

Supplemental Table 1 Summary of intensity values of biomarkers detected in negative ESI mode in rat plasma

Groups	Peak intensity (mean \pm SD, n = 11)				
	Arachidonic acid	LysoPE(16:0/0:0)	P-cresol	Isorhamnetin	Quercetin-3-glucuronide
C	146.51 \pm 16.23	48.37 \pm 10.77	3.88 \pm 1.74	0	0
D	97.56 \pm 15.20**	77.24 \pm 14.67**	9.35 \pm 2.49**	0	0
D+Q1	113.19 \pm 20.57**	74.85 \pm 9.48**	8.96 \pm 2.56**	1.65 \pm 1.02***	3.19 \pm 1.79***
D+Q2	118.13 \pm 32.48**	71.08 \pm 14.97**	8.68 \pm 3.83**	1.91 \pm 1.19***	3.47 \pm 2.05***
D+Q3	120.77 \pm 18.51*#	63.90 \pm 14.89*#	6.51 \pm 2.26*#	2.28 \pm 1.13***	3.87 \pm 1.72***
Q1	146.71 \pm 22.90	48.80 \pm 10.08	3.87 \pm 1.82	1.76 \pm 1.01**	3.09 \pm 1.51**
Q2	146.42 \pm 18.51	48.32 \pm 12.31	3.88 \pm 1.77	2.11 \pm 1.07**	3.39 \pm 2.35**
Q3	146.71 \pm 24.79	48.71 \pm 15.24	3.88 \pm 1.82	2.34 \pm 1.10**	3.93 \pm 1.48**

Note: C, control group; D, DDVP-treated group; DQ1, low-dose quercetin plus DDVP-treated group; DQ2, middle-dose quercetin plus DDVP-treated group; DQ3, high-dose quercetin plus DDVP-treated group; Q1, low-dose quercetin-treated group; Q2, middle-dose quercetin-treated group; Q3, high-dose quercetin-treated group. Values expressed as mean \pm SD(n=11). *Significantly different from control rats at $P < 0.05$ (ANOVA), **Significantly different from control rats at $P < 0.01$ (ANOVA), #Significantly different from DDVP rats at $P < 0.05$ (ANOVA), ##Significantly different from DDVP rats at $P < 0.01$ (ANOVA).

Supplemental Table 2 Summary of intensity values of biomarkers detected in positive ESI mode in rat plasma

Groups	Peak intensity (mean \pm SD, n = 11)					
	LysoPC(16:0/0:0)	LysoPC(0:0/18:0)	LysoPC(15:0/0:0)	Sphingosine	C16 Sphinganine	Tryptophan
C	84.55 \pm 0.83	352.51 \pm 28.38	74.25 \pm 1.16	153.07 \pm 19.42	6.23 \pm 1.30	20.02 \pm 5.62
D	86.17 \pm 0.67**	404.98 \pm 14.41**	77.10 \pm 1.32**	113.13 \pm 13.44**	3.16 \pm 0.99**	28.94 \pm 3.47**
D+Q1	85.78 \pm 0.71**	400.23 \pm 28.31**	76.89 \pm 1.73**	124.60 \pm 16.55**	3.04 \pm 1.42**	25.39 \pm 3.91**
D+Q2	85.65 \pm 0.66**	396.65 \pm 10.50**	76.82 \pm 1.36**	127.40 \pm 28.19**	3.40 \pm 1.62**	25.12 \pm 2.56**
D+Q3	85.36 \pm 0.84*#	376.84 \pm 14.79*#	75.63 \pm 1.55*#	134.05 \pm 11.96*#	4.77 \pm 1.41*#	24.53 \pm 4.11*#
Q1	84.54 \pm 0.81	353.89 \pm 26.60	74.35 \pm 1.09	152.92 \pm 15.06	6.21 \pm 1.58	20.50 \pm 3.41
Q2	84.74 \pm 0.47	354.55 \pm 23.61	74.29 \pm 0.82	153.01 \pm 19.49	6.24 \pm 1.75	20.16 \pm 3.51
Q3	84.59 \pm 0.57	352.54 \pm 24.39	74.43 \pm 1.14	153.03 \pm 12.27	6.23 \pm 0.87	20.21 \pm 3.71

Note: C, control group; D, DDVP-treated group; DQ1, low-dose quercetin plus DDVP-treated group; DQ2, middle-dose quercetin plus DDVP-treated group; DQ3, high-dose quercetin plus DDVP-treated group; Q1, low-dose quercetin-treated group; Q2, middle-dose quercetin-treated group; Q3, high-dose quercetin-treated group. Values expressed as mean \pm SD(n=11) *Significantly different from control rats at P < 0.05(ANOVA), **Significantly different from control rats at P < 0.01(ANOVA), #Significantly different from DDVP rats at P < 0.05(ANOVA), ##Significantly different from DDVP rats at P < 0.01(ANOVA).