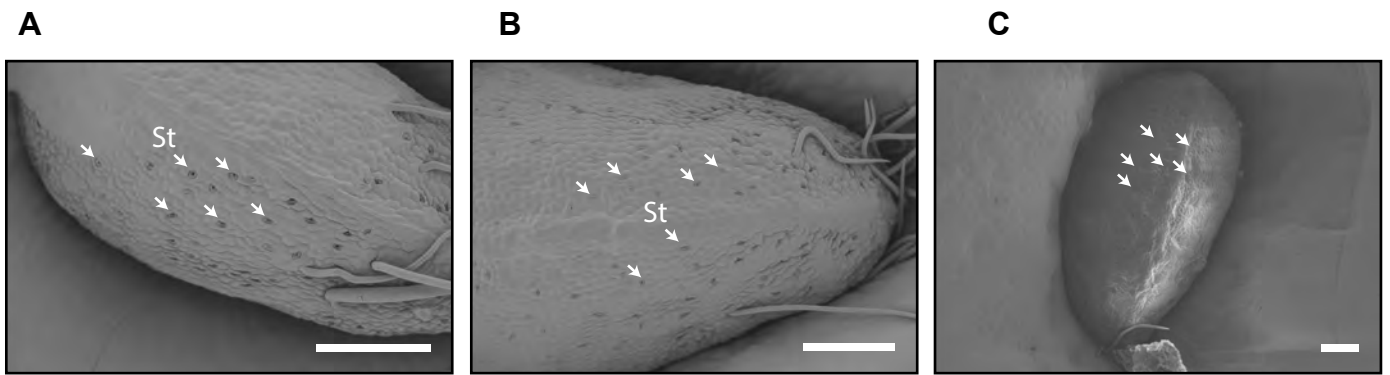
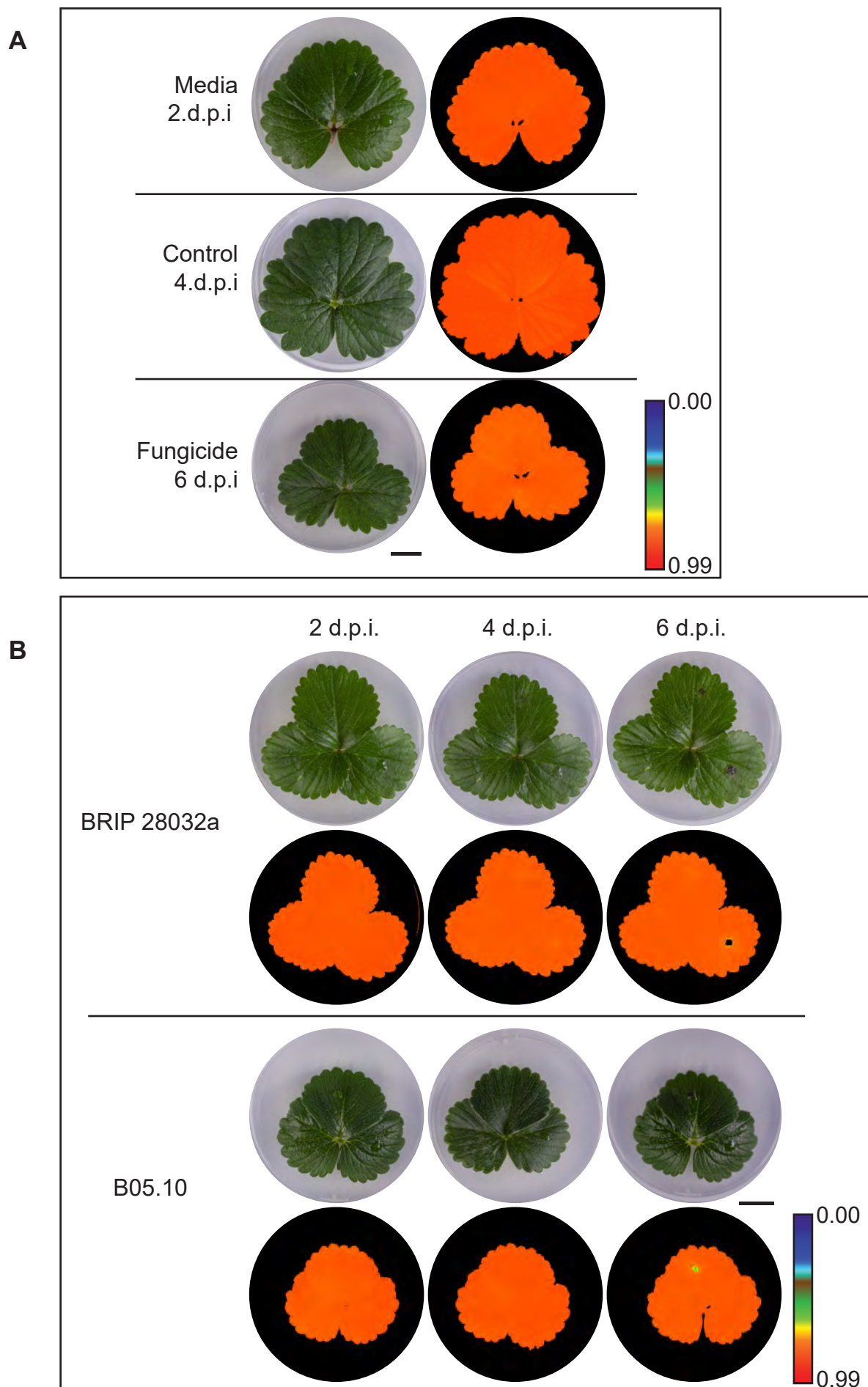


Supplementary Figure 1: Evaluation of BRIP 28032a (WT) and BRIP 28032a transformant (GFP) isolate, there was not was observed in growth rate between WT and a transformant at 4 days post inoculation (unpaired t-test, $p > 0.05$, error bars representing standard error).



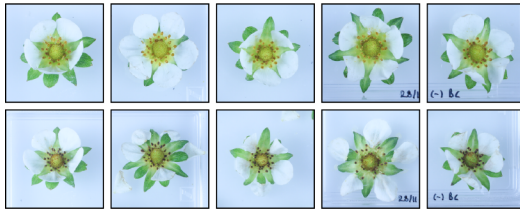
Supplementary Figure 2: Cryo scanning electron microscopy of strawberry seeds revealed the presence of achene stomata (white arrow). Scale bar = 200 μ m.

Samples were attached to a cryo SEM shuttle with Tissue-Tek OCT Compound (ProSciTech, Queensland, Australia) and frozen by plunge freezing into liquid nitrogen slush. They were then transferred to a Safematic CCU-010 HV sputter coater with cryo load lock and stage (Microscopy Solutions, Australia). The samples were heated to 110 degrees for 20 minutes to sublime surface moisture, then cooled and coated with 5nm platinum. The samples were transferred into the Hitachi SU7000 SEM (Newspec, Adelaide, Australia) with cryo stage and load lock (Microscopy Solutions, Australia). All transfers were made using the Microscopy solutions cryo/vacuum transfer shuttle. Imaging was performed under high vacuum conditions with a sample temperature of -160 degrees and an accelerating voltage of (**A** and **B**) 5 kV and (**C**) 3kV.



Supplementary Figure 3: **(A)** The detached leaves assays treated with fungicide Thiram (1.5mg/mL) or inoculated with media only (1% malt extract broth- MEB), controls revealed no significant latent infections **(B)** Disease progression in leaves up to 6 days post inoculation (d.p.i) treated with Thiram following inoculated with *B. cinerea* conidia in 1% MEB. Scale bar 1 cm.

No *Botrytis cinerea* inoculation



Inoculation with 8 μ l of 10^5 spores/ml

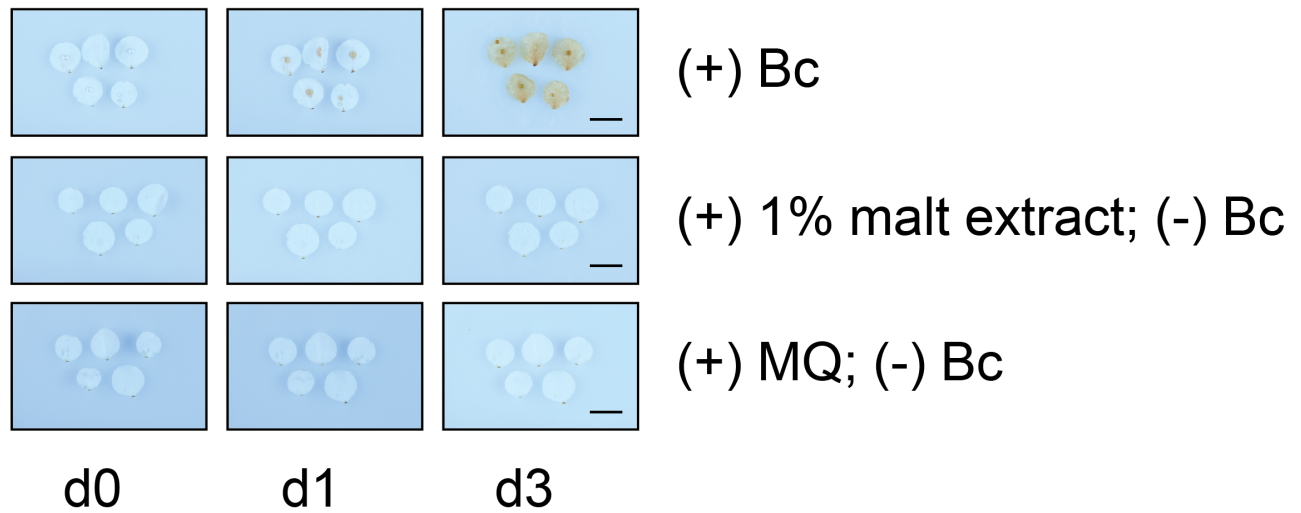
0 h. p. i.



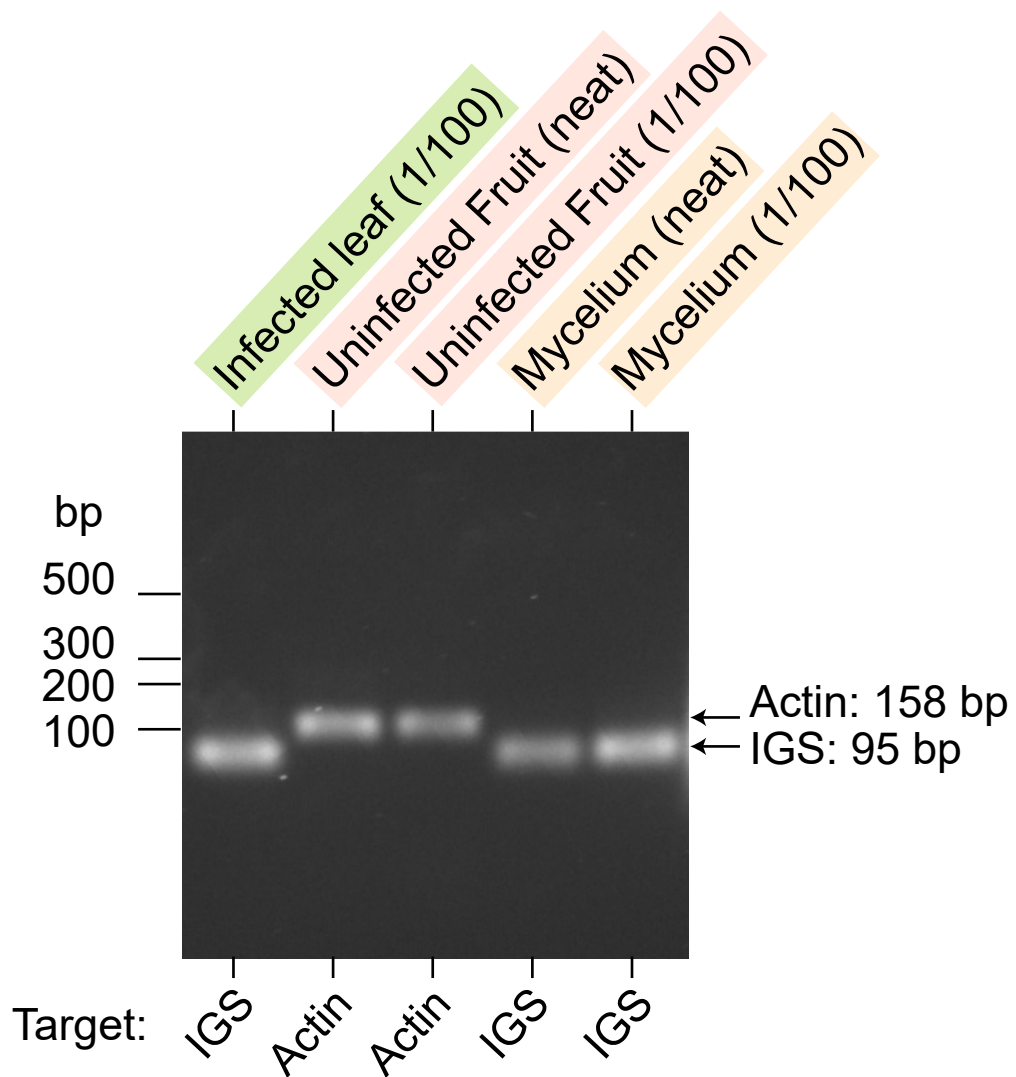
72 h. p. i.



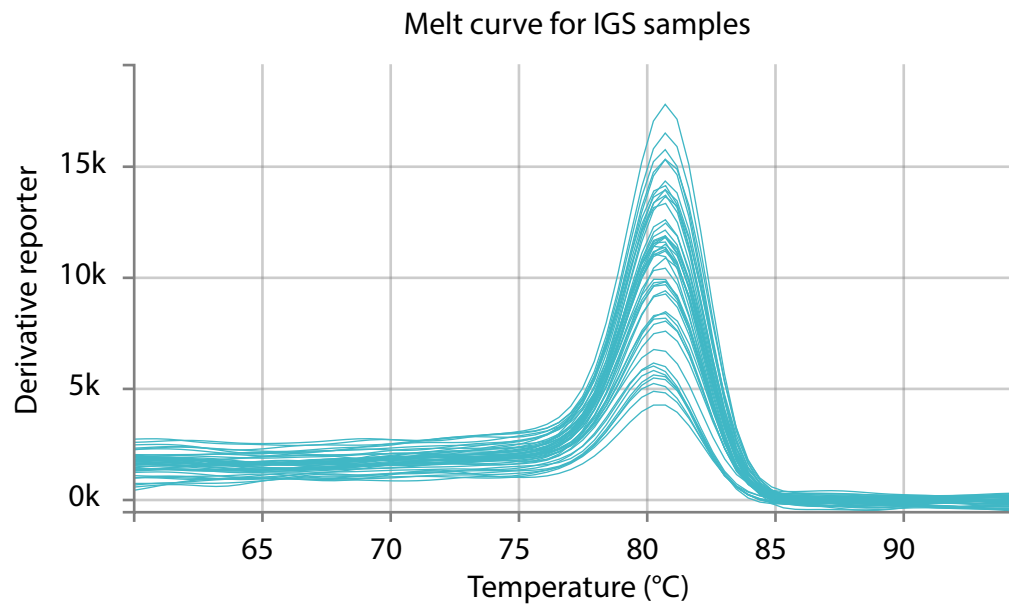
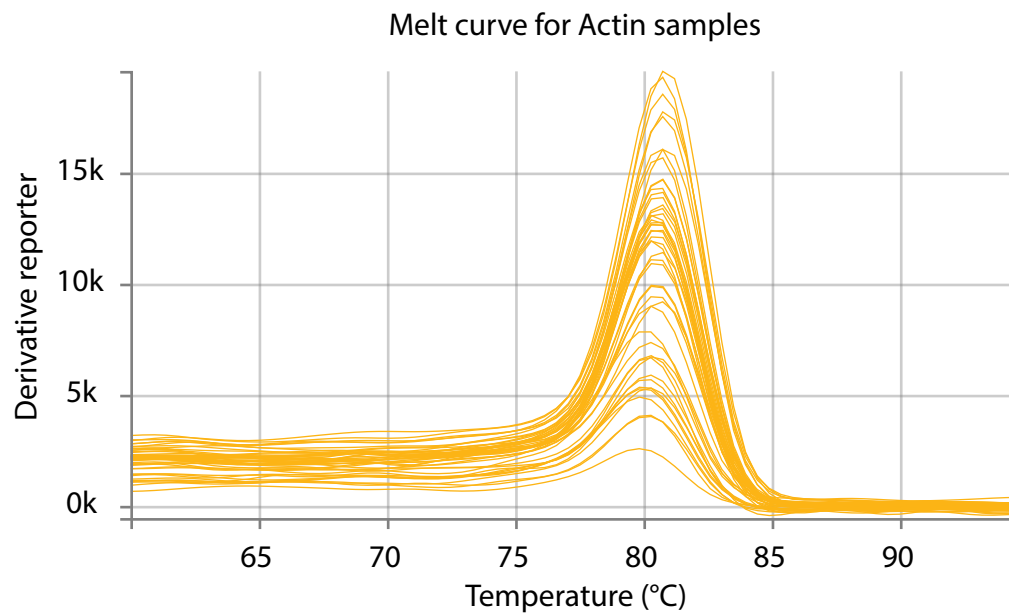
Supplementary figure 4. Strawberry whole-flower assay for *Botrytis cinerea* infection. Flowers were surfaced-sterilized and the peduncle was inserted into a 5 mm layer of MS medium inside Petri dishes. These conditions allow to track the fungal infection for about 72 h. p. i., when petals start naturally detaching from the flower.



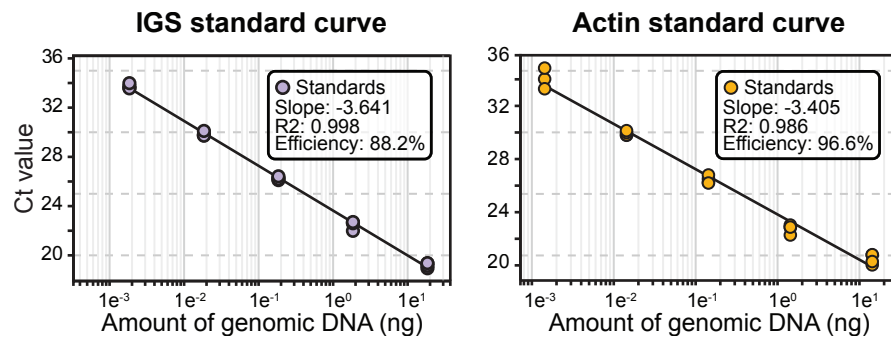
Supplementary figure 5. The detached petal assays allows up to 72 hour incubations without evident changes to petal integrity. Petals were detached, surface-sterilized, and placed in Petri dishes with a 5 mm layer of water agar to retain moisture. Drop inoculation with 10^5 *Botrytis cinerea* spores resulted in full colonization after 48 h. p. i. ((+) Bc). A spray of 1% malt extract broth or a MQ droplet and no *B. cinerea* inoculum revealed no latent infections. Scale bar = 1 cm



Supplementary figure 6. Polymerase chain reaction (PCR) of purified genomic DNA from *Botrytis cinerea* mycelium, healthy strawberry, and infected leaf allowed the amplification of the intergenic spacer (IGS) region and the actin gene, respectively, as a quality control step to validate the use of the designed primers. The IGS band correspond to the predicted size of 95 bp, similar to actin which produced a band at the expected size of 159 bp. These primers were used for qPCR experiments.



Supplementary figure 7. Melt curve profile of IGS and actin samples. The qPCR protocol included a melt curve step where samples were heated from 52 to 72 degrees, holding for 1 min, followed by heating to 95 degrees at a rate of 1.6 degrees/s and holding for 15 s. Samples were cooled down to 60 degrees at the same rate, holding at 60 degrees for 1 min, and then heating to 95 degrees at a rate of 0.15 degrees/s, and holding for 15 s. The presence of single melting peaks suggests the presence of a single qPCR amplicon.



Supplementary figure 8. Standard curves for *B. cinerea* intergenic spacer (IGS) and *Fragaria x ananassa* actin. Known amounts of genomic DNA were added to qPCR reactions revealing efficiencies of 88.2% and 96.6%, respectively.