Table S3. Regulated and annotated information of differentially expressed genes (DEGs) related to *Bradysia odoriphaga* development

Unigene	3th vs 4th		4th vs Pupa		3th vs Pupa	
ID	log2FC	Regulated	log2FC	Regulated	log2FC	Regulated
c4843	-5.17	down			-5.97	down
c23897	-7.09	down			-6.85	down
c33601	3.39	up				
c10244			2.86	up	2.55	up
c20752			4.11	up	4.64	up
c23801			3.58	up	3.46	up
c26961			2.26	up	2.90	up
c27681			3.31	up	3.54	up
c28314			2.65	up	3.52	up
c28746			3.09	up	3.07	up
c30336			3.46	up	3.43	up
c30501			3.78	up	4.65	up
c30850			2.52	up	2.54	up
c31327			2.64	up	3.05	up
c4206					-4.35	down
c15127					2.18	up
c22888					4.02	up
c22990					2.50	up
c24932					-3.75	down
c29289					3.49	up

3rd vs 4th: the comparison of third-instar and fourth-instar *B. odoriphaga*; 4th vs Pupa: the comparison of fourth-instar and pupal insects; 3rd vs Pupa: the comparison of third-instar and pupal insects; The "up" or "down" indicates the gene of latter one up-regulated or down-regulated compared with the former one. For example, "down" in "3rd vs 4th" indicates down-regulated in fourth-instar compared with third-instar stage.