

Tor Tønsberg at seventy-five

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The lichenologist Tor Tønsberg (Fig. 1) was born in Oslo in 1948. It was not a bad start for a future botanist to grow up in Norway's capital city, for he lived in the outskirts of the city, close to the forested hills in its surroundings, "marka". Here he used to roam and was fascinated by the natural environment. It was therefore only natural that he, when entering the University of his native city in 1966, chose biology. After the basic courses he chose to specialize in botany. He discovered lichens during a course given by the bryologist Per Størmer (1907–1991). This triggered him to take up closer studies on that theme for his cand.real thesis. Luckily, there was a lichenologist on the staff, Hildur Krog (1922–2014). She was part of the lichenological tradition (Jørgensen 2007) originating from Bernt Lynge (1884–1942), the great master of Arctic lichenology. This tradition had been renewed by his pupil Eilif Dahl (1916–1993) who introduced chemotaxonomy using the microcrystal tests invented by the Japanese Yasuhiko Asahina shortly before WWII. Tor was trained in this tradition, and later took up Thin Layer Chromatography (TLC), a method introduced by Krog (Jørgensen 2016). However, this thesis was a floristic/phytogeographic study of a National Park, Børgefjell in Nordland, a region he knew from his childhood visits to his maternal grandparents who lived there. He earned a cand.real degree on this study in 1975. He retained this interest in floristics and phytogeography through his career, a most important result being the first Norwegian survey of threatened macrolichens (Tønsberg et al. 1996). He also participated in the publication of the first Norwegian flora of macrolichens (Krog et al. 1980), and later in an illustrated lichen flora (Holien & Tønsberg 2006) with a much enlarged and revised edition in 2023. As a student, Tor became aware of the complexity of the species in the genus *Cladonia* and the lack of knowledge about them. In the following years he published a number of papers about them, recording several as new to the country, to Europe [e.g., *C. alpina* (Asahina) Yoshim., *C. metacorallifera* Asahina] and even one to science (*Cladonia norvegica* Tønsberg & Holien, Fig. 2).



Figure 1. Tor Tønsberg. Photo: Trevor Goward.

Tor earned his degree in 1975, and the following year he was appointed scientific assistant at the University in Trondheim, which was very important as he came close to the lichenologically rich humid, coastal spruce forests in Central Norway, the interesting lichen flora of which had been discovered by the Swede Sten Ahlner (Ahlner 1948). Ahlner had only spent some months in this region, and clearly there was much more to be discovered. Tor paid particular attention to the crusts and made several remarkable discoveries, which showed the link between these forests and the boreal rainforests in western North America. The most noteworthy being the undescribed *Ramboldia subcinnabarina* (Tønsb.) Kalb et al. (Fig. 3) and *Rinodina disjuncta* Sheard & Tønsberg (Fig. 4).

With family connections in the Pacific Northwest of the United States, he got possibilities to follow this discovery up by frequent visits to the Pacific coast, and became fascinated by the forests in coastal Alaska and adjacent British Columbia where he made many important discoveries, several recorded in the major paper on the lichens of Alaska by Spribille et al. (2010). However, his most

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Figure 2. *Cladonia norvegica*. Photo: Håkon Holien.



Figure 3. *Ramboldia subcinnabarina*. Photo: Einar Timdal.



Figure 4. *Rinodina disjuncta*. Photo: Håkon Holien.

remarkable contribution to North American lichenology is the discovery of the endemic *Leioderma cherokeense* P.M. Jørg. & Tønsberg in the Great Smokey Mountains (Jørgensen & Tønsberg 2005), a species in the predominantly southern Hemisphere genus *Leioderma* Nyl.

Back in Norway in 1983, Tor was appointed curator of cryptogamic plants at the University of Bergen where he eagerly took up his favorite activity, fieldwork. Also, here it gave notable results, concerning the American connection of our flora. In Sogn (Leikanger) he discovered *Collema leptaleum* Tuck. (Fig. 5), a warm-temperate to subtropical species described from Cuba, previously not recorded from Europe (Degelius 1974). He paid, however, most attention to the difficult group of sterile, crustose lichens which previously only Lyngé's pupil Ove Arbo



Figure 5. *Collema leptaleum*. Photo: Reidar Haugan.

Høeg (1898–1993) had studied in Norway (Høeg 1923). Although chemotaxonomy now was available, this was a gargantuan task. Nevertheless he, in 1996, managed to earn a doctorate on a thesis about these lichens which the opponent Peter James (1930–2015) characterized as “a Cadillac monograph”. Tor was awarded a personal professorship in 1999. Among the many genera he touched in this treatment, it is probably *Lepraria* Ach. which is the one where he made the most interesting discoveries. He named a number of new species which later proved to have a wider distribution. He found one of them in Bergen and accordingly named it *Lepraria bergensis* Tønsberg (Fig. 6), very suitable name for a city where the first record of lichens in our region was made (1316, Jørgensen 2020).



Figure 6. *Lepraria bergensis*. Photo: Einar Timdal.

He has also enriched the herbarium BG (and others) with his numerous collections, which will likely reach a total of 50,000 specimens. It is also to be hoped that he will manage to issue more fascicles of his valuable exsiccate of sterile corticolous lichens (Fig. 7). He has described numerous taxa, among them the genus *Japewia* Tønsberg. The genus *Toensbergia* is most suitably named in his honor by Bendiksbj & Timdal (2013) for an enigmatic, widespread, sterile species in northern boreal forests, *Toensbergia leucococca* (R. Sant.) Bendiksbj & Timdal. (Fig. 8). An additional eight lichen and one lichenicolous fungus species are also named after him (see below) and one of them *Lepraria toensbergiana* Bayerová & Kukwa, described from the Tatra mountains, contains a fatty acid named toensbergianic acid.

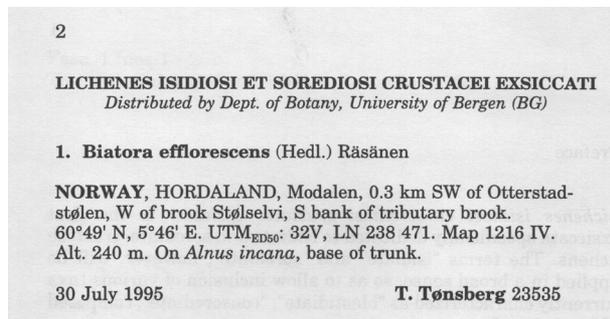


Figure 7. Label of the first specimen in Tønsberg's exsiccate.



Figure 8. *Toensbergia leucococca*. Photo: Einar Timdal.

Both in his years in Trondheim and in Bergen Tor have had several masters- and PhD-students. He has always showed great enthusiasm and care for his students.

We hope that Tor will continue to enrich us with further lichenological discoveries.

Species named after Tor Tønsberg

Acaraspora toensbergii K. Knudsen & Kocourk from Alaska (North America), in *Opuscula Philolichenum* 16: 317–321. 2017.

Arthonia toensbergii Holien & Frisch from Trøndelag (Norway), in *Graphis Scripta* 30: 34–43. 2018.

Biatora toensbergii Holien & Printzen from Norway and Iceland, in *Bibliotheca Lichenologica* 60: 1–275. 1995.

Lecidea toensbergii Haugan & Timdal from Norway, in *Graphis Scripta* 30(6): 51–58. 2018.

Lepraria toensbergiana Bayerová & Kukwa from the Tatra Mountains (Poland), in *The Bryologist* 108: 224–227. 2005.

Lepraria torii Pérez-Ortega & T. Spribille from British Columbia (Canada), in *Graphis Scripta* 21: 36–41. 2009.

Sclerococcum toensbergii Diederich from USA, in *Bulletin de la Société des Naturalistes Luxembourgeois* 119: 71–78. 2017.

Sticta torii Simon & Goward from Alaska (North America), in *Graphis Scripta* 39: 105–114. 2016.

Topeliopsis toensbergii Kantvilas & Vězda from USA, in *The Lichenologist* 32(4): 325–357. 2000.

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