

Appendix D Table 6.1 List of SNO-proteins.

Acc. No.	Protein Name	PSM #	Unique Peptide #	MW (kDa)	Genotype	Reference ^a
P84086	Complexin-2	58	1	15.4	BOTH	Reported
O08539	Myc box-dependent-interacting protein 1	29	1	64.4	BOTH	New
P15105	Glutamine synthetase	242	3	42.1	BOTH	Reported
D3Z6E4	Enolase	126	2	34.8	BOTH	Reported
P63101	14-3-3 protein zeta/delta	73	4	27.8	BOTH	Reported
Q9Z2Q6	Septin-5	79	1	42.7	BOTH	Reported
O55131	Septin-7	15	3	50.5	WT	Reported
Q63912	Oligodendrocyte-myelin glycoprotein	10	2	49.3	BOTH	Reported
D6RJ60	Eukaryotic initiation factor 4A-II	1	5	10.8	BOTH	New
B1AQX6	SRC kinase-signaling inhibitor 1	9	4	126.9	AD	New
P11499	Heat shock protein HSP 90-beta	11	1	83.2	BOTH	New
P05064	Fructose-bisphosphate aldolase A	97	6	39.3	BOTH	Reported
Q60864	Stress-induced-phosphoprotein 1	29	1	62.5	AD	Reported
Q29ZQ5	Myelin-oligodendrocyte glycoprotein	159	3	23.8	AD	Reported
K3W4T3	V-type proton ATPase subunit a	19	2	96.4	BOTH	New
P60764	RAS-related C3 botulinum substrate 3, isoform CRA_a	113	5	20.7	BOTH	Reported
P18760	Cofilin-1	37	2	18.5	BOTH	Reported
Q9R0P3	S-formylglutathione hydrolase	82	6	27.1	BOTH	New
P19536	Cytochrome c oxidase subunit 5B, mitochondrial	4	2	13.8	BOTH	Reported
E9PUD2	Dynamin-1-like protein	12	2	79.5	BOTH	Reported
P84075	Neuron-specific calcium-binding protein hippocalcin	2	3	19.0	BOTH	New
D3Z0Y2	Peroxiredoxin-6	23	4	22.5	AD	Reported
Q9Z2F2	2'-5'-oligoadenylate synthase-like protein 2	12	2	27.6	BOTH	New
Q810U3	Neurofascin	100	6	101.1	WT	Reported
Q8K406	Leucine-rich repeat LGI family member 3	14	1	61.8	WT	New
P20917	Mag protein	38	3	62.5	BOTH	New
G5E839	T-complex protein 1 subunit delta	23	2	54.8	BOTH	New
D3Z736	L-lactate dehydrogenase	95	9	26.0	WT	Reported
P62073	Mitochondrial import inner membrane translocase subunit Tim10	4	1	10.3	BOTH	New
P63318	Protein kinase C	8	3	72.9	BOTH	Reported
Q6NV92	Protein Zfp941	6	2	75.9	BOTH	New

Q9CQ75	NADH dehydrogenase [ubiquinone] 1 alpha subcomplex subunit 2	30	1	10.9	BOTH	New
O55143	Sarcoplasmic/endoplasmic reticulum calcium ATPase 2	24	6	114.8	AD	Reported
P51881	ADP/ATP translocase 2	117	1	32.9	BOTH	Reported
P48962	ADP/ATP translocase 1	66	1	32.9	BOTH	New
Q9Z0E0	Neurochondrin	75	1	78.8	BOTH	New
P14094	Sodium/potassium-transporting ATPase subunit beta-1	47	2	35.2	BOTH	Reported
P08249	Malate dehydrogenase, mitochondrial	383	2	35.6	BOTH	Reported
P99024	Tubulin beta-5 chain	447	5	49.6	BOTH	Reported
Q9ERD7	Tubulin beta-3 chain	330	3	50.4	BOTH	Reported
Q9EST5	Acidic leucine-rich nuclear phosphoprotein 32 family member B	35	5	31.1	AD	New
Q9CZW2	Centromere protein N	21	1	39.2	AD	New
Q922J6	Tetraspanin-2 (Fragment)	12	4	9.5	BOTH	New
P70441	Na(+)/H(+) exchange regulatory cofactor NHE-RF1	5	1	38.6	AD	New
Q8C048	Calcium-transporting ATPase	22	3	125.6	BOTH	New
P09411	Phosphoglycerate kinase	119	2	27.7	BOTH	Reported
Q9D7N9	Adipocyte plasma membrane-associated protein	1	1	46.4	BOTH	New
P63005	Platelet-activating factor acetylhydrolase IB subunit alpha	5	1	46.6	BOTH	New
Q3ULA2	F-box/WD repeat-containing protein 1A	9	1	68.9	AD	New
Q9CZU6	Citrate synthase, mitochondrial	37	2	51.7	BOTH	Reported
Q9R0P9	Ubiquitin carboxyl-terminal hydrolase isozyme L1	112	1	24.8	BOTH	Reported
P56382	ATP synthase subunit epsilon, mitochondrial	52	1	5.8	BOTH	New
P25444	40S ribosomal protein S2	9	6	28.6	BOTH	New
P52480	Pyruvate kinase PKM	446	1	57.8	BOTH	Reported
P46460	Vesicle-fusing ATPase	181	1	82.6	BOTH	New
D6RFU9	Synaptophysin-like protein 1	34	2	8.9	BOTH	New
D3YTR7	Adenylyl cyclase-associated protein	8	2	39.9	BOTH	New
Q9WTX5	S-phase kinase-associated protein 1	12	2	10.6	BOTH	New
O08553	Dihydropyrimidinase-related protein 2	311	1	62.2	BOTH	Reported
Q80SW1	Putative adenosylhomocysteinase 2	18	3	19.8	BOTH	New
E9Q223	Protein Hbb-bs	7	4	11.1	WT	New
Q91VA7	Isocitrate dehydrogenase [NAD] subunit, mitochondrial	48	1	42.2	BOTH	New
G3UZJ4	Peroxiredoxin-5, mitochondrial	70	3	17.2	WT	Reported
P47791	Glutathione reductase, mitochondrial	12	1	53.6	WT	New
E9PZ64	NGFI-A-binding protein 1	1	3	50.7	AD	New

O55126	Protein NipSnap homolog 2	28	3	12.5	BOTH	New
Q9Z1G3	V-type proton ATPase subunit C 1	37	1	43.9	AD	New
Q9D6R2	Isocitrate dehydrogenase [NAD] subunit alpha, mitochondrial	9	1	39.6	BOTH	Reported
P52503	NADH dehydrogenase [ubiquinone] iron-sulfur protein 6, mitochondrial	1	1	13.0	BOTH	New
D3YXT0	NADH dehydrogenase [ubiquinone] iron-sulfur protein 2, mitochondrial	3	2	49.5	WT	New
P17751	Triosephosphate isomerase	108	2	32.2	WT	Reported
P05201	Aspartate aminotransferase, cytoplasmic	64	1	46.2	BOTH	Reported
P16858	Glyceraldehyde-3-phosphate dehydrogenase	401	8	29.9	BOTH	Reported
Q9R1X5	Multidrug resistance-associated protein 5	2	2	57.7	BOTH	New
D3YVN5	Signal peptide, CUB and EGF-like domain-containing protein 2	4	1	88.6	BOTH	New
O35215	D-dopachrome decarboxylase	9	1	13.1	BOTH	New
Q8K3M5	CDK5 and ABL1 enzyme substrate 2	74	1	52.0	BOTH	New
Q9WV60	Glycogen synthase kinase-3 beta	6	4	46.7	BOTH	New
B1AWE0	Clathrin light chain A	88	6	23.5	BOTH	Reported
P16330	2',3'-cyclic-nucleotide 3'-phosphodiesterase	65	1	47.1	BOTH	Reported
P16054	Protein kinase C epsilon type	11	1	83.5	WT	New
Q62277	Synaptophysin	48	2	18.1	BOTH	Reported
Q60597	2-oxoglutarate dehydrogenase, mitochondrial	2	3	116.0	WT	New
Q6PIC6	Sodium/potassium-transporting ATPase subunit alpha-3	404	5	111.6	BOTH	Reported
Q8VDN2	Sodium/potassium-transporting ATPase subunit alpha-1	252	3	112.9	WT	Reported
D3YYN7	Sodium/potassium-transporting ATPase subunit alpha	253	4	103.5	WT	Reported
Q8VED9	Galectin-related protein	1	1	18.9	BOTH	New
Q922S4	cGMP-dependent 3',5'-cyclic phosphodiesterase	10	3	103.2	WT	New
P63011	Ras-related protein Rab-3A	99	1	25.0	BOTH	New
Q9QUI0	Transforming protein RhoA	14	7	18.7	BOTH	New
A2AMH3	Choline transporter-like protein 1	13	4	59.1	BOTH	New
Q91VD9	NADH-ubiquinone oxidoreductase 75 kDa subunit, mitochondrial	1	3	12.9	BOTH	New
F6SAC3	Glucose-6-phosphate isomerase	52	2	53.2	WT	New
Q9CZ13	Cytochrome b-c1 complex subunit 1, mitochondrial	163	2	52.8	AD	Reported
D3YXG6	Actin-related protein 2/3 complex subunit 2	9	2	32.5	BOTH	New
Q6ZQ38	Cullin-associated NEDD8-dissociated protein 1	37	2	136.2	BOTH	New
P61982	14-3-3 protein gamma	21	1	28.3	BOTH	Reported
P56391	Cytochrome c oxidase subunit 6B1	177	1	10.1	BOTH	New
E9Q9G3	Protein Zfp938	83	1	67.5	BOTH	New

O35136	Neural cell adhesion molecule 2	11	1	93.1	BOTH	New
P54071	Isocitrate dehydrogenase [NADP], mitochondrial	51	2	50.9	AD	New
P61922	4-aminobutyrate aminotransferase, mitochondrial	60	1	56.4	WT	Reported
P40124	Adenylyl cyclase-associated protein 1	34	1	51.5	BOTH	New
O35098	Dihydropyrimidinase-related protein 4	12	2	61.9	WT	New
Q8BH55	Threonine synthase-like 1 (Fragment)	2	2	4.1	BOTH	New
P60202	Myelin proteolipid protein	1057	1	30.1	BOTH	Reported
P50396	Rab GDP dissociation inhibitor alpha	130	2	50.5	BOTH	New
P03995	Glial fibrillary acidic protein	33	1	49.9	AD	Reported
Q60625	Intercellular adhesion molecule 5	35	1	96.9	WT	New
Q8BKH7	Target of rapamycin complex 2 subunit MAPKAP1	8	2	19.3	WT	Reported
Q9R1B9	Slit homolog 2 protein	7	4	168.7	BOTH	New
Q68FD5	Clathrin heavy chain 1	112	3	191.4	BOTH	Reported
P68373	Tubulin alpha-1C chain	272	5	49.9	BOTH	New
P43006	Excitatory amino acid transporter 2	48	1	62.0	BOTH	New
P14152	Malate dehydrogenase, cytoplasmic	132	2	36.5	BOTH	Reported
Q6PHC1	Alpha-enolase	258	2	39.8	BOTH	Reported
Q9JLZ3	Methylglutaconyl-CoA hydratase, mitochondrial	9	3	22.9	WT	Reported
P31254	Ubiquitin-like modifier-activating enzyme 1 Y	8	2	118.0	BOTH	New
P68368	Tubulin alpha-4A chain	372	9	49.9	BOTH	Reported
Q9DCZ1	GMP reductase 1	12	2	37.5	AD	New
P58252	Elongation factor 2	17	1	95.3	BOTH	Reported
Q5SVG5	AP-1 complex subunit beta-1	28	7	101.1	AD	New
P07901	Heat shock protein HSP 90-alpha	34	1	84.7	BOTH	Reported
E9Q939	Serotransferrin	8	5	7.9	AD	New
Q61687	Transcriptional regulator ATRX	61	6	26.8	BOTH	New
Q504P4	Heat shock cognate 71 kDa protein	54	2	68.7	BOTH	Reported
E9Q133	T-complex protein 1 subunit gamma	84	3	56.5	AD	New
P05202	Aspartate aminotransferase, mitochondrial	292	1	47.4	BOTH	Reported
G3X8Y1	MCG19772	5	1	60.1	AD	New
O89053	Coronin	17	5	12.3	BOTH	New
O70318	Band 4.1-like protein 2	1	1	109.9	WT	New
Q99LX0	Protein deglycase DJ-1	21	5	8.8	BOTH	New
Q5UE59	Kinesin light chain 1	13	10	61.6	BOTH	New

P14206	40S ribosomal protein SA	15	1	32.8	WT	Reported
P60766	Cell division control protein 42 homolog	12	1	21.2	AD	New

^a Comparison with literature. "Reported" indicates the finding of the same SNO-modified proteins in the literature. "New" indicates the SNO-modified proteins that are identified for the first time.