

---

---



# News

The Newsletter of the R Project

Volume 3/3, December 2003

---

---

## Editorial

by *Friedrich Leisch*

Another year is over and it is time for change in the editorial board of R News. Thomas Lumley will take over as Editor-in-Chief for 2004, and Paul Murrell will join him and Doug Bates as board members.

Three years ago, in the editorial of issue 1/1, Kurt Hornik and I outlined possible topics for articles in the newsletter; I am pleased to say that issue 3/3 covers all of these types of topics and much more.

This issue starts with an introductory guide on dimension reduction for data mapping, followed by two articles on applications that describe how R can be used as a simulation tool in empirical ecology and for the analysis of student achievements over time. Of interest to many users is creation of web pages from within R, the topic of the R2HTML package article. For programmers and those interested in getting a little bit more out of R we have a Programmer's Niche column on regular expressions, an introduction to a new debugging facility, and an introduction to the lmeSplines package.

Certainly one of the key strengths of R is the packaging system. We now have about 300 packages on CRAN and another 50 in the Bioconductor repository, and the lists keep growing faster and faster. This wealth of packages can have a down side. In my ex-

perience the distinction between a "package" and a "library" or why it is hard to install a "source" package on Windows are confusing issues, especially for beginners. This issue's Help Desk column clarifies this vocabulary and has many upseful tips on how to make your R installation easier to maintain.

At the Technische Universität Wien we are eagerly anticipating the first R users conference, useR! 2004, which will be held here in May. Over the last few years we had several developer conferences but this will be the first meeting primarily for those interested in using R for data analysis without necessarily writing software (although, in S, a software user often quickly becomes a developer). Several R core members will give keynote lectures on important features of R; in addition we hope to attract a large number of contributions from which we can compile an attractive program. In some sense this will be a conference version of R News, with bits and pieces for all R users from novices to seasoned programmers.

Looks like 2004 will be another good year for the R project. Best wishes to everyone!

*Friedrich Leisch*  
*Technische Universität Wien, Austria*  
[Friedrich.Leisch@R-project.org](mailto:Friedrich.Leisch@R-project.org)

### Contents of this issue:

Editorial . . . . .	1
Dimensional Reduction for Data Mapping . . .	2
R as a Simulation Platform in Ecological Modelling . . . . .	8
Using R for Estimating Longitudinal Student Achievement Models . . . . .	17
lmeSplines . . . . .	24

Debugging Without (Too Many) Tears . . . . .	29
The R2HTML Package . . . . .	33
R Help Desk . . . . .	37
Programmer's Niche . . . . .	40
Recent Events . . . . .	41
Upcoming Events . . . . .	42
Changes in R 1.8.1 . . . . .	43
Changes on CRAN . . . . .	43
R Foundation News . . . . .	45