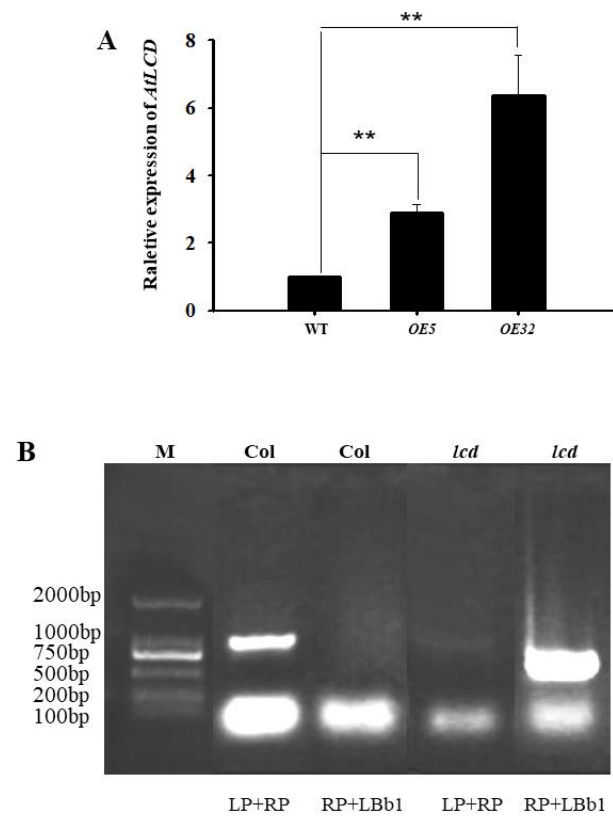
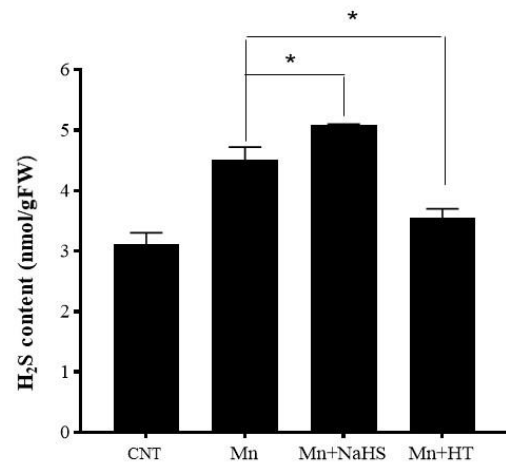


Supplementary Materials:



**Figure S1. Identification of *lcd* mutant and *AtLCD* overexpressing lines.** *AtLCD* relative expression in overexpressing lines (14 d- whole seedling of T3 generation lines) by qRT-PCR (A); Identification of *lcd* T-DNA-inserted mutant by PCR (B). Three independent experimental replications were conducted. Values are the means  $\pm$  SE of three independent experiments (\*\* $P < 0.01$ ).



**Figure S2. Effects of NaHS and HT on the content of H<sub>2</sub>S in wild-type *Arabidopsis* seedlings under Mn stress.** Three independent experimental replications were conducted. Values are the means  $\pm$  SE of three independent experiments (\* $P < 0.05$ ).