

**Supplementary Table S2.** Validation study: median daily intakes of energy and carotenoids based on the average of two FFQs and the average of three 24-h recalls; Pearson correlation coefficients between FFQs and 24-h recalls completed by 123 pregnant Chinese women from the TMCHC study

(Medians and interquartile ranges or pearson correlation coefficients)

Carotenoids	Average of two FFQ		Average of three 24HR FFQ/24HR			Pearson correlation coefficients *			<i>P</i> †
	Median	P25,P75	Median	P25,P75	Median (%)	Un-adjusted	Energy-adjusted	Energy-adjusted and de-attenuated	
Energy (kcal)	1735	1478, 1994	1705	1445, 1983	102	0.55	-	-	
a-carotene (mg)	0.243	0.133, 0.587	0.124	0.064, 0.353‡	196	0.33	0.28	0.33	0.002
β-carotene (mg)	2.456	1.704, 3.217	1.827	1.096, 2.555	155	0.38	0.32	0.37	<0.001
β-cryptoxanthin (mg)	0.205	0.104, 0.356	0.139	0.026, 0.374	152	0.38	0.34	0.41	<0.001
Lycopene (mg)	1.941	1.068, 4.526	1.467	0.012, 3.703	132	0.48	0.42	0.45	<0.001
Lutein/zeaxanthin (mg)	1.963	1.311, 2.868	1.613	0.701, 2.750‡	140	0.38	0.35	0.40	<0.001

\* Values were based on log-transformation.

† *P* value of energy adjusted Pearson correlation coefficients between average intakes of two FFQs and three 24-h recalls.

‡ *P*<0.05, compared with average intakes estimated by two FFQ using Wilcoxon's signed rank test.