## PATHOGENICITY OF THE Chrysosporium ANAMORPH OF Nannizziopsis vriesii FOR VEILED CHAMELEONS (Chamaeleo calyptratus)

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## **ABSTRACT**

During the last decade, a poorly known fungus, the *Chrysosoporium* anamorph of *Nannizziopsis vriesi* (CANV) has been reported from several cases of cutaneous fungal disease among individual or groups of reptiles, usually with a fatal outcome. The CANV is rarely found on the skin of healthy squamate reptiles. We conducted a fungal challenge study using an isolate of the *Chrysosporium* anamorph of *Nannizziopsis vriesii* (CANV) originating from a chameleon to induce infection in veiled chameleons (*Chamaeleo calyptratus*) using noninvasive procedures. Chameleons were exposed to CANV spores in their environment, and were inoculated by direct cutaneous contact on abraded and nonabraded skin. The CANV induced lesions in all experimental groups, suggesting it may act as a primary fungal pathogen in this species of reptile.

This study demonstrates that the CANV may act as a primary pathogen of reptiles by direct cutaneous contact. Animals in which the skin was abraded demonstrated a higher level of infection, suggesting that skin trauma or other changes to the skin may predispose reptiles to infection. Still, the CANV can readily invade the intact skin of veiled chameleons maintained under standard husbandry. The concept of a primary fungal pathogen of squamate reptiles is new and this study firmly documents fungal infection in captive, otherwise healthy reptiles.

## LITERATURE CITED

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