C1072G19	39163	33472		ND	
CDK20	CCRK	CMGC	CDK		Hs	MGC	3605918	2216	1896		No Cleavage	
Stk19	G11	Atypical	G11		Mm	FANTOM	I920061M10	12388	10615		No Cleavage	
PAK1	PAK1	STE	STE20	PAKA	Hs	MGC	40034484	1964	1690		No Cleavage	
DAPK3	DAPK3	CAMK	DAPK		Hs	MGC	8992146	8953	7712		No Cleavage	
VRK2	VRK2	CK1	VRK		Hs	MGC	5221315	1624	1400		No Cleavage	
BCKDK	BCKDK	Atypical	PDHK		Hs	MGC	3630050	1828	1577		ND	
STK32B	YANK2	AGC	YANK		Hs	MGC	5744969	17704	15277		ND	
MAK	MAK	CMGC	RCK		Hs	MGC	5167621	6012	5192		No Cleavage	
CABC1	ADCK3	Atypical	ABC1	ABC1-A	Hs	MGC	3604948	16129	13944		ND	
IRAK4	IRAK4	TKL	IRAK		Hs	MGC	4287014	73301	63481		ND	
Mos	MOS	Other	MOS		Mm	FANTOM	4930571D16	3048	2644		No Cleavage	
AURKB	AurB	Other	AUR		Hs	MGC	3677349	16953	14709		ND	
ZAK	ZAK	TKL	MLK	MLK	Hs	EU	NM_016653	14166	12307		No Cleavage	
SGK1	SGK	AGC	SGK		Hs	MGC	3459056	31539	27451		ND	
RPS6KA3	RSK2	AGC	RSK	RSK	Hs	MGC	40007452	2365	2064		No Cleavage	
MARK3	MARK3	CAMK	CAMKL	MARK	Hs	EU	NM_001128920	40319	35305		ND	

PLK2	PLK2	Other	PLK	Hs	MGC	3831747	12684	11108	88	No Cleavage	
RIPK2	RIPK2	TKL	RIPK	Hs	MGC	4026156	54556	47816	88	No Cleavage	
CAMK1G	CaMK1g	CAMK	CAMK1	Hs	MGC	5179957	27717	24329	88	ND	
CAMK2G	CaMK2g	CAMK	CAMK2	Hs	MGC	4813948	959	844	88	No Cleavage	
Ripk5	Sgk496	Other	Other-Unique	Mm	FANTOM	C820013G01	29633	26100	88	ND	
CDC7	CDC7	Other	CDC7	Hs	MGC	40034179	55002	48492	88	ND	
HIPK1	HIPK1	CMGC	DYRK	HIPK	MGC	4830408	14565	12883	88	ND	
TSSK3	TSSK3	CAMK	TSSK	Hs	MGC	5171736	78480	69432	88	ND	
SYK	SYK	TK	Syk	Hs	MGC	3542895	12363	10951	89	ND	
TBK1	TBK1	Other	IKK	Hs	MGC	4824988	44984	39892	89	No Cleavage	
BMP2K	BIKE	Other	NAK	Hs	MGC	5272264	55160	49004	89	ND	
ADRBK2	BARK2	AGC	GRK	BARK	MGC	5590378	4817	4281	89	No Cleavage	
Plk7	CCK4	TK	CCK4	Mm	FANTOM	D930032O19	2112	1880	89	ND	
GSK3A	GSK3A	CMGC	GSK	Hs	MGC	6171438	26115	23273	89	ND	
DYRK1A	DYRK1A	CMGC	DYRK	Dyrk1	EU	NM_130436	19043	16975	89	ND	
Ikkbb	IKKb	Other	IKK	Mm	FANTOM	I830125F20	45180	40324	89	ND	
IRAK1	IRAK1	TKL	IRAK	Hs	MGC	6164719	6612	5903	89	ND	
RnaseL	RNaseL	Other	Other-Unique	Mm	FANTOM	C130033H22	1033	923	89	No Cleavage	
CDK13	CHED	CMGC	CDK	CRK7	EU	NM_003718	631	564	89	ND	
MYLK2	skMLCK	CAMK	MLCK	Hs	MGC	40085085	47753	42765	90	ND	
TGFBR2	TGFBR2	TKL	STKR	Type2	EU	NM_003242	57417	51420	90	ND	
MAP4K3	KHS2	STE	STE20	KHS	MGC	5296205	9481	8509	90	ND	
NEK2	NEK2	Other	NEK	Hs	MGC	5541026	6002	5392	90	ND	
BB049667	NEK5	Other	NEK	Mm	FANTOM	6530411J22	47571	42795	90	ND	
STK16	MPSK1	Other	NAK	Hs	MGC	5760866	11070	9964	90	ND	
NEK4	NEK4	Other	NEK	Hs	MGC	5169184	21652	19541	90	ND	
PDGFRA	PDGFRa	TK	PDGFR	Hs	MGC	5205969	61054	55141	90	ND	
Sgk3	SGK3	AGC	SGK	Mm	FANTOM	5031426D23	9541	8655	91	ND	
MELK	MELK	CAMK	CAMKL	MELK	Hs	MGC	4547136	1049	952	91	ND
GRK5	GPRK5	AGC	GRK	GRK	Hs	MGC	6482467	25921	23581	91	ND
Frk	FRK	TK	Src	Mm	FANTOM	4732463C23	43003	39132	91	ND	
STK25	YSK1	STE	STE20	YSK	MGC	4867978	1129	1028	91	ND	
PDK2	PDHK2	Atypical	PDHK	Hs	MGC	4272593	42317	38635	91	ND	
PDK3	PDHK3	Atypical	PDHK	Hs	MGC	3922929	6536	5976	91	ND	
PRKCA	PKCa	AGC	PKC	Alpha	Hs	MGC	40028305	15307	13999	91	ND
PCTK3	PCTAIRE3	CMGC	CDK	TAIRE	Hs	MGC	3855304	52050	47624	91	ND
STK17A	DRAK1	CAMK	DAPK	Hs	MGC	5761182	1300	1191	92	ND	
TSSK6	SSTK	CAMK	TSSK	Hs	MGC	4826305	31343	28786	92	No Cleavage	
AURK6	AurA	Other	AUR	Hs	MGC	3456017	39611	36405	92	ND	
AURKC	AurC	Other	AUR	Hs	EU	NM_001015878	29879	27499	92	ND	
TIE1	TIE1	TK	Tie	Hs	MGC	5767075	732	674	92	ND	
Stk35	CLIK1	Other	NKF4	Mm	FANTOM	1700054C12	44303	40832	92	ND	
PHKG1	PHKg1	CAMK	PHK	Hs	MGC	6277230	37843	34881	92	ND	
A630047E20F	TBCK	Other	TBCK	Mm	FANTOM	9430001M19	53196	49115	92	ND	
ADCK4	ADCK4	Atypical	ABC1	ABC1-A	Hs	MGC	4342891	10003	9244	92	No Cleavage
CSNK1E	CK1e	CK1	CK1	Hs	MGC	3937782	21533	19925	93	No Cleavage	
RIOK2	RIOK2	Atypical	RIO	RIO2	Hs	MGC	3449997	31607	29271	93	ND
IKBKE	IKKe	Other	IKK	Hs	EU	NM_014002	28933	26815	93	ND	
FLT1	FLT1	TK	VEGFR	Hs	MGC	5722772	3288	3048	93	No Cleavage	
DAPK2	DAPK2	CAMK	DAPK	Hs	MGC	40005390	30752	28536	93	ND	
ACVR1B	ALK4	TKL	STKR	Type1	Hs	MGC	3352720	35056	32532	93	ND
CSNK1G2	CK1g2	CK1	CK1	Hs	MGC	3851613	52992	49197	93	ND	
ADCK1	ADCK1	Atypical	ABC1	ABC1-B	Hs	MGC	6150933	8189	7611	93	No Cleavage
ACVR2A	ACTR2	TKL	STKR	Type2	EU	NM_001616	41813	38895	93	ND	
Eif2ak4	GCN2	Other	PEK	GCN2	Mm	FANTOM	4933428O03	82341	76641	93	ND
YES1	YES	TK	Src	Hs	MGC	5260751	32107	29914	93	ND	
Rps6ka6	RSK4	AGC	RSK	RSK	Mm	FANTOM	C330026J02	885	825	93	ND
MAP3K8	COT	STE	STE-Unique	Hs	MGC	8322618	53779	50151	93	ND	
KIT	KIT	TK	PDGFR	Hs	MGC	4375615	31633	29501	93	ND	
PDK1	PDHK1	Atypical	PDHK	Hs	MGC	4778360	30865	28791	93	ND	
PAK3	PAK3	STE	STE20	PAKA	Hs	EU	NM_001128166	124345	116509	94	ND
TP53RK	PRPK	Other	Bud32	Hs	MGC	5277911	21075	19752	94	ND	
CLK2	CLK2	CMGC	CLK	Hs	MGC	6007375	65465	61431	94	ND	
TTK	TTK	Other	TTK	Hs	MGC	5270012	32912	30921	94	ND	
Fgfr3	FGFR3	TK	FGFR	Mm	FANTOM	F420011N06	83069	78064	94	ND	
CSNK2A2	CK2a2	Other	CK2	Hs	MGC	3951914	46855	43975	94	No Cleavage	
MAP2K5	MAP2K5	STE	STE7	Hs	MGC	4100679	47524	44679	94	ND	
CASK	CASK	CAMK	CASK	Hs	MGC	40125862	76091	71671	94	ND	
CAMK1D	CaMK1d	CAMK	CAMK1	Hs	MGC	5748490	101236	95453	94	ND	
Nek8	NEK8	Other	NEK	Mm	FANTOM	F630023G20	26704	25233	94	ND	
UHMK1	KIS	Other	Other-Unique	Hs	MGC	4649261	60509	57191	95	ND	
SNRK	SNRK	CAMK	CAMKL	SNRK	Hs	MGC	4375623	33593	31805	95	No Cleavage
MAP2K3	MAP2K3	STE	STE7	Hs	MGC	5215093	41180	39039	95	ND	
CAMK2A	CaMK2a	CAMK	CAMK2	Hs	EU	NM_171825	32819	31175	95	ND	
TESK2	TESK2	TKL	LISK	TESK	Hs	MGC	5425494	15704	14920	95	ND
TLK1	TLK1	Other	TLK	Hs	MGC	5532877	91152	86763	95	ND	
BMPR1A	BMPR1A	TKL	STKR	Type1	Hs	MGC	4824378	40644	38693	95	ND
Myo3a	MYO3A	STE	STE20	NinaC	Mm	FANTOM	9030416P08	47423	45167	95	ND
Nek7	NEK7	Other	NEK	Mm	FANTOM	9530057D01	45984	43811	95	ND	
TAOK2	TAO2	STE	STE20	TAO	Hs	EU	NM_004783	10419	9928	95	ND
ACVRL1	ALK1	TKL	STKR	Type1	Hs	MGC	5179243	30429	29008	95	ND
Irak3	IRAK3	TKL	IRAK	Mm	FANTOM	C330013G03	87033	83119	96	ND	
CSNK1A1L	CK1a2	CK1	CK1	Hs	MGC	5266487	20139	19239	96	ND	
STK38	NDR1	AGC	NDR	Hs	MGC	4554884	31196	29829	96	ND	
Csf1r	FMS	TK	PDGFR	Mm	FANTOM	1300008N20	7133	6821	96	ND	
CDK10	CDK10	CMGC	CDK	CDK10	Hs	MGC	4865641	48323	46215	96	ND
PRKACB	PKACb	AGC	PKA	Hs	MGC	5262372	36180	34607	96	ND	
Prkg2	PKG2	AGC	PKG	Mm	FANTOM	A230058O08	18412	17639	96	ND	
Clk4	CLK4	CMGC	CLK	Mm	FANTOM	3110002D09	12321	11820	96	ND	
STK40	Sgk495	CAMK	CAMK-Unique	Hs	MGC	4109652	34511	33124	96	ND	
ABL2	ARG	TK	Abi	Hs	MGC	5173213	131756	126520	96	ND	
MAP4K5	KHS1	STE	STE20	KHS	Hs	MGC	5272190	9299	8929	96	ND
CDKL5	CDKL5	CMGC	CDKL	Hs	MGC	5295038	5359	5148	96	ND	
Tec	TEC	TK	Tec	Mm	FANTOM	F630035P04	513	493	96	No Cleavage	
Epha5	Epha5	TK	Eph	Mm	FANTOM	E530015D21	844	812	96	ND	
Aatk	LMR1	TK	Lmr	Mm	FANTOM	9830165D16	109933	105765	96	ND	
PASK	PASK	CAMK	CAMKL	PASK	Hs	MGC	4419998	38308	36856	96	ND

Gak	GAK	Other	NAK	Mm	FANTOM	I920043D18	8839	8504	96	ND	
FGFR2	FGFR2	TK	FGFR	Hs	MGC	5277896	38593	37137	96	ND	
Plk6	BRK	TK	Src	Mm	FANTOM	F630104G13	20500	19733	96	ND	
NTRK2	TRKB	TK	Trk	Hs	MGC	4941763	11880	11444	96	ND	
MAPK1	Erk2	CMGC	MAPK	ERK	Hs	MGC	4685557	57205	55120	96	ND
FGR	FGR	TK	Src	Hs	MGC	5734966	14912	14376	96	ND	
SPEG	SPEG	CAMK	Trio	Hs	MGC	4100987	99673	96148	96	ND	
PKMYT1	MYT1	Other	WEE	Hs	EU	NM_004203	33871	32735	97	ND	
PAK4	PAK4	STE	STE20	PAKB	Hs	MGC	5421365	3776	3653	97	ND
Epha3	Epha3	TK	Eph	Mm	FANTOM	B130048J04	75829	73516	97	ND	
DYRK1B	DYRK1B	CMGC	DYRK	Dyrk1	Hs	MGC	5019417	83999	81471	97	ND
MAPKAPK5	MAPKAPK5	CAMK	MAPK	MAPKAPK	Hs	MGC	4997201	63822	61961	97	ND
CSNK1G3	CK1g3	CK1	CK1	Hs	MGC	4817058	60579	58833	97	ND	
TRIB2	Trb2	CAMK	Trbl	Hs	MGC	3607549	72365	70327	97	ND	
ULK3	ULK3	Other	ULK	Hs	MGC	5219403	19669	19147	97	No Cleavage	
PDGFRB	PDGFRb	TK	PDGFR	Hs	MGC	5309813	49328	48057	97	ND	
MAPK14	p38a	CMGC	MAPK	p38	Hs	MGC	5181064	82804	80682	97	ND
CAMK2D	CaMK2d	CAMK	CAMK2	Hs	MGC	5178265	98888	96416	98	ND	
Myk	smMLCK	CAMK	MLCK	Mm	FANTOM	6820449L08	57453	56073	98	ND	
MAPKAPK2	MAPKAPK2	CAMK	MAPKAPK	MAPKAPK	Hs	MGC	6267183	1578	1548	98	ND
CDK7	CDK7	CMGC	CDK	CDK7	Hs	MGC	3997991	37165	36477	98	ND
PNCK	CaMK1b	CAMK	CAMK1	Hs	MGC	5751849	36464	35821	98	ND	
Epha7	Epha7	TK	Eph	Mm	FANTOM	5330417H08	60065	59025	98	ND	
FGFR1	FGFR1	TK	FGFR	Hs	MGC	30387634	27608	27140	98	ND	
Flt3	FLT3	TK	PDGFR	Mm	FANTOM	A930013I19	77852	76560	98	ND	
Gucy2e	CYGD	RGC	RGC	Mm	FANTOM	A930005H11	2108	2075	98	ND	
CSNK2A1	CK2a1	Other	CK2	Hs	MGC	5772615	30272	29815	98	ND	
CAMK2B	CaMK2b	CAMK	CAMK2	Hs	MGC	5014712	47815	47176	99	ND	
STK33	STK33	CAMK	CAMK-Unique	Hs	MGC	5296502	32941	32544	99	ND	
PRKACG	PKACg	AGC	PKA	Hs	MGC	5165721	31859	31521	99	ND	
MAP2K2	MAP2K2	STE	STE7	Hs	MGC	4025987	39678	39318	99	ND	
SCYL2	SCYL2	Other	SCY1	Hs	MGC	6473586	76836	76176	99	ND	
OGG1	CaMK1a	CAMK	CAMK1	Hs	MGC	3350168	55458	55008	99	ND	
MAP2K1	MAP2K1	STE	STE7	Hs	MGC	40053655	74976	74580	99	ND	
Lrrk2	LRRK2	TKL	LRRK	Mm	FANTOM	4921513O20	47543	47391	100	ND	
ERBB4	HER4/ErbB4	TK	EGFR	Hs	MGC	8327667	15636	15681	100	ND	
MAP4K2	GCK	STE	STE20	KHS	Hs	MGC	5530523	3476	3496	101	ND
MAPK10	JNK3	CMGC	MAPK	JNK	Hs	MGC	4838495	26117	26292	101	ND
IGF1R	IGF1R	TK	InsR	Hs	MGC	8322664	6804	6852	101	ND	
TAF10	ILK	TKL	MLK	ILK	Hs	MGC	4562773	22127	22287	101	ND
DYRK2	DYRK2	CMGC	DYRK	Dyrk2	Hs	MGC	4139392	48011	48433	101	ND
EIF2AK1	HRI	Other	PEK	Hs	MGC	2989989	61351	62021	101	ND	
TYRO3	TYRO3	TK	Axl	Hs	MGC	6095596	10270	10400	101	ND	
TWF2	A6r	Atypical	A6	Hs	MGC	2957960	91644	92907	101	ND	
STK38L	NDR2	AGC	NDR	Hs	MGC	4823429	46305	46988	101	ND	
AXL	AXL	TK	Axl	Hs	MGC	5205825	2040	2072	102	ND	
MAPK11	p38b	CMGC	MAPK	p38	Hs	EU	NM_002751	63331	64380	102	ND
EPHB3	EphB3	TK	Eph	Hs	MGC	6472607	2324	2363	102	ND	
Ick	ICK	CMGC	RCK	Mm	FANTOM	E130304P20	2451	2492	102	ND	
Ntrk1	TRKA	TK	Trk	Mm	FANTOM	C130047N21	46909	47703	102	ND	
MKNK1	MNK1	CAMK	MAPKAPK	MNK	Hs	MGC	3629765	82807	84284	102	ND
PDK4	PDHK4	Atypical	PDHK	Hs	EU	NM_002612	39635	40363	102	ND	
CDK5	CDK5	CMGC	CDK	CDK5	Hs	MGC	3537202	40781	41532	102	ND
EPHB6	EphB6	TK	Eph	Hs	EU	NM_004445	38292	39004	102	ND	
PBK	PBK	Other	TOPK	Hs	MGC	4082846	83549	85124	102	ND	
FER	FER	TK	Fer	Hs	EU	NM_005246	8344	8502	102	ND	
TRIM28	TIF1b	Atypical	TIF1	Hs	MGC	2906325	100289	102239	102	ND	
4930444A02R	Sgk196	Other	Other-Unique	Mm	FANTOM	4930444A02	34417	35099	102	ND	
ZAP70	ZAP70	TK	Syk	Hs	MGC	5757161	40345	41235	102	ND	
ADRBK1	BARK1	AGC	GRK	BARK	Hs	MGC	5585846	843	861	102	ND
CDC2	CDC2	CMGC	CDK	CDC2	Hs	MGC	2967728	2902	2968	102	No Cleavage
2610019A05R	STLK5	STE	STE20	STLK	Mm	FANTOM	2610019A05	58291	59768	103	ND
NEK6	NEK6	Other	NEK	Hs	MGC	3507262	75819	77768	103	ND	
TNK1	TNK1	TK	Ack	Hs	MGC	5589312	36193	37149	103	ND	
GSK3B	GSK3B	CMGC	GSK	Hs	MGC	3357620	27915	28657	103	ND	
Gucy2c	HSER	RGC	RGC	Mm	FANTOM	9130002N05	15784	16239	103	ND	
JAK2	JAK2	TK	JakA	Hs	MGC	5556026	6943	7147	103	ND	
Frap1	FRAP	Atypical	PIKK	FRAP	Mm	FANTOM	F830216D04	10105	10409	103	ND
PRKCB	PKCb	AGC	PKC	Alpha	Hs	MGC	5260547	29741	30672	103	ND
PRKACA	PKACa	AGC	PKA	Hs	MGC	6066764	41408	42740	103	ND	
ACV2R2B	ACTR2B	TKL	STKR	Type2	Hs	MGC	40005760	34483	35604	103	ND
CDKL3	CDKL3	CMGC	CDKL	Hs	MGC	5298279	3235	3341	103	ND	
TSSK1B	TSSK1	CAMK	TSSK	Hs	MGC	4816988	13997	14465	103	ND	
PDIK1L	CLIK1L	Other	NKF4	Hs	MGC	4828997	41427	42851	103	ND	
TSSK2	TSSK2	CAMK	TSSK	Hs	MGC	5273397	8988	9316	104	ND	
BLK	BLK	TK	Src	Hs	MGC	5216030	3433	3560	104	ND	
VRK1	VRK1	CK1	VRK	Hs	MGC	8322562	36672	38065	104	ND	
NRBP1	NRBP1	Other	NRBP	Hs	MGC	3534543	94607	98408	104	ND	
SIK2	QIK	CAMK	CAMKL	QIK	Hs	EU	NM_015191	46673	48569	104	ND
SGK2	SGK2	AGC	SGK	Hs	MGC	5730271	40402	42044	104	ND	
Alpk1	AlphaK1	Atypical	Alpha	Mm	FANTOM	B020030J01	4593	4803	105	ND	
STK17B	DRAK2	CAMK	DAPK	Hs	MGC	4575012	29120	30535	105	ND	
PKN3	PKN3	AGC	PKN	Hs	MGC	6649806	78000	82175	105	ND	
PLK1	PLK1	Other	PLK	Hs	MGC	3854860	46192	48740	106	ND	
STK32C	YANK3	AGC	YANK	Hs	MGC	4831007	38458	40702	106	ND	
E530005C20F	Trad	CAMK	Trio	Mm	FANTOM	C130022K08	50423	53477	106	ND	
NEK10	NEK10	Other	NEK	Hs	MGC	4821808	50895	54036	106	ND	
MLKL	MLKL	TKL	TKL-Unique	Hs	MGC	5214733	32203	34233	106	ND	
MAP3K11	MLK3	TKL	MLK	MLK	Hs	MGC	5733866	993	1060	107	ND
FES	FES	TK	Fer	Hs	MGC	5170548	22859	24424	107	ND	
MAPKAPK3	MAPKAPK3	CAMK	MAPKAPK	MAPKAPK	Hs	MGC	3345889	40633	43609	107	ND
DDR1	DDR1	TK	DDR	Hs	MGC	5262509	37316	40104	107	ND	
CDK2	CDK2	CMGC	CDK	CDC2	Hs	MGC	3504348	71336	76775	108	ND
DDR2	DDR2	TK	DDR	Hs	MGC	6162716	37281	40283	108	ND	
E130304F04R	NIM1	CAMK	CAMKL	NIM1	Mm	FANTOM	C230008I02	2840	3072	108	ND
SCYL3	SCYL3	Other	SCY1	Hs	MGC	4852719	45548	49280	108	ND	
MAST1	MAST1	AGC	MAST	Hs	MGC	4938605	9048	9807	108	ND	

DCLK3	DCAMKL3	CAMK	DCAMKL		Hs	EU	NM_033403	607	660	109	No Cleavage
RPS6KL1	RSKL2	AGC	RSKL		Hs	MGC	3945902	42608	46535	109	ND
MAP3K14	NIK	STE	STE-Unique		Hs	MGC	5497185	84087	92224	110	ND
OXR1	OSR1	STE	STE20	FRAY	Hs	MGC	3163379	29487	32459	110	ND
NEK3	NEK3	Other	NEK		Hs	MGC	5000918	505	562	111	ND
STK11	LKB1	CAMK	CAMKL	LKB	Hs	MGC	3946005	29044	32120	111	ND
RPS6KA1	RSK3	AGC	RSK	RSK	Hs	MGC	4867373	66968	74118	111	ND
Trib1	Trib1	CAMK	Trib1		Mm	FANTOM	4732420B02	64360	71311	111	ND
CDK6	CDK6	CMGC	CDK	CDK4	Hs	MGC	6377987	52377	58188	111	ND
Map3k9	MLK1	TKL	MLK	MLK	Mm	FANTOM	E130314H24	41215	45876	111	ND
Map3k3	MAP3K3	STE	STE11		Mm	FANTOM	9430093B06	96209	107748	112	ND
CDK4	CDK4	CMGC	CDK	CDK4	Hs	MGC	3531300	44562	50128	112	ND
InsR	INSR	TK	InsR		Mm	FANTOM	4932439J01	2400	2716	113	ND
CAMKV	VACAMKL	CAMK	CAMK-Unique		Hs	MGC	2820734	15643	17925	115	ND
SRC	SRC	TK	Src		Hs	MGC	4548399	4395	5036	115	ND
PHKg2	PHKg2	CAMK	PHK		Hs	MGC	3138927	38650	44733	116	ND
Mst1r	RON	TK	Met		Mm	FANTOM	E130119A05	26415	31737	120	ND
MAP3K6	MAP3K6	STE	STE11		Hs	EU	NM_004672	3322	4256	128	ND
DYRK4	DYRK4	CMGC	DYRK	Dyrk2	Hs	MGC	5266287	20076	27884	129	ND
BRD3	BRD3	Atypical	BRD		Hs	MGC	4856840	18073	23759	131	ND

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