

List of publications Stimulation program System-oriented Ecotoxicological Research

List of publications Stimulation program System-oriented Ecotoxicological Research.....	1
Scientific publications from the SSEO program	2
Publications (all publications are “submitted”) for a special issue from Science of the Total Environment (STOTEN)	10
Publications from the program committee, location coordinators and integration project.....	11
Reports integration project	12
Final reports of the program.....	12

Scientific publications from the SSEO program

Barranguet, C., van den Ende, F.P., Rutgers, M., Breure, A.M., Greijdanus, M., Sinke, J.J. and Admiraal, W. 2003. Copper induced modifications of the trophic relations in riverine algal-bacterial biofilms. *Environ. Toxicol. Chem.* 22(6): 1340-1349.

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Boivin M.E.Y., Greve G.D., García-Meza, J.V., Massieux, B., Sprenger, W.W., Kraak, M.H.S., Breure, A.M., Rutgers, M. and Admiraal, W. (2007). Algal-bacterial interactions in metal contaminated floodplain sediments. *Environmental Pollution* 145: 884-894.

Boivin, M.E.Y., Greve, G.D., Kools, S.A.E., van der Wurff, A.W.G., Leeftang, P., Smit, E., Breure, A.M., Rutgers M. and van Straalen, N.M. (2006). Discriminating between effects of heavy metals and natural variables in terrestrial microbial communities. *Applied Soil Ecology* 34: 103-113.

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de Haas, E.M., Reuvers, B., Moermond, C.T.A., Koelmans, A.A. and Kraak, M.H.S., 2002. Responses of benthic invertebrates to combined toxicant and food input in floodplain lake sediments. *Environ. Toxicol. Chem.* 21(10): 2165-2171.

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treatment with the fungicide Triphenyltin acetate. *Environmental Science and Technology* 24(5): 1133-1139.

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Heemsbergen, D.A., Berg, M.P., van Hal, J.R., Faber, J.H. and Verhoef H.A. Complementarity in ecological functioning of soil detritivores is related to ecological distance between species. **In prep.**

Heemsbergen, D.A., van Hal, J.R., Faber, J.H., Berg, M.P. and Verhoef H.A. Soil detritivore functioning in heterogeneously contaminated soils. **In prep.**

Heemsbergen, D.A., van Hal, J.R., Faber, J.H., Berg, M.P. and van Straalen, N.M. Soil fauna community in a River Floodplain; the relevance of contamination and seasonal dynamics. **In prep.**

Heemsbergen, D.A., van Hal, J.R., Faber, J.H., Berg, M.P. and Verhoef H.A. Effect of Vertical Heterogeneity in soil characteristics on soil functioning; a Field Experiment. **In prep.**

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Kools, S.A.E., Boivin, M.E.Y., van der Wurff, A.W.G., Berg, M.P., van Gestel, C.A.M. and van Straalen, N.M. (2005). Soil communities and ecosystem processes in a stress-on-stress experiment. **In prep.**

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Roodbergen, M., Klok C. and Schekkerman, H. Local adult survival of Black-tailed godwits (*Limosa l. limosa*) in the Netherlands 2002-2005 does not explain the ongoing decline of the breeding population. **Submitted.**

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Veltman K., Huijbregts M.A.J., Vijver M.G., Peijnenburg W.J.G.M., Hobbelen P.H.F., Koolhaas J.E., van Gestel C.A.M., van Vliet P.C.J., Hendriks A.J. (2007). Metal accumulation in the earthworm *Lumbricus rubellus*. Model predictions compared to field data. *Environmental Pollution* 146: 428-436.

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Vijver, M.G., Vink, J.P.M., Jager, T., van Straalen, N.M., Wolterbeek, H.Th., and van Gestel, C.A.M. (2006). Kinetics of Zn and Cd accumulation in the isopod *Porcellio scaber* exposed to contaminated soil and/or food. *Soil Biology and Biochemistry* 38: 1554-1563.

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Vijver, M.G., Vink, J.P.M., Wolterbeek, H.Th. and van Gestel, C.A.M. (2005). Surface adsorption of metals onto earthworms and isopods is negligible compared to absorption in the body. *Science of the Total Environment*, 340: 271-280.

van Vliet, P.C.J., Didden, W.A.M., van der Zee, S.E.A.T.M., Peijnenburg, W.J.G.M. (2006). Accumulation of heavy metals by enchytraeids and earthworms in a floodplain. *Eur. J. Soil Biol.* 42: S117-S126.

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van der Welle, M.E.W., Cuppens, M.L.C., Lamers, L.P.M. and. Roelofs, J.G.M. (2006). Detoxifying toxicants: interactions between iron and sulfide toxicity in freshwater wetlands. *Environmental Toxicology and Chemistry* 25: 1592-1597.

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van der Welle, M.E.W., Niggebrugge, K., Lamers, L.P.M. and Roelofs, J.G.M. (2007). Differential responses of the freshwater wetland species *Juncus effusus* L. and *Caltha palustris* L. to iron supply in sulphidic environments. *Environmental Pollution* 147: 222-230.

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Wijnhoven, S., Leuven, R.S.E.W., van der Velde, G., Jungheim, G., Koelemij, E.I., De Vries, F.T., Eijsackers, H.J.P., Smits, A.J.M. (2007). Heavy metal concentrations in small mammals from a diffusely polluted floodplain: Importance of species- and location-specific characteristics. *Archives of Environmental Contamination and Toxicology* **In press** (available online).

Wijnhoven, S., Thonon, I., van der Velde, G., Leuven, R.S.E.W., Zorn, M.I., Eijsackers, H.J.P., Smits, A.J.M. (2006). The impact of bioturbation by small mammals on heavy metal redistribution in an embanked floodplain of the river Rhine. *Water, Air & Soil Pollution* 177: 183-210.

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the river Rhine: Extractability and exposure through the food chain. *Chemistry and Ecology* 22: 463-477.

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Zorn, M.I., van Gestel, C.A.M. and Eijsackers, H.J.P. (2005). Species-specific earthworm population responses in relation to flooding dynamics in a Dutch floodplain soil. *Pedobiologia* 49: 189-198.

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Zorn, M.I., van Gestel, C.A.M., Morrien, E., Wagenaar, M. and Eijsackers, H.J.P. Flooding responses of *Allolobophora chlorotica*, *Aporrectodea caliginosa* and *Lumbricus rubellus* in a laboratory-controlled environment. *Soil Biol. Biochem.* **Submitted** (provisionally accepted).

Publications (all publications are “submitted”) for a special issue from Science of the Total Environment (STOTEN)

Breure, A.M., van het Groenewoud-Groot, M. and Eijsackers, H.J.P. System Oriented Ecotoxicological Research: Which way to go.

Boekhold, A.E. Ecological risk assessment of contaminated soil in the Netherlands.

Eijsackers, H.J.P., van het Groenewoud-Groot, M. and Breure, A.M. Upgrading system-oriented ecotoxicological research.

van der Geest, H.G. León Paumen, M. Dynamics of metal availability and toxicity in historically polluted floodplain sediments.

van Gestel, C.A.M. Physico-chemical and biological parameters determine metal bioavailability at different spatial and temporal scales.

de Haas, E.M. and Kraak, M.H.S. Species-specific responses of benthic invertebrates explain their distribution along environmental gradients.

Klok, C. and Kraak, M.H.S. Living in highly dynamic polluted river floodplains, do contaminants contribute to population and community effects?

Kools, S.A.E, Boivin, M-E.Y., Kuenen, F.J.A., van der Wurff, A.W.G., van Gestel, C.A.M. and van Straalen, N.M. Responses of Terrestrial Model Ecosystems from heavy metal polluted grasslands.

Laskowski, R., Skalski, T. and Stefanowicz, A. Effects of mixed diffuse pollution on biological diversity – methods, approaches and examples.

Liess, M., Schäfer, R.B. and Schriever, C. The footprint of pesticide stress in communities - species traits reveal community effects of toxicants.

Posthuma L., Eijsackers, H.J.P. and Vijver, M.G. What is the meaning of environmental quality criteria?

Preziosi, D.V. and Pastorok, R.A. Ecological Food Web Analysis for Chemical Risk Assessment.

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Afsluitend document Stimuleringsprogramma Stysteemgericht Ecotoxicologisch Onderzoek: Conclusies en aanbevelingen ten behoeve van beleid voor en beheer van diffuus verontreinigde bodem- en waterecosystemen

Diffuus verontreinigde gronden beheren? Beleids- en beheersopties voor diffuus verontreinigde terreinen: een systeemecotoxicologische analyse