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Intro Hil Kuypers

Dear all,

Since April 1st I am the new Secretary of the ECRR and the successor of Wim Zeeman, who fulfilled this job for more than a year within DLG. During this period Wim drafted a new strategy and communication plan for ECRR and initiated the renewal of the website.

In my role as secretary I have recently started my activities for ECRR; thereto I am working in close cooperation with ECRR chairman Bart Fokkens and my colleges at DLG, Wim Zeeman and Rogier Vogelij. I hope to continue the positive contributions to the ECRR.

Within DLG, I have been working on several positions, as senior advisor, project manager or secretary for land consolidation committees. In my work I have been dealing mostly with rural development issues and land consolidation. Apart from that, I am working on international projects for DLG as well; currently as team leader of a project with Croatian Waters, dealing with implementation of the EU WFD in Croatia.

I am looking forward to contribute to the work and activities of ECRR and hope for a fruitful cooperation with all relevant organisations to achieve ECRR's mission and goals.

A current activity for ECRR is the start up of the preparations for organizing/coordinating the theme "protect and restore rivers and water eco systems to reach a good ecological status of European water bodies" as one of the events for the next WWF in 2012. ECRR acts in this process together with ONEMA and EWA. Already some first inventories were made, and some ideas have been proposed. In this newsletter you may find more information on this subject.

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ECRR involved in preparation of WWF6

In spring 2010 the next World Water Forum event (WWF6) will take place in Marseille, France. ECRR is invited to coordinate / organise, in close cooperation with EWA* and ONEMA**, the preparatory process towards the WWF6 for the theme 'Protect and restore rivers and water ecosystems to reach a good ecological status of European water bodies'.

On April 29th 2011, a preparatory group of ECRR, ONEMA and CEMAGREF (on behalf of EWA) met at Brussels to discuss the preparation of this next WWF 6.

River restoration and eco systems is a quite new issue on the WWF6 agenda. Especially the increasing presence of local authorities, playing an important role in restoration projects forms a challenge, f.e. to involve them in the ECRR activities.

In the meeting it became more clear how such a coordinating role could be fulfilled by the three organizations. It was decided to elaborate together a draft joint work plan, based on the ECRR work plan.

Both ECRR and RESTORE are positive about participating in the 6th World Water Forum. A general agreement on taking up an active role in leading it has been reached. By doing so, it is possible to link the ECRR and RESTORE activities, and provide information to WWF.

A new, more outlined work plan will be presented to the ECRR and RESTORE board soon.

Hil Kuypers

*) EWA: Ecology, river restoration up till now are not the main focus. Basic mission of EWA is to share and provide feedback on knowledge to water professionals and experts in Europe, and to contribute to the definition and implementation of water related EU policies. The WWF6 event fits in this mission, EWA is willing to contribute.

**) ONEMA: Its general objective is to obtain good status of river basins, and enhance restoration; using several stake holder networks. Together with the French EWA member (ASTEE), ONEMA works on the green infrastructure. Efforts are made to involve stakeholders, both at regional and local levels.



Trout 2010 Stakeholder Participation in Brook Restoration

Watercourses and their surroundings play an important role in urban ecology. They are not only recreation areas for citizens but also pathways and resting sites for fauna and flora. To serve these multiple purposes improvements have to take place, not only in reference to water quality but also to the structure of the waterside. These aspects are interesting themes for the public: Active participation e.g. in 2 Bachpatenschaften (adopt a brook) can lead citizens of different ages to feel more familiar with their place of residence. Tasks of Bachpaten vary with personal interest and the condition of the stretch of water with in-stream restoration being the main activity. In the Borough of Wandsbek more than 80 Bachpatenschaften exist. More than 800 individuals from pupils to the elderly feel responsible for their 2 brook on the doorstep.

The total length of running waters in the Hamburg Borough of Wandsbek (14 755 ha, 410 000 inhabitants) is about 360 km, most of them look like straightened and deepened canals filled with mobile sand. For the limnologist these stretches are headwaters in a landscape formed by the glacial ages, characterised by a stable bottom being thus salmonid biotopes with cold summer water. Unfortunately the knowledge of the potential of species richness and natural fish production has been lost. Most urban brooks, nowadays, are inhabited mainly by roach and perch. This discrepancy reveals the amount of work needed to change today's status to a more sustainable environment.

After brook improvement work the documented species change from ubiquitous invertebrates to indicator organisms of lively running waters like mayflies and caddisflies is a real reward for the participating citizens. And it is not

only an ecological but a sociopsychological approach, as well. The new perception of waters is a real phenomenon: where there was a silent slow flowing canal suddenly a murmuring brook appears.

After several years of inducing turbulence and brooks' dynamics a vision arose to restore the characteristics of the salmonid region in one pilot brook, structures like pool-riffle-sequences and meandering of the watercourse being main goals. First checks of chemical and physical data of the Wandse Beck revealed that this is not a nonsense activity. Successful breeding of brown trout eggs in the Wandse during several winters has shown that no principle problems are to be awaited. Six trout year classes up to now have been identified by electro fishing.

The project Trout 2010 achieves necessary changes via co-operation of an NGO (BUND Hamburg), the engaged citizen groups, the Umweltstiftung der Hamburgischen Electricitäts-Werke and the Wandsbek administration. Brown trout being but one key species. Scientific institutions engage in special tasks, e.g. elaborations of catchment improvements and low water level elevation. All of this can not only be considered as part of the ongoing process of the Water Framework Directive's implementation but also as important aspects in Agenda 21 activities and support for the improvement of the urban society. As such it is part of best practices for the Metropolitan Region of Hamburg.

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A Workshop Focused on Advances in River Science, Swansea



Over 70 academics, consultants, public and third sector workers from around the world met at Swansea University in April 2011 for the inaugural Advances in River Science workshop.

The [UK Flood Risk Management Research Consortium](#)-sponsored event was directed towards advancing integrated river and flood risk management, focusing on the role of sediment, habitats and morphology in increasingly complex, dynamic and natural-human hybrid river environments. The workshop aimed to demonstrate best practice from around the world in a series of key themed areas, and to provide a forum for early-career researchers and practitioners to discuss ideas and approaches with established international leaders in their respective fields.

A series of speakers from around the world including the USA, Scotland, England and New Zealand set the scene and it soon became clear that collating and storing data from research outputs, in a format that could be used by both practitioners and academics was a recurring theme. New methods for achieving this were highlighted.

A series of science presentations concentrated on issues such as "River and catchment appraisal, typology and reconnaissance", "Altered morphodynamics" and "Challenges to integrated management". Of particular



interest, especially to the role of the practitioners, was the emphasis on the need to link this science to river restoration and best practice management and demonstration of how these areas of science were aiming to provide new tools and evidence base to help assess and understand rivers in this context.

This debate continued during the field trip to the Taff catchment in the Brecon Beacons, Wales, where, in un-seasonally glorious sunshine and stunning scenery, the difficulties associated with assessing catchment-scale sediment dynamics in the context of local river management issues were debated; would the development of broad scale sediment catchment models be useful to practitioners, or realistically will local river management relies on local understanding of specific issues?

Perhaps unusually, for a science-focused workshop there was an opportunity for stakeholder and practitioner groups to outline how work on-the-ground needed to work within policy constraints and demonstrated the need for more user-friendly tools underpinned by scientific understanding. As part of this discussion, the EU-LIFE+ funded, RESTORE project (http://ec.europa.eu/environment/life/project/Projects/index.cfm?fuseaction=search.dspPage&n_proj_id=3780&docType=pdf) was highlighted as an opportunity to define ways forward to help Practitioners and River Basin Managers deliver best practice river restoration projects within the context of appropriate policy and scientific evidence across Europe.

Presentations and posters of the workshop can be found at riverscience.wikidot.com. This website is a key component of the River Science Network which aims to encourage on-going knowledge exchange and networking amongst individuals who share a common interest in river science so it is recommended that you visit it. Further information on the how to join the river science network Alex Henshaw (a.henshaw@qmul.ac.uk); or to be involved with RESTORE please contact Jenny Mant (rrc@therrc.co.uk).

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Knowledge in action in river restoration

In river restoration projects policy makers, environmentalists, local stakeholders, hydrologists, members of historical societies and many others meet and discuss. But the diversity of backgrounds and knowledge's of these people doesn't make it always easy to understand each other. It is as if different languages are spoken. Literature on science and society studies refers to 'knowledge gaps' between science, policy and practice. The assumption is that knowledge is not sufficiently shared between sectors and disciplines, and that translation problems occur.

In complex design activities such as river restoration, which affect the interests of many and that impacts on multiple scale levels, many knowledge fields need to be integrated, so that the potential for gaps between knowledge's is large. This raises the following questions: what forms of knowledge integration underlie current planning, design and execution of river restoration? Are these adequate? The research project "Knowledge in Action in the Rhine River Restoration" analysed the translation of knowledge and experience in the planning and implementation of river restoration projects. The investigations were executed by a research team together with a community of practice (CoP) of 20 policy makers, scientists and stakeholders from the Rhine river basin. To that end, eight river restoration projects in the Rhine river basin were studied. The CoP executed three in depth case studies (during two day transdisciplinary events), but knowledge exchanges among participants to the CoP itself were monitored too.

In these projects cognitive communities were identified. Cognitive communities are groups of people who share the same knowledge field and thus 'speak the same language'. Representatives of these cognitive communities were asked, through interviews, how they experienced the interactions with other groups during the implementation of the projects. Special emphasis was put on how interactions developed during the history of the project and on what the role of project management was. An important finding was that the quality of planning and design of river restoration positively correlates with the quality of interaction and communication between actors during the process. And that skills for person-to-person interaction and communication need to be developed, because it was observed that in actual planning and design of river restoration conflicts, lack of involvement and translation difficulties lead to long and inefficient processes (10 - 20 years in most of our cases). Surprisingly the observed 'gaps' between cognitive communities continue across scales. Members of a cognitive community (for instance on ecological connectivity) were connected between scales, so that local 'ecologists' were well informed about European and national ecological policies and policy workers were aware of experiences at the project level, but only on aspects relevant to their own knowledge. So interdisciplinary boundary work is needed not only at the project level, but also between scientific and policy disciplines like: ecologists, hydrologists, agriculturists, fishery experts, etc.

The KNAC research defined a set of ten general principles to improve the practice of planning and design of river restoration.

1. In river restoration projects communication skills and capacities are of high importance.
2. The art of managing boundaries between cognitive communities is essential in river restoration. This art in project management terms is known by different names: process management, boundary spanning, in French: 'animateur'.
3. It is important to monitor and communicate, the success and failure of river restoration projects. Success and failure are problematic concepts as different stakeholders may define it differently. In the Australian practice of river restoration a specified percentage of the budget is obligatory for evaluation and monitoring.
4. Pilot projects and experiments are useful as they generate experiences which convince people that new solutions are not dangerous.
5. Addressing history (of the river, interpersonal relations, cultural, local, experience) of locations and of stakeholder relations deepens the perceived value of river restoration projects.
6. Involvement of local knowledge and experience from local inhabitants in river restoration is crucial.
7. Dialogues between experts and local stakeholders are crucial in river restoration processes. Also important are dialogues between experts within the water sector.
8. Meeting places like communities of practices deepen the quality of interactions as these meetings facilitate to learn each other's languages.
9. Organizing 'time to learn' and reflection in process designs improves the quality of river restorations.
10. Respect cultural and legal rights (implicit and explicit), like millers rights, nomads (like the Samus in Sweden), social places (for fishing), and anglers rights (UK).

KNAC is part of the IWRM-net research program (<http://www.iwrn-net.eu/>) funded by the EU FP6 program, with additional German and Dutch research funding. Information:

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Aerial view on the Doorbraak, one of the KNAC cases.



Call for articles

The newsletter of the ECRR should also be a way to share with one another what interesting work is being done, information about seminars or literature.

One way of doing this is by writing an article of any project, event or literature you may be acquainted with. Send this article (**maximum of 500 words**) to the secretariat of the ECRR at info@ecrr.org.

We will take a close look to the content and if it is coherent with the philosophy of ECRR (ecological river restoration and sharing knowledge) your article will be published with pleasure in the next edition (s) of the ECRR Newsletter.

The secretariat of the ECRR hopes to receive any article on ecological river restoration from any of its members.

European Events 2011; relevant for ECRR

For events in other continents please consult the website

18-20 May	Clean water of Russia	Yekaterinburg	http://www.eecca-water.net
24-27 May	course Modelling Habitat Fish and Invertebrates	Warsaw	http://www.mesohabsim.org/
08-12 Aug	“Rivers as Linked Systems” International Society for River Science	Berlin	http://www.riversociety.org/berlin.html
21-27 Aug	World Water Week	Stockholm	http://www.siwi.org/worldwaterweek
27-30 Sept	INBO	Porto	http://www.inbo-news.org/spip.php?mot120&lang=en
3-5 Oct	Restoration of Streams; the houting project	Tonder, Denmark	http://www.snaebel.dk/konf
10-14 Oct	Bioindication in monitoring of freshwater ecosystems	St Petersburg	http://www.ecrr.org/events-october-2011.html
18-20 Okt	1 Iberian Congress on RR	Leon	http://www.restaurarios.es/
29 Oct-04 Nov	International waterweek	Amsterdam	http://www.eurekanetwork.org/c/document_library/get_file?uuid=ef081217-4a05-4f07-bf65-0a8743a2536a&groupId=10137

