

Indicator 8b: Change in indigenous species composition, saproxylic beetles



Figure: Saproxylic beetle research at Haltiala. Trunk window traps were used for collecting samples. All sampling was conducted using the same method and the same sites. The sampling shown in this photograph was taken during the original sampling in 2005. (Photograph: Faunatica Oy)

Status:

An initial survey of the saproxylic beetle fauna of the Haltiala forests deciduous swamp was conducted in 2005. Subsequent monitoring was conducted in the years 2007, 2008 and 2009. The purpose of this survey was to determine the effects of restoration measures aimed at enhancing the habitat conditions for saproxylic organisms. These restoration measures included filling drainage ditches in the area. The rise in the water table is expected to kill spruce trees, resulting in an increase in dead wood and increase in the abundance of deciduous tree species.

Samples were collected from six study sites within the restoration area and two control sites in adjacent protected areas of primaeval forest. The numbers of species recorded have varied considerably. At this stage, the monitoring results represent such a short period of time that it is not possible to be certain about the

effects of restoration. The results may also be subject to the influence of annual variation in temperature. The total numbers of saproxylic species recorded are shown in the Table below.¹

Year:	Total number of species:	Change from previous year:
2005	194	0
2007	184	- 10
2008	233	+ 49
2009	199	- 34

Score:

0 points: The number of species remains constant or declines 2009

1 point: 1 additional species

2 points: 2 additional species

3 points: 3 additional species

4 points: 4 additional species

Monitoring:

The monitoring of saproxylic beetles in Haltiala will continue. Surveys will be conducted at five year intervals. The long term objective of this indicator is to enhance the diversity of the coleopteran assemblage.

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¹ Helsingin Haltialan lahoppukovakuoriaisten seuranta. Lajiston perusselvitys vuonna 2005 ja seuranta vuosina 2007-2009 (In English: Saproxylic beetle monitoring in Haltiala, Helsinki. Initial survey of 2005 and monitoring in 2007-2009), Faunatica Oy, Espoo 2010