

**Supplementary Table 1. Association between Inflammation Proteins Tested from a High Sensitivity Cytokine Panel and Gallstone risk, Shanghai, China, 1997 - 2001.**

Inflammation Proteins and Category	No. of Cases	No. of Controls	Age- and Sex- Adjusted		Multivariable- Adjusted ORs (95% CIs) <sup>b</sup>
			ORs (95% CIs) <sup>a</sup>		
<b>IL-1β</b>					
Q1	19	38	reference		reference
Q2	42	37	2.3 (1.1, 4.8)		3.2 (1.4, 7.7)
Q3	28	39	1.3 (0.6, 2.7)		1.4 (0.6, 3.5)
Q4	61	35	3.1 (1.6, 6.4)		3.2 (1.4, 7.9)
P trend <sup>c</sup>			0.010		0.058
<b>IL-4</b>					
Q1	22	38	reference		reference
Q2	43	37	1.9 (0.9, 3.8)		2.1 (0.9, 4.9)
Q3	27	37	1.1 (0.5, 2.4)		1.1 (0.4, 2.8)
Q4	58	37	2.4 (1.2, 4.8)		2.6 (1.1, 6.2)
P trend <sup>c</sup>			0.046		0.083
<b>IL-7</b>					
Q1	22	38	reference		reference
Q2	29	37	1.4 (0.7, 3.0)		1.71 (0.7, 4.1)
Q3	38	37	1.8 (0.9, 3.7)		1.91 (0.8, 4.4)
Q4	61	37	2.8 (1.4, 5.6)		2.50 (1.1, 5.6)
P trend <sup>c</sup>			0.002		0.027
<b>IL-8</b>					
Q1	26	39	reference		reference
Q2	31	36	1.3 (0.6, 2.6)		1.7 (0.7, 3.9)
Q3	49	37	2.1 (1.1, 4.1)		2.3 (1.0, 5.2)
Q4	44	37	1.9 (0.9, 3.7)		2.4 (1.0, 5.5)
P trend <sup>c</sup>			0.036		0.033
<b>IL-17a</b>					
Q1	30	38	reference		reference
Q2	29	38	0.9 (0.4, 1.7)		1.2 (0.5, 2.7)
Q3	32	36	1.0 (0.5, 2.0)		1.1 (0.5, 2.6)

<b>Q4</b>	59	37	1.7 (0.9, 3.3)	1.7 (0.8, 3.7)
<i>P</i> trend <sup>c</sup>			0.076	0.183
<b>IL-23</b>				
Q1	25	39	reference	reference
Q2	23	36	1.0 (0.5, 2.0)	1.0 (0.4, 2.3)
Q3	45	37	1.8 (0.9, 3.5)	1.8 (0.8, 4.0)
Q4	57	37	2.2 (1.2, 4.4)	1.3 (0.6, 2.8)
<i>P</i> trend <sup>c</sup>			0.004	0.327
<b>CCL3</b>				
Q1	25	38	reference	reference
Q2	26	37	1.0 (0.5, 2.2)	1.0 (0.4, 2.3)
Q3	60	37	2.3 (1.2, 4.4)	2.1 (1.0, 4.5)
Q4	39	37	1.6 (0.8, 3.2)	1.2 (0.5, 2.8)
<i>P</i> trend <sup>c</sup>			0.047	0.266
<b>CCL20</b>				
Q1	41	38	reference	reference
Q2	43	37	1.0 (0.5, 1.9)	1.2 (0.5, 2.5)
Q3	35	37	0.8 (0.4, 1.6)	0.6 (0.3, 1.3)
Q4	31	37	0.7 (0.4, 1.4)	0.7 (0.3, 1.5)
<i>P</i> trend <sup>c</sup>			0.293	0.183
<b>GM-CSF</b>				
Q1	42	38	reference	reference
Q2	38	37	0.9 (0.5, 1.7)	0.6 (0.3, 1.3)
Q3	34	37	0.7 (0.4, 1.4)	0.7 (0.3, 1.6)
Q4	36	37	0.8 (0.4, 1.5)	0.5 (0.2, 1.0)
<i>P</i> trend <sup>c</sup>			0.399	0.112

Abbreviations: CCL, CC-Chemokine Ligand; CI, confidence interval; GM-CSF, Granulocyte macrophage-colony stimulating factor; IL: interleukin; Q, quartile; OR, odds ratio

a Adjusted for age and sex.

b Adjusted for age, sex, body mass index, education level, smoking, alcohol drinking, self-reported history of diabetes, and history of cholecystitis.

c Two-sided *P* values for trend across protein categories were assessed with the Wald test using categorical values of the proteins with 1 degree of freedom.

**Supplementary Table 2. Odds ratios (ORs) and 95% confidence intervals (CIs) of gallstones associated with inflammation proteins**

Inflammation Proteins	Sex			BMI			Diabetes		
	Women	Men	P heterogeneity	Underweight or Normal	Overweight or Obese	P heterogeneity	No	Yes	P heterogeneity
<b>IL-6</b>	1.5 (1.1, 1.9)	1.6 (1.1, 2.4)	0.541	1.6 (1.2, 2.0)	1.4 (0.9, 2.1)	0.669	1.5 (1.2, 1.9)	1.2 (0.6, 2.6)	0.56
<b>IL-10</b>	1.4 (1.1, 1.9)	1.6 (1.1, 2.3)	0.731	1.5 (1.2, 1.9)	1.3 (0.8, 2.0)	0.649	1.5 (1.2, 1.9)	1.2 (0.6, 2.3)	0.491
<b>IL-12 (p70)</b>	1.6 (1.2, 2.1)	1.8 (1.2, 2.6)	0.723	1.7 (1.3, 2.2)	1.4 (0.9, 2.1)	0.376	1.8 (1.4, 2.3)	1.1 (0.5, 2.2)	0.113
<b>IL-13</b>	1.3 (1.0, 1.7)	1.8 (1.2, 2.7)	0.338	1.5 (1.1, 1.9)	1.4 (0.9, 2.2)	0.941	1.6 (1.2, 2.0)	1.1 (0.5, 2.4)	0.397

Ordinal ORs reflecting the linear change per category were estimated based on unconditional logistic regression models, adjusting for age and sex. P value from two-sided likelihood ratio test for heterogeneity of ORs across subgroups of participants.