

64 **Supplementary Table S6.** Canonical correlation analysis relating gastric, cecal, and colonic short-chain
 65 fatty acids with the expression of tight- and adherens-junction proteins in duodenum, cecum and colon
 66 on experimental days 50 and 51 (n = 24).

	Correlated data sets	Canonical function	Canonical correlation	Approximate F value	p-Values
Short-chain fatty acids ¹⁾ with relative gene expression of tight-and adherens-junction proteins ²⁾	Stomach	1	0.802	1.68	0.062
		2	0.746	1.26	0.270
		3	0.424	0.45	0.878
		4	0.129	0.10	0.961
	Cecum	1	0.854	1.54	0.090
		2	0.800	1.11	0.378
		3	0.511	0.45	0.924
		4	0.228	0.17	0.972
	Colon	1	0.862	1.83	0.030
		2	0.722	1.43	0.166
		3	0.642	1.40	0.224
		4	0.579	1.51	0.244

67 ¹⁾Short.-chain fatty acids ($\mu\text{mol/g}$) include the data for acetate, propionate, isobutyrate, butyrate,
 68 isovalerate, valerate, caproate, heptanoate and total short-chain fatty acids.

69 ²⁾The relative gene expression of tight- and adherens-junction proteins include the data for claudin-4,
 70 occludin, zonula occludens-1 and cadherin-1.