A New Record for the Myxomycetes Flora of Turkey: 
**Comatricha pulchella** (C.Bab.) Rost. var. pulchella

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Abstract: *Comatricha pulchella* (C.Bab.) Rost. var. *pulchella* is recorded for the first time from Turkey.  
Key Words: Myxomycetes, *Comatricha*, Turkey

**Türkiye Miksomiset Florası için Yeni Bir Kayıt:**  
**Comatricha pulchella** (C.Bab.) Rost. var. *pulchella*  

Özet: *Comatricha pulchella* (C.Bab.) Rost. var. *pulchella* Türkiye’den ilk defa kaydedilmektedir.  
Anahtar Sözcükler: Myxomycetes, *Comatricha*, Türkiye

Introduction  
The samples were collected from the edge of the Lake Abant (Bolu) in September, 1995. Samples were identified as *Comatricha pulchella* (C.Bab.) Rost. var. *pulchella* using the diagnostic literature (Martin & Alexopoulos, 1969; Farr, 1976; Nannenga-Bremekamp, 1991). This taxon is a new record for the Myxomycetes Flora of Turkey (Harkonen & Uotila, 1983; Harkonen, 1988; Lado, 1994; Ergül & Dünger, 2000). The samples are kept in the Herbarium of Uludağ University (Bursa).

Description of Species  

Sporangia gregarious, stipitate, ovate to cylindric, pale brown, 0.5-1.2 mm tall. Stalk black, shorter than the sporangium, 0.2-0.4 mm. Hypothallus usually discoid and small, rarely continuous under a group. Columella black, straight, tapering, becoming tortuous and coiled towards the apex. Capillitium dense, arising from the entire columella, dark brown, primary branches darker and stouter, successive branches paler and slender, freely anastomosing branches and with few free ends. Spores brown in mass, paler in transmitted light, minutely punctate, 6.5-8.5 (-10) µm in diameter (Figures 1-2).


Known World Distribution: India, Ceylon, Japan, Europe, North America, Nigeria (Farr, 1976; Thind, 1977)

Result and Discussion  
*Comatricha pulchella* can be distinguished from other similar-looking species of *Comatricha* as follows: This species often forms extensive fructification on small twigs; the reddish tint of the small, ovoid to cylindric sporangia, and the pale brown spores are its distinguishing marks (Farr, 1976). *Comatricha tenerrima* (Curtis) G.Lister is morphologically close to *Comatricha pulchella*, from which it is distinguished by
the pink colour, longer stipes, and smaller, more fusiform sporangia (Nannenga-Bremekamp, 1991).

Nannenga-Bremekamp (1991) recognized two varieties: C. pulchella var. fusca and C. pulchella var. pulchella. Comatricha pulchella var. fusca can be distinguished from var. pulchella by the usually somewhat longer sporangia, which are always dark brown (much darker than those of C. pulchella var. pulchella) and usually closer together; by the relatively short stalks; by the dark purple-brown capillitium, which often exhibits an interrupted surface net; and by the pale grey-brown spores in transmitted light. In addition, Lister (1966) described a variety as gracilis; but this has been transferred to the genus Stemonitopsis because of its stalk structure, cylindrical sporangia and almost complete surface net.

The spore diameter of Comatricha pulchella var. pulchella given in the literature varies: Nannenga-Bremekamp (1991), 6.5-8.0 µm; Farr (1976), 6-8 µm; Martin & Alexopoulos (1969), 6.5-8.0 µm; Lakhanpal & Mukerji (1981), 7-8(-9) µm; Thind (1977), 7-9(-9.8) µm. The spores of our specimen were 6.5-8.5(-10) µm in diam. According to Nannenga-Bremekamp (1991), the total size is 0.7-1.5 mm, whereas Lakhanpal & Mukerji (1981) reported it to be 1.5-3.5 mm. The total size of our specimen was 0.5-1.2 mm tall (Table 1).

This record brings the species count for the genus Comatricha in Turkey to seven (Ergül & Dülger, 2000).

Table 1. Values of Comatricha pulchella var. pulchella from various studies.

<table>
<thead>
<tr>
<th>Total colour</th>
<th>Total size (mm)</th>
<th>Spore size (µm)</th>
<th>Spore colour By transmitted light</th>
</tr>
</thead>
<tbody>
<tr>
<td>Nannenga-Bremekamp (1991)</td>
<td>Pale lilac-brown or cinnamon</td>
<td>0.7-1.5</td>
<td>6.5-8.0</td>
</tr>
<tr>
<td>Farr (1976)</td>
<td>Pale brown or ferruginous</td>
<td>0.7-1.5(-3.0)</td>
<td>6-8</td>
</tr>
<tr>
<td>Martin &amp; Alexopoulos (1969)</td>
<td>Pale brown or ferruginous</td>
<td>0.7-1.5(-3.0)</td>
<td>6.5-8.0</td>
</tr>
<tr>
<td>Lakhanpal &amp; Mukerji (1981)</td>
<td>Bright ferruginous</td>
<td>1.5-3.5</td>
<td>7-8(-9)</td>
</tr>
<tr>
<td>Thind (1977)</td>
<td>Dark brown</td>
<td>0.5-1.3</td>
<td>7-9(-9.8)</td>
</tr>
<tr>
<td>Present specimen</td>
<td>Pale brown</td>
<td>0.5-1.2</td>
<td>6.5-8.5(-10)</td>
</tr>
</tbody>
</table>
References


