

Table S2: The activity and expression of 114 concordant microRNAs

microRNA	Z _{AC} (T/N)	Q _{AC} (T>N)	Q _{AC} (T<N)	Z _{EX} (T/N)	Q _{EX} (T>N)	Q _{EX} (T<N)
hsa-miR-99a	-0.80	8.54E-01	1.00E+00	-4.09	1.00E+00	1.79E-03
hsa-miR-143	-0.44	7.42E-01	1.00E+00	-3.76	1.00E+00	4.99E-03
hsa-let-7b	-1.83	1.00E+00	7.41E-01	-2.79	1.00E+00	3.20E-02
hsa-miR-184	-0.75	8.38E-01	1.00E+00	-2.54	1.00E+00	5.53E-02
hsa-miR-125b	-0.59	7.97E-01	1.00E+00	-2.34	1.00E+00	7.90E-02
hsa-miR-23b	-0.09	6.09E-01	1.00E+00	-2.26	1.00E+00	9.06E-02
hsa-miR-296-5p	-1.81	1.00E+00	7.38E-01	-1.81	1.00E+00	1.81E-01
hsa-miR-483-5p	-4.38	1.00E+00	9.23E-04	-1.72	1.00E+00	1.89E-01
hsa-miR-423-5p	-2.82	1.00E+00	9.46E-02	-1.63	1.00E+00	2.12E-01
hsa-miR-135b	-2.50	1.00E+00	1.90E-01	-1.40	1.00E+00	2.73E-01
hsa-miR-661	-2.88	1.00E+00	9.16E-02	-1.30	1.00E+00	2.94E-01
hsa-miR-525-5p	-1.00	9.04E-01	1.00E+00	-0.96	1.00E+00	4.23E-01
hsa-miR-521	-0.05	5.91E-01	1.00E+00	-0.82	1.00E+00	4.61E-01
hsa-miR-658	-0.44	7.43E-01	1.00E+00	-0.82	1.00E+00	4.62E-01
hsa-miR-324-3p	-0.66	8.13E-01	1.00E+00	-0.75	1.00E+00	4.73E-01
hsa-miR-181c	-0.96	8.96E-01	1.00E+00	-0.74	1.00E+00	4.74E-01
hsa-miR-515-3p	-0.85	8.66E-01	1.00E+00	-0.52	1.00E+00	5.28E-01
hsa-miR-654-5p	-0.44	7.42E-01	1.00E+00	-0.49	1.00E+00	5.40E-01
hsa-miR-551a	-0.50	7.62E-01	1.00E+00	-0.48	1.00E+00	5.39E-01
hsa-miR-337-5p	-0.38	7.23E-01	1.00E+00	-0.32	1.00E+00	5.93E-01
hsa-miR-30a	-0.08	6.03E-01	1.00E+00	-0.29	1.00E+00	6.07E-01
hsa-miR-451	-1.07	9.17E-01	1.00E+00	-0.20	1.00E+00	6.45E-01
hsa-miR-663	-1.80	1.00E+00	7.28E-01	-0.18	1.00E+00	6.47E-01
hsa-miR-492	-0.64	8.10E-01	1.00E+00	-0.12	1.00E+00	6.68E-01
hsa-miR-566	-3.73	1.00E+00	8.64E-03	-0.10	1.00E+00	6.76E-01
hsa-miR-487b	3.47	4.67E-04	1.00E+00	0.02	1.00E+00	7.08E-01
hsa-miR-519e	1.36	1.10E-01	1.00E+00	0.05	1.00E+00	7.21E-01
hsa-miR-506	3.69	2.19E-04	1.00E+00	0.06	1.00E+00	7.22E-01
hsa-miR-635	2.57	7.59E-03	1.00E+00	0.06	1.00E+00	7.20E-01
hsa-miR-223	3.76	1.73E-04	1.00E+00	0.06	1.00E+00	7.16E-01
hsa-miR-548a-5p	1.73	5.45E-02	1.00E+00	0.06	1.00E+00	7.14E-01
hsa-miR-200a	1.93	3.65E-02	1.00E+00	0.08	1.00E+00	7.18E-01
hsa-miR-211	9.91	6.13E-21	1.00E+00	0.08	1.00E+00	7.19E-01
hsa-miR-619	0.31	4.41E-01	1.00E+00	0.09	1.00E+00	7.20E-01
hsa-miR-181a	3.46	4.95E-04	1.00E+00	0.09	1.00E+00	7.19E-01
hsa-miR-503	3.41	5.77E-04	1.00E+00	0.11	1.00E+00	7.24E-01
hsa-miR-431	5.59	4.89E-08	1.00E+00	0.12	1.00E+00	7.26E-01
hsa-miR-185	4.76	2.78E-06	1.00E+00	0.13	1.00E+00	7.28E-01
hsa-miR-409-5p	3.73	1.88E-04	1.00E+00	0.14	1.00E+00	7.33E-01
hsa-miR-190	5.51	7.37E-08	1.00E+00	0.16	1.00E+00	7.38E-01
hsa-miR-518b	2.56	7.85E-03	1.00E+00	0.17	1.00E+00	7.43E-01

hsa-miR-328	1.11	1.65E-01	1.00E+00	0.20	1.00E+00	7.54E-01
hsa-miR-508-5p	1.83	4.45E-02	1.00E+00	0.21	1.00E+00	7.56E-01
hsa-miR-193b	5.18	4.01E-07	1.00E+00	0.21	1.00E+00	7.55E-01
hsa-miR-545	5.44	1.08E-07	1.00E+00	0.22	1.00E+00	7.55E-01
hsa-miR-16	4.02	6.19E-05	1.00E+00	0.23	1.00E+00	7.57E-01
hsa-miR-646	5.38	1.41E-07	1.00E+00	0.26	1.00E+00	7.69E-01
hsa-miR-557	7.20	5.77E-12	1.00E+00	0.30	1.00E+00	7.84E-01
hsa-miR-518d-5p	4.27	2.23E-05	1.00E+00	0.35	1.00E+00	8.04E-01
hsa-miR-15a	2.04	2.83E-02	1.00E+00	0.36	1.00E+00	8.10E-01
hsa-miR-142-5p	3.96	8.02E-05	1.00E+00	0.36	1.00E+00	8.07E-01
hsa-miR-331-5p	6.01	5.73E-09	1.00E+00	0.43	1.00E+00	8.29E-01
hsa-miR-632	7.27	3.82E-12	1.00E+00	0.46	1.00E+00	8.41E-01
hsa-miR-623	8.31	2.47E-15	1.00E+00	0.48	1.00E+00	8.49E-01
hsa-miR-584	2.12	2.35E-02	1.00E+00	0.49	1.00E+00	8.49E-01
hsa-miR-34b	2.53	8.50E-03	1.00E+00	0.52	1.00E+00	8.58E-01
hsa-miR-196b	4.44	1.13E-05	1.00E+00	0.55	1.00E+00	8.65E-01
hsa-miR-629	4.33	1.78E-05	1.00E+00	0.56	1.00E+00	8.69E-01
hsa-miR-200b	5.56	5.86E-08	1.00E+00	0.57	1.00E+00	8.69E-01
hsa-miR-659	7.00	1.54E-11	1.00E+00	0.58	1.00E+00	8.69E-01
hsa-miR-768-3p	3.62	2.81E-04	1.00E+00	0.58	1.00E+00	8.69E-01
hsa-miR-507	6.89	3.09E-11	1.00E+00	0.61	1.00E+00	8.76E-01
hsa-miR-299-3p	5.21	3.37E-07	1.00E+00	0.62	1.00E+00	8.77E-01
hsa-miR-375	6.38	7.66E-10	1.00E+00	0.62	1.00E+00	8.74E-01
hsa-miR-212	3.40	5.87E-04	1.00E+00	0.67	1.00E+00	8.84E-01
hsa-miR-576-5p	3.66	2.42E-04	1.00E+00	0.68	1.00E+00	8.88E-01
hsa-miR-568	6.01	5.74E-09	1.00E+00	0.69	1.00E+00	8.86E-01
hsa-miR-767-3p	4.45	1.08E-05	1.00E+00	0.71	1.00E+00	8.91E-01
hsa-miR-582-5p	4.33	1.81E-05	1.00E+00	0.71	1.00E+00	8.90E-01
hsa-miR-631	0.92	2.17E-01	1.00E+00	0.74	1.00E+00	8.98E-01
hsa-miR-342-5p	0.32	4.35E-01	1.00E+00	0.75	1.00E+00	8.97E-01
hsa-miR-330-5p	4.49	9.19E-06	1.00E+00	0.78	1.00E+00	9.05E-01
hsa-miR-510	7.56	5.52E-13	1.00E+00	0.80	1.00E+00	9.08E-01
hsa-miR-520f	7.12	8.41E-12	1.00E+00	0.81	1.00E+00	9.08E-01
hsa-miR-498	2.60	6.97E-03	1.00E+00	0.87	1.00E+00	9.25E-01
hsa-miR-433	5.05	7.23E-07	1.00E+00	0.87	1.00E+00	9.23E-01
hsa-miR-668	6.45	5.14E-10	1.00E+00	0.88	1.00E+00	9.20E-01
hsa-miR-622	5.41	1.25E-07	1.00E+00	0.93	1.00E+00	9.34E-01
hsa-miR-617	7.04	1.27E-11	1.00E+00	0.97	1.00E+00	9.43E-01
hsa-miR-367	1.74	5.36E-02	1.00E+00	1.00	1.00E+00	9.45E-01
hsa-miR-146b-5p	4.26	2.32E-05	1.00E+00	1.08	1.00E+00	9.61E-01
hsa-miR-146a	6.44	5.07E-10	1.00E+00	1.09	1.00E+00	9.61E-01
hsa-miR-197	3.46	4.91E-04	1.00E+00	1.16	1.00E+00	9.75E-01
hsa-miR-509-5p	1.81	4.67E-02	1.00E+00	1.18	1.00E+00	9.73E-01
hsa-miR-129-5p	5.16	4.25E-07	1.00E+00	1.19	1.00E+00	9.71E-01

hsa-miR-202	5.85	1.30E-08	1.00E+00	1.24	1.00E+00	9.78E-01
hsa-miR-18a	3.09	1.64E-03	1.00E+00	1.24	1.00E+00	9.76E-01
hsa-miR-519d	4.34	1.75E-05	1.00E+00	1.28	1.00E+00	9.79E-01
hsa-miR-17	1.79	4.88E-02	1.00E+00	1.29	1.00E+00	9.78E-01
hsa-miR-612	2.51	8.85E-03	1.00E+00	1.32	1.00E+00	9.81E-01
hsa-miR-198	1.87	4.12E-02	1.00E+00	1.35	1.00E+00	9.84E-01
hsa-miR-96	7.16	7.33E-12	1.00E+00	1.39	1.00E+00	9.87E-01
hsa-miR-20a	5.70	2.79E-08	1.00E+00	1.43	1.00E+00	9.92E-01
hsa-miR-148a	9.59	8.88E-20	1.00E+00	1.45	1.00E+00	9.92E-01
hsa-miR-25	2.49	9.50E-03	1.00E+00	1.46	1.00E+00	9.91E-01
hsa-miR-486-5p	4.04	5.87E-05	1.00E+00	1.48	1.00E+00	9.91E-01
hsa-miR-497	2.01	3.06E-02	1.00E+00	1.48	1.00E+00	9.89E-01
hsa-miR-130b	6.22	1.81E-09	1.00E+00	1.64	9.43E-01	1.00E+00
hsa-miR-636	7.19	6.20E-12	1.00E+00	1.75	8.15E-01	1.00E+00
hsa-miR-488	4.67	4.25E-06	1.00E+00	1.86	6.77E-01	1.00E+00
hsa-miR-769-5p	1.48	8.93E-02	1.00E+00	1.96	5.96E-01	1.00E+00
hsa-miR-339-5p	1.24	1.34E-01	1.00E+00	2.03	5.37E-01	1.00E+00
hsa-miR-613	3.19	1.21E-03	1.00E+00	2.04	5.62E-01	1.00E+00
hsa-miR-485-3p	4.43	1.19E-05	1.00E+00	2.11	5.04E-01	1.00E+00
hsa-miR-512-3p	3.75	1.78E-04	1.00E+00	2.12	5.41E-01	1.00E+00
hsa-miR-596	0.70	2.89E-01	1.00E+00	2.12	5.84E-01	1.00E+00
hsa-miR-412	3.03	2.03E-03	1.00E+00	2.15	5.87E-01	1.00E+00
hsa-miR-425	4.73	3.21E-06	1.00E+00	2.21	6.18E-01	1.00E+00
hsa-miR-618	3.99	7.00E-05	1.00E+00	2.22	6.84E-01	1.00E+00
hsa-miR-32	7.39	1.80E-12	1.00E+00	2.25	7.05E-01	1.00E+00
hsa-miR-370	1.99	3.17E-02	1.00E+00	2.46	4.79E-01	1.00E+00
hsa-miR-554	3.37	6.54E-04	1.00E+00	2.86	1.73E-01	1.00E+00
hsa-miR-182	5.60	4.77E-08	1.00E+00	2.91	1.85E-01	1.00E+00
hsa-miR-93	5.62	4.36E-08	1.00E+00	4.08	9.32E-03	1.00E+00

$Z_{AC}(T/N)$: The Stouffer Z statistics of differential miRNA activity between prostate tumors(T) and normal tissues(N).

$Q_{AC}(T>N)$: q-value (the activity of miRNA in prostate tumors greater than that in normal tissues). Q-value is calculated by B-H method.

$Q_{AC}(T<N)$: q-value (the activity of miRNA in prostate tumors less than that in normal tissues)

$Z_{EX}(T/N)$: The Stouffer Z statistics of differential miRNA expression between prostate tumors(T) and normal tissues(N).

$Q_{EX}(T>N)$: q-value (the expression of miRNA in prostate tumors greater than that in normal tissues).

$Q_{EX}(T<N)$: q-value (the expression of miRNA in prostate tumors less than that in normal tissues)