

Supplementary Materials: Integrated mRNA and miRNA Transcriptomic Analyses Reveals Divergent Mechanisms of Sunitinib Resistance in Clear cell Renal Cell Carcinoma (ccRCC)

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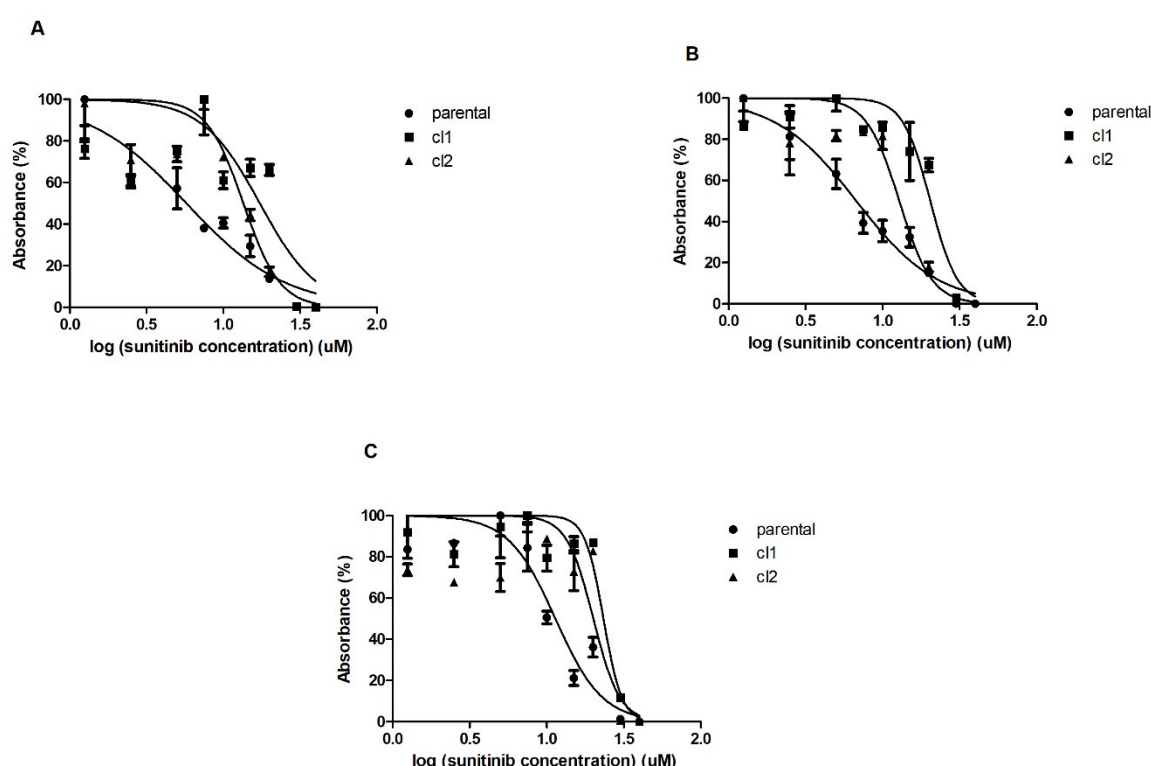


Figure S1. Cell proliferation MTT assays of 786-O resistant clones (c1 and c2) and the parental cell line used to calculate the IC₅₀ value in Table 1. Biological replicate studies were carried out and are depicted in the respective graphs (A–C). Error bars were calculated from the readings obtained in technical triplicates.

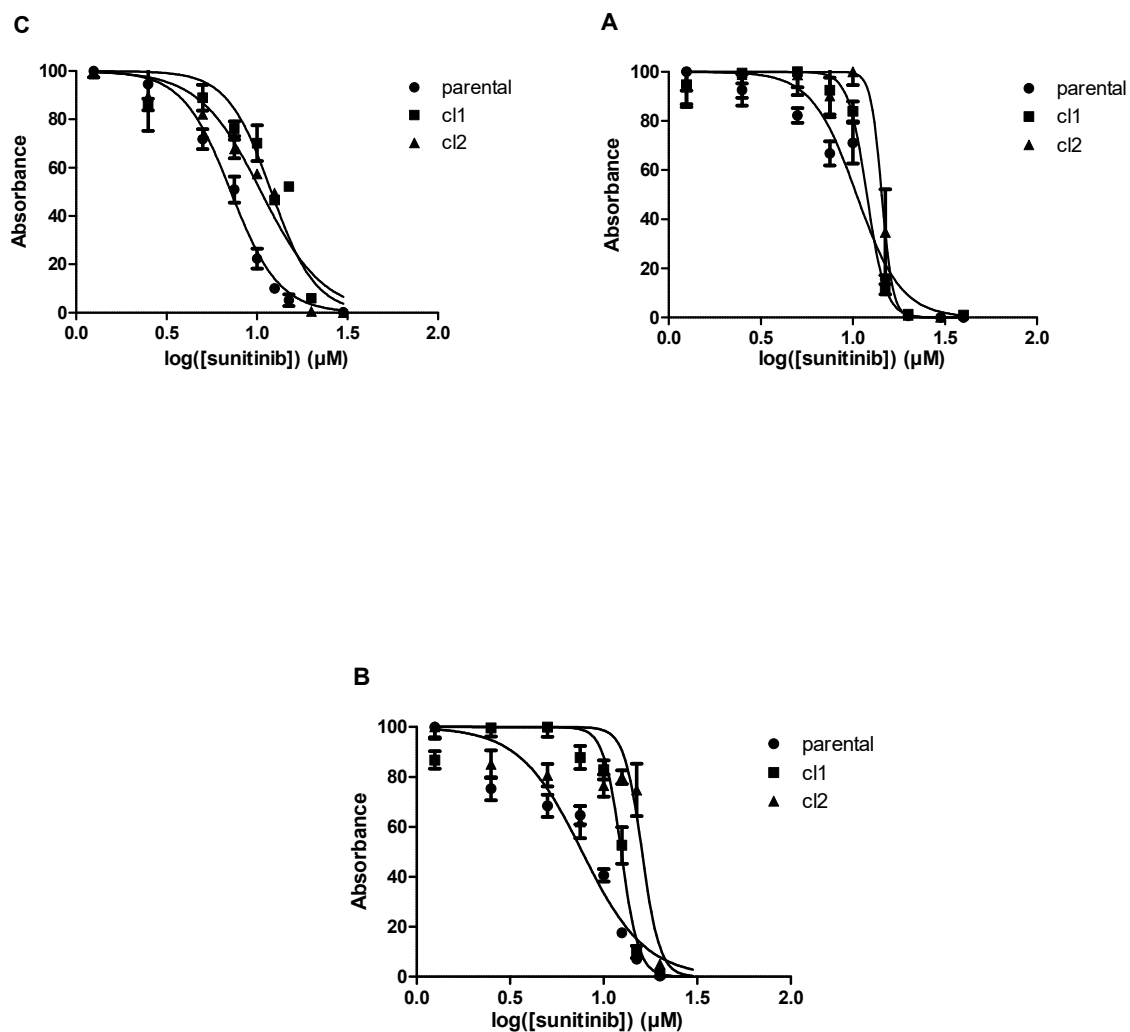


Figure S2. Cell proliferation MTT assays of A498 resistant clones (c1 and c2) and the parental cell line used to calculate the IC₅₀ value in Table 1. Biological replicate studies were carried out and are depicted in the respective graphs (A–C). Error bars were calculated from the readings obtained in technical triplicates.

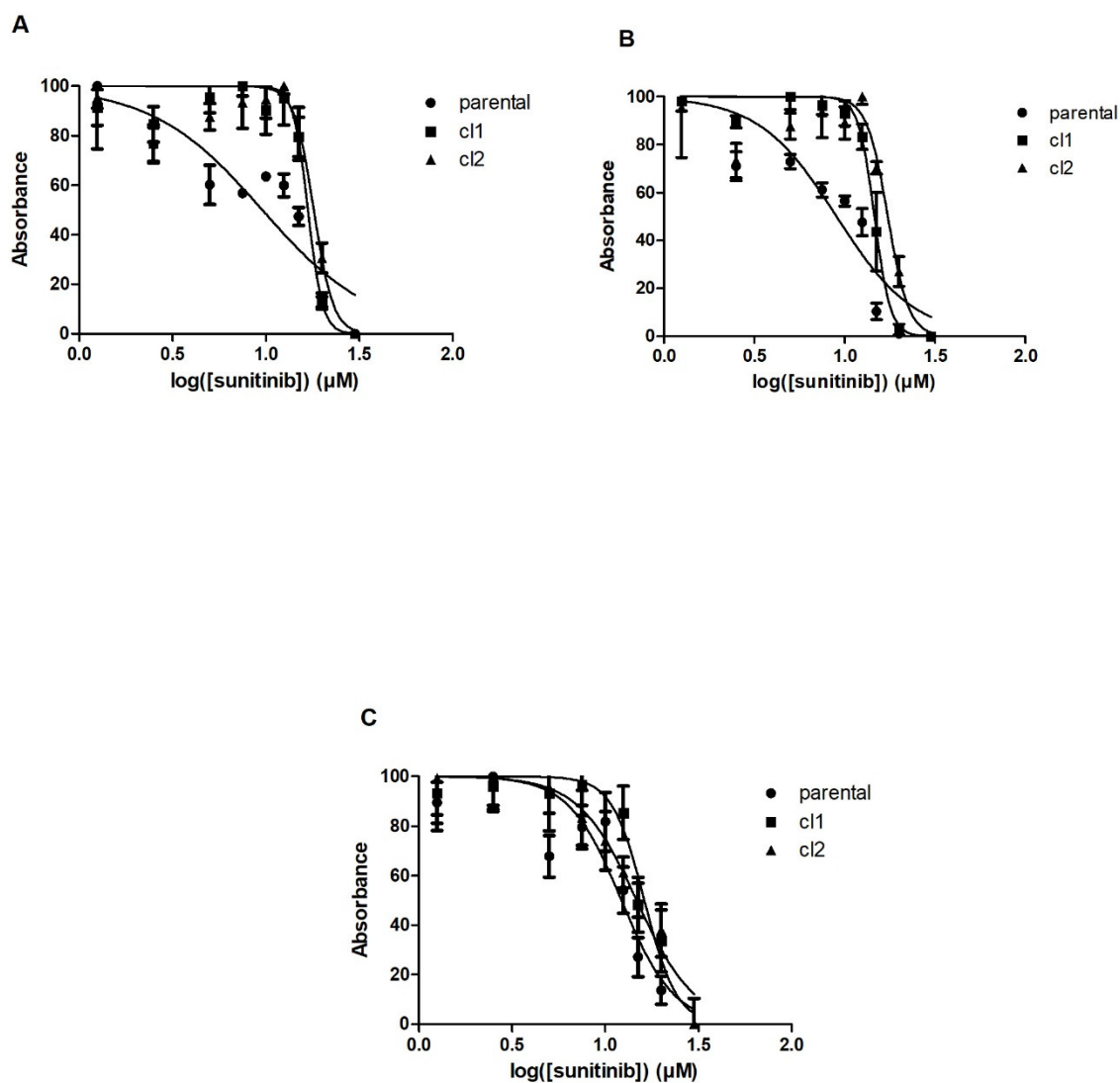


Figure S3. Cell proliferation MTT assays of Caki-1 resistant clones (c1 and c2) and the parental cell line used to calculate the IC_{50} value in Table 1. Biological replicate studies were carried out and are depicted in the respective graphs (A–C). Error bars were calculated from the readings obtained in technical triplicates.

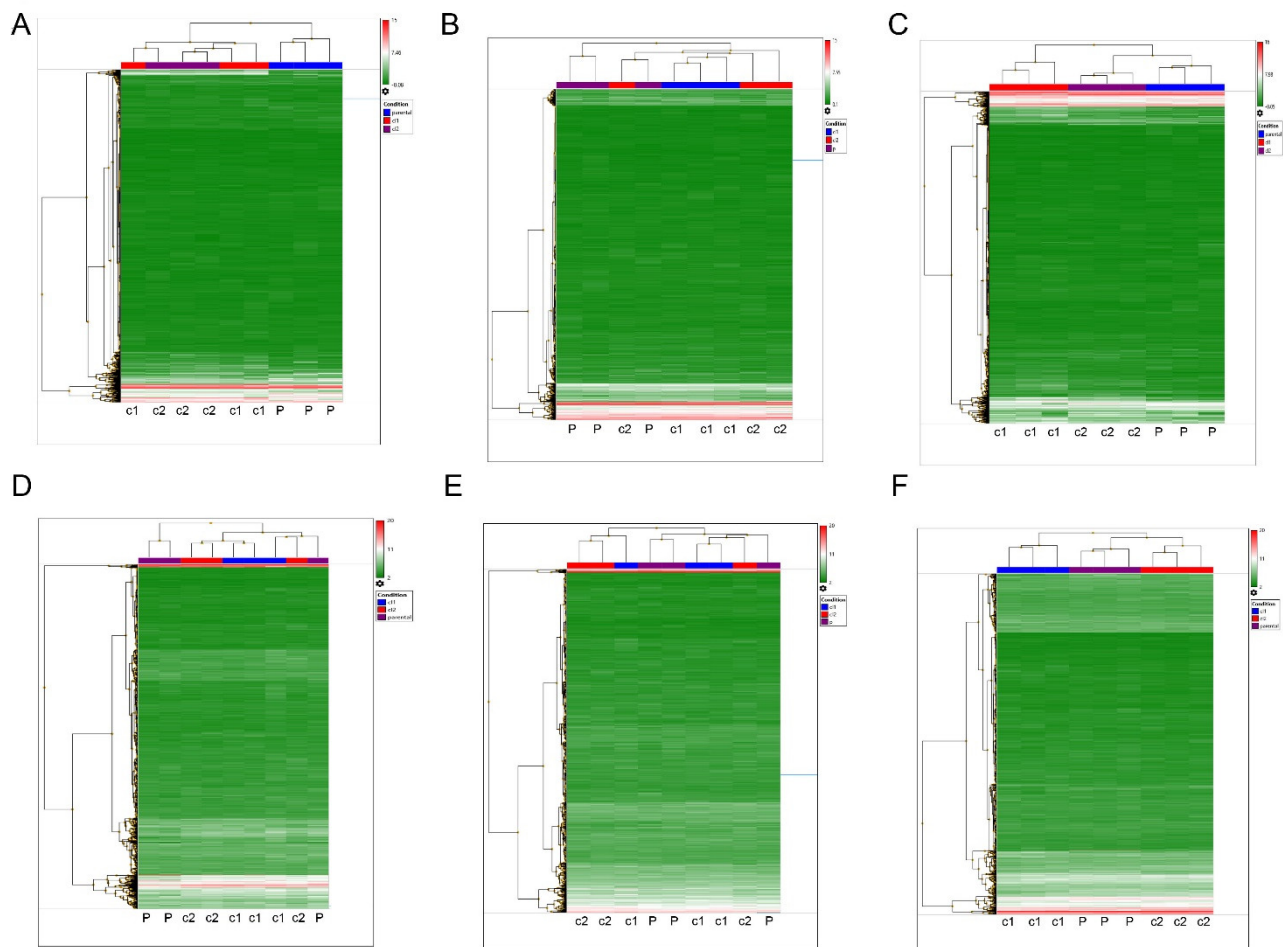


Figure S4. Unsupervised cluster analysis heatmaps of miRNA expression (A–C) in 786–O (A), A498 (B) and Caki–1 (C) resistant clones and parental control cell lines. Unsupervised cluster analysis heatmaps of gene expression (D–F) in 786–O (D), A498 (E) and Caki–1 (F) resistant clones and parental control cell lines.

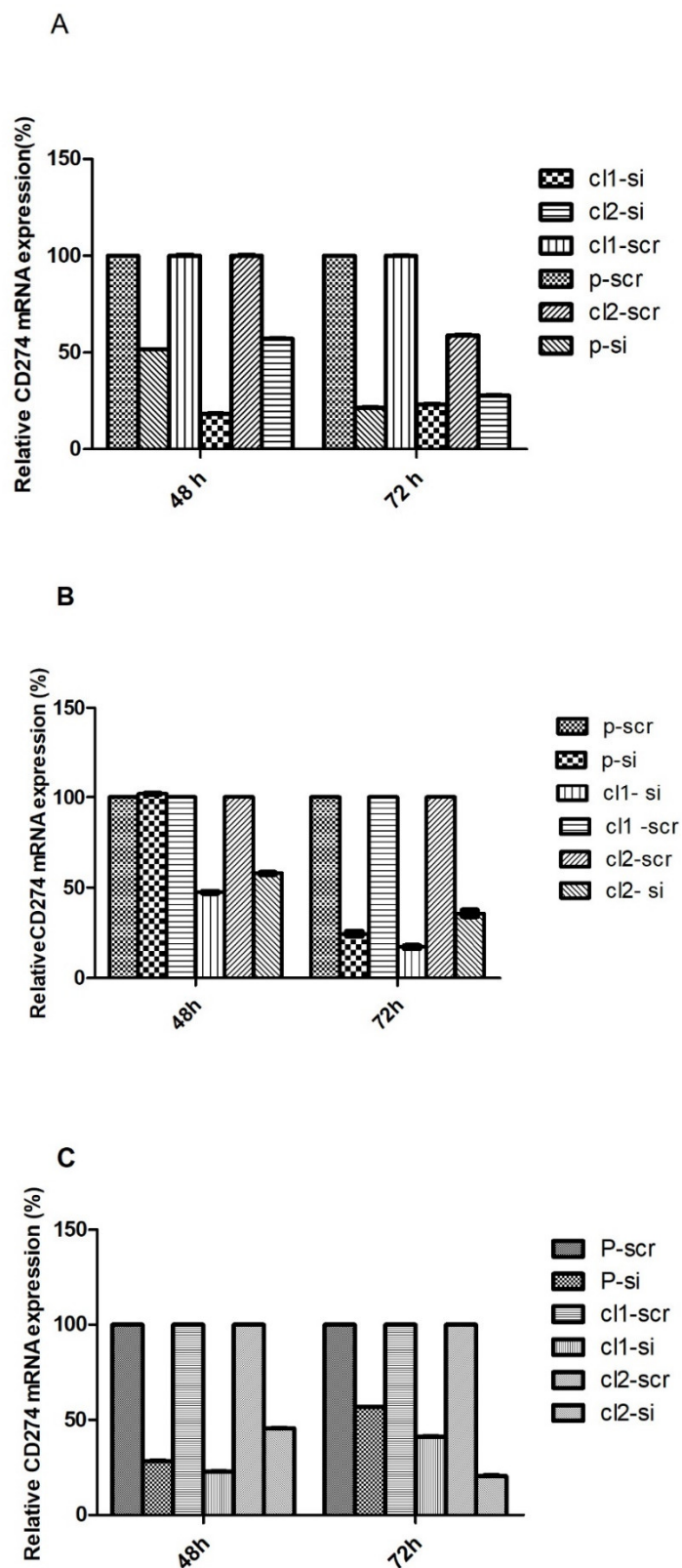


Figure S5. Relative *CD274* mRNA expression measured by qRT-PCR in sunitinib resistant clones, cl1 and cl2, and parental cells in 786 -O (A), A498 (B) and Caki-1 (C) cell lines at 48 and 72 h post-transfection with either siRNA or a scramble control.

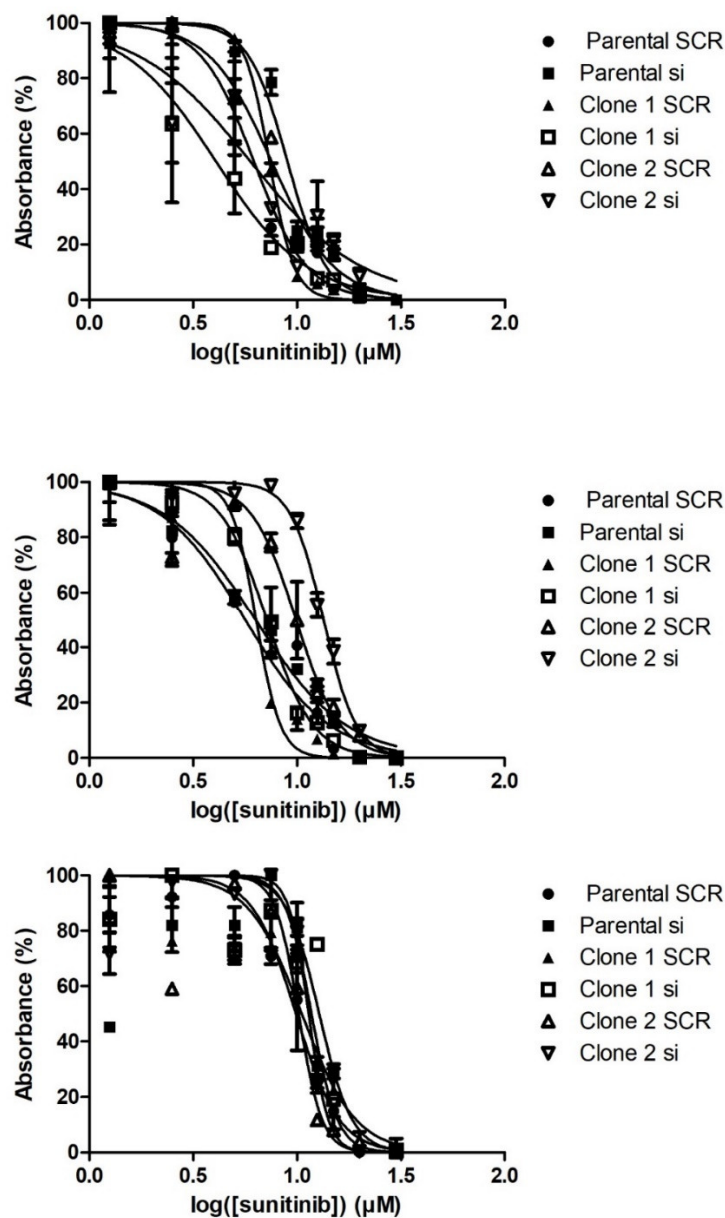


Figure S6. Cell proliferation MTT assays of 786-O resistant clones (c1 and c2) and the parental cell line transfected with CD274-siRNA or scramble control siRNA. These data were used to calculate the IC_{50} value in Table 3. Biological replicate studies were carried out and are depicted in the respective graphs (A–C). Error bars were calculated from the readings obtained in technical triplicates.

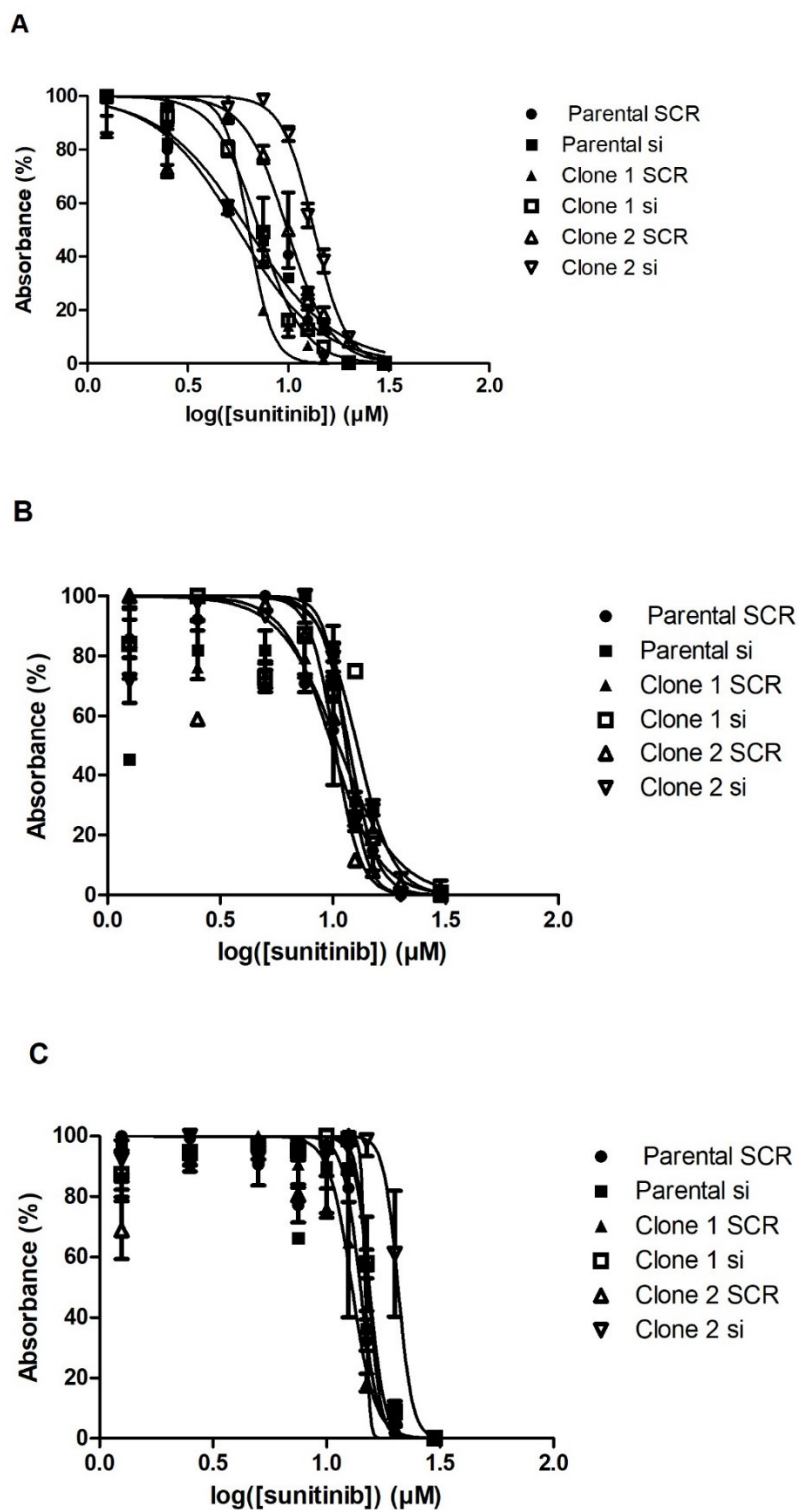


Figure S7. Cell proliferation MTT assays of A498 resistant clones (c1 and c2) and the parental cell line transfected with CD274-siRNA or scramble control siRNA. These data were used to calculate the IC₅₀ value in Table 3. Biological replicate studies were carried out and are depicted in the respective graphs (A–C). Error bars were calculated from the readings obtained in technical triplicates.

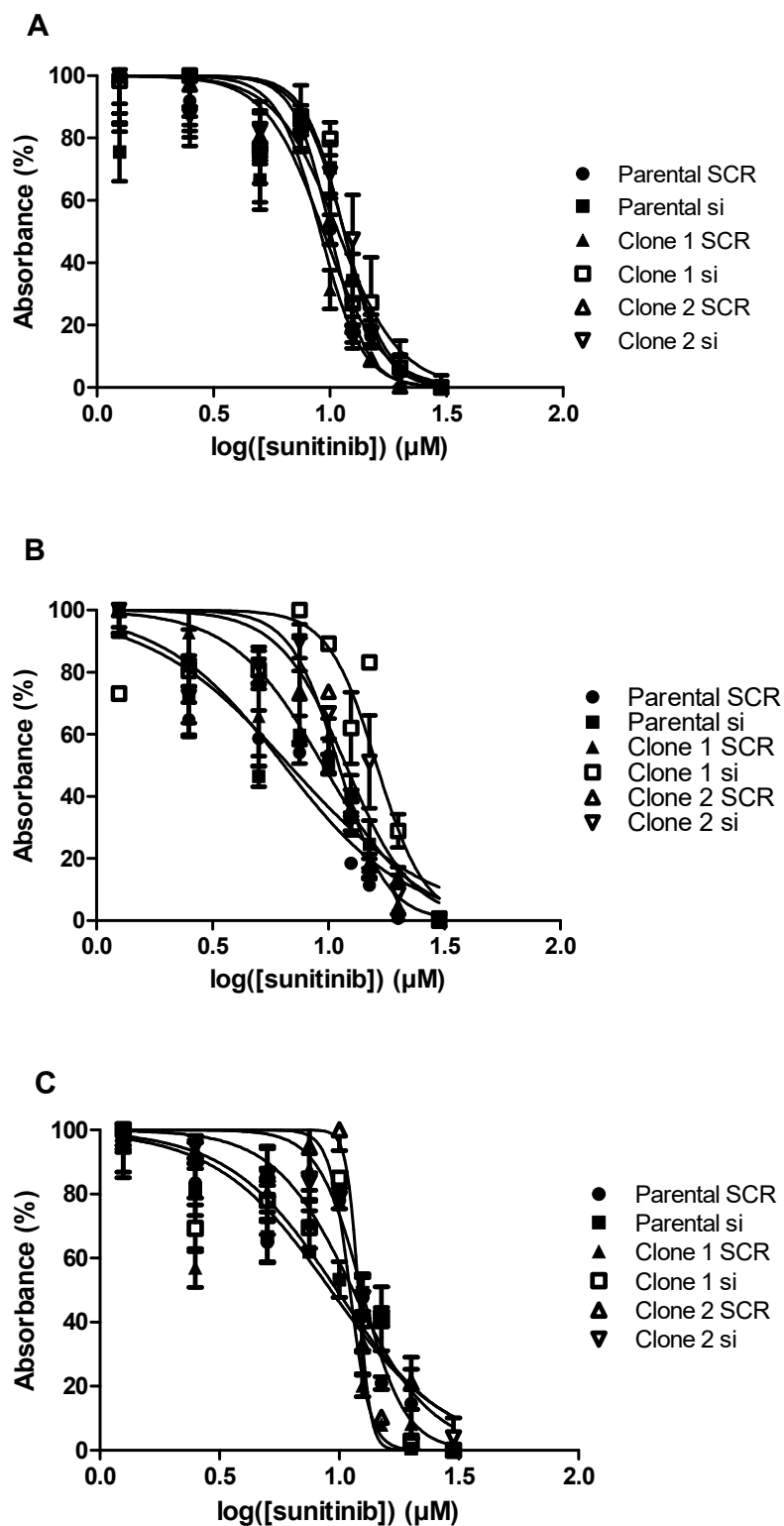


Figure S8. Cell proliferation MTT assays of Caki-1 resistant clones (c1 and c2) and the parental cell line transfected with CD274-siRNA or scramble control siRNA. These data were used to calculate the IC₅₀ value in Table 3. Biological replicate studies were carried out and are depicted in the respective graphs (A–C). Error bars were calculated from the readings obtained in technical triplicates.

Table S1. List of miRNAs commonly differentially expressed between 786-O parental (P) and resistant clones c1 and c2.

<i>miRNA</i>	Clone1(c1)	Clone2(c2)	Parental (P)	c1/P (Fold)	c2/P(Fold)
<i>hsa-miR-6068</i>	181.02	222.86	1.62	111.14	137.01
<i>hsa-miR-4467</i>	1200.98	1217.75	18.77	64.25	65.22
<i>hsa-miR-5001-5p</i>	643.59	680.29	13.64	47.27	50.12
<i>hsa-miR-642a-3p</i>	118.60	105.42	2.93	40.48	36.01
<i>hsa-miR-6825-5p</i>	51.27	49.18	1.75	29.18	28.00
<i>hsa-miR-1271-5p</i>	43.71	10.85	2.03	21.63	5.36
<i>hsa-miR-572</i>	33.82	57.28	1.64	20.57	35.00
<i>hsa-miR-7108-5p</i>	1795.29	1722.16	89.88	19.90	19.15
<i>hsa-miR-3937</i>	38.59	42.22	2.20	17.48	19.10
<i>hsa-miR-3621</i>	61.39	66.26	4.50	13.61	14.67
<i>hsa-miR-6754-5p</i>	28.64	13.27	2.10	13.58	6.29
<i>hsa-miR-6075</i>	33.59	55.72	2.53	13.29	22.05
<i>hsa-miR-4721</i>	39.12	26.35	2.97	13.19	8.85
<i>hsa-miR-642b-3p</i>	58.08	72.50	4.76	12.15	15.25
<i>hsa-miR-4651</i>	232.32	184.82	20.11	11.55	9.22
<i>hsa-miR-2861</i>	2401.97	2336.28	222.86	10.80	10.53
<i>hsa-miR-3154</i>	21.86	23.59	2.03	10.75	11.65
<i>hsa-miR-6860</i>	20.82	8.57	2.06	10.09	4.15
<i>hsa-miR-371b-5p</i>	17.27	28.25	1.72	10.05	16.48
<i>hsa-mir-6860</i>	36.76	25.46	3.66	10.04	6.95
<i>hsa-miR-8072</i>	2778.33	2538.92	284.05	9.76	8.94
<i>hsa-miR-638</i>	3848.29	3640.70	396.18	9.74	9.16
<i>hsa-miR-3911</i>	40.50	24.59	4.20	9.69	5.87
<i>hsa-miR-4649-5p</i>	69.07	70.03	7.46	9.21	9.34
<i>hsa-miR-4800-3p</i>	16.68	22.01	1.89	8.85	11.61
<i>hsa-miR-6126</i>	374.81	407.31	42.52	8.82	9.58
<i>hsa-miR-4430</i>	65.34	73.01	7.46	8.74	9.79
<i>hsa-miR-3180</i>	23.26	18.00	2.69	8.62	6.69
<i>hsa-miR-1915-3p</i>	5042.77	4672.57	592.22	8.51	7.91
<i>hsa-miR-935</i>	17.75	12.21	2.10	8.49	5.83
<i>hsa-miR-612</i>	17.27	8.94	2.06	8.43	4.34
<i>hsa-miR-6870-5p</i>	32.22	29.86	3.84	8.40	7.82
<i>hsa-miR-6802-5p</i>	18.64	22.78	2.25	8.26	10.12
<i>hsa-miR-6831-5p</i>	62.25	41.93	8.00	7.79	5.25
<i>hsa-miR-6088</i>	5955.47	4544.80	770.69	7.72	5.88
<i>hsa-miR-6132</i>	27.67	24.76	3.61	7.68	6.91
<i>hsa-mir-5703</i>	54.95	82.71	7.31	7.52	11.31
<i>hsa-miR-4486</i>	12.73	7.67	1.73	7.38	4.44
<i>hsa-miR-6125</i>	5996.90	5914.33	843.36	7.14	7.01
<i>hsa-mir-6090</i>	20.39	16.34	2.87	7.13	5.68
<i>hsa-miR-4436b-5p</i>	15.03	11.00	2.17	6.91	5.05
<i>hsa-miR-1908-5p</i>	1858.60	1640.59	276.28	6.73	5.94
<i>hsa-miR-4532</i>	560.28	390.72	83.87	6.66	4.66
<i>hsa-miR-4497</i>	7082.29	5042.77	1082.39	6.58	4.68
<i>hsa-miR-6127</i>	61.39	50.21	9.45	6.52	5.35
<i>hsa-miR-6727-5p</i>	3821.70	3420.52	608.87	6.30	5.64
<i>hsa-miR-6848-5p</i>	19.43	13.00	3.18	6.09	4.09
<i>hsa-miR-1281</i>	31.12	41.07	5.13	6.05	8.01
<i>hsa-miR-6724-5p</i>	1951.00	2019.80	333.14	5.86	6.09
<i>hsa-miR-6789-5p</i>	192.67	167.73	33.59	5.72	4.99
<i>hsa-miR-4665-5p</i>	18.77	25.11	3.32	5.66	7.58
<i>hsa-miR-4669</i>	75.06	41.64	13.45	5.57	3.09
<i>hsa-miR-6729-5p</i>	5556.65	5873.48	1002.93	5.53	5.87
<i>hsa-miR-191-3p</i>	9.58	4.86	1.75	5.45	2.77
<i>hsa-miR-4488</i>	2304.12	1964.57	430.54	5.35	4.54
<i>hsa-miR-5189-5p</i>	16.22	13.18	3.03	5.35	4.33
<i>hsa-miR-4505</i>	254.23	158.68	48.50	5.25	3.29
<i>hsa-miR-4466</i>	3691.52	2836.70	719.08	5.12	3.92
<i>hsa-miR-1225-5p</i>	64.45	70.03	12.82	5.02	5.47
<i>hsa-miR-1343-5p</i>	164.28	118.60	34.30	4.79	3.44
<i>hsa-miR-6805-5p</i>	433.53	421.68	90.51	4.79	4.67
<i>hsa-miR-6787-5p</i>	46.85	46.85	9.92	4.74	4.72
<i>hsa-miR-7704</i>	10809.4	8599.28	2272.40	4.74	3.77
<i>hsa-miR-6728-5p</i>	13.93	11.55	3.01	4.64	3.85
<i>hsa-miR-3188</i>	18.51	10.20	4.06	4.58	2.52

<i>hsa-miR-4750-5p</i>	13.18	18.13	2.87	4.58	6.31
<i>hsa-mir-3656</i>	21.71	24.25	4.86	4.49	5.00
<i>hsa-miR-138-1-3p</i>	49.87	73.52	11.24	4.46	6.54
<i>hsa-miR-149-3p</i>	1520.15	1031.12	340.14	4.46	3.04
<i>hsa-miR-1207-5p</i>	407.31	263.20	91.14	4.45	2.89
<i>hsa-miR-4787-5p</i>	13400.5	10660.9	3019.30	4.45	3.54
<i>hsa-miR-4690-5p</i>	13.18	14.12	2.97	4.43	4.75
<i>hsa-miR-3665</i>	11268.4	11268.4	2556.58	4.41	4.41
<i>hsa-miR-6820-5p</i>	16.22	10.27	3.71	4.38	2.78
<i>hsa-miR-3180-3p</i>	38.05	34.54	8.69	4.37	3.96
<i>hsa-miR-6726-5p</i>	7.46	5.54	1.71	4.37	3.24
<i>hsa-miR-4463</i>	224.41	263.20	52.35	4.29	5.01
<i>hsa-miR-6812-5p</i>	168.90	91.14	39.95	4.25	2.28
<i>hsa-mir-6089-1</i>	270.60	250.73	64.45	4.21	3.90
<i>hsa-mir-6089-2</i>	270.60	250.73	64.45	4.21	3.90
<i>hsa-miR-6791-5p</i>	382.68	433.53	90.51	4.21	4.79
<i>hsa-miR-6780b-5p</i>	29.24	42.81	7.06	4.15	6.08
<i>hsa-miR-4674</i>	97.01	91.77	23.43	4.14	3.91
<i>hsa-miR-3197</i>	19.84	32.00	4.92	4.02	6.52
<i>hsa-miR-5010-5p</i>	10.34	5.74	2.60	3.97	2.21
<i>hsa-miR-1587</i>	24.42	18.51	6.19	3.95	2.98
<i>hsa-miR-6821-5p</i>	218.27	198.09	55.72	3.94	3.57
<i>hsa-miR-6765-5p</i>	249.00	203.66	64.00	3.89	3.18
<i>hsa-miR-6786-5p</i>	1200.98	1136.20	308.69	3.88	3.67
<i>hsa-miR-6891-5p</i>	57.28	60.13	15.35	3.75	3.92
<i>hsa-miR-3141</i>	265.03	168.90	72.00	3.67	2.34
<i>hsa-miR-1910-5p</i>	48.17	28.64	13.27	3.64	2.16
<i>hsa-miR-3620-5p</i>	212.31	174.85	60.13	3.54	2.92
<i>hsa-miR-4745-5p</i>	256.00	317.37	74.03	3.47	4.30
<i>hsa-miR-4507</i>	44.63	42.22	12.91	3.45	3.28
<i>hsa-miR-8063</i>	8.63	9.71	2.53	3.42	3.83
<i>hsa-miR-6798-5p</i>	64.45	76.64	19.16	3.37	4.01
<i>hsa-miR-8069</i>	3875.05	4039.61	1152.06	3.36	3.49
<i>hsa-mir-4281</i>	124.50	89.26	37.53	3.32	2.37
<i>hsa-miR-4433b-3p</i>	113.77	112.21	34.30	3.31	3.27
<i>hsa-miR-6089</i>	5556.65	5077.84	1675.06	3.31	3.03
<i>hsa-miR-1237-5p</i>	1323.37	1200.98	401.71	3.29	2.98
<i>hsa-miR-6782-5p</i>	33.36	24.59	10.20	3.29	2.41
<i>hsa-miR-6087</i>	10809.4	7750.10	3304.00	3.28	2.35
<i>hsa-miR-6763-5p</i>	33.13	29.04	10.20	3.25	2.86
<i>hsa-miR-135a-3p</i>	7.94	4.92	2.45	3.24	2.01
<i>hsa-miR-1227-5p</i>	97.68	124.50	30.91	3.16	4.03
<i>hsa-miR-4707-5p</i>	182.28	225.97	58.08	3.12	3.87
<i>hsa-miR-3178</i>	699.41	910.17	229.13	3.07	3.99
<i>hsa-miR-4459</i>	274.37	196.72	89.88	3.06	2.19
<i>hsa-miR-663a</i>	617.37	670.92	202.25	3.04	3.31
<i>hsa-miR-937-5p</i>	58.89	57.68	19.29	3.03	2.98
<i>hsa-miR-1909-5p</i>	8.51	5.78	2.85	2.99	2.04
<i>hsa-miR-4689</i>	64.89	65.34	22.01	2.95	2.98
<i>hsa-miR-4734</i>	121.94	159.79	41.64	2.93	3.84
<i>hsa-miR-6090</i>	3541.14	4299.64	1217.75	2.91	3.53
<i>hsa-miR-920</i>	4.89	3.41	1.69	2.90	2.02
<i>hsa-miR-6774-5p</i>	8.22	6.06	2.85	2.89	2.13
<i>hsa-miR-4741</i>	32.90	43.41	11.47	2.87	3.79
<i>hsa-miR-6850-5p</i>	145.01	182.28	51.27	2.82	3.55
<i>hsa-miR-3960</i>	14766.9	13969.5	5256.91	2.81	2.65
<i>hsa-miR-6749-5p</i>	69.07	64.45	24.76	2.78	2.61
<i>hsa-miR-6716-5p</i>	37.01	29.45	13.55	2.74	2.18
<i>hsa-miR-4758-5p</i>	43.41	64.45	16.00	2.71	4.02
<i>hsa-miR-4433-3p</i>	33.59	40.79	12.47	2.69	3.27
<i>hsa-miR-675-5p</i>	5.74	10.34	2.16	2.67	4.81
<i>hsa-miR-212-3p</i>	5.24	5.28	1.97	2.65	2.67
<i>hsa-miR-5196-5p</i>	22.63	26.35	8.51	2.65	3.08
<i>hsa-miR-3940-5p</i>	340.14	421.68	130.69	2.60	3.23
<i>hsa-miR-4695-5p</i>	37.27	47.84	15.24	2.46	3.16
<i>hsa-miR-3162-5p</i>	31.12	36.50	12.82	2.43	2.85
<i>hsa-miR-4270</i>	153.28	183.55	63.12	2.42	2.90
<i>hsa-miR-6816-5p</i>	349.71	374.81	145.01	2.42	2.60
<i>hsa-miR-6808-5p</i>	32.90	29.04	13.64	2.41	2.13

<i>hsa-mir-4734</i>	4.69	4.69	1.95	2.40	2.40
<i>hsa-miR-6879-5p</i>	58.08	63.12	24.08	2.40	2.61
<i>hsa-miR-6752-5p</i>	159.79	199.47	67.18	2.38	2.97
<i>hsa-miR-6734-5p</i>	8.28	10.41	3.51	2.35	2.96
<i>hsa-miR-874-3p</i>	3.89	4.41	1.72	2.26	2.56
<i>hsa-mir-6790</i>	10.20	9.58	4.59	2.23	2.09
<i>hsa-miR-1229-5p</i>	9.45	13.64	4.32	2.19	3.17
<i>hsa-miR-6768-5p</i>	8.69	12.13	4.20	2.08	2.89
<i>hsa-miR-4783-3p</i>	3.68	6.50	1.80	2.04	3.61
<i>hsa-miR-940</i>	9.78	10.34	4.82	2.03	2.15
<i>hsa-miR-1469</i>	617.37	760.08	306.55	2.02	2.49
<i>hsa-miR-106a-5p</i>	996.00	792.35	2352.53	−2.36	−2.98
<i>Has-miR-17-5p</i>	1082.39	1112.82	2896.31	−2.67	−2.61
<i>hsa-miR-296-3p</i>	34.78	32.22	100.43	−2.89	−3.11
<i>hsa-miR-20a-5p</i>	498.00	526.39	1448.15	−2.90	−2.75
<i>hsa-miR-18a-3p</i>	19.16	13.36	56.10	−2.94	−4.20
<i>hsa-miR-4417</i>	7.26	6.36	22.63	−3.12	−3.56
<i>hsa-miR-3607-5p</i>	1.67	2.04	5.82	−3.48	−2.85
<i>hsa-miR-30d-5p</i>	137.19	225.97	491.14	−3.60	−2.19
<i>hsa-miR-18a-5p</i>	137.19	89.88	498.00	−3.64	−5.53
<i>hsa-miR-99a-5p</i>	148.06	36.25	576.03	−3.91	−15.88
<i>hsa-miR-4657</i>	1.73	2.20	6.77	−3.92	−3.08
<i>hsa-miR-93-5p</i>	1530.73	1686.71	5996.90	−3.92	−3.55
<i>hsa-miR-26b-5p</i>	1.79	1.84	7.62	−4.25	−4.13
<i>hsa-miR-140-3p</i>	261.38	250.73	1192.69	−4.55	−4.74
<i>hsa-miR-6511a-5p</i>	2.95	6.50	13.74	−4.67	−2.13
<i>hsa-miR-664b-5p</i>	2.68	2.38	13.45	−5.05	−5.64
<i>hsa-miR-4284</i>	51.98	68.59	274.37	−5.27	−3.99
<i>hsa-miR-328-3p</i>	20.11	35.02	107.63	−5.32	−3.06
<i>hsa-miR-25-5p</i>	28.25	37.79	158.68	−5.63	−4.20
<i>hsa-mir-21</i>	7.94	9.00	53.82	−6.77	−5.99
<i>hsa-miR-181a-3p</i>	5.50	13.00	41.64	−7.59	−3.20
<i>hsa-mir-3651</i>	5.54	4.50	43.11	−7.76	−9.55
<i>hsa-miR-1254</i>	3.36	3.25	26.17	−7.80	−8.05
<i>hsa-miR-4668-5p</i>	2.53	1.65	22.32	−8.79	−13.48
<i>hsa-miR-21-5p</i>	57.68	113.77	548.75	−9.53	−4.82
<i>hsa-miR-331-5p</i>	2.81	3.61	27.47	−9.81	−7.67
<i>hsa-miR-7641</i>	45.25	79.34	461.44	−10.24	−5.84
<i>hsa-miR-3651</i>	93.05	109.90	1120.56	−12.03	−10.15
<i>hsa-miR-7975</i>	5.82	15.56	75.58	−12.99	−4.84
<i>hsa-miR-17-3p</i>	5.10	6.59	75.06	−14.73	−11.45
<i>hsa-miR-21-3p</i>	12.73	14.72	227.54	−17.86	−15.43
<i>hsa-miR-34a-5p</i>	21.86	42.52	694.58	−31.73	−16.39
<i>hsa-miR-196b-3p</i>	11.00	36.25	448.82	−40.93	−12.40

Values shown are median intensities. Those miRNAs that were validated by qRT-PCR are depicted in bold type.

Table S2. List of miRNAs commonly differentially expressed between A498 parental (P) and resistant clones c1 and c2.

miRNA	Clone1(c1)	Clone2(c2)	Parental	c1/P (Fold)	c2/P (Fold)
<i>hsa-miR-6068</i>	97.68	183.55	6.45	15.16	28.44
<i>hsa-miR-371b-5p</i>	18.13	14.12	2.35	7.74	6.02
<i>hsa-miR-6126</i>	487.75	354.59	72.00	6.78	4.91
<i>hsa-miR-4467</i>	415.87	760.08	70.52	5.88	10.76
<i>hsa-miR-1202</i>	19.56	10.63	3.34	5.84	3.17
<i>hsa-miR-34c-5p</i>	43.11	21.11	8.69	4.95	2.43
<i>hsa-miR-4430</i>	42.52	20.11	9.13	4.65	2.2
<i>hsa-miR-6754-5p</i>	12.13	9.71	2.71	4.46	3.57
<i>hsa-miR-6075</i>	32.67	29.65	8.34	3.9	3.56
<i>hsa-miR-150-3p</i>	43.71	51.98	11.16	3.9	4.64
<i>hsa-miR-7108-5p</i>	786.88	1144.10	206.50	3.81	5.54
<i>hsa-miR-3162-5p</i>	37.01	24.76	10.85	3.41	2.29
<i>hsa-miR-5001-5p</i>	436.55	588.13	133.44	3.29	4.41
<i>hsa-miR-15-5p</i>	1152.06	1448.15	354.59	3.24	4.09
<i>hsa-miR-1915-3p</i>	2179.83	3191.46	704.28	3.1	4.52
<i>hsa-miR-4505</i>	124.50	129.79	40.79	3.06	3.18
<i>hsa-miR-6724-5p</i>	861.08	1234.75	284.05	3.04	4.36
<i>hsa-miR-4787-5p</i>	4672.57	6038.61	1584.71	2.96	3.82
<i>hsa-miR-4689</i>	78.25	82.14	26.91	2.91	3.05
<i>hsa-miR-2861</i>	968.76	1217.75	330.84	2.91	3.68
<i>hsa-miR-6743-5p</i>	433.53	357.05	151.17	2.86	2.36
<i>hsa-miR-3937</i>	30.70	29.86	10.70	2.86	2.78
<i>hsa-miR-8072</i>	1097.50	1746.20	388.02	2.82	4.49
<i>hsa-miR-4741</i>	49.18	86.22	18.00	2.74	4.79
<i>hsa-miR-6729-5p</i>	2336.28	3468.27	855.13	2.73	4.06
<i>hsa-miR-34c-3p</i>	58.49	48.84	21.71	2.69	2.25
<i>hsa-miR-638</i>	1509.65	2210.26	564.18	2.66	3.9
<i>hsa-miR-6132</i>	21.41	23.10	8.11	2.64	2.86
<i>hsa-miR-1225-5p</i>	51.98	73.52	19.84	2.62	3.69
<i>hsa-miR-6125</i>	2418.67	3615.55	962.07	2.51	3.77
<i>hsa-miR-4516</i>	1584.71	1562.89	634.73	2.51	2.48
<i>hsa-miR-3665</i>	5556.65	6793.79	2336.28	2.39	2.91
<i>hsa-miR-1908-5p</i>	879.17	1458.23	369.65	2.37	3.93
<i>hsa-miR-320e</i>	168.90	141.04	344.89	−2.04	−2.45
<i>hsa-miR-484</i>	119.43	122.79	252.48	−2.11	−2.05
<i>hsa-miR-550a-3p</i>	99.73	82.71	219.79	−2.22	−2.65
<i>hsa-miR-671-3p</i>	57.28	55.33	128.00	−2.23	−2.32
<i>hsa-miR-99a-5p</i>	855.13	652.58	1910.85	−2.23	−2.92
<i>hsa-miR-125b-2-3p</i>	76.11	65.80	184.82	−2.42	−2.79
<i>hsa-miR-148b-3p</i>	15.14	10.06	36.76	−2.43	−3.65
<i>hsa-miR-363-3p</i>	1.68	1.47	4.14	−2.45	−2.81
<i>hsa-miR-92b</i>	121.94	151.17	304.44	−2.5	−2.01
<i>hsa-miR-34a-3p</i>	77.71	78.25	195.36	−2.5	−2.49
<i>hsa-miR-2110</i>	26.54	13.93	67.18	−2.53	−4.82
<i>hsa-miR-1296-5p</i>	13.18	16.68	35.75	−2.72	−2.14
<i>hsa-miR-1910-3p</i>	4.00	5.39	12.55	−3.13	−2.33
<i>hsa-miR-92b-3p</i>	809.00	1269.46	2665.15	−3.28	−2.1
<i>hsa-miR-146b-5p</i>	8.28	7.11	33.36	−4.04	−4.69
<i>hsa-miR-328-3p</i>	4.56	15.03	48.17	−10.52	−3.19
<i>hsa-miR-145-5p</i>	1.83	2.19	20.53	−11.23	−9.42

Table S3. List of miRNAs commonly differentially expressed between Caki-1 parental (P) and resistant clones c1 and c2.

miRNA	Clone1(c1)	Clone2(c2)	Parental	c1/P (Fold)	c2/P(Fold)
<i>miR-92a-1-5p</i>	1428.22	328.56	2.79	512	118.07
<i>miR-200b-5p</i>	382.68	118.60	2.95	129.76	40.04
<i>miR-200a-5p</i>	135.30	62.68	1.75	76.79	35.74
<i>miR-210-5p</i>	224.41	76.11	3.68	61.13	20.74
<i>miR-708-5p</i>	156.50	19.70	2.71	57.66	7.27
<i>miR-92b-3p</i>	138.14	29.45	3.05	45.2	9.63
<i>miR-193b-5p</i>	256.00	33.59	6.36	40.05	5.25
<i>miR-18a-3p</i>	290.02	41.07	7.52	38.47	5.46
<i>miR-210-3p</i>	5914.33	1782.89	182.28	32.31	9.78
<i>miR-3613-5p</i>	55.33	4.99	1.87	29.72	2.68

<i>miR-138-5p</i>	46.85	10.13	1.93	24.32	5.26
<i>miR-766-3p</i>	53.45	18.77	2.22	24.11	8.47
<i>miR-2110</i>	64.00	19.84	2.75	23.32	7.22
<i>mir-92b</i>	74.54	97.01	3.29	22.75	29.46
<i>miR-328-3p</i>	59.30	17.63	2.71	21.93	6.5
<i>miR-138-1-3p</i>	54.95	16.22	2.77	19.9	5.87
<i>miR-125a-3p</i>	1192.69	232.32	61.82	19.34	3.75
<i>miR-5189-3p</i>	37.53	4.23	2.01	18.66	2.1
<i>miR-1307-3p</i>	81.57	24.25	4.38	18.63	5.52
<i>miR-23a-5p</i>	78.79	25.28	4.26	18.55	5.96
<i>miR-3184-3p</i>	133.44	40.50	7.21	18.51	5.61
<i>miR-18a-5p</i>	85.63	27.67	4.66	18.42	5.93
<i>miR-365a-5p</i>	580.04	105.42	31.78	18.35	3.33
<i>miR-1180-3p</i>	2876.30	803.41	156.50	18.35	5.13
<i>miR-18b-5p</i>	45.89	16.11	2.51	18.26	6.42
<i>miR-365b-5p</i>	93.70	41.36	5.28	17.8	7.85
<i>miR-8075</i>	344.89	125.37	19.84	17.39	6.32
<i>miR-197-3p</i>	112.99	40.50	7.26	15.52	5.58
<i>miR-423-5p</i>	31.34	8.94	2.20	14.27	4.06
<i>miR-550a-3-5p</i>	71.51	15.78	5.03	14.25	3.14
<i>miR-1972</i>	21.71	8.57	1.59	13.63	5.4
<i>miR-193a-5p</i>	39.12	19.43	2.89	13.5	6.72
<i>miR-345-5p</i>	83.87	28.25	6.19	13.49	4.54
<i>miR-744-5p</i>	34.54	10.56	2.58	13.33	4.06
<i>miR-31-5p</i>	30.70	8.46	2.35	13.13	3.6
<i>miR-101-5p</i>	352.14	95.01	26.91	13.03	3.51
<i>miR-1301-3p</i>	39.12	14.03	3.03	12.88	4.62
<i>miR-941</i>	63.12	18.90	4.99	12.64	3.77
<i>miR-331-5p</i>	19.70	9.25	1.58	12.45	5.85
<i>miR-615-3p</i>	52.35	19.97	4.35	12.06	4.58
<i>miR-550a-5p</i>	35.75	25.99	2.99	11.98	8.71
<i>miR-455-3p</i>	86.22	36.25	7.21	11.97	5.02
<i>miR-330-3p</i>	263.20	69.55	23.26	11.3	2.98
<i>miR-877-5p</i>	28.05	18.38	2.53	11.09	7.27
<i>miR-30b-3p</i>	61.39	32.45	5.58	11.04	5.83
<i>miR-21-5p</i>	219.79	60.97	20.11	10.93	3.03
<i>miR-585-5p</i>	49.52	22.32	4.53	10.91	4.93
<i>miR-106a-5p</i>	30.48	33.36	2.83	10.8	11.79
<i>miR-1275</i>	126.24	69.55	11.71	10.76	5.94
<i>miR-4284</i>	23.43	8.11	2.25	10.36	3.59
<i>miR-4417</i>	82.14	38.05	8.06	10.22	4.72
<i>miR-17-5p</i>	69.55	27.47	6.92	10.06	3.95
<i>miR-652-3p</i>	31.56	7.67	3.16	9.99	2.43
<i>miR-505-5p</i>	29.65	13.83	2.99	9.92	4.6
<i>miR-125b-1-3p</i>	35.75	48.50	3.68	9.69	13.17
<i>miR-378a-3p</i>	50.56	21.56	5.31	9.52	4.04
<i>mir-6776</i>	5404.70	1710.26	572.05	9.46	2.99
<i>miR-574-3p</i>	41.93	20.11	4.53	9.23	4.43
<i>miR-4701-3p</i>	14.83	5.03	1.64	9.03	3.07
<i>miR-423-3p</i>	57.28	32.22	6.45	8.88	4.98
<i>miR-193b-3p</i>	21.71	10.13	2.45	8.87	4.12
<i>miR-339-5p</i>	15.89	7.78	1.82	8.74	4.29
<i>miR-874-3p</i>	79.89	43.11	9.32	8.54	4.63
<i>miR-130b-3p</i>	24.25	13.36	2.89	8.44	4.63
<i>miR-320a</i>	16.11	7.73	1.96	8.22	3.93
<i>miR-320b</i>	74.54	33.36	9.06	8.2	3.67
<i>miR-502-3p</i>	7696.57	2256.70	942.27	8.17	2.4
<i>miR-1343-3p</i>	192.67	54.95	23.75	8.15	2.31
<i>miR-296-3p</i>	156.50	48.84	19.29	8.12	2.53
<i>miR-106b-3p</i>	19.70	13.36	2.48	7.94	5.4
<i>miR-23b-5p</i>	27.86	18.64	3.58	7.75	5.19
<i>miR-2115-5p</i>	36.25	19.29	4.69	7.7	4.09
<i>miR-1296-5p</i>	44.02	28.64	5.74	7.66	5.01
<i>miR-31-3p</i>	19.03	59.71	2.48	7.66	24.06
<i>miR-491-5p</i>	42.22	27.67	5.54	7.58	4.98
<i>miR-27a-5p</i>	26.17	71.01	3.48	7.56	20.44
<i>miR-99b-3p</i>	18.38	28.05	2.43	7.55	11.56
<i>miR-25-5p</i>	17.15	5.24	2.28	7.51	2.3
<i>miR-339-3p</i>	14.32	3.94	1.92	7.49	2.05

<i>miR-769-3p</i>	24.25	30.48	3.25	7.46	9.42
<i>miR-320c</i>	9877.98	2977.74	1332.57	7.45	2.24
<i>miR-615-5p</i>	26.91	10.93	3.61	7.44	3.02
<i>miR-4298</i>	306.55	135.30	42.22	7.29	3.22
<i>mir-526a-2</i>	48.50	19.70	6.82	7.12	2.89
<i>miR-7847-3p</i>	12.47	4.66	1.75	7.09	2.66
<i>miR-93-5p</i>	103.97	35.51	14.83	7.03	2.4
<i>mir-4449</i>	13.09	12.73	1.85	7.02	6.84
<i>miR-3663-3p</i>	261.38	86.22	37.79	6.89	2.28
<i>mir-711</i>	16.11	8.69	2.35	6.86	3.72
<i>miR-6836-5p</i>	102.54	35.26	15.24	6.74	2.33
<i>miR-7846-3p</i>	14.93	9.92	2.23	6.65	4.41
<i>miR-181c-3p</i>	11993.79	3640.70	1807.78	6.62	2.02
<i>mir-4734</i>	48.50	40.79	7.31	6.62	5.59
<i>miR-3137</i>	24.59	15.78	3.76	6.54	4.19
<i>miR-4776-5p</i>	17.75	9.71	2.71	6.54	3.57
<i>miR-6084</i>	25709.25	12077.21	3983.99	6.49	3.04
<i>miR-1199-5p</i>	28.84	21.11	4.50	6.43	4.69
<i>miR-203a</i>	21.56	9.45	3.36	6.42	2.82
<i>miR-1238-5p</i>	48.50	45.57	7.57	6.4	6.02
<i>miR-4731-5p</i>	14.03	5.24	2.19	6.39	2.39
<i>miR-6856-5p</i>	21.11	8.46	3.29	6.39	2.56
<i>miR-6875-5p</i>	121.10	38.59	18.90	6.37	2.04
<i>mir-4674</i>	16.56	7.84	2.62	6.3	2.97
<i>miR-6076</i>	38.32	122.79	6.11	6.27	20.02
<i>miR-4458</i>	13.93	25.46	2.23	6.25	11.4
<i>miR-6735-5p</i>	14.93	5.21	2.43	6.17	2.15
<i>miR-224-5p</i>	18.00	6.45	2.95	6.13	2.2
<i>miR-4784</i>	12.13	4.38	1.97	6.13	2.22
<i>miR-192-5p</i>	11190.60	4640.29	1820.35	6.12	2.55
<i>miR-4253</i>	18.51	7.16	3.05	6.07	2.35
<i>miR-4725-3p</i>	22.16	14.52	3.66	6.05	3.98
<i>miR-3714</i>	14.62	12.04	2.45	5.98	4.94
<i>miR-8060</i>	13587.57	5914.33	2288.20	5.93	2.59
<i>miR-3194-5p</i>	13682.08	6888.62	2320.15	5.88	2.96
<i>mir-638</i>	8.22	3.53	1.39	5.88	2.53
<i>miR-4486</i>	158.68	66.26	27.28	5.83	2.43
<i>miR-4465</i>	15.78	6.73	2.75	5.74	2.45
<i>miR-183-3p</i>	26.91	81.57	4.69	5.72	17.29
<i>mir-3150a</i>	108.38	41.07	19.56	5.56	2.1
<i>miR-301a-3p</i>	14.83	13.00	2.68	5.52	4.85
<i>mir-3917</i>	14.83	16.00	2.71	5.45	5.89
<i>mir-8072</i>	8.94	4.06	1.64	5.44	2.48
<i>miR-8071</i>	7.67	2.93	1.43	5.35	2.04
<i>miR-6830-5p</i>	55.33	24.59	10.41	5.32	2.37
<i>miR-363-3p</i>	10.06	7.94	1.91	5.29	4.17
<i>miR-3622b-5p</i>	11.96	65.80	2.28	5.24	28.76
<i>miR-3187-3p</i>	14.93	9.00	2.93	5.09	3.08
<i>miR-6759-5p</i>	22.47	15.03	4.44	5.05	3.38
<i>miR-7977</i>	60.13	31.56	12.21	4.91	2.59
<i>miR-6873-5p</i>	14.93	10.48	3.05	4.89	3.42
<i>miR-1236-5p</i>	216.77	110.66	44.94	4.82	2.46
<i>miR-4788</i>	8.63	3.73	1.79	4.82	2.09
<i>miR-6738-5p</i>	13.74	6.28	2.85	4.81	2.2
<i>miR-126-3p</i>	14.32	8.06	2.97	4.81	2.71
<i>miR-5088-5p</i>	18.51	8.00	3.86	4.78	2.07
<i>mir-6790</i>	14.22	48.50	2.99	4.77	16.25
<i>miR-711</i>	29.24	22.16	6.11	4.77	3.62
<i>miR-4638-5p</i>	21.11	11.96	4.44	4.77	2.7
<i>miR-6080</i>	498.00	337.79	104.69	4.75	3.23
<i>miR-6746-3p</i>	11.16	5.70	2.41	4.64	2.38
<i>mir-611</i>	21.71	11.16	4.69	4.6	2.37
<i>miR-3156-5p</i>	17.15	11.00	3.81	4.52	2.9
<i>miR-1909-3p</i>	105.42	48.84	23.43	4.49	2.09
<i>miR-5189-5p</i>	15.56	12.91	3.48	4.47	3.69
<i>miR-4454</i>	47.50	30.06	10.63	4.47	2.83
<i>miR-4498</i>	17.15	30.06	3.86	4.44	7.74
<i>mir-4632</i>	7.67	36.00	1.75	4.38	20.49
<i>miR-6869-5p</i>	84.45	39.95	19.43	4.37	2.05

<i>mir-4787</i>	15.45	16.91	3.53	4.36	4.78
<i>miR-4688</i>	70.03	40.22	16.00	4.35	2.51
<i>miR-628-3p</i>	10.27	5.35	2.41	4.26	2.23
<i>miR-6879-5p</i>	7.11	4.82	1.67	4.26	2.89
<i>miR-7152-3p</i>	174.85	82.71	41.36	4.24	2
<i>miR-4695-3p</i>	23.75	48.17	5.62	4.23	8.61
<i>miR-6782-5p</i>	59.30	51.63	14.03	4.22	3.7
<i>miR-6845-5p</i>	15.14	10.06	3.63	4.15	2.77
<i>miR-584-5p</i>	13969.57	7486.11	3373.43	4.14	2.22
<i>miR-29b-3p</i>	6.41	4.69	1.55	4.13	3.04
<i>miR-4667-5p</i>	45.57	34.30	11.08	4.11	3.1
<i>miR-6777-5p</i>	5595.30	6608.01	1379.57	4.05	4.8
<i>miR-4655-5p</i>	61.39	53.82	15.24	4.04	3.52
<i>miR-8089</i>	232.32	127.12	57.68	4.03	2.2
<i>miR-3622a-5p</i>	6.50	4.89	1.67	3.88	2.92
<i>miR-6795-5p</i>	5.35	2.87	1.39	3.85	2.06
<i>miR-4708-5p</i>	8.11	4.50	2.13	3.81	2.11
<i>miR-3185</i>	6.82	4.17	1.79	3.81	2.33
<i>miR-22-5p</i>	8.69	5.10	2.30	3.79	2.22
<i>miR-4743-5p</i>	6.77	5.82	1.79	3.78	3.24
<i>mir-3960</i>	59.30	32.90	15.89	3.75	2.07
<i>miR-4539</i>	9.58	11.00	2.57	3.74	4.28
<i>miR-4665-3p</i>	42.52	116.16	11.47	3.7	10.08
<i>miR-4481</i>	8.17	7.21	2.23	3.65	3.23
<i>miR-4741</i>	11.24	14.83	3.14	3.58	4.72
<i>miR-4479</i>	12.55	16.80	3.61	3.49	4.68
<i>miR-6784-5p</i>	809.00	929.30	232.32	3.47	3.98
<i>miR-6510-5p</i>	7.78	5.03	2.25	3.47	2.23
<i>miR-6877-5p</i>	7.78	5.50	2.36	3.29	2.33
<i>miR-8085</i>	18.51	20.25	5.66	3.25	3.57
<i>miR-148a-3p</i>	7.11	8.00	2.19	3.25	3.63
<i>miR-6829-5p</i>	7.94	46.53	2.48	3.22	18.85
<i>miR-2392</i>	7.62	9.25	2.38	3.21	3.89
<i>mir-3123</i>	12.21	10.78	3.86	3.17	2.78
<i>miR-6772-5p</i>	7.84	5.66	2.48	3.15	2.28
<i>miR-6887-5p</i>	4.03	3.32	1.29	3.1	2.56
<i>miR-659-3p</i>	5.13	11.08	1.68	3.06	6.58
<i>miR-6848-5p</i>	13.09	9.99	4.35	3	2.3
<i>miR-660-5p</i>	10.93	24.42	3.73	2.94	6.56
<i>miR-4322</i>	5.66	7.62	2.00	2.82	3.79
<i>miR-4665-5p</i>	79.34	73.01	28.25	2.81	2.59
<i>miR-6729-5p</i>	18.51	16.00	6.63	2.79	2.41
<i>miR-6892-5p</i>	4.56	5.50	1.66	2.75	3.3
<i>miR-6125</i>	12.38	12.64	4.53	2.73	2.79
<i>miR-6740-5p</i>	5.21	7.84	1.92	2.72	4.09
<i>miR-665</i>	6.92	7.67	2.55	2.71	3.01
<i>miR-4513</i>	4.35	4.29	1.62	2.68	2.64
<i>miR-638</i>	19.70	188.71	7.41	2.66	25.46
<i>miR-4722-5p</i>	3.58	2.97	1.37	2.61	2.17
<i>miR-4257</i>	8.46	47.50	3.25	2.61	14.7
<i>miR-1304-3p</i>	13.64	11.79	5.24	2.59	2.25
<i>miR-34a-3p</i>	8.17	12.73	3.18	2.56	4
<i>miR-452-5p</i>	8.22	11.88	3.34	2.47	3.56
<i>miR-6737-5p</i>	19.56	16.56	8.06	2.43	2.06
<i>miR-5196-5p</i>	5.98	13.00	2.51	2.39	5.19
<i>miR-6800-3p</i>	3.97	4.00	1.66	2.38	2.4
<i>miR-6796-5p</i>	4.35	3.86	1.85	2.34	2.1
<i>miR-6086</i>	4.35	4.69	1.87	2.34	2.51
<i>miR-5572</i>	109.90	357.05	47.84	2.3	7.46
<i>miR-7106-5p</i>	4.11	7.36	1.84	2.23	4
<i>miR-4787-5p</i>	4.66	4.66	2.10	2.22	2.22
<i>miR-4685-5p</i>	4.69	4.69	2.14	2.2	2.19
<i>miR-4767</i>	17.88	19.97	8.17	2.18	2.44
<i>miR-3197</i>	3.86	3.92	1.77	2.18	2.21
<i>miR-1915-3p</i>	8.69	25.11	4.17	2.08	6.02
<i>miR-3682-3p</i>	12.64	14.22	6.15	2.06	2.31
<i>miR-4690-5p</i>	33.82	33.82	68.12	−2.01	−2.01
<i>miR-3652</i>	50.21	39.95	101.13	−2.02	−2.53
<i>miR-7150</i>	184.82	182.28	385.34	−2.1	−2.12

<i>miR-4442</i>	166.57	141.04	357.05	−2.14	−2.54
<i>mir-3656</i>	2005.85	2105.58	4299.64	−2.15	−2.04
<i>miR-8064</i>	556.41	596.34	1251.98	−2.24	−2.1
<i>miR-6861-5p</i>	1.34	1.49	3.01	−2.25	−2.02
<i>miR-4695-5p</i>	410.15	448.82	935.76	−2.29	−2.09
<i>miR-6833-5p</i>	14.32	10.34	37.27	−2.61	−3.6
<i>miR-8072</i>	2957.17	3691.52	7750.10	−2.63	−2.1
<i>miR-6721-5p</i>	35.02	45.25	93.05	−2.66	−2.06
<i>miR-4708-3p</i>	170.07	182.28	455.09	−2.68	−2.5
<i>miR-6760-5p</i>	60.97	44.02	166.57	−2.73	−3.79
<i>miR-1244</i>	245.57	151.17	694.58	−2.84	−4.59
<i>miR-148b-3p</i>	86.82	124.50	257.78	−2.97	−2.06
<i>miR-6781-5p</i>	76.64	60.97	232.32	−3.03	−3.8
<i>miR-140-5p</i>	4.79	37.27	14.62	−3.04	2.55
<i>miR-6728-5p</i>	61.39	29.86	192.67	−3.14	−6.46
<i>miR-8063</i>	247.28	242.19	786.88	−3.19	−3.26
<i>miR-483-5p</i>	93.70	141.04	298.17	−3.19	−2.13
<i>miR-3147</i>	82.14	97.01	263.20	−3.2	−2.71
<i>miR-3162-5p</i>	4.92	3.84	16.22	−3.3	−4.25
<i>miR-4433-3p</i>	56.89	38.32	188.71	−3.3	−4.91
<i>miR-2861</i>	168.90	249.00	564.18	−3.33	−2.26
<i>mir-5703</i>	3902.01	4359.66	13124.73	−3.36	−3.01
<i>mir-4785</i>	4011.71	4544.80	13587.57	−3.38	−2.99
<i>miR-6726-5p</i>	207.94	263.20	704.28	−3.4	−2.68
<i>miR-5006-5p</i>	34.06	29.24	116.16	−3.41	−3.98
<i>miR-211-3p</i>	238.86	374.81	831.75	−3.48	−2.21
<i>miR-6754-3p</i>	1448.15	1287.18	5113.16	−3.54	−3.97
<i>miR-5739</i>	781.44	781.44	2876.30	−3.7	−3.7
<i>mir-6729</i>	10.06	14.32	37.53	−3.72	−2.63
<i>mir-6869</i>	1606.83	1782.89	5996.90	−3.74	−3.37
<i>miR-7108-5p</i>	6.36	9.58	23.92	−3.75	−2.49
<i>miR-6799-5p</i>	86.82	91.14	326.29	−3.77	−3.57
<i>miR-6790-5p</i>	280.14	224.41	1060.11	−3.77	−4.7
<i>miR-346</i>	53.45	73.52	206.50	−3.88	−2.82
<i>miR-6734-5p</i>	92.41	114.56	359.54	−3.89	−3.14
<i>miR-6132</i>	2538.92	3956.48	9946.68	−3.92	−2.52
<i>miR-933</i>	24.59	40.79	97.01	−3.94	−2.38
<i>miR-1909-5p</i>	186.11	215.27	739.29	−3.96	−3.43
<i>miR-6075</i>	288.01	128.89	1152.06	−3.98	−8.93
<i>miR-885-3p</i>	1964.57	3492.39	8023.41	−4.07	−2.29
<i>miR-4640-5p</i>	2.08	3.07	8.57	−4.13	−2.79
<i>miR-1225-5p</i>	242.19	380.04	1016.93	−4.19	−2.66
<i>miR-6820-5p</i>	28.25	38.59	120.26	−4.28	−3.13
<i>miR-1202</i>	91.77	91.14	401.71	−4.36	−4.4
<i>miR-6794-5p</i>	22.94	22.32	100.43	−4.37	−4.5
<i>miR-6802-5p</i>	22.47	37.79	102.54	−4.56	−2.72
<i>miR-6746-5p</i>	410.15	498.00	1871.53	−4.56	−3.76
<i>miR-6741-5p</i>	109.90	154.34	504.95	−4.6	−3.29
<i>miR-4271</i>	30.70	61.39	142.02	−4.61	−2.31
<i>miR-6797-5p</i>	36.50	34.78	168.90	−4.65	−4.86
<i>miR-4428</i>	57.28	46.53	268.73	−4.7	−5.75
<i>miR-937-5p</i>	14.52	13.83	68.12	−4.71	−4.94
<i>miR-135a-3p</i>	2592.27	4096.00	12330.98	−4.75	−3
<i>miR-6894-5p</i>	284.05	167.73	1360.57	−4.78	−8.14
<i>miR-1587</i>	128.00	171.25	625.99	−4.89	−3.67
<i>miR-6774-5p</i>	765.36	1112.82	3821.70	−4.98	−3.43
<i>miR-943</i>	14.03	26.91	71.01	−5.05	−2.63
<i>miR-3188</i>	12.30	30.27	62.68	−5.07	−2.06
<i>miR-1238-3p</i>	625.99	430.54	3236.01	−5.15	−7.53
<i>miR-4800-3p</i>	143.01	272.48	744.43	−5.21	−2.74
<i>miR-1281</i>	41.93	105.42	219.79	−5.25	−2.09
<i>miR-6780b-5p</i>	29.45	28.84	155.42	−5.26	−5.38
<i>miR-6069</i>	10.48	24.25	56.10	−5.36	−2.31
<i>miR-5001-5p</i>	65.80	69.07	380.04	−5.77	−5.47
<i>miR-6798-5p</i>	17.75	7.26	103.25	−5.82	−14.15
<i>miR-4706</i>	209.38	219.79	1305.15	−6.26	−5.94
<i>miR-6716-5p</i>	6.32	5.21	39.95	−6.35	−7.68
<i>miR-191-3p</i>	105.42	97.01	670.92	−6.38	−6.92
<i>miR-6893-5p</i>	186.11	190.02	1200.98	−6.45	−6.32

<i>miR-920</i>	50.21	107.63	324.03	−6.45	−3
<i>miR-4651</i>	111.43	191.34	754.83	−6.74	−3.94
<i>miR-1224-5p</i>	46.53	51.63	321.80	−6.94	−6.25
<i>miR-3154</i>	31.78	103.97	230.72	−7.24	−2.22
<i>miR-1231</i>	16.91	47.84	131.60	−7.82	−2.77
<i>miR-6813-5p</i>	46.21	45.57	388.02	−8.42	−8.54
<i>miR-5571-5p</i>	10.20	19.16	86.82	−8.53	−4.52
<i>miR-6754-5p</i>	491.14	272.48	4211.15	−8.58	−15.44
<i>miR-557</i>	2.35	4.23	24.08	−10.21	−5.69
<i>miR-4467</i>	652.58	448.82	6936.54	−10.6	−15.39
<i>miR-4430</i>	11.96	29.04	144.01	−12.02	−4.98
<i>miR-642b-3p</i>	56.89	54.95	724.08	−12.73	−13.15
<i>miR-6824-5p</i>	206.50	826.00	2836.70	−13.65	−3.42
<i>miR-6825-5p</i>	4.79	17.88	91.77	−19.12	−5.13
<i>miR-3937</i>	2.95	3.78	60.97	−20.71	−16.19
<i>miR-371b-5p</i>	3.51	6.36	73.01	−20.88	−11.43
<i>miR-572</i>	7.11	45.89	174.85	−24.62	−3.82
<i>miR-6068</i>	23.26	66.26	600.49	−25.78	−9.03

Values shown are median intensities. Those miRNAs that were validated by qRT-PCR are depicted in bold type.

Table S4. List of top 100 differentially expressed genes between 786-O parental (P) and resistant clones c1 and c2. Arranged according to FDR *F-value*.

Gene	Clone#1	Clone#2	Parental	c1/P (Fold)	c2/P(Fold)	<i>p</i> -val
<i>WLS</i>	2091.03	903.89	20.97	99.73	43.11	2.47E-09
<i>CTHRC1</i>	26801.0	79023.8	67.65	396.18	1168.14	1.73E-08
<i>RELN</i>	625.99	317.37	15.14	41.36	20.97	8.57E-08
<i>PQLC2L</i>	474.41	45.57	20.39	23.26	2.23	8.76E-08
<i>KCNIP1</i>	12854.6	2628.46	27.67	464.65	95.01	1.07E-07
<i>ANTXR1</i>	21469.4	11746.6	48.84	439.59	240.52	2.72E-07
<i>APOL2</i>	3848.29	3304.00	41764	−10.85	−12.64	4.91E-07
<i>DKK3</i>	3956.48	5914.33	143.01	27.67	41.36	8.11E-07
<i>EVI2A</i>	156.50	1052.79	17.75	8.82	59.30	9.72E-07
<i>DSC2</i>	501.46	380.04	26.91	18.64	14.12	1.05E-06
<i>PRODH</i>	42.52	41.36	286.03	−6.73	−6.92	1.20E-06
<i>COL12A1</i>	1595.73	205.07	32.90	48.50	6.23	1.20E-06
<i>ENPP3</i>	67.65	64.00	670.92	−9.92	−10.48	1.43E-06
<i>BORCS</i>	22.63	45.25	304.44	−13.45	−6.73	1.59E-06
<i>SEMA5A</i>	149522	81245.4	2628.4	56.89	30.91	1.71E-06
<i>DNAJC1</i>	5996.90	4389.98	64.89	92.41	67.65	2.04E-06
<i>GNG4</i>	222.86	369.65	17.15	13.00	21.56	2.11E-06
<i>CLMP</i>	592.22	1468.37	68.12	8.69	21.56	2.34E-06
<i>HERC5</i>	290.02	296.11	17.88	16.22	16.56	2.57E-06
<i>DMKN</i>	50.56	256.00	20.53	2.46	12.47	2.73E-06
<i>CA12</i>	458.25	2179.83	69272	−151.17	−31.78	2.76E-06
<i>SLC38A5</i>	1924.14	26249.4	108.38	17.75	242.19	3.28E-06
<i>AGA</i>	1360.57	1060.11	292.04	4.66	3.63	4.43E-06
<i>PSG5</i>	102126	2256.70	48.84	2091.03	46.21	4.79E-06
<i>CCDC80</i>	22226.6	27939.1	84.45	263.20	330.84	5.04E-06
<i>SFTA1P</i>	448.82	131.60	36.50	12.30	3.61	5.33E-06
<i>SERPIN2</i>	1807.78	7281.40	430.54	4.20	16.91	5.54E-06
<i>CHRD1</i>	14066.7	65083.3	209.38	67.18	310.83	6.70E-06
<i>COL6A3</i>	7590.61	38165.9	64.45	117.78	592.22	7.17E-06
<i>ST6GL1</i>	102.54	218.27	25.28	4.06	8.63	7.39E-06
<i>VWDE</i>	533.74	512.00	30.27	17.63	16.91	8.87E-06
<i>AAMTS5</i>	4299.64	2272.40	29.24	147.03	77.71	9.11E-06
<i>RRAGD</i>	2896.31	1710.26	24.59	117.78	69.55	9.13E-06
<i>HIF0</i>	280.14	110.66	40.79	6.87	2.71	9.44E-06
<i>NOG</i>	238.86	151.17	21.56	11.08	7.01	9.46E-06
<i>ALPK3</i>	15.45	16.45	51.27	−3.32	−3.12	9.51E-06
<i>MYLK</i>	4482.23	2702.35	317.37	14.12	8.51	9.53E-06
<i>KLF8</i>	109.90	42.22	11.31	9.71	3.73	1.06E-05
<i>AS3MT</i>	20.82	35.75	315.17	−15.14	−8.82	1.11E-05
<i>BARX2</i>	11.79	11.39	47.18	−4.00	−4.14	1.18E-05
<i>TSPAN2</i>	3169.41	744.43	116.16	27.28	6.41	1.21E-05
<i>NPAS2</i>	333.14	501.46	74.03	4.50	6.77	1.22E-05
<i>RNF150</i>	135.30	109.90	10.13	13.36	10.85	1.24E-05
<i>HOXA13</i>	60.97	123.64	26.35	2.31	4.69	1.32E-05
<i>CRYAB</i>	27939.1	1686.71	20.11	1389.16	83.87	1.39E-05
<i>PDE1C</i>	81.01	235.57	32.45	2.50	7.26	1.50E-05
<i>LINC003</i>	39.12	27.10	292.04	−7.46	−10.78	1.51E-05
<i>MOXD1</i>	8135.41	10226.3	568.10	14.32	18.00	1.54E-05
<i>PTCH1</i>	407.31	153.28	64.89	6.28	2.36	1.67E-05
<i>TNS3</i>	4737.79	6122.90	1136.2	4.17	5.39	2.06E-05
<i>Clorf21</i>	7332.05	5556.65	372.22	19.70	14.93	2.53E-05
<i>SAA1</i>	1243.34	98.36	25.63	48.50	3.84	2.73E-05
<i>DZIP1</i>	330.84	250.73	55.33	5.98	4.53	2.80E-05
<i>PTHLH</i>	613.11	292.04	12503	−20.39	−42.81	2.85E-05
<i>CDR1</i>	1734.13	1217.75	37.53	46.21	32.45	2.86E-05
<i>SIX1</i>	230.72	207.94	27.10	8.51	7.67	3.05E-05
<i>ECHDC2</i>	955.43	1105.13	3565.7	−3.73	−3.23	3.74E-05
<i>ITGB3</i>	130.69	158.68	24.25	5.39	6.54	3.90E-05
<i>AJAP1</i>	374.81	112.21	35.75	10.48	3.14	4.05E-05
<i>PLPP3</i>	100.43	367.09	15.14	6.63	24.25	4.15E-05
<i>SLC16A4</i>	58.49	76.64	2048.0	−35.02	−26.72	4.61E-05
<i>TRAM2</i>	15393.1	10960.3	744.43	20.68	14.72	5.11E-05
<i>PPIC</i>	9741.98	5442.30	1722.1	5.66	3.16	5.14E-05
<i>PTPN20</i>	18.64	14.62	101.83	−5.46	−6.96	5.34E-05
<i>PRSS12</i>	184.82	58.49	23.92	7.73	2.45	5.35E-05

<i>PMP22</i>	7281.40	19349.3	749.61	9.71	25.81	5.56E-05
<i>SORT1</i>	3902.01	1552.09	62.68	62.25	24.76	5.76E-05
<i>TRIM22</i>	82.14	53.45	661.68	−8.06	−12.38	5.79E-05
<i>COL6A1</i>	240.52	670.92	49.18	4.89	13.64	5.92E-05
<i>BASP1</i>	4608.24	5712.87	243.88	18.90	23.43	6.45E-05
<i>SHISA9</i>	304.44	229.13	56.89	5.35	4.03	6.61E-05
<i>PTGFR</i>	401.71	588.13	21.26	18.90	27.67	6.79E-05
<i>ST3GAL6</i>	87.43	93.70	32.67	2.68	2.87	6.92E-05
<i>ACSM3</i>	191.34	604.67	12854.	−67.18	−21.26	7.07E-05
<i>CUX1</i>	9216.48	12330.98	81810.5	−8.88	−6.63	7.35E-05
<i>DLG5</i>	68.59	50.21	176.07	−2.57	−3.51	7.67E-05
<i>ADAMTS3</i>	125.37	200.85	31.12	4.03	6.45	7.82E-05
<i>AFAP1L1</i>	45.89	30.48	11.31	4.06	2.69	7.84E-05
<i>PID1</i>	37.53	34.30	10.48	3.58	3.27	7.92E-05
<i>RPS6KA2</i>	393.44	203.66	56.10	7.01	3.63	7.99E-05
<i>DHCR7</i>	5404.70	3541.14	91.14	59.30	38.85	8.12E-05
<i>BET1</i>	1884.54	4640.29	9475.59	−5.03	−2.04	8.38E-05
<i>PVRL1</i>	138.14	73.52	10.27	13.45	7.16	8.42E-05
<i>KCNIP3</i>	467.88	132.51	18.90	24.76	7.01	9.16E-05
<i>PIK3IP1</i>	81.01	65.34	21.11	3.84	3.10	9.22E-05
<i>NID2</i>	1379.57	8364.13	73.01	18.90	114.56	9.45E-05
<i>SEMA6A</i>	630.35	786.88	35857.8	−56.89	−45.57	0.0001
<i>PCSK5</i>	56.10	125.37	1067.48	−19.03	−8.51	0.0001
<i>KMO</i>	133.44	207.94	1408.55	−10.56	−6.77	0.0001
<i>PHKA2</i>	29.24	31.78	290.02	−9.92	−9.13	0.0001
<i>ANXA4</i>	47314.67	30786.28	447026	−9.45	−14.52	0.0001
<i>RPRD1B</i>	401.71	501.46	1509.65	−3.76	−3.01	0.0001
<i>UFSP2</i>	362.04	286.03	86.22	4.20	3.32	0.0001
<i>C1QTNF1</i>	221.32	171.25	49.52	4.47	3.46	0.0001
<i>PANK3</i>	1992.00	1200.98	347.29	5.74	3.46	0.0001
<i>PSG2</i>	230.72	77.71	33.82	6.82	2.30	0.0001
<i>DPYSL2</i>	388.02	477.71	50.91	7.62	9.38	0.0001
<i>HIF1A</i>	365623.6	577715	27939.1	13.09	20.68	0.0001
<i>ZNF318</i>	6427.31	2005.85	357.05	18.00	5.62	0.0001

Table S5. List of top 100 differentially expressed genes between A498 parental (P) and resistant clones c1 and c2. Arranged according to FDR *F-value*.

Gene	Clone#1	Clone#2	Parental	c1/P (Fold)	c2/P(Fold)	<i>p</i> -val
<i>FN1</i>	18.51	19.70	661.68	−35.73	−33.42	3.76×10^{-5}
<i>RHOB</i>	10513.82	14766.09	657.11	16.02	22.45	0.0004
<i>FAR2</i>	1226.22	68.59	190.02	6.47	−2.77	0.002
<i>TINAGL1</i>	670.92	42.81	18.51	36.39	2.32	0.002
<i>HEXA</i>	12416.75	9475.59	143.01	86.76	66.46	0.002
<i>SULT1A4</i>	724.08	433.53	2817.11	−3.89	−6.51	0.0022
<i>CIS</i>	533.74	4513.40	20171.07	−37.8	−4.47	0.0057
<i>SEC14L2</i>	159.79	200.85	962.07	−6.03	−4.81	0.0057
<i>BST2</i>	306.55	240.52	47.50	6.46	5.07	0.0057
<i>GLRXP</i>	47.18	46.53	306.55	−6.48	−6.57	0.0059
<i>ADGRG2</i>	113.77	3213.66	259.57	−2.28	12.39	0.0059
<i>CYR61</i>	25709.25	13216.02	1060.11	24.22	12.5	0.0059
<i>DNAJC15</i>	17.15	17.39	114.56	−6.67	−6.6	0.0078
<i>ANPEP</i>	4770.75	401.71	24491.61	−5.15	−61.07	0.0083
<i>DMKN</i>	1097.50	781.44	75.58	14.51	10.39	0.0083
<i>UBE2L6</i>	7643.41	3666.02	955.43	8	3.84	0.0094
<i>DOK4</i>	526.39	401.71	2256.70	−4.3	−5.65	0.0109
<i>TNSI</i>	28.25	21.71	233.94	−8.29	−10.74	0.011
<i>FAM111A</i>	1458.23	4153.18	151.17	9.64	27.39	0.011
<i>MRPS35</i>	7383.04	1144.10	2628.46	2.81	−2.29	0.0111
<i>MAL2</i>	23331.64	17928.91	1243.34	18.7	14.37	0.0123
<i>plylo</i>	24.42	30.70	199.47	−8.21	−6.52	0.0164
<i>PRKAR2A</i>	16.91	22.32	88.03	−5.2	−3.96	0.0164
<i>NPC2</i>	21027.65	23331.64	4482.23	4.68	5.2	0.0164
<i>ITGB3</i>	7750.10	744.43	1734.13	4.47	−2.34	0.0167
<i>N4BP1</i>	955.43	831.75	2817.11	−2.96	−3.4	0.0168
<i>TMEM139</i>	1251.98	1746.20	149.09	8.42	11.74	0.0168
<i>USH1C</i>	38.59	72.00	484.38	−12.48	−6.72	0.0171
<i>NAMPT</i>	744.43	1370.04	5955.47	−8.05	−4.35	0.0171
<i>PRKD3</i>	80.45	17.63	280.14	−3.48	−15.94	0.0171
<i>FCHSD2</i>	3061.45	4067.71	448.82	6.82	9.1	0.0174
<i>LINC0067</i>	85.04	588.13	1951.00	−22.96	−3.34	0.0191
<i>NEDD4L</i>	2936.74	1499.22	481.04	6.14	3.12	0.0191
<i>ST3GAL6</i>	94.35	83.87	754.83	−8.02	−9.01	0.0196
<i>ARHGAP1</i>	2005.85	6122.90	13873.08	−6.92	−2.26	0.0196
<i>MIR3654</i>	198668.00	177812.4	55108.99	3.61	3.24	0.0196
<i>SNAPC1</i>	24154.43	5007.93	1698.45	14.22	2.95	0.0196
<i>TTC9C</i>	685.02	504.95	146.02	4.7	3.47	0.0222
<i>SLC35F2</i>	1448.15	354.59	159.79	9.03	2.21	0.0223
<i>SERINC5</i>	310.83	541.19	2076.59	−6.69	−3.83	0.0225
<i>ETFB</i>	2876.30	2019.80	9741.98	−3.39	−4.83	0.0225
<i>ANKRD13</i>	1097.50	2105.58	501.46	2.19	4.19	0.0225
<i>PPFIBP1</i>	13493.72	734.19	2759.13	4.89	−3.77	0.0225
<i>GLRX</i>	1234.75	2683.69	29532.18	−23.91	−10.95	0.0232
<i>NOB1</i>	3743.05	3326.99	13307.94	−3.55	−3.98	0.0239
<i>WDR59</i>	729.11	116.16	278.20	2.62	−2.39	0.0239
<i>STX3</i>	3929.15	4737.79	471.14	8.35	10.06	0.0239
<i>SCIN</i>	512.00	11190.60	52.35	9.81	213.89	0.0239
<i>SLFN13</i>	401.71	308.69	32.00	12.55	9.66	0.0239
<i>VPS26B</i>	6208.38	2683.69	1332.57	4.68	2.01	0.0247
<i>PCED1B</i>	86.22	218.27	749.61	−8.71	−3.42	0.0262
<i>NUAK2</i>	6888.62	3125.78	263.20	26.07	11.88	0.0262
<i>ACKR3</i>	317.37	3420.52	21769.19	−68.22	−6.35	0.0285
<i>FGFR2</i>	634.73	1686.71	72.00	8.79	23.46	0.0299
<i>NAMPTP3</i>	2005.85	6888.62	23331.64	−11.63	−3.37	0.0301
<i>MAN1A1</i>	182.28	171.25	885.29	−4.85	−5.17	0.0301
<i>WASF3</i>	222.86	168.90	33.13	6.74	5.1	0.0301
<i>EPB41L2</i>	11268.44	14664.09	1458.23	7.75	10.06	0.0301
<i>DCLK1</i>	265.03	136.24	24.08	11	5.65	0.0301
<i>CNOT1</i>	2574.36	2957.17	10884.59	−4.24	−3.68	0.0323
<i>KAZN</i>	130.69	65.80	20.39	6.38	3.23	0.0323
<i>TPK1</i>	8079.22	26068.14	1060.11	7.62	24.73	0.0338
<i>RP11–24</i>	3169.41	380.04	1176.27	2.69	−3.09	0.0365
<i>AKR1E2</i>	82.14	8.82	30.06	2.72	−3.41	0.0372
<i>RHOD</i>	1296.13	1176.27	240.52	5.37	4.86	0.0387

<i>ZBTB40</i>	243.88	160.90	68.59	3.55	2.34	0.039
<i>CDK10</i>	166.57	163.14	625.99	−3.76	−3.83	0.0407
<i>ARL4C</i>	3902.01	1160.07	11585.24	−2.97	−9.99	0.041
<i>NRP1</i>	2005.85	749.61	6208.38	−3.09	−8.32	0.0434
<i>TNFAIP6</i>	73.52	215.27	1951.00	−26.55	−9.04	0.0443
<i>KYNU</i>	128.89	333.14	1584.71	−12.36	−4.76	0.0444
<i>CLMP</i>	1530.73	274.37	6984.79	−4.56	−25.41	0.0467
<i>ANKRD44</i>	37.01	45.89	218.27	−5.92	−4.78	0.0477
<i>FADS2</i>	998913.34	985161.0	279018.2	3.59	3.53	0.0477
<i>NAE1</i>	922.88	648.07	2610.30	−2.83	−4.04	0.0483
<i>EEF1A2</i>	1820.35	3258.52	826.00	2.2	3.94	0.0483
<i>SC5D</i>	11268.44	3326.99	198.09	57.19	16.83	0.0483
<i>KCNIP1</i>	8659.09	652.58	91.14	94.62	7.13	0.0483
<i>CALML4</i>	165.42	261.38	1112.82	−6.74	−4.28	0.0502
<i>SLC22A18S</i>	263.20	572.05	1770.57	−6.7	−3.09	0.0544
<i>STS</i>	42.81	89.26	18.25	2.35	4.87	0.0544
<i>HNRNPUL</i>	1795.29	2385.37	634.73	2.84	3.77	0.0555
<i>CSRP1</i>	831.75	328.56	97.01	8.58	3.38	0.0555
<i>CLU3</i>	568.10	390.72	2385.37	−4.2	−6.1	0.0565
<i>CLSTN1</i>	1398.83	1871.53	410.15	3.41	4.59	0.0565
<i>CHKA</i>	1314.23	1009.90	128.00	10.2	7.85	0.0565
<i>EZR</i>	87076.75	106463	15716.5	5.58	6.82	0.058
<i>RSPRY1</i>	1418.35	1168.14	7858.29	−5.53	−6.68	0.0585
<i>IL6</i>	13969.57	744.43	198.09	70.63	3.76	0.0586
<i>NQO1</i>	197295.70	256749.1	746612.4	−3.78	−2.9	0.0602
<i>SLX1</i>	369.65	233.94	1097.50	−2.97	−4.69	0.0602
<i>TMSB4X</i>	40622.74	28924.41	5792.62	7.01	4.98	0.0602
<i>PTGIS</i>	65.80	580.04	252.48	−3.84	2.3	0.0606
<i>RTN3</i>	32316.87	56658.31	10660.59	3.03	5.29	0.061
<i>CORO1B</i>	526.39	685.02	222.86	2.36	3.08	0.0636
<i>BAD</i>	213.78	407.31	105.42	2.03	3.88	0.0643
<i>MYO1D</i>	8964.45	6746.86	552.56	16.22	12.22	0.0653
<i>STARD10</i>	776.05	781.44	215.27	3.6	3.63	0.0654
<i>HEBP1</i>	1675.06	2134.97	8364.13	−5	−3.93	0.0674
<i>TRMT112</i>	14462.21	16270.83	3258.52	4.44	5	0.0674

Table S6. List of top 100 differentially expressed genes between Caki-1 parental (P) and resistant clones c1 and c2. Arranged according to FDR *F-value*.

Gene	Clone#1	Clone#2	Parental	c1/P (Fold)	c2/P(Fold)	p-val
CA2	25.28	28.05	4240.45	−168.05	−151.18	2.44×10^{-7}
FGB	8.22	12.21	8719.32	1063.42	−713.71	2.52×10^{-6}
PFKFB3	265.03	53.82	3169.41	−11.93	−58.82	4.02×10^{-6}
TRHDE	25.81	8.57	278.20	−10.77	−32.5	4.26×10^{-6}
COLEC10	1002.93	18053	116502	−115.68	−6.46	1.07×10^{-5}
NR5A2	15.67	25.81	333.14	−21.22	−12.92	1.70×10^{-5}
AOAH	17.03	20.53	471.14	−27.68	−22.99	4.40×10^{-5}
SLC1A1	218.27	73.52	2120.22	−9.71	−28.94	4.40×10^{-5}
SLC34A2	16.45	13.09	2164.77	−131.7	−164.79	4.40×10^{-5}
ZPLD1	62.25	30.48	12077.2	−194.15	−394.76	5.71×10^{-5}
GDA	26.17	16.56	484.38	−18.57	−29.4	6.26×10^{-5}
DCDC2	146.02	162.02	3420.52	−23.5	−21.1	6.46×10^{-5}
ACSM3	41.07	45.25	333.14	−8.09	−7.34	9.92×10^{-5}
HAVCR1P1	643.59	294.07	10884.5	−16.97	−37.03	0.0001
ADD3	194.01	198.09	2194.99	−11.35	−11.11	0.0001
CD24P4	3717.20	1710.2	34397.2	−9.23	−20.07	0.0001
HSPA12A	29.24	51.63	200.85	−6.85	−3.87	0.0001
ADAMTS9	16.91	20.97	362.04	−21.51	−17.25	0.0001
IDH2	1428.22	458.25	6562.36	−4.6	−14.28	0.0001
ARRDC4	442.64	192.67	19.43	22.92	9.96	0.0002
HNF1B	675.59	430.54	11113.30	−16.39	−25.86	0.0002
KCNJ16	67.18	41.64	8248.98	−122.59	−198.35	0.0002
SULF2	1184.45	40.79	184.82	6.41	−4.53	0.0002
LAMA3	709.18	765.36	29328.18	−41.23	−38.33	0.0002
GUCY1B3	148.06	26.72	2005.85	−13.52	−74.79	0.0003
FHL1	38431.46	164.28	436.55	87.93	−2.66	0.0003
TM4SF18	34.06	26.54	451.94	−13.3	−17.14	0.0003
MLK4	48.17	119.43	1618.00	−33.45	−13.47	0.0003
EPCAM	17.63	28.25	873.10	−49.23	−30.74	0.0003
LRRN1	56658.31	401.71	69.07	820.71	5.8	0.0003
SYT14	657.11	1478.8	75.06	8.71	19.61	0.0004
HAVCR1	28526	23170	762300	−26.81	−33.06	0.0004
HBEGF	3666.	424.61	1234.75	2.97	−2.91	0.0004
SLC4A4	39.12	30.91	568.10	−14.49	−18.36	0.0004
AGT	85.63	15.78	427.57	−4.98	−27.07	0.0004
LAMP3	1217.7	7538.8	221.32	5.5	34.13	0.0004
ARHGAP29	3640.7	6746.8	32995.9	−9.05	−4.9	0.0005
ERICH2	372.22	1675	131.60	2.82	12.71	0.0005
SPP1	11036	15286	386470.	−35.17	−25.33	0.0005
PDE1A	367.09	32.45	170.07	2.15	−5.25	0.0005
GUCY1A3	11.31	12.91	230.72	−20.41	−17.97	0.0005
CXXC5	315.17	159.79	1418.35	−4.48	−8.85	0.0006
CIQTNF1	352.14	280.14	50.56	6.95	5.54	0.0006
GNMB	38967	9864	4153.18	9.4	23.86	0.0006
EFHB	12.13	18.51	109.14	−9.04	−5.93	0.0006
MACROD	35.51	24.93	170.07	−4.8	−6.81	0.0006
ANKRD29	137.19	176.07	1398.83	−10.2	−7.98	0.0006
OSTM1	25006	20738	4299.64	5.82	4.84	0.0006
SC5D	25321	68794	1595.73	158.5	43.24	0.0006
NOV	143.01	522.76	31.56	4.53	16.49	0.0006
PDE4D	26.17	224.41	1097.50	−42.13	−4.9	0.0006
KIF12	6.68	9.06	30.48	−4.54	−3.35	0.0007
HGD	49.87	35.02	704.28	−14.17	−20.13	0.0007
PAR6B	3040.30	4124.4	14766.0	−4.88	−3.59	0.0007
RCAN1	8248.98	2998.5	491.14	16.84	6.12	0.0008
MLLT3	349.71	982.29	8023.41	−22.93	−8.12	0.0008
ADGRG1	23010.4	2916.4	82952.6	−3.6	−28.43	0.0008
AMIGO2	47.84	56.10	564.18	−11.83	−10.04	0.0008
PDE5A	2134.97	407.31	31.56	67.79	12.89	0.0008
SCG5	560.28	23.10	122.79	4.58	−5.31	0.0008
UGT2B7	229.13	128.89	2179.83	−9.49	−16.9	0.0009
MOCOS	96.34	2486.6	809.00	−8.36	3.08	0.001

<i>CYTH3</i>	12245.8	8719.3	1226.22	10.02	7.13	0.001
<i>CTPS1</i>	6517.03	23331	2320.15	2.81	10.03	0.001
<i>CRABP1</i>	16.00	14.03	51.63	−3.24	−3.69	0.001
<i>NUPRI</i>	87076.7	13569	26068.1	3.34	5.21	0.001
<i>TBLIXR1</i>	382.68	442.64	4451.27	−11.69	−10.1	0.0011
<i>FUOM</i>	99.73	51.27	342.51	−3.44	−6.68	0.0011
<i>EIF3E</i>	41476.3	52498.	200049	−4.82	−3.8	0.0011
<i>TRPC6</i>	75.06	45.57	272.48	−3.62	−5.94	0.0011
<i>ARMC9</i>	4608.24	3640.0	729.11	6.34	5	0.0011
<i>HMG A2</i>	144.01	149.09	1045.52	−7.23	−6.99	0.0012
<i>SLC17A1</i>	22.63	53.45	398.93	−17.71	−7.47	0.0012
<i>SAMD5</i>	362.04	44.63	19.70	18.34	2.25	0.0012
<i>OR51B5</i>	64.00	99.04	1341.84	−21.04	−13.56	0.0012
<i>CD24</i>	100024	51063.	565826.	−5.66	−11.11	0.0013
<i>ANXA13</i>	15.67	14.42	124.50	−7.96	−8.65	0.0013
<i>MYO1E</i>	2610.30	445.72	5595.30	−2.15	−12.59	0.0013
<i>GGT8P</i>	35.26	19.29	75.06	−2.14	−3.89	0.0013
<i>A-AS1</i>	5480.15	20031	43538.3	−7.93	−2.17	0.0013
<i>KAT6B</i>	955.43	1192.6	3590.58	−3.77	−3.02	0.0013
<i>DSC3</i>	31.78	48.17	261.38	−8.17	−5.41	0.0013
<i>MKRN9P</i>	95950.3	4608.2	28526.2	3.37	−6.2	0.0013
<i>TNIK</i>	43.11	58.49	3492.39	−81.17	−59.9	0.0013
<i>CAMLG</i>	962.07	1562.8	3795.30	−3.93	−2.43	0.0014
<i>PTPN13</i>	1192.69	1710.2	13493.7	−11.35	−7.93	0.0015
<i>AK4</i>	116.97	119.43	897.64	−7.65	−7.5	0.0015
<i>RPL12P12</i>	4482.23	5148.7	18053.6	−4.01	−3.51	0.0015
<i>ANXA4</i>	12854.6	12944.	80684.2	−6.26	−6.24	0.0016
<i>ARHGAP1</i>	2957.17	2936.7	12765.8	−4.3	−4.32	0.0016
<i>VCAM1</i>	1144.10	63743	313911	−273.14	−4.89	0.0016
<i>ANPEP</i>	154.34	24.93	1097.50	−7.1	−44.02	0.0016
<i>PALLD</i>	4640.29	792.35	1595.73	2.91	−2.02	0.0016
<i>CFAP70</i>	128.89	121.94	25.63	5.06	4.76	0.0016
<i>CCL28</i>	304.44	66.72	24.25	12.53	2.75	0.0016
<i>LIMA1</i>	33456.5	45073.	3875.05	8.65	11.58	0.0016
<i>CECR2</i>	8.34	10.85	45.89	−5.5	−4.24	0.0016
<i>DAB2</i>	2149.82	613.11	4389.98	−2.04	−7.18	0.0017
<i>SCG5</i>	439.59	22.63	149.09	2.96	−6.58	0.0017

Table S7. List of significantly enriched KEGG pathways for 786-O cell line.

# Genes (Genes in Pathway)	Description	Genes	p-value
10 (149)	MicroRNAs in cancer	<i>HOXD10 NOTCH2 MMP16 ITGA5 PTGS2 PTEN RECK FSCN1 CDKN1A ITGB3</i>	4.09×10^{-9}
8 (195)	Proteoglycans in cancer	<i>MMP2 HOXD10 ITGA5 RAC1 MSN CDKN1A HIF1A ITGB3</i>	1.61×10^{-5}
10 (515)	Pathways in cancer	<i>MMP2 NOTCH2 LRP6 EPAS1 SP1 RAC1 PTGS2 PTEN CDKN1A HIF1A</i>	3.34×10^{-4}
8 (317)	Human papillomavirus infection	<i>TBPL1 NOTCH2 ITGA5 PTGS2 PTEN PRK CZ CDKN1A ITGB3</i>	5.52×10^{-4}
4 (63)	Mitophagy – animal	<i>SP1 BECN1 BNIP3L HIF1A</i>	4.90×10^{-4}
4 (68)	Renal cell carcinoma	<i>EPAS1 RAC1 CDKN1A HIF1A</i>	6.51×10^{-3}
5 (147)	Breast cancer	<i>NOTCH2 LRP6 SP1 PTEN CDKN1A</i>	9.33×10^{-3}
4 (98)	Choline metabolism in cancer	<i>SP1 WASF3 RAC1 HIF1A</i>	2.50×10^{-3}
5 (183)	Kaposi's sarcoma-associated herpesvirus infection	<i>RAC1 BECN1 PTGS2 CDKN1A HIF1A</i>	2.50×10^{-3}
4 (95)	Endocrine resistance	<i>MMP2 NOTCH2 SP1 CDKN1A</i>	2.20×10^{-3}
6 (348)	PI3K–Akt signaling pathway	<i>ITGA5 RAC1 PTEN CDKN1A BDNF ITGB3</i>	6.70×10^{-3}
4 (133)	Fluid shear stress and atherosclerosis	<i>MMP2 RAC1 PRKCZ ITGB3</i>	7.70×10^{-3}

Table S8. List of significantly enriched KEGG pathways for A498 cell line.

# Genes (Genes in Pathway)	Description	Genes	p-value
2 (87)	Gap junction	EGFR ITPR1	3.00×10^{-3}
2 (88)	GnRH signaling pathway	EGFR ITPR1	3.10×10^{-3}
2 (133)	Estrogen signaling pathway	EGFR ITPR1	7.00×10^{-3}
2 (133)	Apelin signaling pathway	ITPR1 CTGF	7.00×10^{-3}
2 (149)	Proteoglycans in cancer	EGFR ITPR1	8.70×10^{-3}
2 (153)	PI3K-Akt signaling pathway	EGFR ITPR1	9.20×10^{-3}

Table S9. List of significantly enriched KEGG pathways for Caki-1 cell line.

# Genes (Genes in Pathway)	Description	Genes	p-value
5 (133)	Fluid shear stress and atherosclerosis	KLF2 ITGAV ICAM1 CAV1 ITGB3	9.34×10^{-6}
4 (115)	Thyroid hormone signaling pathway	CCND1 ITGAV SLC2A1 ITGB3	2.90×10^{-5}
3 (56)	Viral myocarditis	CCND1 ICAM1 CAV1	1.71×10^{-3}
4 (195)	Proteoglycans in cancer	CCND1 ITGAV CAV1 ITGB3	2.22×10^{-3}
4 (197)	Focal adhesion	CCND1 ITGAV CAV1 ITGB3	2.31×10^{-3}
4 (317)	Human papillomavirus infection	CCND1 IRF1 ITGAV ITGB3	1.40×10^{-3}
3 (133)	Apelin signaling pathway	CCND1 KLF2 CTGF	2.10×10^{-3}
3 (149)	MicroRNAs in cancer	CCND1 DNMT3B ITGB3	2.90×10^{-3}
3 (152)	Hippo signaling pathway	CCND1 CTGF BMP2	3.00×10^{-3}
4 (515)	Pathways in cancer	CCND1 ITGAV BMP2 SLC2A1	8.80×10^{-3}

Table S10. List of primary and secondary antibodies used in the Western Blots. All antibodies were diluted in 5% non-fat dry milk in TBS-T.

Anti-	Cat. No.	Dilution	Manufacturer
HIF-1 α	610958	1:250	BD Transduction Laboratories
HIF-2 α	sc-46691	1:500	Santa Cruz
PD-L1	#13684	1:500	Cell Signaling Technologies
Cyclin D1	ab16663	1:500	Abcam
β -actin	A5441	1:5000	Sigma
α -tubulin	ab52866	1:1000	Abcam
Mouse, IgG-HRP	sc-2005	1:2000	Santa Cruz
Rabbit, IgG-HRP	sc-2357	1:2000	Santa Cruz