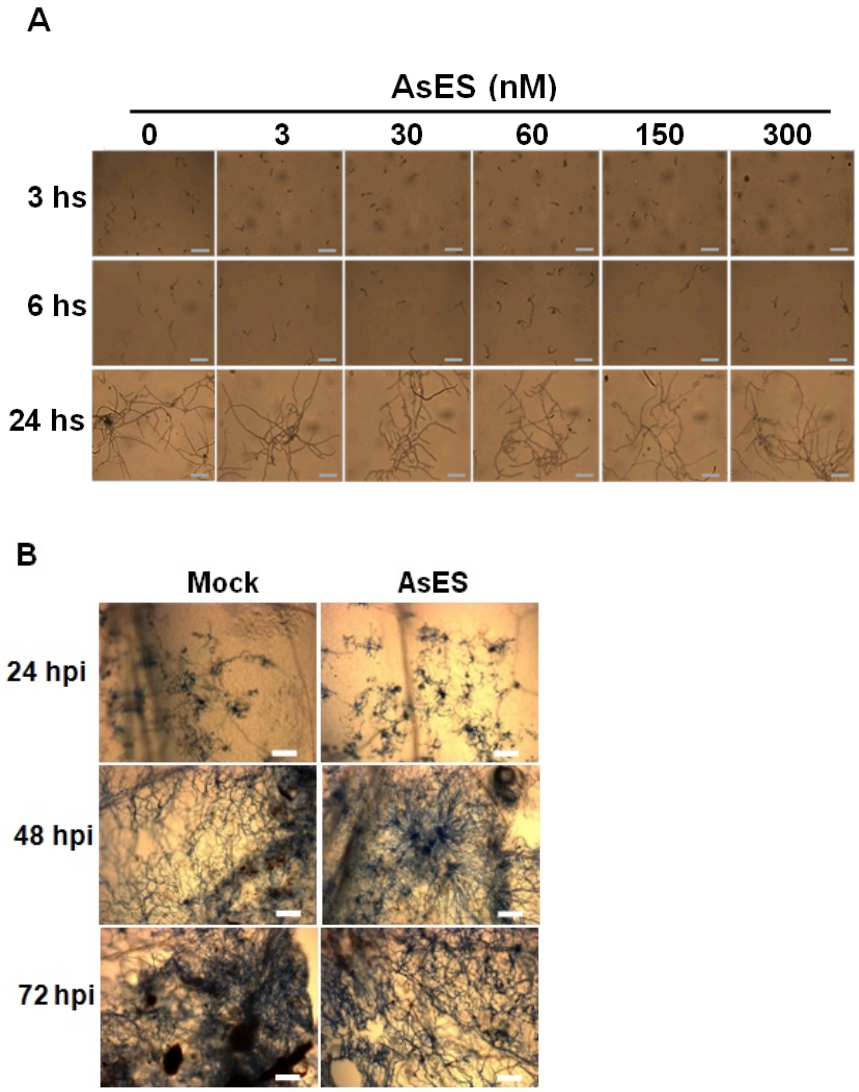
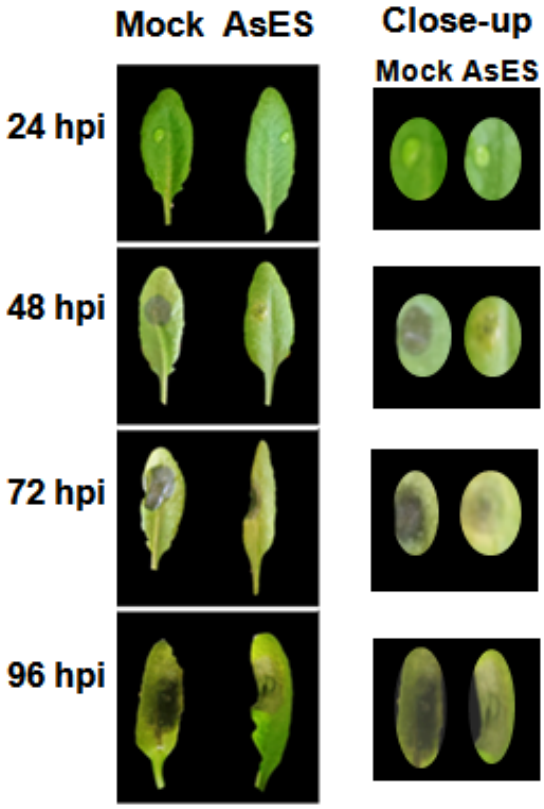
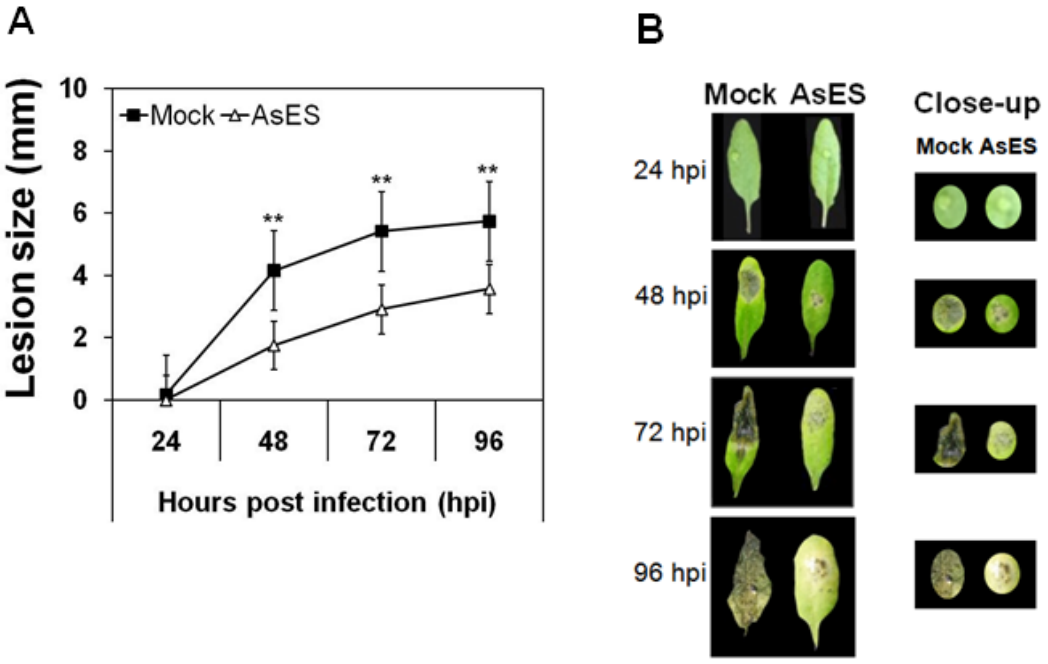

**Supplementary Figure 1.** ***Botrytis*** **infection of strawberry fruits.** Mock and AsES (60 nM) treatments were applied 48 hpti on each strawberry fruit and infection symptoms were evaluated 96 hpi (n=5).The experiment was carried out 2 times with similar results. Two representative images from one experiment are shown.



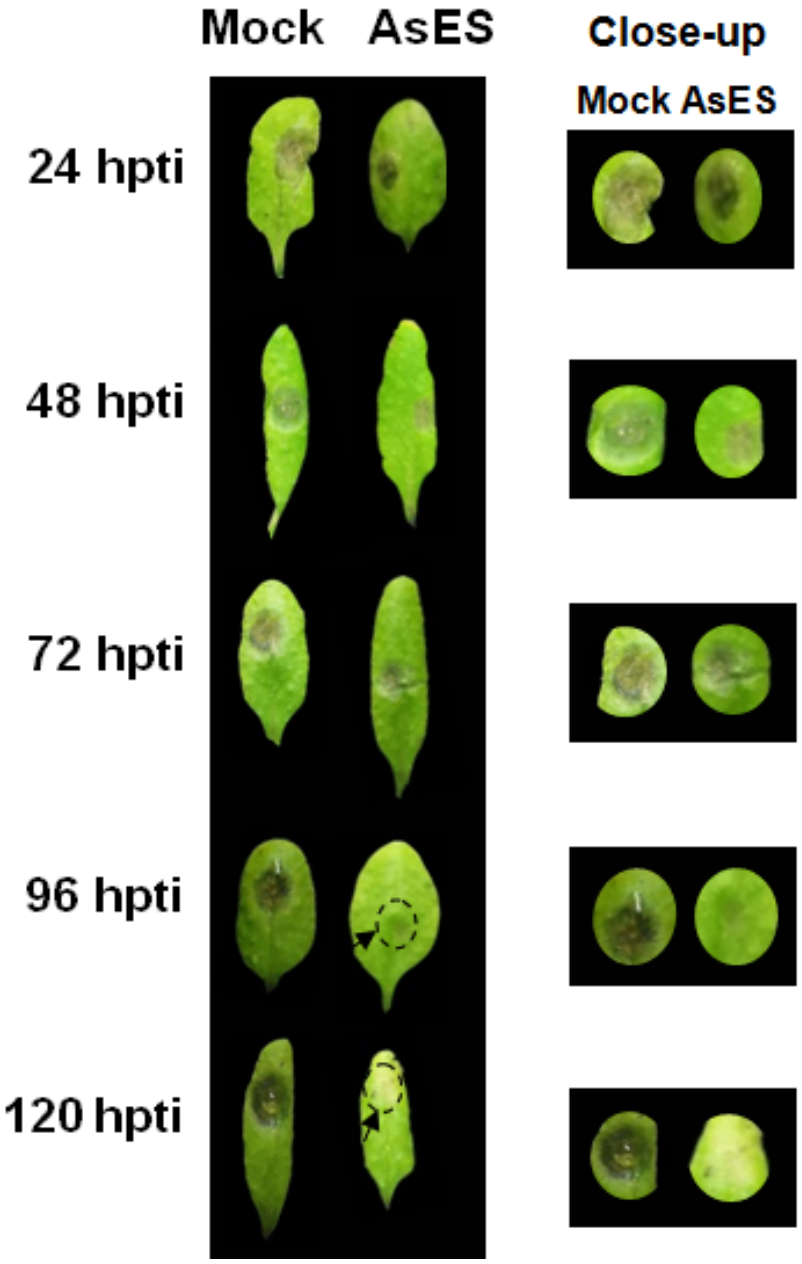

**Supplementary Figure 2. Analysis of development of *B. cinerea* in the presence of AsES.** (A) Microscopic analysis of spore germination at 3 and 6 hpi in the presence of increasing concentrations of AsES. (B) Trypan blue staining to analyze the fungus growth in Arabidopsis plants treated with 60 nM AsES and evaluated at different hpi. Bar: 200 µm. The assays were carried out twice (n=8) with similar results; representative pictures are shown.



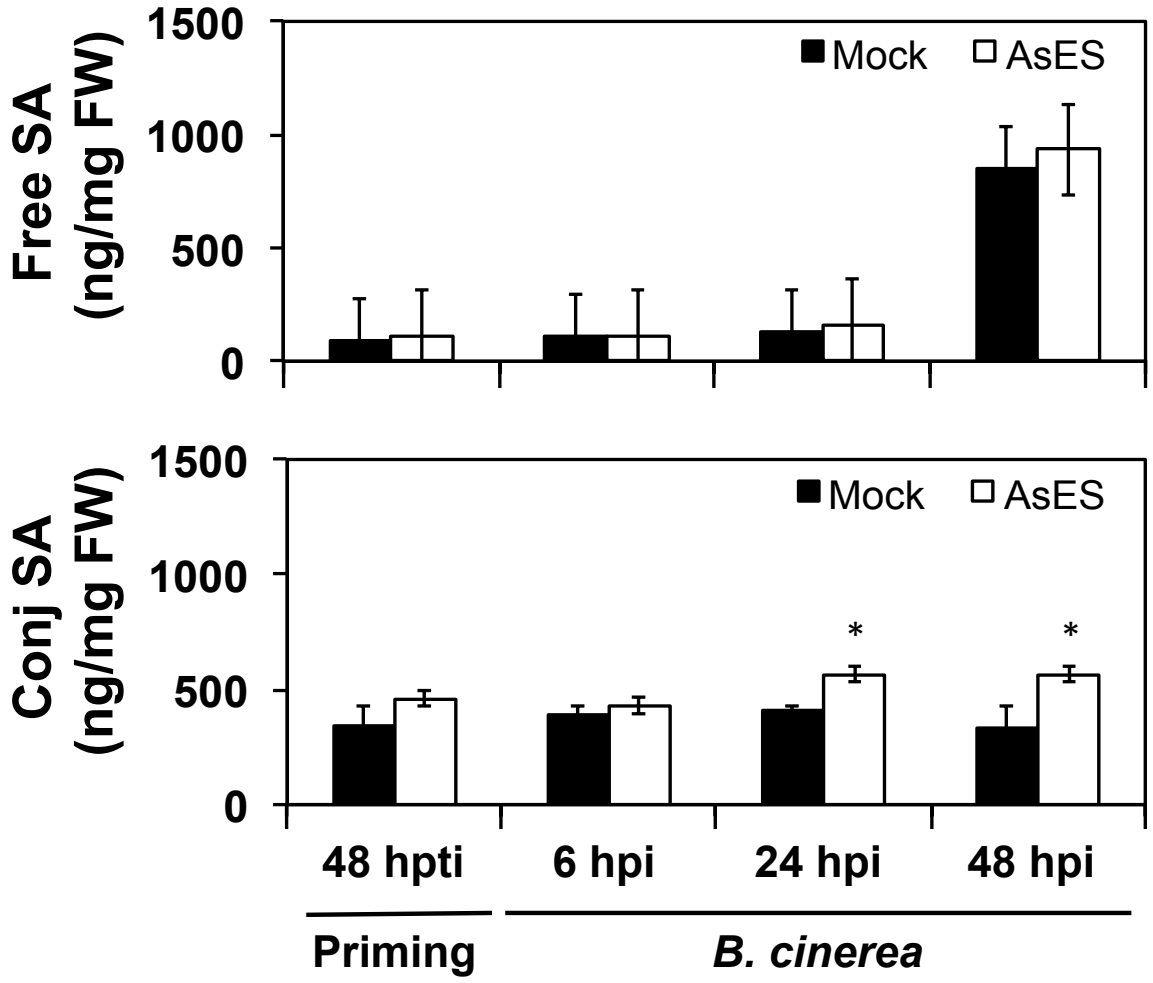

**Supplementary Figure 3. Evolution of lesion size caused by *B. cinerea* in AsES-treated *A. thaliana* plants.** Appearance of the lesions at different hpi; a close-up of the lesion is included. Mock and AsES (60 nM) treatments were applied 48 hpti and lesion size was measured 24, 48, 72 and 96 hpi. The assay was carried out three times (n=20) with similar results; representative pictures are shown.



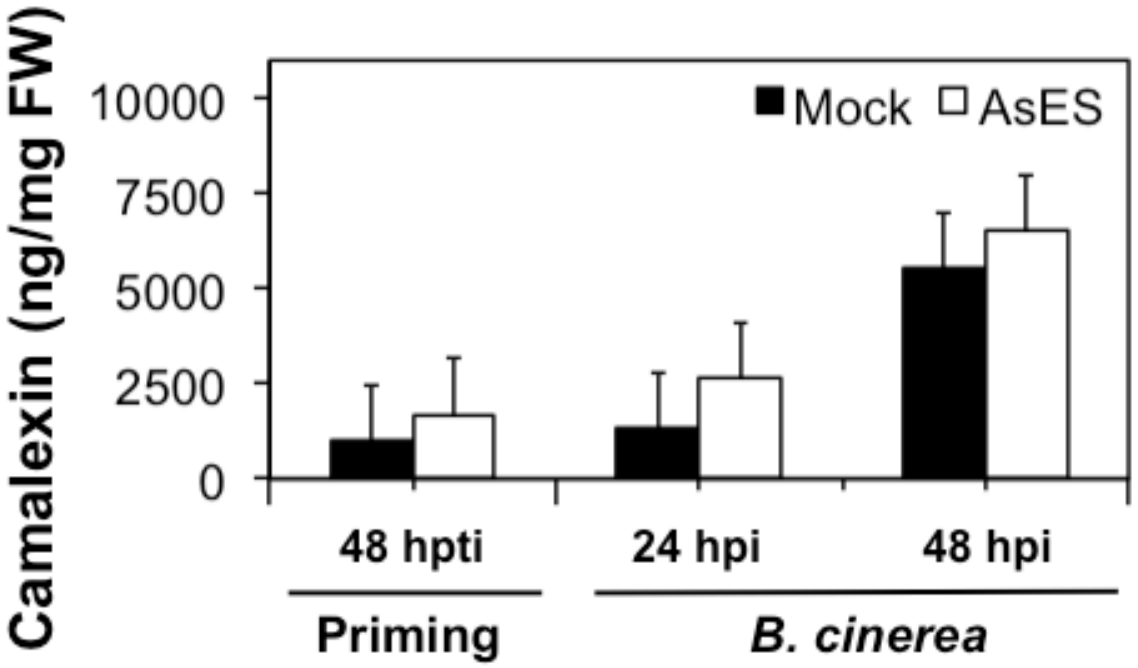

**Supplementary Figure 4. Evolution of lesion size caused by *B. cinerea in* AsES-treated *A. thaliana* plants.** (A) Time course analysis of the lesion size during 96 hpi. (B) Appearance of the lesions at different hpi; a close-up of the lesion is included. Mock and AsES (150 nM) treatments were applied 48 hpti and lesion size was measured 24, 48, 72 and 96 hpi. Mean values ± SE were obtained from two independent experiments (n=20). Asterisks indicate a statistically significant difference between the mock- and AsES-treated plants, according to Student's t test ($p<0.01$).




**Supplementary Figure 5. Effect of different AsES pre-treatment times and *B. cinerea* infection in *A. thaliana*.** Mock and AsES (60 nM) treatments were applied at different time-points. Appearance of the lesions at different hpti; a close-up of the lesion is included. A representative image of each treatment is presented.




**Supplementary Figure 6. Free and conjugated salicylic acid quantification in AsES-treated plants infected with *Botrytis.*** Mock and AsES (60 nM) treatments were applied and free and conjugated SA measured at times indicated (n=20). The experiment was carried out 3 times and the result of one typical assay is presented. Asterisks indicate a statistically significant difference between the mock- and AsES-treated plants, according to Student's t test ($p<0.05$).




**Supplementary Figure 7. Camalexin quantification in AsES-treated plants infected with *Botrytis*** Mock and AsES (60 nM) treatments were applied and Camalexin measured at times indicated (n=20). The experiment was carried out 3 times and the result of one typical assay is presented.