Supporting information

Environmental adaptability for quorum sensing: regulating iron uptake during biofilm formation in *Paracoccus denitrificans*

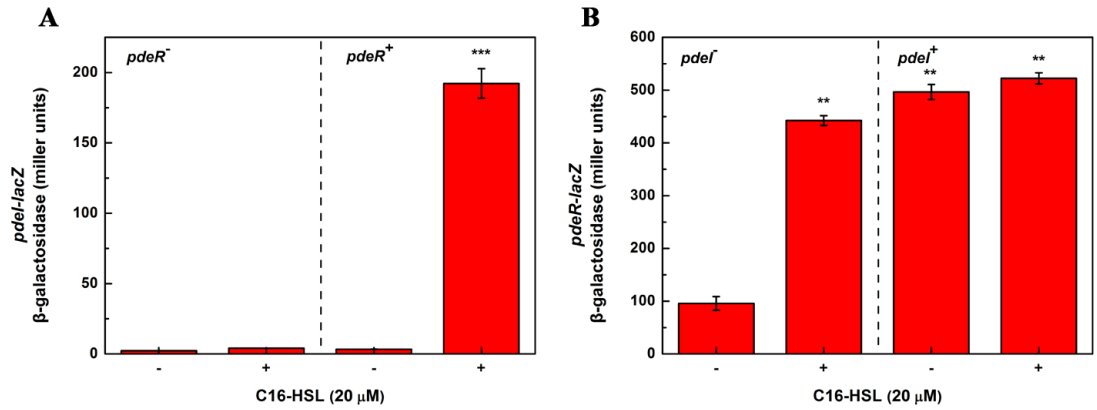

FIG. S1 Expression of *pdeR* and *pdeI* is AHL dependent. (A) *pdeI-lacZ* expression in the wild type and the *pdeR* mutant background. (B) *pdeR-lacZ* expression in the wild type and the *pdeI* mutant background. These strains were grown in the presence or absence of 20 μM C16-HSL in LB medium for 24 h at 37°C. β-galactosidase activity assays were performed as described previously, and data are presented as miller units. The results are representative of triplicate experiments. Error bars indicate standard deviations.

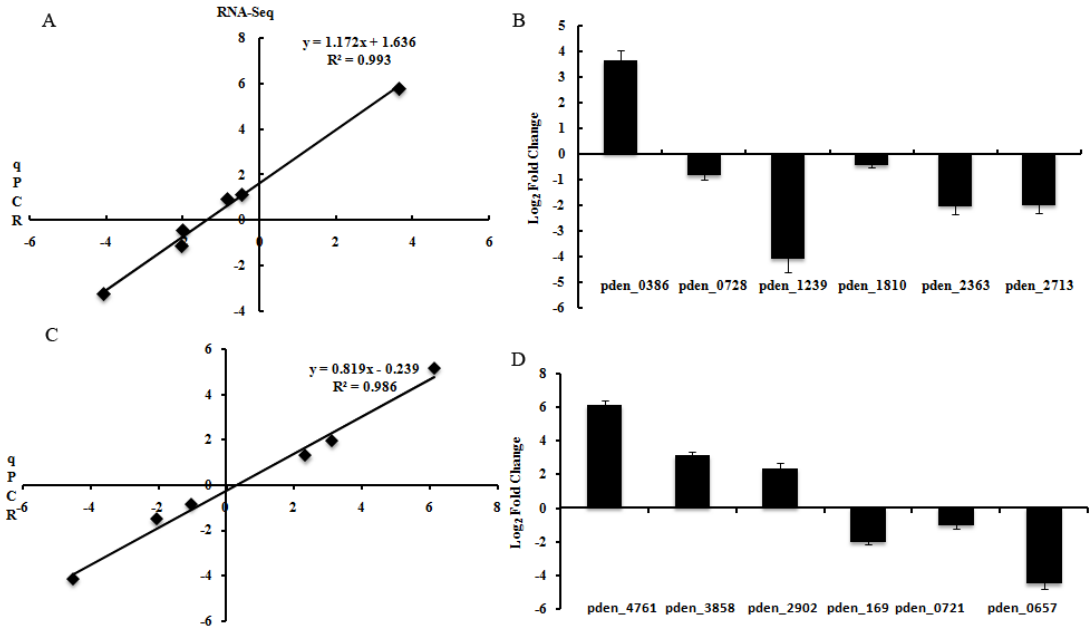

Fig. S2 Validation of RNA-Seq data by RT-qPCR. The $\log_2$ Fold Change of each gene from qPCR was compared with the $\log_2$ Fold Change of the RNA-Seq data. A, Correlation of the fold changes between RNA-Seq (x-axis) and qPCR (y-axis) in the DEGs relative to *pdeI* mutant. B, Log_2 Fold Change of genes in *pdeI* mutant measured by qPCR. C, Correlation of the fold changes between RNA-Seq (x-axis) and qPCR (y-axis) in the DEGs relative to *pdeR* mutant. D, Log_2 Fold Change in *pdeR* mutant measured by qPCR.

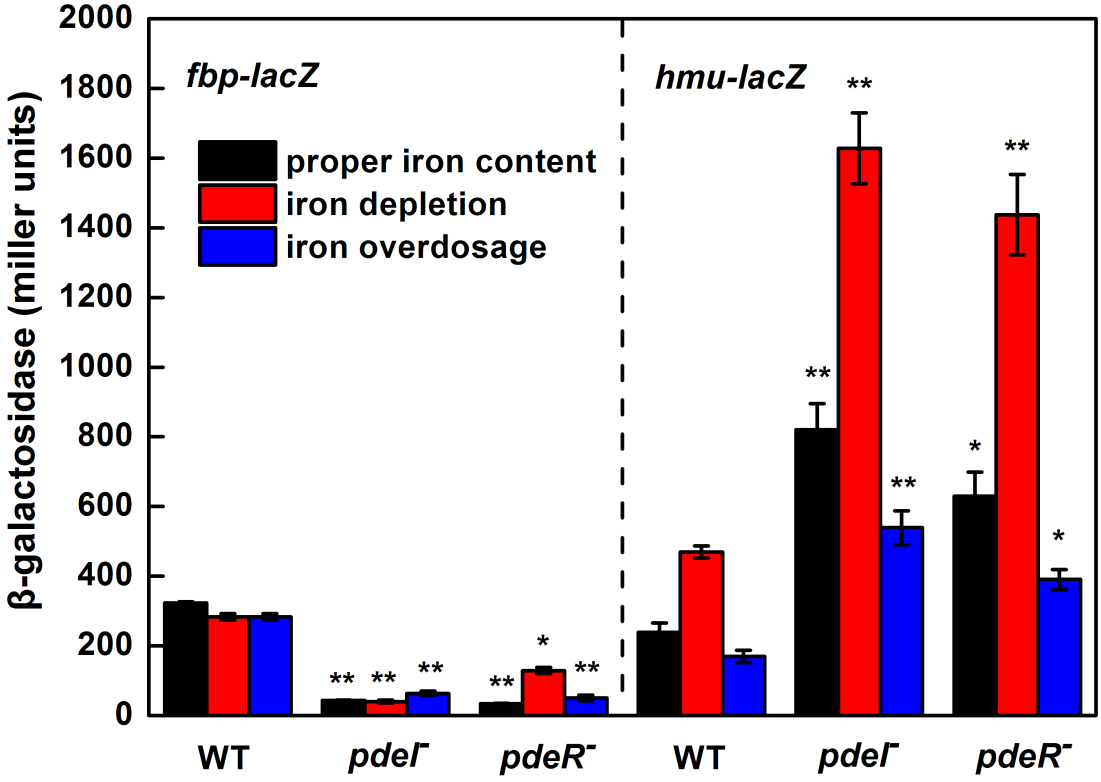

Fig. S3 Effects of available iron concentration on QS-dependent iron uptake systems.