

NEWSLETTER

Volume 6 - No. I March 2002

Newsletter – ECRR European Centre for River Restoration ISSN (print): 1397-0097 ISSN (electronic): 1600-194X Editor: Hans Ole Hansen

European Centre for River Restoration

Secretariat:

National Environmental Research Institute Vejlsøvej 25 P.O.Box 314, DK-8600 Silkeborg, Denmark

Tel + 45 89 20 14 00 Fax + 45 89 20 14 14 e-mail: ECRR@dmu.dk URL: http://www.ecrr.org

EUROPEAN CENTRE FOR RIVER RESTORATION

The ECRR secretariat at RIZA from I April 2002

Since the establishment of the European Centre for River Restoration the Danish National Environmental Research Institute (NERI) has had the secretariat responsibilities.

New secretariat

On I April 2002 the ECRR secretariat at NERI will be transferred to the Dutch Institute for Inland Water Management and Waste Water Treatment (RIZA). This date coincides with the finalisation of the EU Life project by the end of March 2002 and was therefore agreed by the Management Board of the ECRR.

From the start of ECRR it has been planned that secretariat responsibilities should shift between institutions. This is the first change of institute running the secretariat within the young ECRR network. The Management Board Members have not yet decided for how long the secretariat will be located at RIZA.

NERI has done a great job running the secretariat during the recent years. Denmark and the United Kingdom originally took the initiative of establishing the ECRR network by initiating their joint demonstration project in 1995. NERI hosted the 1st ECRR river restoration conference in 1996, and this conference encouraged other European countries to back up the idea of officially constituting a European Centre for River Restoration. In 1999, the ECRR became a fact. A website, the newsletter and, of course, the 2nd Conference of River Restoration in Wageningen, the Netherlands in 2000 have been major highlights of the ECRR network.

NERI and RIZA are working closely together to prepare the website transfer. Hopefully it will not cause too much inconvenience for you as ECRR participants. A little patience of all users during the first weeks in April will be appre-

ciated. The management board are confident that RIZA will keep you well informed and that you as ECRR members will keep our network active.

New contact address

The contact address of the new secre-

European Centre for River Restoration - Secretariat

c/o Institute for Inland Water Management and Waste Water Treatment (RIZA) P.O. Box 17

NL - 8224 AA Lelystad The Netherlands

E-mail: ECRR@ecrr.org URL: www.ECRR.org



ECRR study tours

Networking and the exchange of experiences with river restoration are an important ECRR objective. In addition to website, newsletters and international conferences, ECRR has decided to organise regular study tours. These

are regarded as excellent opportunities for interactive exchange of information within a smaller group of people as compared to e.g. ECRR conferences. The first ECRR study tour will take place in the Netherlands (see below). Dutch organ-

isations are looking forward to exchanging and discussing their experiences with other participants from European countries

First ECRR study tour 10-13 September 2002, The Netherlands

1st announcement

During the recent century, rapid industrial and rural development and population growth have resulted in substantial loss of natural rivers and their habitats. Most of the Dutch rivers are expected to be classified as heavily modified water bodies according to the classification within the Water Framework Directive.

In the late 1980s a NGO presented the 'Plan Black Stork' and in 1992 WWF presented their 'Living River's programme'. Following the major floodings in 1993 and 1995, the Dutch government initiated an action programme. River restoration has a prominent role in the different measures implemented to regain safety in the Rhine / Meuse delta area.

Provisional programme

The first ECRR 3-day study tour will be held in the Netherlands 10-13 September 2002. During the tour, a quick-scan from small-scale to large-scale rivers will be made. The following problems will be addressed:

- Practical approaches within a transboundary (small-scale) river restoration project.
- Urban development and solutions for large rivers.
- · (Need for) Retention areas in the delta area

All will be considered within the concept of sustainable, integrated water management

The programme will consist of a mixture of lectures, field visits and workshops. The discussions and results of the projects can provide new aspects for people working on these projects and the participants are able to exchange experience and knowledge for the benefit of their own country. A more detailed programme, including information about costs and registration, is in preparation and will be announced soon in the following newsletters and on the ECRR homepage.

River Restoration mailing list

By Lydia Bruce-Burgess, Queen Mary, University of London, UK and Hans Ole Hansen, European Centre for River Restoration (ECRR@ecrr.org).

Introduction

Last year Lydia Bruce-Burgess, Queen Mary, University of London set up a River Restoration mailing list to facilitate discussion, collaboration and communication on river restoration in academic and non-academic communities.

The mailing list is no doubt already very well-known by many of the ECRR participants. It will soon be transferred to the ECRR who will administer the list in future.

What is a mailing list?

A mailing list is an electronic discussion list service specifically for the higher and further education and research communities and is a free service. It uses electronic mail to enable groups to talk to each other and to share information. There are numerous lists covering different subjects, and the River Restoration mailing list is one of these.

All you need to use is e-mail. If you join the River Restoration mailing list you

will receive all the messages sent to that list and you can post your own messages to all members. This means you can take part in quick and easy group discussion without leaving your office.

The purpose of the River Restoration mailing list

The role of the River Restoration mailing list is to act as a discussion forum for both academics and practitioners in the field of river restoration. It enables the



wider dissemination of information of a practical, theoretical and scientific nature within environmental organisations and across academic disciplines.

This list also has the potential to act as a means of disseminating information on areas of good practice, thus facilitating advancements within this field.

It can also be used to advertise conferences, workshops, etc. enabling rapid contact with individuals involved in River Restoration globally.

The idea for this River Restoration mailing list arose with the realisation that great benefit could be gained in this field if academics and practitioners learnt to talk more, and exchange information, with the main outcome of improving the science and practice of river restoration.

A mailing list is a suitable means of trying to achieve these goals, as mailing lists can help individuals to:

- · keep in touch with their peers;
- help keep up-to-date with developments in a specific field;
- · find out about and distribute information regarding funding opportunities,

calls for papers, conferences, vacancies and relevant resources;

- seek advice from more experienced list members or ask questions outside your expertise;
- by sharing experiences, you can avoid re-inventing the wheel; and
- mailing lists also allow you to reach a particular group of people quickly with a rapid response to queries and feedback on your ideas.

Who can join?

This mailing list is targeted primarily at academics and practitioners of river restoration, but welcomes the participation of any individual with an interest in this field.

Participants of the European Centre for River Restoration are highly recommended to join the list.

At present, more than 300 participants from all across the World have joined the mailing list.

An archive on all previous mails sent to and from the list can be found at the WEB-address www.jiscmail.ac.uk/lists/river-restoration.html from where you

can also send messages to be included at the list.

How does one join the mailing list? In order to join this list, simply e-mail: JISCmail@JISCmail.ac.uk

In the main body of your e-mail (not in the subject box), please use the following commands:

join RIVER-RESTORATION FIRST-NAME LASTNAME

To post a message to this mailing list, e-mail:

River-Restoration@JISCmail.ac.uk

However, if you prefer, you can join the River Restoration list and send messages via its web interface at: www.JISCmail.ac.uk/lists/ river-restoration.html

Additionally the ECRR secretariat can be contacted by e-mailing: **ECRR@ecrr.org**

River Restoration in Europe - Proceedings on the Internet

Institute for Inland Water Management and Waste Water Treatment, RIZA, The Netherlands

The second international ECRR conference on river restoration was held in May 2000.

The proceedings was printed in July 2001 and are now downloadable from the ECRR homepage www.ECRR.org

The conference was organised by the ECRR and hosted by the Dutch Institute for Inland Water Management and Waste Water Treatment (RIZA).

It focused on practical approaches in river restoration. Many discussions and exchange of experiences took place during the week.

Projects and experiences on river restoration differ on scale and geographic positions and therefore on conditions. Stimulation of knowledge sharing and, even more important, the possibility to

find each other in new or future projects were main goals of the conference.

Contents

In the proceedings, edited by H.J. Nijland and M.J.R. Cals, 61 papers and abstracts are grouped as follows:

- · General, Key-note papers,
- · Eastern Europe,
- · Western Europe,
- · Southern Europe,
- · Northern Europe,
- · Outside Europe.

How to get the report

The report is, as mentioned, downloadable from the ECRR homepage.

On special request, hard copies can be ordered for the price of euro 60 through CABRI Mailservice,

PO box 431,8200 AK Lelystad, The Netherlands, tel +31 320 285311 fax +31 320 24112, e-mail: riza@cabri.nl.

Refer to:

Nijland, H.J. & Cals, M.J.R. (Eds.) (2001): River Restoration in Europe, Practical approaches. - Proceedings from the conference on river restoration, Wageningen, The Netherlands, 2000. - RIZA rapport nr. 2001.023. Institute for Inland Water Management and Waste Water Treatment/ RIZA Lelystad, The Netherlands. 344 pp.

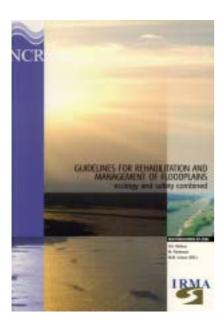


SHORT NOTES

Guidelines for Rehabilitation and Management of Floodplains - ecology and safety combined

Institute for Inland Water Management and Waste Water Treatment - RIZA, The Netherlands

The printed guidelines are the result of a two-years project. Those efforts of RIZA and NCR were made in the IRMA-Sponge programme.



The publication exhibits some practical results of ongoing field research on ecological rehabilitation, combined with knowledge of safety against floods. The main emphasis is on the translation of this research into practical guidelines and recommendations, to be used in planning and design of measures in floodplains.

Contents of the report

The first three chapters of this report offer introductions, each from their own viewpoint.

In the first chapter, the focus point is the river landscape in general. Amongst others the history of human interference in the river landscape, theories on the ecological functioning of rivers and summaries of hydrological and morphological processes are treated here.

The second chapter gives an overview of relevant policy documents for the river landscape in the Netherlands.

The third chapter deals with aspects in which interrelations between different rehabilitation measures come to light. These aspects are the ecological coherence in ecological networks, the effects of measures on design river water levels and aspects of dealing with polluted soils.

Chapters 4 to 10 each deal with one of the measures that might be considered in floodplain rehabilitation projects. In all of these seven chapters, first the measure and its reference situation are described; then attention is paid to the functioning of the area in which the measure is implemented, from hydrological, morphological and ecological viewpoints. Finally an overview of the suitability of the river stretches to the measure and a number of guidelines and recommendations for the implementation of the measure are given.

The last chapter deals with grazing management, the choices that must be made there, and the consequences these choices have for the further development of the area. This last chapter to some degree is relevant for all preceding chapters dealing with specific measures, but this time from the viewpoint of terrain management.

How to get the report

The report will soon be downloadable from the IRMA-Sponge programme homepage www.irma-sponge.org

A hard copy can be ordered for the price of euro 11,34 (incl. mail costs) through CABRI Mailservice,

PO box 431,8200 AK Lelystad, The Netherlands,

Tel +31 320 285 333; fax +31 320 285 311

e-mail: riza@cabri.nl

Refer to:

Wolters, H., M. Platteeuw & M.M. Schoor (Eds.) (2001):

Guidelines for Rehabilitation and Management of Floodplains - ecology and safety combined.- NCR-Publication 09-2001./ RIZA report: 2001.059, ISSN 1568-243x. Institute for Inland Water Management and Waste Water Treatment/RIZA Lelystad, The Netherlands. 184 pp.



2003: International year of freshwater

The United Nations has proclaimed 2003 as the International Year of Freshwater.

In the resolution, the UN »encourages all Member States, the United Nations system and all other actors to take advantage of the Year to increase awareness of the importance of freshwater and to promote action at the local, national, regional and international levels«.

The International Year of Freshwater provides an opportunity to accelerate the implementation of the principles of integrated water resources management. The Year will be used as a platform for promoting existing activities and spearheading new initiatives in water resources at

the international, regional and national levels. The International Year of Freshwater is expected to follow up on agreements reached at the World Summit on Sustainable Development (Johannesburg, September 2002), and should have an impact far beyond the year 2003.

The publication by the United Nations system of the World Water Development Report will be a major focus of the Year's public information activities. Its first edition will be launched at the Third World Water Forum in Kyoto, Japan in March 2003.

The public information and media strategy will include the elaboration

of information materials, brochures and media kits. Educational material for schools, videotapes and documentaries, and an official Website for the Year are also being developed, with assistance from the private sector, NGOs and bilateral donors.

For further information: www.unesco.org/water/iyfw

Or contact:

Mr Manuel Dengo or Ms Marcia Brewster
E-mail: Dengo@un.org or
Brewster@un.org

CONFERENCES

The Centre has received information about the following international conferences with relevance to river restoration. Further information can be obtained from the Internet homepages given and by writing to the e-mail addresses provided.

9th International Symposium on the Interactions between sediments and Water

Banff Springs Hotel, Canada 5-10 May 2002

Symposium Themes:

- Assessing and/or Restoring Disturbed Watersheds
- Sediment-water linkages in terrestrial and aquatic (marine and freshwater) environments
- Evaluating change in saline and freshwater habitats.

For further information URL: www.wsc.monash.edu.au/iasws/ninthconference.html

International Symposium on Floodplain Protection and Restoration Strasbourg, France 8-12 July 2002

The main theme of the symposium will be "Assessment of long-term river management on floodplain forest and grassland, and lateral arms ecology".

Other main themes:

- Natural functioning of floodplains: biodiversity, bio-geochemistry, river-groundwater exchanges, aquatic ecosystems.
- 2. Evaluation of responses of terrestrial and aquatic ecosystems to river management.
- 3. Synthesis of existing knowledge on floodplain protection and restoration.
- Partnerships between scientists, decisionmakers, government agencies, conservation bodies and managers in order to improve floodplain protection and restoration.

For information on programme, abstract submission, registration etc. visit the symposium WEB-site at:

http://floodplain2002.u-strasbg.fr

International Course on Wetland Management

Lelystad, The Netherlands 22 August - 2 October 2002

The wetland management tasks are complex, involving many interrelated factors. Ecological, hydrological, sociological, technological, administrative, internal- and external factors all play their role.

Consequently, the people who have to actually manage a particular wetland need a great deal of knowledge and skills to do this successfully.

In practice, many people involved in wetland management do not possess the knowledge and skills necessary for the effective management of wetlands in a sustainable way.

The International Course on Wetland Management, the first edition of which was held in Spring 1994, aims to provide training in this field. Since the first course in 1994, many reactions from around the globe have confirmed the need and the effectiveness of a course like this, and also contributed to the further improvement of the curriculum.

Therefore, this course will still better cater to the needs of the wetland manager than the previous editions.

For further information URL: Brochure in PDF at: www.ramsar.org/watc_manager

www.ramsar.org/watc_management.pdf Application form in two JPGs [1, 2] at: www.ramsar.org/pictures/watcmanagement-form1.jpg



Fifth International River Management Symposium

Brisbane, Australia 3-6 September 2002

Sessions topics include dams, irrigation, water efficiency, climate change and rivers, tropical rivers, indigenous river management, institutional arrangements, design of water frontages, land use impacts and salinity, biodiversity targets, wild rivers.

For further information URL: www.riverfestival.com.au

Second International Symposium on Flood Defence (ISFD '2002)

Beijing, China 10-13 September 2002

The purpose of the conference is to review the state-of-the-art of the studies on flooding and engineering and non-engineering strategies.

The symposium will focus on better understanding the laws of flooding and the consequent environmental problems as taken from different perspectives, climate change and its impact on extreme hydrological events, and reporting new approaches in flood control strategies.

The symposium will provide not only a forum for exchange on the latest developments in flood defence but also an opportunity for the participants to observe the development of hydraulic engineering in China.

For further information URL: www.irtces.org/isshhu/2ISFD.htm

13th International Salmonid Habitat Enhancement Workshop

Westport, Co. Mayo, Ireland 16-19 September 2002

Workshop Objectives:

 To provide attendees with an opportunity to listen to speakers from many countries involved in designing and/or implementing salmonid riverine enhancement programmes.

- To provide visitors the opportunity to view Irish Salmonid Enhancement programmes. Westport is centrally located to much of the 400 km of channel which has been rehabilitated.
- To accommodate the interchange of ideas in this field.

For more information URL: www.cfb.ie/salmonidworkshop2002.htm

River Basin Management Plans -Practical Aspects and Economic Questions

Amsterdam, The Netherlands 2-3 October 2002

The European Water Association (EWA) arranges this conference.

Precise prescriptions of the European Water Framework Directive demand the production of River Basin Management Plans (RBMP) for European River Catchments. The conference will serve as a platform for answers on these and more questions. A "cross-section" over the present European status concerning the topic will be given.

General topics

- The concept of the Water Framework Directive
- Experiences with former River Basin Management Plans
- National implementation: Concepts, state of the activities, challenges.

For further information: European Water Association Theodor-Heuss-Allee 17 D - 53773 Hennef Germany

Phone: +49 (0)2242 872-189 Fax:+ 49 (0)2242 872-135 E-mail: ewa@atv.de

The EWA homepage:

www.EWAonline.de contains regularly updated information about the conference.

NGO Worldwide Conference on Wetlands

Valencia, Spain 14 - 16 November 2002

On the occasion of the VIII Conference of the Wetlands Convention (Ramsar) in Valencia (Spain), the Spanish ecologist and conservationist NGOs are undertaking the organisation of a NGOs Conference.

The aim is to provide a space for organisations that are fighting all over the world for wetlands conservation to have an opportunity to show their experiences and to be heard.

Ecologistas en Acción, Amigos de la Tierra/ Friends of the Earth Spain, WWF/Adena and SEO/Birdlife, are working together to organise this international event, titled »Ramsar, 30 years on«. It will take place in the Palace of the Congress of Valencia (Spain) on 14th, 15th and 16th of November, 2002.

Our aim is to gather the largest number of NGOs which are working on wetlands projects in the five continents, in order to get a survey of the present global situation.

The issues proposed to be discussed at the NGOs Conference »Ramsar, 30 years on« are:

- I Balance of 30 years of the Ramsar Convention
- 2 Strategic plan of the Convention for the triennium 2003-2005.
- 3 Water and wetlands sustainable use.

Nevertheless the programme of the conference still remains opened and any proposal of new issues that you would send to us would be taken into consideration in the final programme.

We think that this meeting will give us the opportunity to show our projects and views on the issue of wetlands conservation and rational use around the world and to see them taken into account during the COP 8.

For further information URL: www.nodo50.org/preramsar/ conference.htm or e-mail: preramsar@nodo50.org



First International Symposium on Transboundary Waters Management Monterrey, Mexico 18 - 22 November 2002

The Symposium's objective is to review the main issues involved in the management of transboundary basins and aquifers with an integrated scope.

Water quantity and water quality management, as well as aspects related to agricultural and industrial development, forests and fisheries, will be considered.

Social, economic, political and education issues will also be included, in view of their relevance in the international and interstate water resources arena.

Several experts will be invited to give keynote speeches dealing with different topics related to transboundary waters management

Papers are welcomed for review and possible presentation during the Symposium until 20 May 2002.

For further information URL: www.TransboundaryWatersMexico.org

The 3rd World Water Forum

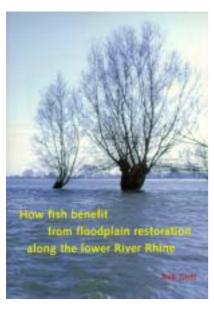
Kyoto, Japan 16-23 March 2003

The Forum is intended to be open to all stakeholders, to stimulate global awareness of water problems, to help generate action from the debates and ideas centred around the World Water Vision, and to contribute to concrete solutions of world water problems.

For further information URL: www.worldwaterforum.org

PUBLICATIONS AND VIDEOS

Publications



Grift, R.E. (2001):

How fish benefit from floodplain restoration along the river Rhine. – PhD Thesis, Wageningen University, 205 pp. Fish Culture and Fisheries Group, Wageningen Institute of Animal Sciences, Wageningen University, P.O. Box 338, 6700 AH, Wageningen, the Netherlands. ISBN 90-5808-488-4.

The report is downloadable from: www.gcw.nl/dissertations/3045/dis3045.pdf

Abstract

The objectives of this study were to test the beneficial value of newly created secondary channels and reconnected oxbow lakes along the lower River Rhine for fish and to give advice on position, shape and character of future water bodies.

These water bodies should contribute to the rebuilding of the population of rheophilic cyprinids that are endangered due to embankment and normalisation of the Rhine.

The functions these water bodies fulfil during the life cycle of distinct fish species, were inferred from the description of patterns of presence of fish in time and space in 25 floodplain water bodies (secondary channels, oxbows, lakes). In all water bodies, depth, flow velocity and the presence of vegetation determine the fish community present.

Secondary channels and reconnected oxbow lakes do have a beneficial value for the riverine fish community. They function as nursery areas for all rheophilic cyprinids (e.g. Barbus barbus, Leuciscus idus and Gobio gobio). Secondary channels probably also function as spawning areas for L. idus and G. gobio but not for lithophilic species (B. barbus, Leuciscus leuciscus) since suitable substrate lacks. Eurytopic species (Abramis brama, Rutilus rutilus and Stizostedion lucioperca) use all types of floodplain water body to reproduce. For A. brama, isolated turbid

clay-pits form important source arcs from which juveniles recruit to the main channel during floods.

The dominance of eurytopic species in the lower Rhine is caused by the large area of suitable spawning and nursery areas for these species relative to those of rheophilic species.

For limnophilic species (Tinca tinca, Rutilus erythroph-thalmus) suitable habitat (vegetated lakes) is also scare and should be preserved. Within plans on flood protection, floodplain management should focus on increasing the number of secondary channels and on restoring the natural interaction between the river and its floodplains.

Wolfert, H.P. (2001):

Geomorphological change and river rehabilitation - Case studies on lowland fluvial systems in the Netherlands. – Alterra Scientific Contributions 6, Alterra Green World Research, Wageningen, The Netherlands. 200 pp. ISBN: 90-327-0311-0.

Abstract

Integrated spatial planning for river rehabilitation requires insight in the geomorphology of river systems. Procedures are elaborated to implement a functional-geographical approach in geomorphology, in



which a view of rivers as four-dimensional systems and the use of a process-based hierarchy of spatio-temporal domains is coupled to methods of land evaluation. Geomorphological mapping and map interpretations are important research techniques.

Application is exemplified in case studies on lowland streams and rivers in the Netherlands, in which reference situations, process conditions to be fulfilled, suitability of areas and layout of measures are addressed.

The natural developments of bedforms in the meandering sand-bed Keersop stream are strongly influenced by seasonal variations in discharge and aquatic macrophyte cover.

Differences in the short-term recovery of the Tongelreep, Keersop and Aa streams to meander rehabilitation are caused by differences in bank material composition, but were also influenced through the design of crosssectional dimensions and bend curvature. Riverine pastures along the small meandering River Dinkel depend on natural levee overbank deposition and in the long term on meander cut-offs, implicating conservation strategies must be based on geomorphological disturbance processes. Analysis of historical migration rates allowed areas suitable for re-meandering along the small River Vecht to be indicated, on the basis of the spatial variability of bank material resistance to erosion.

In the embanked River Rhine depositional zone, four types of fluvial styles occurred before channelisation; landform development was related to the channel width-depht ratio values and the flow velocity over the floodplain.

Insights in the Rhine river reach continuum could be incorporated in a cyclical planning procedure characterised by phases of plan design and plan evaluation, at two different scale levels. Finally, similarities and differences between these case studies are set in a wider perspective and recommendations for river rehabilitation are discussed.

Wolters, H., M. Platteeuw & M.M. Schoor (Eds.) (2001):

Guidelines for Rehabilitation and Management of Floodplains - ecology and safety combined.- NCR-Publication 09-2001 / RIZA report: 2001.059. Institute for Inland Water Management and Waste Water Treatment, RIZA Lelystad, The Netherlands. 184 pp. ISSN 1568-243x.

See the announcement under 'Short notes'.