

**Table W1.** All Identified Proteins in  $VARas^{mut}$  Cells and Their Fold Changes According to Four Biologic Replicates.

Protein Name	Taxonomy*	Accession Number	Molecular Weight $M_w$ (Theoretical/Experimental); kDa)	p / (Theoretical/ Experimental)	SQ <sup>†</sup> 1		VARas <sup>mut</sup> /VA <sup>‡</sup>			
					VARas <sup>mut</sup>	VA	1	2	3	4
$\alpha$ Tubulin [fragmented protein]	H	NP_116093	50.5/38.3	4.96/5.67	4.485 ± 1,278	7,969 ± 4,917	-1.80	-1.50	-2.80	+1.10
Annexin 1	B	NP_786978	39.1/35.8	6.44/6.39	14,871 ± 4,888	3,886 ± 1,802	+3.80	-1.60	nd	+1.50
$\beta/\gamma$ Actin	M	CAA31455	41.3/44.1	5.56/5.43	58,031 ± 13,449	27,218 ± 10,089	+2.10	-1.15	+3.30	-1.05
	M	CAA27396	39.1/38.2	5.78/5.69	3,342 ± 1,302	5,461 ± 4,311	-1.60	nd	nd	+1.70
	B	ATBOB	41.9/41.9	5.31/5.29	2,525 ± 779	7,010 ± 2,339	-2.80	+1.05	-3.70	+1.10
$\beta$ Tubulin [fragmented protein]	B	ATBOB	41.9/41.9	5.31/5.33	1,503 ± 522	3,497 ± 1,410	-2.35	+1.30	-1.55	+1.30
	M	NP_076205	50.4/36.0	4.78/5.59	7,512 ± 2,454	2,904 ± 2,238	+2.60	+1.30	+1.05	+1.40
Enolase 1	B	NP_776474	47.6/47.3	6.44/6.30	16,811 ± 7,415	1,107 ± 150	+15.20	-1.75	nd	-1.30
	B	NP_776474	47.6/47.7	6.44/6.15	5,717 ± 2,818	687 ± 292	+8.30	-1.30	nd	±1.00
	B	NP_776474	47.6/47.3	6.44/6.44	25,349 ± 19,299	5,456 ± 3,847	+4.65	-1.20	nd	nd
$\gamma$ Actin	H	AAA51580	26.1/26.1	5.65/5.65	2,362 ± 1,133	6,581 ± 1,671	-2.80	-1.20	-1.40	-1.10
Glucose-regulated protein 58 kDa	B	NP_776758	57.3/58.6	6.23/6.16	17,627 ± 4,608	8,250 ± 4,153	+2.15	+1.35	+2.30	+2.40
Heat shock 27-kDa protein	C	P42929	22.9/25.0	6.23/6.11	20,929 ± 6,778	11,788 ± 4,010	+1.80	+4.40	+2.15	+2.05
Heat shock 70-kDa protein 5	H	NP_006338	72.4/75.2	5.07/5.12	7,416 ± 1,643	3,995 ± 2,135	+1.85	+1.45	+1.40	+1.80
Heat shock 70-kDa protein 8	B	NP_776770	71.4/71.5	5.49/5.50	23,658 ± 11,900	7,154 ± 3,899	+3.30	+1.70	+2.35	+4.00
	B	NP_776770	71.4/71.5	5.49/5.45	5,044 ± 2,138	2,061 ± 1,378	+2.45	+2.15	+2.40	nd
Keratin type I, cytoskeletal 19	B	P08728	43.9/41.7	4.92/5.02	11,770 ± 1,941	21,558 ± 17,399	-1.80	+1.95	±1.00	+2.40
	B	P08728	43.9/39.1	4.92/4.73	486 ± 254	2,611 ± 445	-5.40	nd	nd	nd
Keratin type II, cytoskeletal 8	B	P05786	42.2/53.3	5.13/5.92	11,109 ± 1,853	3,051 ± 2,970	+3.65	+2.90	nd	+3.20
	B	P05786	42.4/48.7	5.13/5.65	517 ± 234	2,984 ± 1,333	-5.75	nd	nd	nd
Keratin, type II cytoskeletal 8 [fragmented protein]	B	P05786	42.4/26.4	5.13/5.01	1,698 ± 730	3,698 ± 1,173	-2.15	-2.65	-3.00	+2.00
	B	P05786	42.4/25.0	5.13/4.60	4,605 ± 1,768	8,745 ± 3,563	-1.90	+1.30	+1.40	+1.75
Myosin regulatory light chain	H	NP_006462	19.8/21.2	4.67/4.60	1,237 ± 1,043	3,481 ± 2,016	-2.80	nd	-3.25	nd
<i>N</i> -acetyl-galactosaminyl-transferase	B		/37.6	/6.25	1,305 ± 650	1,746 ± 490	-1.35	+1.10	±1.00	+1.80
Peroxyredoxin 2	B	NP_777188	22.2/23.7	5.37/5.37	8,364 ± 2,228	6,889 ± 1,767	+1.20	+1.10	-1.20	+1.10
Proliferating cell nuclear antigen	M	NP_035175	29.1/32.7	4.66/4.60	583 ± 155	2,360 ± 922	-4.05	-4.80	-6.20	nd
RhoGDP dissociation inhibitor $\alpha$	B	NP_788823	23.5/26.5	5.12/5.24	4,143 ± 1,399	1,710 ± 441	+2.40	nd	+1.90	+1.20
Stress-induced phosphoprotein 1	M	AAH03794	63.2/64.6	6.40/6.27	8,770 ± 2,853	1,916 ± 1,324	+4.60	+2.20	+3.65	+1.60
Triosephosphate isomerase 1	H	NP_000356	26.9/25.5	6.45/6.38	5,515 ± 1,647	2,678 ± 1,452	+2.05	-1.90	nd	nd
Tropomyosin 1	H	NP_000357	32.8/31.2	4.81/4.69	2,591 ± 2,002	8,033 ± 3,534	-3.10	-1.60	+1.25	-2.10
Tropomyosin 4	H	NP_003281	28.6/28.6	4.67/4.75	3,153 ± 732	2,178 ± 1,746	+1.45	-1.15	+1.80	nd
Tropomyosin 5	M	S11390	29.2/28.6	4.75/4.80	16,990 ± 3,996	10,520 ± 2,250	+1.60	±1.00	+1.10	-1.40
Tropomyosin 5	M	S11390	29.2/28.6	4.75/4.67	16,548 ± 3,928	24,044 ± 10,393	-1.45	+1.20	+1.60	+1.05
Vimentin	B	NP_776394	53.7/51.6	5.20/5.00	3,878 ± 5,754	5,479 ± 2,098	-1.40	-1.40	+2.10	-1.90
	B	NP_776394	53.7/47.7	5.20/4.89	1,249 ± 619	3,774 ± 1,918	-3.00	-2.10	-2.15	-1.10
	B	NP_776394	53.7/44.9	5.20/4.68	1,371 ± 827	4,917 ± 1,818	-3.60	-2.25	-1.55	nd

nd = not detected in gel or no quantification possible.

\*C = *C. familiaris*; B = *B. taurus*; H = *H. sapiens*; M = *M. musculus*.

†SQ = mean spot quantity and standard deviation (technical replicates) of experiment 1; normalized by total quantity in valid spots. SQs of experiments 2 to 4 are not shown.

‡Fold change: (+) an increase in protein expression in  $VARas^{mut}$  cells; (-) a decrease in protein expression in  $VARas^{mut}$  cells.