

Table S1 - The correlations between expression pattern and sequence structural parameters for *Arabidopsis* and rice genes.

Parameters	Arabidopsis			Rice		
	<i>Exp_{tot}</i>	<i>Exp_{avg}</i>	<i>Width</i>	<i>Exp_{tot}</i>	<i>Exp_{avg}</i>	<i>Width</i>
Length of primary transcript	0.187	-0.091	0.288	0.139	0.134	0.234
		-0.228	0.286		-0.100	0.216
Length of CDS	-0.027	-0.184	0.048	-0.064	-0.071	0.012*
		-0.203	0.090		-0.136	0.116
Average exon length	-0.142	-0.065	-0.184	-0.188	-0.167	-0.220
		0.038***	-0.215		-0.0005*	-0.157
Average intron length	0.205	0.071	0.251	0.161	0.165	0.222
		-0.054	0.225		-0.033***	0.157
Number of introns	0.221	-0.002*	0.303	0.272	0.260	0.343
		-0.151	0.282		-0.032***	0.228
Intron density	0.266	0.102	0.321	0.317	0.307	0.360
		-0.058	0.286		0.027***	0.194
Total intron length	0.243	0.016*	0.333	0.259	0.254	0.343
		-0.158	0.320		-0.046	0.240
5' UTR length	0.472	0.146	0.507	0.112	0.113	0.184
		-0.052	0.331		-0.048	0.153
3' UTR length	0.473	0.145	0.509	0.217	0.199	0.260
		-0.055	0.336		-0.003*	0.165
5' intergenic length	-0.078	-0.022**	-0.124	0.009*	-0.011*	-0.013**
		0.066	-0.167		0.038***	-0.039***
3' intergenic length	-0.129	-0.011*	-0.167	-0.099	-0.089	-0.120
		0.062	-0.142		0.012*	-0.078

For each structural parameter, the first line shows Spearman's rank sum correlation coefficients with expression pattern, while the second line shows Spearman's partial correlations. Controlled variable for the columns of *Exp_{avg}* is expression width and that for the columns of *Width* is average expression level. Intron density was defined as the ratio of intron number to coding sequence length, i.e. the number of introns per coding base for each gene. *Exp_{tot}*, total expression level; *Exp_{avg}*, average expression level; *Width*, expression breadth. CDS, Coding Sequence; UTR, Untranslated Region. Level of significance: *, $P > 0.05$; **, $0.001 < P < 0.05$; ***, $1e - 10 < P < 1e - 3$; No asterisks indicates $P < 1e - 10$. Numbers in bold indicate highly significant partial correlations ($P < 1e - 10$).