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Urban Ecology of Terrestrial Fireflies in Busan Metropolitan City

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It were investigated the distribution of terrestrial fireflies at the various sites in Busan Metropolitan City. The two firefly species *Hotaria papariensis* (Doi) and *Lychnuris rufa* (Olivier) were detected and observed in Busan. *H. papariensis* distributed largely along the Kumjeong Mountain, while *L. rufa* distributed in scattered manner in wider area. *H. papariensis* were also observed at the 17 sites belonging to 9 districts, while *L. rufa* at 29 sites belonging to 9 districts.

The fireflies may have migrated and dispersed or survived along Mts. Baegyangsan - Seunghaksan along Mt. Keumjeong Mountain and also along Mts. Daleumsan - Jangsan along Kumryon Mountain. The two geographical connections were tentatively to be the major habitats as well as the pathways. The connections were likely to support the more numbers of fireflies. It was also suggested to build up the independent habitats escaping from shining electric light. It may encourage to designate the green network between Busan and surrounding areas.

Key words: distribution, fireflies, Busan, Hotaria papariensis, Lychnuris rufa