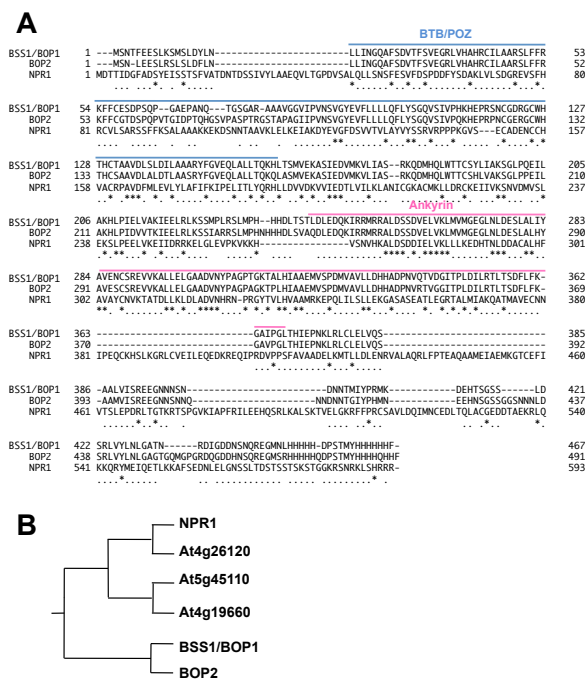


Supplemental Figure 1. The phenotype of *bss1-1D* resembles the phenotype of BR-deficient mutants.

(A-C) Wild-type (WT) *Arabidopsis*, the *bss1-1D* mutant and BR biosynthesis (*det2*) and signaling (*bri1*, *bin2*) mutants were grown in the soil in long-day conditions for 35 days.

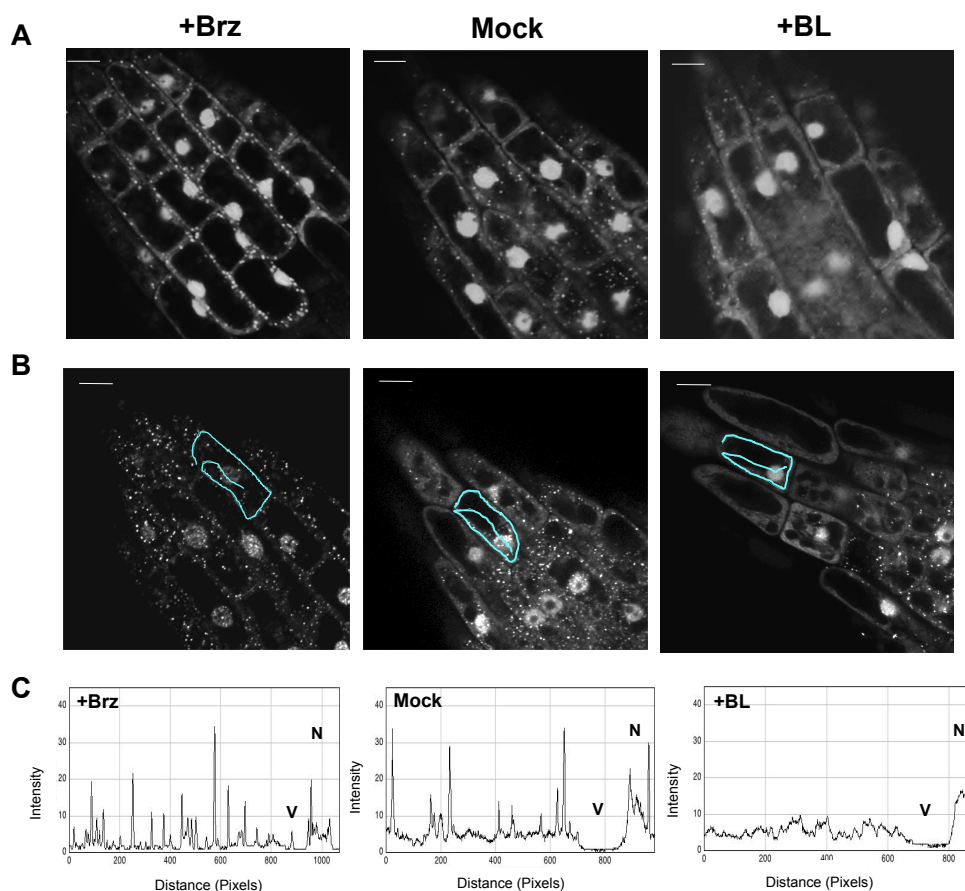
(D-E) WT *Arabidopsis* and the *det2*, *bin2-1* and *bss1-1D* mutants were grown on medium containing 3 μ M Brz (D) and without Brz (E) in the dark for 7 days. Scale bar, 1 mm.



Supplemental Figure 2. BSS1 protein encoded by the BOP1 gene.

(A) Multiple sequence alignment of the BSS1/BOP1, BOP2 and NPR1 proteins. The alignment was obtained using the COBALT program (Papadopoulos and Agarwala 2007). The BTB/POZ domain and ankyrin repeat region are indicated with blue and pink lines, respectively.

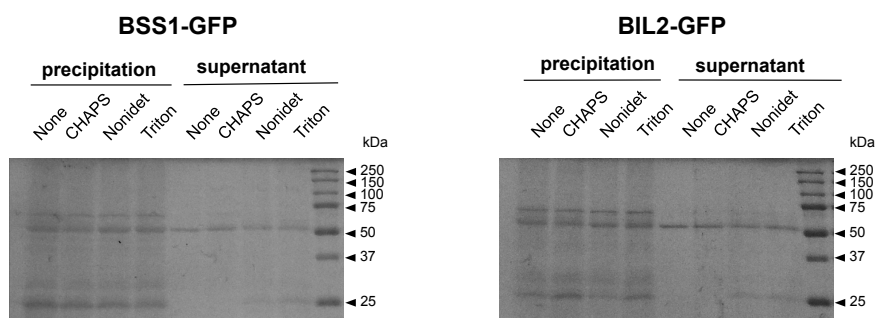
(B) Phylogenetic tree for BSS1/BOP1 and homologs.



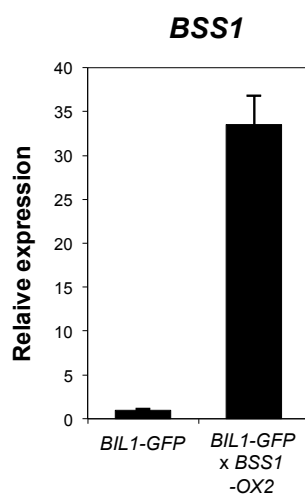
Supplemental Figure 3. Analysis of BSS1/BOP1-GFP signal intensities

(A-B) The root cells of four-day-old BSS1/BOP1-GFP transgenic seedlings were treated with 3 μ M Brz (+Brz), the same amount of DMSO as mock treatment (Mock) or 100 μ M BL (+BL) for 15 minutes (A) and 3 h (B). Scale bar, 10 μ m. Blue lines show the point of analysis of signal intensity in the nucleus, cytoplasm and vacuole by ImageJ software.

(C) GFP fluorescence intensity profiles for the cytosol, vacuole (V) and nucleus (N) from the images shown in (B). An image of BSS1/BOP1-GFP in 4-day-old seedlings treated with 3 μ M Brz (+Brz), DMSO (Mock) or 100 nM BL (+BL) for 3 h. The plot profiles were made using ImageJ software (<http://rsb.info.nih.gov/ij/>).



Supplemental Figure 4. Loading control for Figure 6E. Same amount of proteins as in Figure 6E were separated in SDS-PAGE gels and stained with Coomassie Brilliant Blue.



Supplemental Figure 5. Analysis of *BSS1/BOP1* expression in *BIL1-GFP-OX* and *BIL1-GFP* and *BSS1/BOP1-OX* used in the observations and measurements shown in Figure 9.

Quantitative RT-PCR analysis of the expression levels of *BSS1/BOP1* in light-grown *BIL1-GFP-OX* and *BIL1-GFP* and *BSS1/BOP1-OX2* used in Figure 9. The results are presented as the mean \pm s.d. from 4 independent experiments. For qRT-PCR analysis, *ACT2* was used as the internal control.