Acidotolerant genus *Fodinomyces* (Ascomycota: *Capnodiales*) is a synonym of *Acidiella*

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A new combination, *Acidiella uranophila* (X. Vázquez-Campos) M. Kolařík, Hujslová & X. Vázquez-Campos is provided for *Fodinomyces uranophilus* X. Vázquez-Campos based on similarity in phenotype and genotype.

**Key words:** soil fungi, Dothideomycetes, taxonomy, acid soils, ITS rDNA.

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**SHORT TAXONOMIC REPORT**

*Acidiella uranophila* (X. Vázquez-Campos) M. Kolařík, Hujslová & X. Vázquez-Campos, **comb. nov.**
(Mycobank MB 811258)

**Basionym:** *Fodinomyces uranophilus* X. Vázquez-Campos, Mycologia 106: 1078 (2014).

Highly acidic soils represent a specific habitat harbouring acidophilic or acidotolerant fungi such as *Acidomyces*, *Acidothrix* and *Acidea* (Hujslová et al. 2013, Hujslová et al. 2014). Recently, the dematiaceous hyphomycete *Fodinomyces*
uranophilus X. Vázquez-Campos (type species of Fodinomyces X. Vázquez-Campos) was isolated from acid uranium mine water (raffinate) in Australia (Vázquez-Campos et al. 2014) and Acidiella bohemica Hujslová & M. Kolařík (type species of Acidiella Hujslová & M. Kolařík) from acid soil in a kaolin quarry in the Czech Republic (Hujslová et al. 2013). Type strains (F. uranophilus CBS 136962T, A. bohemica CBS 132721T) have 99% (536/538 bp) similarity in ITS rDNA sequences (JQ904602 for F. uranophilus, JQ172752.2 for A. bohemica), and 99% (745/746 bp) similarity in LSU rDNA (KF857170 for F. uranophilus, JQ172752.2 for A. bohemica). Optimum growth of both species is at pH 5. They are not able to grow at pH 1. Colony diameter on Potato dextrose agar (PDA) (24–25 °C, 14 days) is 14–15 mm in F. uranophilus and 16 mm in A. bohemica. Colonies of both species on PDA were compact, flat, centrally heaped or cerebriform showing a tendency to crack, surface slightly velvety, black. Both species produced arthroconidia and chlamydospores. Arthroconidia were (4.5)5–7 × 2–2.5(3) μm in F. uranophilus and 8.0–16.0 × 1.7–3.0 μm in A. bohemica. Chlamydospores were (4.5)10.5–11(13.5) in F. uranophilus (only one dimension is given for chlamydospores in the original description) and 4.8–18.0 × 1.8–4.8 μm in A. bohemica. The only remarkable difference in phenotype is the presence of blastoconidia in Fodinomyces, which are absent in Acidiella. In conclusion, the high similarity in ITS-LSU rDNA sequences, ecology, physiology and morphology proves that these species are sisters to be placed in a single genus, Acidiella, of which Fodinomyces represents a later synonym.

REFERENCES

