

## SUPPLEMENTARY TABLE

Supplementary Table 1. Cytokine release and cytotoxicity assay data.

<b>IFN-<math>\gamma</math></b>	<b>Non-transduced T Cell</b>	<b>Con-CAR-T Cell</b>	<b>EGFR-CAR-1 T Cell</b>	<b>EGFR-CAR-2 T Cell</b>	<b>EGFR-CAR-1 T Cell+si-EGFR</b>	<b>EGFR-CAR-2 T Cell+si-EGFR</b>
HS578T	12.7 $\pm$ 1.3	17 $\pm$ 3	1357.3 $\pm$ 94.7	1361 $\pm$ 23	315.3 $\pm$ 14.7	308 $\pm$ 3
MDA-MB-468	19.3 $\pm$ 2.7	14.3 $\pm$ 1.7	1557 $\pm$ 95	1537.3 $\pm$ 40.7	335 $\pm$ 5	320.3 $\pm$ 7.7
MDA-MB-231	18 $\pm$ 3	15.3 $\pm$ 1.7	1054.3 $\pm$ 45.7	1091.7 $\pm$ 43.3	294.7 $\pm$ 9.3	288 $\pm$ 6
MCF7	17.6 $\pm$ 1.4	17.7 $\pm$ 1.3	299 $\pm$ 13	305 $\pm$ 10		
<b>IL-4</b>	<b>Non-transduced T Cell</b>	<b>Con-CAR-T Cell</b>	<b>EGFR-CAR-1 T Cell</b>	<b>EGFR-CAR-2 T Cell</b>	<b>EGFR-CAR-1 T Cell+si-EGFR</b>	<b>EGFR-CAR-2 T Cell+si-EGFR</b>
HS578T	1.7 $\pm$ 0.3	2 $\pm$ 1	90.7 $\pm$ 4.3	87.3 $\pm$ 2.7	16.7 $\pm$ 0.3	15.7 $\pm$ 3.3
MDA-MB-468	1.7 $\pm$ 0.3	1.3 $\pm$ 0.7	90.7 $\pm$ 3.3	88.3 $\pm$ 3.7	14.3 $\pm$ 1.7	15 $\pm$ 2
MDA-MB-231	1.7 $\pm$ 1.3	1.3 $\pm$ 0.7	96.7 $\pm$ 4.3	98 $\pm$ 2	18.3 $\pm$ 1.7	16 $\pm$ 2
MCF7	1.7 $\pm$ 0.3	1.7 $\pm$ 1.3	12 $\pm$ 2	13 $\pm$ 1		
<b>IL-2</b>	<b>Non-transduced T Cell</b>	<b>Con-CAR-T Cell</b>	<b>EGFR-CAR-1 T Cell</b>	<b>EGFR-CAR-2 T Cell</b>	<b>EGFR-CAR-1 T Cell+si-EGFR</b>	<b>EGFR-CAR-2 T Cell+si-EGFR</b>
HS578T	316.3 $\pm$ 3.7	312.7 $\pm$ 9.3	2017.7 $\pm$ 27.3	2022.3 $\pm$ 62.7	739.7 $\pm$ 57.3	696.7 $\pm$ 11.3
MDA-MB-468	363.7 $\pm$ 6.3	359.7 $\pm$ 5.3	2151.7 $\pm$ 52.3	2134 $\pm$ 64	794.3 $\pm$ 34.7	830.3 $\pm$ 5.7
MDA-MB-231	319.7 $\pm$ 6.3	322.3 $\pm$ 5.7	1940 $\pm$ 40	1947 $\pm$ 31	704.3 $\pm$ 10.7	709.7 $\pm$ 5.3
MCF7	319.3 $\pm$ 4.7	318 $\pm$ 3	616.7 $\pm$ 23.3	679.3 $\pm$ 30.7		
<b>E:T(HS578T)</b>	<b>Non-transduced T Cell</b>	<b>Con-CAR-T Cell</b>	<b>EGFR-CAR-1 T Cell</b>	<b>EGFR-CAR-2 T Cell</b>	<b>EGFR-CAR-1 T Cell+si-EGFR</b>	<b>EGFR-CAR-2 T Cell+si-EGFR</b>
5:1	4.62 $\pm$ 0.23	4.64 $\pm$ 0.04	33.84 $\pm$ 1.61	35.03 $\pm$ 1.42	15.34 $\pm$ 0.9	15.52 $\pm$ 0.93
10:1	7.91 $\pm$ 0.21	8.31 $\pm$ 0.1	44.27 $\pm$ 1.85	45.53 $\pm$ 0.32	22.03 $\pm$ 1.38	20.55 $\pm$ 0.68
20:1	13.32 $\pm$ 0.12	13.76 $\pm$ 0.2	52.12 $\pm$ 1.22	51.7 $\pm$ 1.42	25.81 $\pm$ 0.94	25.31 $\pm$ 2.94
<b>E:T (MDA-MB-468)</b>	<b>Non-transduced T Cell</b>	<b>Con-CAR-T Cell</b>	<b>EGFR-CAR-1 T Cell</b>	<b>EGFR-CAR-2 T Cell</b>	<b>EGFR-CAR-1 T Cell+si-EGFR</b>	<b>EGFR-CAR-2 T Cell+si-EGFR</b>
5:1	5.88 $\pm$ 0.13	5.91 $\pm$ 0.3	38.12 $\pm$ 1.66	37.52 $\pm$ 0.93	14.82 $\pm$ 0.95	15.68 $\pm$ 0.56
10:1	9.58 $\pm$ 0.45	9.82 $\pm$ 0.32	51.9 $\pm$ 1.22	49.33 $\pm$ 1.42	19.44 $\pm$ 0.7	19.56 $\pm$ 1.89
20:1	16.06 $\pm$ 0.35	15.46 $\pm$ 0.8	57.78 $\pm$ 2.34	57.72 $\pm$ 1.45	28.31 $\pm$ 1.8	28.48 $\pm$ 2.01
<b>E:T (MDA-MB-231)</b>	<b>Non-transduced T Cell</b>	<b>Con-CAR-T Cell</b>	<b>EGFR-CAR-1 T Cell</b>	<b>EGFR-CAR-2 T Cell</b>	<b>EGFR-CAR-1 T Cell+si-EGFR</b>	<b>EGFR-CAR-2 T Cell+si-EGFR</b>
5:1	3.74 $\pm$ 0.27	4.12 $\pm$ 0.1	31.15 $\pm$ 0.41	31.3 $\pm$ 0.29	13.24 $\pm$ 0.45	13.15 $\pm$ 0.67
10:1	7.31 $\pm$ 0.32	7.69 $\pm$ 0.15	38.48 $\pm$ 1.07	40.49 $\pm$ 0.92	16.57 $\pm$ 2.36	17.04 $\pm$ 0.57
20:1	11.07 $\pm$ 0.38	12.15 $\pm$ 0.26	46.4 $\pm$ 0.72	47.26 $\pm$ 1.56	21.53 $\pm$ 1.64	22.95 $\pm$ 0.92
<b>E:T(MCF7)</b>	<b>Non-transduced T Cell</b>	<b>Con-CAR-T Cell</b>	<b>EGFR-CAR-1 T Cell</b>	<b>EGFR-CAR-2 T Cell</b>		
5:1	3.15 $\pm$ 0.06	3.26 $\pm$ 0.18	7.04 $\pm$ 0.41	6.29 $\pm$ 0.56		
10:1	5.88 $\pm$ 0.24	6.01 $\pm$ 0.2	12.85 $\pm$ 1.83	13.44 $\pm$ 0.67		
20:1	11.37 $\pm$ 1.48	10.86 $\pm$ 1.58	14.5 $\pm$ 1.58	15.82 $\pm$ 0.73		