

DISEASE NOTE

FIRST REPORT OF *PESTALOTIOPSIS CLAVISPORA* CAUSING POSTHARVEST FRUIT ROT OF LOQUAT IN SPAIN

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Spain is the second loquat (*Eriobotrya japonica* Lindl.) producer in the world. In a survey for postharvest fruit losses, brownish spots located mainly at the stilar end were observed which, at 20°C, expanded rapidly, turning dark brown to black, and developed a compact white mycelium. The potential causal agent (isolate IVIA NiAA-33) was recovered and identified at the Spanish Type Culture Collection (CECT, UV, Valencia, Spain). The fungus grew fast on potato dextrose and malt extract agar at 26°C covering the entire plate with a velvety white mycelium with numerous black globose acervuli. The plate reverse showed orangish tonalities. Conidia were fusiform (26×8 µm), five-celled, with hyaline apical and basal cells and dark brown median cells, and showed one short basal and 2 to 4 long apical appendages. The identification as *Pestalotiopsis clavispora* (G.F. Atk.) Steyaert was molecularly determined by sequencing the rDNA ITS1-5.8S-ITS2 region (GenBank accession No. KC153999) and the D1/D2 region in the 5' end of the 28S rDNA gene (KC154000). BLAST analysis showed in both cases 100% identity with *P. clavispora* (EU342214 and JN940831). To fulfill Koch's postulates, 5-mm diameter mycelial plugs from 7-day-old colonies were transferred to skin wounds on superficially disinfected loquats cv. Algeria. While all inoculated fruits developed lesions after 14 days at 20°C and *P. clavispora* was consistently reisolated from these lesions, no infection was observed on wounded but non inoculated control fruits. To our knowledge, this is the first report of *P. clavispora* causing postharvest fruit rot of loquat in Spain. This fungus was reported as the cause of stem-end rot of avocado (Valencia *et al.*, 2011) and *P. guepini* as the agent of a loquat disease (Perelló and Larran, 1999).

Perelló A.E., Larran S., 1999. First report of *Pestalotiopsis guepini* on loquat in Argentina. *Plant Disease* **83**: 695.

Valencia A.L., Torres R., Latorre B.A., 2011. First report of *Pestalotiopsis clavispora* and *Pestalotiopsis* spp. causing postharvest stem end rot of avocado in Chile. *Plant Disease* **95**: 492.

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FIRST REPORT OF *ALTERNARIA ALTERNATA* CAUSING LEAF BLIGHT OF *PTERIDIUM AQUILINUM* IN TURKEY

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In a survey for diseases of the fern *Pteridium aquilinum* (L.) Kuhn, leaf samples with blight symptoms were collected from grasslands in the Trabzon province (Turkey) in late spring of 2009. Initial symptoms appeared as small circular spots, light brown in colour. Later, many became dark brown. A fungus, consistently isolated on potato dextrose agar (PDA) from symptomatic leaves, formed conidia singly or in short chains, dark brown, with 3-7 transverse and 0-4 longitudinal septa, 20-60×9-16 µm in size. The pathogen was identified as *Alternaria alternata* based on morphology characteristics (Simmons, 2007). For pathogenicity tests, inocula were prepared by growing isolates on PDA at 25°C for 15 days. Sterile distilled water (10 ml) was added to each plate and colonies were carefully scraped with a sterile needle. The resulting conidial suspension from each isolate (diluted to 5×10⁵ CFU/ml) was used to infect 12 *P. aquilinum* plants, using an atomizer to spray leaves. After inoculation, plants were covered with polyethylene bags for 72 h to maintain a high humidity, after which the bags were removed and plants were kept under laboratory conditions until symptoms appeared. Ten days post inoculation, light brown spots were observed on inoculated leaves but no symptoms were seen on water-treated control plants. Koch's postulates were fulfilled by re-isolating *A. alternata* from diseased leaves. Similar symptoms caused by *A. alternata* on *P. aquilinum* were reported in UK (Godfrey, 1974). To our knowledge, this is the first report of *A. alternata* on *P. aquilinum* in Turkey.

Godfrey B.E.S., 1974. Phylloplanemycoflora of bracken, *Pteridium aquilinum*. *Transactions of the British Mycological Society* **62**: 305-311.

Simmons E.G., 2007. *Alternaria* an Identification Manual. CBS Fungal Biodiversity Center Utrecht, The Netherlands.

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