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## Taiwan

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**Abstract.** Two new species of *Dermatodothis*, *D. euonymi* sp. nov. on *Euonymus acutorhombifolia* and *D. symploci* sp. nov. on *Symplocos wikstroemifolia*, and *D. javanica* Racib. on *S. lancifolia* are described and illustrated.

**Key words:** *Dermatodothis*; *D. euonymi* sp. nov.; *D. javanica*; *D. symploci* sp. nov.

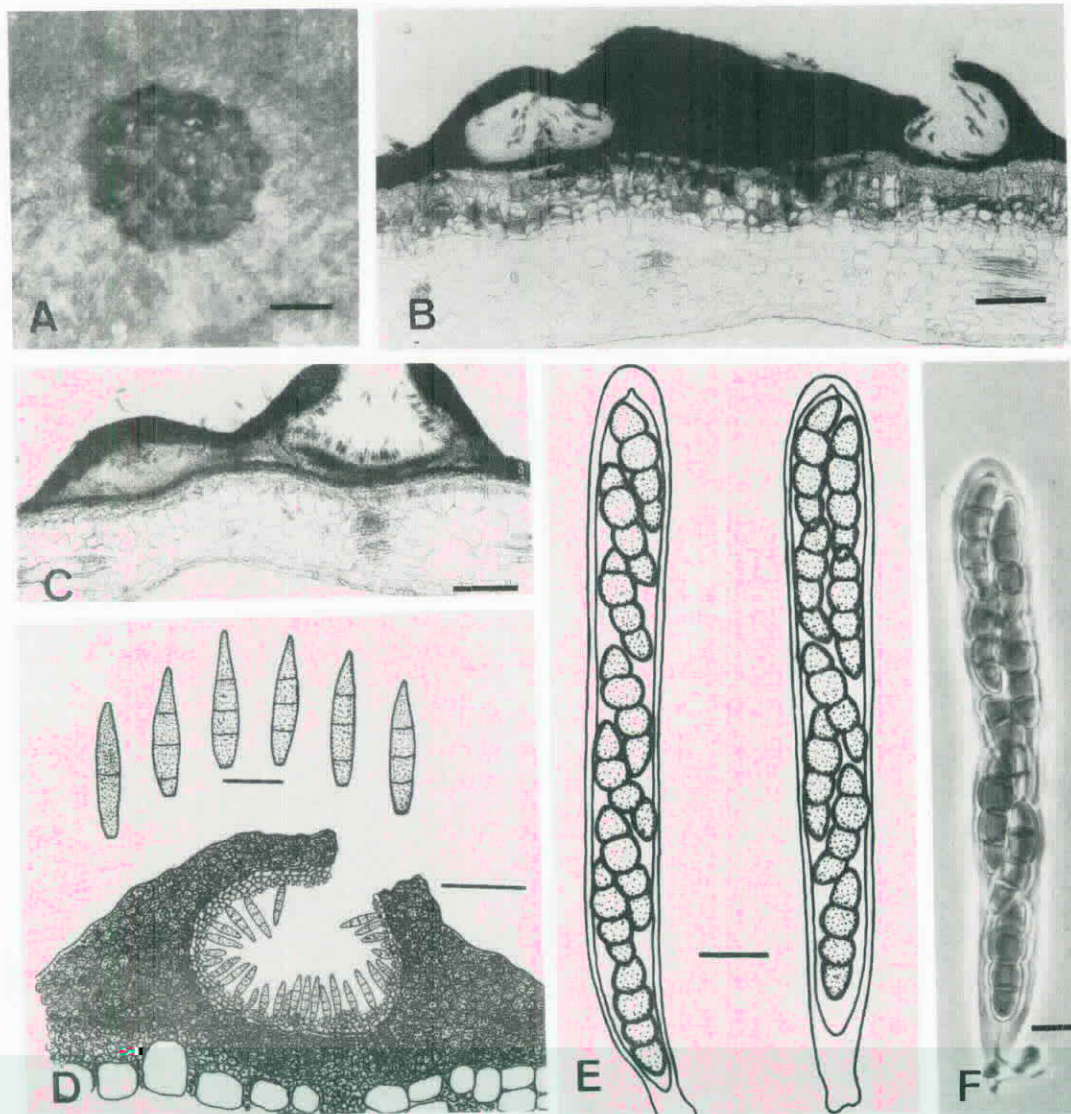


Fig. 1. *Dermatodothis euonymi*. A, Stromata on leaf. Bar=500  $\mu\text{m}$ . B, Section of stroma. Bar=120  $\mu\text{m}$ . C, Locule of anamorph. Bar=50  $\mu\text{m}$ . D, Locule of anamorph (Bar=50  $\mu\text{m}$ ) and *Hendersonula*-like conidia (Bar=10  $\mu\text{m}$ ). E and F, Asci and ascospores. Bar=10  $\mu\text{m}$ .

8-spored, pseudoparaphysate. Ascospores fusiform, rounded at each end, 3-septate, constricted at the septa, olivaceous to dark brown,  $18\text{--}22 \times 5\text{--}7 \mu\text{m}$ , overlapping uniseriate to biseriate in the ascus.

In stromata a few pycnidial locules containing brown pycnidiospores are present; they morphologically resemble *Hendersonula* with 3-septate, brownish conidia. Similar *Hendersonula*-like anamorphs have been reported for some species of *Dermatodothis* (Theissen and Sydow, 1914; Sydow, 1923; Müller, 1975) and another *Hendersonula* hyperparasite, *H. yaku-*

*shimensis* Kobayashi, was also present on *D. zeylanica* Syd. (Katamoto, 1983).

**Habitat:** On living leaves of *Euonymus acutorhombifolia* Hay.

**Specimen examined:** NCHUPP-2250, Tzuen, Hualein Hsien, Nov. 26, leg. F. L. Wu.

**Distribution:** Taiwan.

**Notes:** Species of *Dermatodothis* have only been reported on members of the families Symplocaceae, Buddlejaceae, Fagaceae and Compositae from Asia and South America. *Euonymus* however, belongs to the family Celastraceae. *D. buddleyae* (Stév.) von Arx & E. Müller and *D. zeylanica* have 3-septate ascospores like *D. euonymi*. However, the ascospores of *D. buddleyae* are larger ( $22-28 \times 9-11 \mu\text{m}$ ) with a rough surface and those of *D. zeylanica* are smaller ( $16-18 \times 5-6 \mu\text{m}$ ) than those of *D. euonymi*.

***Dermatodothis javanica*** Rac. in Theissen & Sydow, *Annls mycol.* 12: 280, 1914. (Fig. 2: A-D).

Pseudothecia epiphyllous, gregarious, subcuticular, hemispheric, pustulate, not forming any leaf spot,  $170-190 \mu\text{m}$  in diam.,  $90-110 \mu\text{m}$  high, sometimes confluent, with superficial mycelial mat surrounding the pseudothecia. Peridium pseudoparenchymatous,

thick-walled, dark brown,  $20-30 \mu\text{m}$  thick in the upper part, becoming thicker towards the basal part of the lateral wall which is up to  $46-65 \mu\text{m}$  thick. Hypostroma subcuticular, composed of 1-2 layers of hyaline, palisadely arranged cells. Asci cylindrical, bitunicate, basal, 8-spored,  $74-90 \times 10-12 \mu\text{m}$ , pseudoparaphysate. Ascospores elliptical, 2-septate, constricted at each septum, hyaline to pale brown,  $12-16 \times 4-5 \mu\text{m}$ .

**Host:** On living leaves of *Symplocos lancifolia* Sieb. & Zucc. (Symplocaceae).

**Distribution:** Mainland China, India, Indonesia, Philippines, Taiwan, Vietnam.

**Specimen examined:** NCHUPP-2280, Tzuen, Hualien Hsien, March 16, 1992, leg. C. Y. Chen.

**Note:** Of the three species of *Dermatodothis* described on *Symplocos*, the fungus on *Symplocos lancifolia*

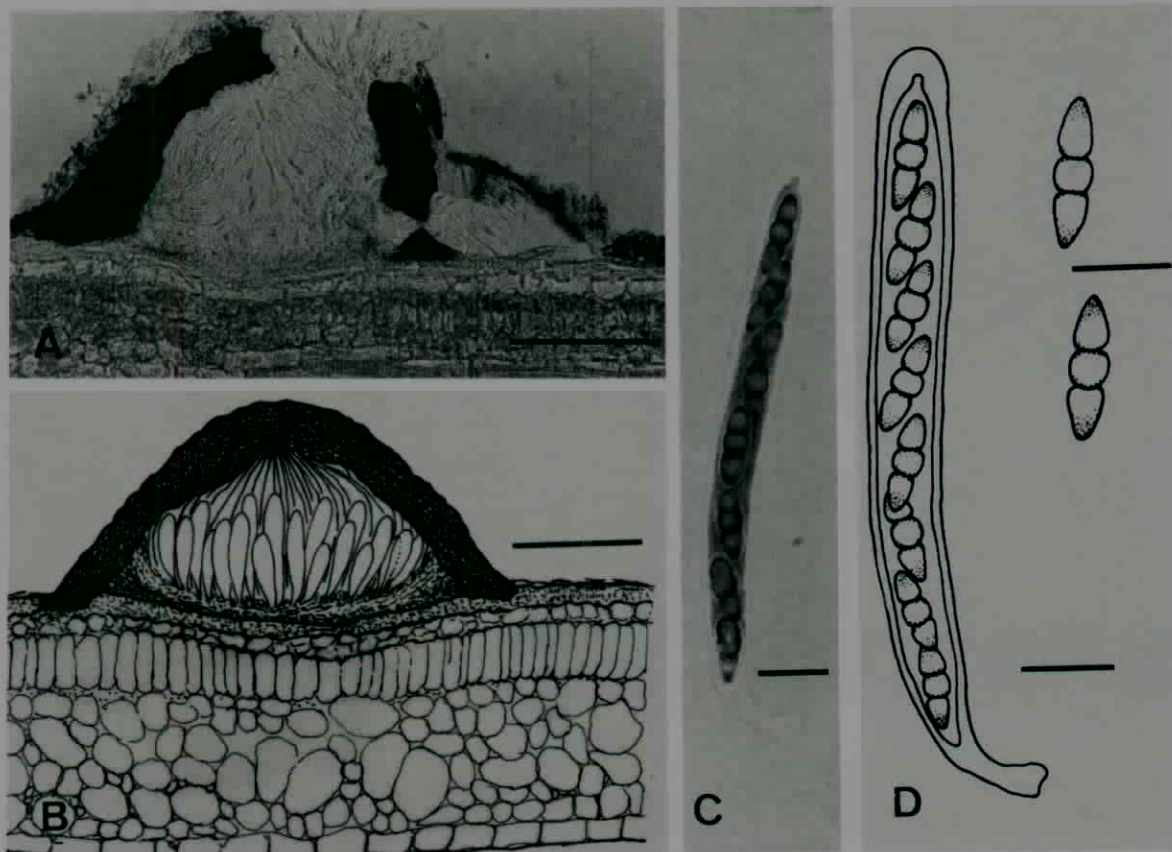


Fig. 2. *Dermatodothis javanica*. A, Section of pseudothecia. Bar =  $50 \mu\text{m}$ . B, Pseudothecia. Bar =  $100 \mu\text{m}$ . C and D, Asci and ascospores. Bar =  $10 \mu\text{m}$ .

agrees with *D. javanica* (Teng, 1964) in its morphological features.

***Dermatodothis symploci*** W. H. Hsieh et C. Y. Chen, sp. nov. (Fig. 3: A-D).

Ascstromata epiphylla, conica vel subglobosa, basaliter complanata, ostiolata, immersa, leviter erumpentia, dispersa, 188-363  $\mu\text{m}$  lata, 213-300  $\mu\text{m}$  alta, raro aggregata. Paries ascstromatis ex cellulis complanatis atrobrunneis compositus, hypha ascstromatum implexa cingens. Asci bitunicati, cylindrici

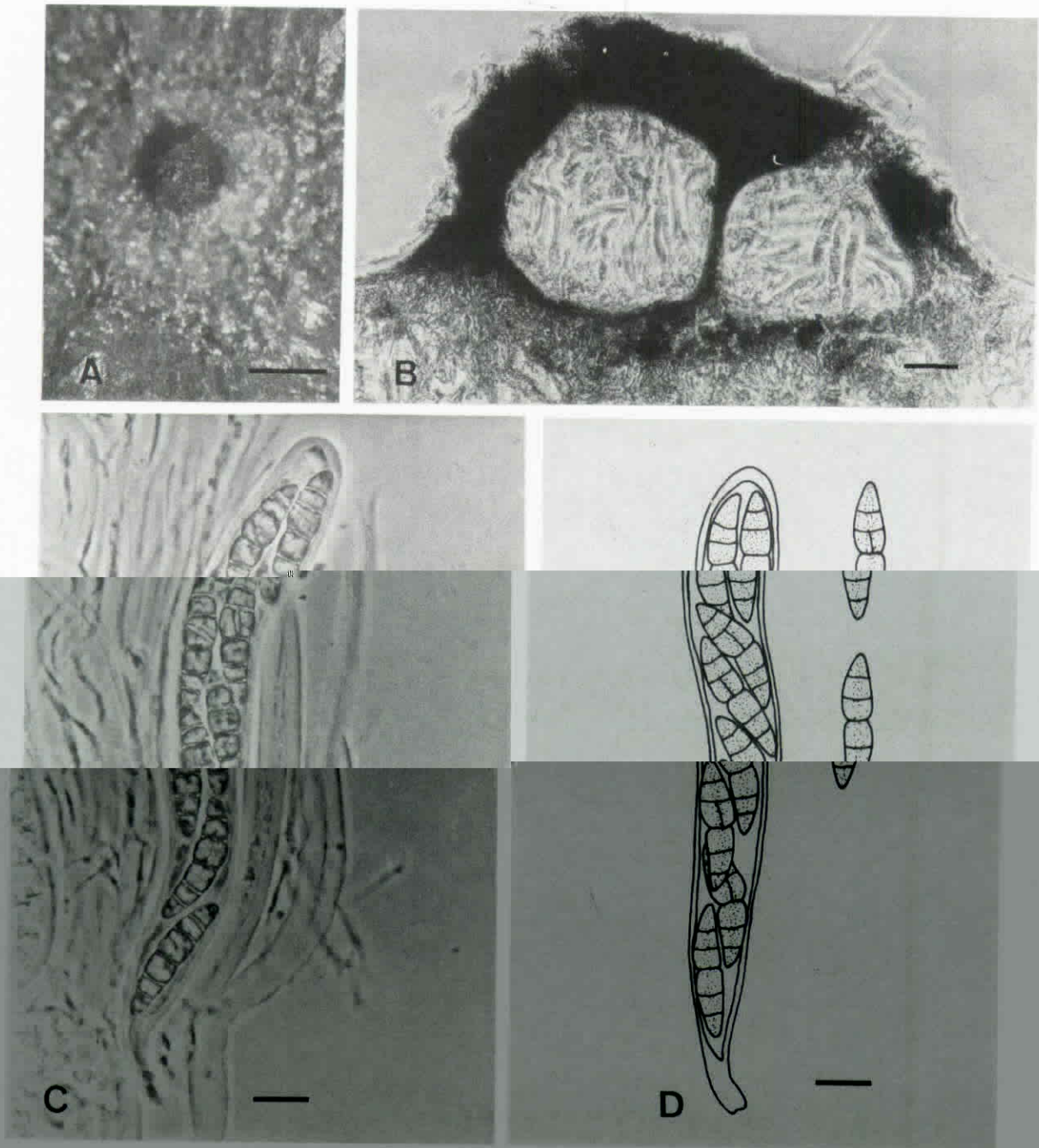


Fig. 3. *Dermatodothis symploci*. A, Ascostroma on leaf. Bar = 500  $\mu\text{m}$ . B, Section of ascostroma. Bar = 100  $\mu\text{m}$ . C and D, Asci and ascospores. Bar = 10  $\mu\text{m}$ .

vel anguste clavati, sessiles, 125-145 × 11-15 μm, octospori, pseudoparaphysati. Ascospores fusiformes, inaequilateralis, supra biseriatae infra uniseriatae, pallide brunneae, 24-29 × 5-8 μm, 5-septatae, medio con-

*zeylanica* (Müller, 1975) are 3-septate. This fungus has five transverse septa in the ascospores, and occasionally one longitudinal septum. These significantly different characters of the ascospores show that a new taxon must be erected to accommodate this fungus.

tia.

**Habitat:** In foliis vivis *Symploci wikstroemifoliae* Hay. (Symplocaceae), Alishan, Chiai Hsien, Aug. 22, 1991, leg. C. Y. Chen, NCHUPP-2245 holotypus.

Ascostromata epiphyllous, conical to subglobose with a flattened base, ostiolate, immersed in the mesophyll, slightly erumpent, scattered, 188-363 μm wide, 213-300 μm high, occasionally in groups of two, which are laterally adnate. The wall of ascostromata is composed of compressed, dark brown cells, and is surround-

**Habitat:** On living leaves of *Symplocos wikstroemifolia* Hay.

**Specimen examined:** NCHUPP-2245, Alishan, Chiai Hsien, Aug. 22, leg. C. Y. Chen.

**Distribution:** Taiwan.

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## 台灣產 *Dermatodothis* 兩新種及一新紀錄種

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本文報告子囊菌 *Dermatodothis* 屬兩新種及一新紀錄種。寄生於菱葉衛矛 (*Euonymus acutorhombifolia*) 葉片上之 *D. euonymi* 新種，子座多腔室，直徑超過兩公釐，腔室寬 190-363 微米，高 112-212 微米；子囊雙囊壁，大小為 100-118×10-13 微米；子囊孢子四室，大小 18-22×5-7 微米。寄生於蕘花葉山礬 (*Symplocos wikstroemifolia*) 葉片上之 *D. symploci* 新種，子座寬 188-363 微米，高 213-300 微米；子囊雙囊壁，大小 125-145×11-15 微米；子囊孢子六室，大小 24-29×5-8 微