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Springer-Verlag New York Inc.
2003

Lodenius, M. 2003. Boreal Forest Ecosystem After Application of Wood Ash. Bulletin of Environmental Contamination and Toxicology 71:776-781.

<http://hdl.handle.net/1975/178>

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Bull. Environ. Contam. Toxicol. (2003) 71:776–781
© 2003 Springer-Verlag New York Inc.
DOI: 10.1007/s00128-003-0199-6

**Environmental
Contamination
and Toxicology**

Cadmium Concentrations in a Boreal Forest Ecosystem After Application of Wood Ash

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in egg size and the cadmium concentrations were very low in albumin, yolk and shell ($0.01 - 0.07 \mu\text{g g}^{-1} \text{dw}$). Nor were any differences between control and treated areas found (Table 1).

Application of wood ash increases the cadmium reserves in soil, but mostly in biologically unavailable form. However, different ashes may have significantly different effects on pH, cadmium concentration and cadmium species in the soil. Cadmium is strongly bound to wood ash and only small amounts can be extracted. The leaching of cadmium from granulated ash may, at least on short term, be small even when the total cadmium concentration is high.

In the study area higher concentrations were found at treated areas from earthworms, macrofungi and shrews but the differences were small. In a few years perspective there does not seem to be any significant changes in the cadmium status of the forest ecosystem. It is, however, difficult to assess the long term environmental risk related to the application of wood ash in forests.

Acknowledgments. I am indebted to Ali Soltanpour-Gargari, Jussi Vilen, Anna Kepanen, Esa Tulisalo, Sari Nuutinen, and Helinä Hartikainen for expert assistance and the Academy of Finland and the Ministry of the Environment (project EEMA) for economic support. Presented at the First International Conference on Pollution Eco-Chemistry & Ecological Processes, Shenyang, China, August 26-31, 2002.

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