First report of *Neopestalotiopsis clavispora* causing postharvest fruit rot of loquat in Pakistan

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Loquat [*Eriobotrya japonica* (Thunb.) Lindl.] has largest cultivated areas in Pakistan. During 2014–2016, brownish spots were recorded at stilar end of the fruits with 35 to 40% disease incidence. Sodium hypochlorite (1%) was used for surface disinfection and fruits were shifted on PDA at 25 °C with a 12-h photoperiod. The white cottony fungal colonies with undulate edge, pale luteous at reverse side and circular (upper side) were recorded after 7 days. The black and concentric acervuli (avg. 269 µm) were recorded after 9 days. Five cell conidia (average 21.6 × 7.5 µm) (n = 50) were fusiform to ellipsoid with dark brown (third and fourth) and pale brown (second) cells. Two to four apical appendages (avg. 24.8 µm) and one basal appendage (average 9.3 µm) were recorded in the conidia. The morphological characterizations indicated *Neopestalotiopsis clavispora* (G.F. Atk.) Steyaert (Maharachchikumbura et al. 2014). The mycelial plugs (5 mm) from fungal culture of FHM isolate were shifted on disinfected wounded and non-wounded loquat fruit cv. Surkh. The media

plugs were used as a negative control and experiment was conducted twice. The lesions were recorded on inoculated fruits after 10 days at 25 °C, while no lesions were recorded on negative control. The fungus was re-isolated from these lesions and morphological characterization was similar with mother culture (FHM isolate). The molecular characterization was performed by sequencing of D1/D2 region with NL1/NL4 primers in the 5' end of the 28S rDNA gene (GenBank accession No. MW480225) and rDNA ITS1-5.8S-ITS2 region (MW471686) with ITS1/ITS4 primers. The sequences were exhibiting 99% genetic similarity with previously reported *N. clavispora* isolates (Palou et al. 2013). This fungus has caused post-harvest fruit rot of loquat in Spain (Palou et al. 2013) but to our knowledge, this is first report of *N. clavispora* on loquat in Pakistan.

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Declarations

Conflict of interest Authors have no conflict of interest.

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