The PracTEX Journal 2007-3–2008-1

The PracTEX Journal is an online publication of the \TeX\ Users Group. Its web site is \url{http://tug.org/pracjourn}. All articles are available there.

The PracTEX Journal 2007-3, August 2007

Issue theme: Tools for \TeX\ and \LaTeX\ users.

Francisco Reinaldo, From the Editor

The Editors, News from Around: Upcoming conferences in Pisa and Cluj (Romania); \LaTeX\ workshop in Berkeley

From the Readers, Feedback

Theresa Song Loong, The beginner’s forest of \LaTeX\

Images kept floating away, and keeping the style within one project both beautiful and consistent took up a lot of time. I have never been really content with a word processor. For a large project containing lots of math formulas, I assumed that learning to use \LaTeX\ would take as much time as trying to input the maths in a word processor. The final result was beautiful, but I was very wrong about how much time it would consume: using Greek fonts, making tables, using some packages, and trying to solve issues by reading incomprehensible package documentation (some of which didn’t even explain how to use the package, only how it was coded) was very time-consuming indeed.

Antero Neves, A minha experiência em \LaTeX\

[Article is in Portuguese.]
ARNE HENNINGSSEN, Tools for collaborative writing of scientific \LaTeX{} documents

Collaborative writing of documents requires a strong synchronisation among authors. This paper describes a possible way to organise the collaborative preparation of scientific \LaTeX{} documents. The presented solution is primarily based on the version control system Subversion. The paper describes how Subversion can be used together with several other software tools and \LaTeX{} packages to organise the collaborative preparation of \LaTeX{} documents.

ARTHUR BUCHSBAUM and FRANCISCO REINALDO, A tool for logicians

\texttt{turnstile} is a \LaTeX{} package that allows typesetting of the mathematical logic symbol, “turnstile”, in all of the various ways it is used. This package was developed because there was no easy way in \LaTeX{} to typeset this symbol in its various forms, and place expressions above and below the crossbar.

CHARILAOS SKIADAS and THOMAS KJOSMOEN, \LaTeX{}Xing with TextMate

This article discusses the TextMate text editor and its many capabilities that make working with \LaTeX{} documents a lot easier. Some of its features include syntax highlighting, various methods for automatic insertion of text (such as the begin-end blocks in environments and automatic labels for section commands), lookup of labels and cite keys based on partial matches, as well as tools for dealing with large projects.

TextMate is designed with the user in mind, so it is easy to customize it to your needs. During its short lifetime (about two and a half years) it has gained many supporters and has become a very popular text editor for the Mac OS X platform, and especially among \LaTeX{} users, as can be seen from the large number of \LaTeX{} related questions on the TextMate mailing list.

In addition to this article, the first author’s weblog can be used as a starting point for learning more about using TextMate for \LaTeX{}:

\url{http://skiadas.dcostanet.net/afterthought}

VINICIUS PROVENZANO, A \LaTeX{}2ε “Linux-like” environment on Mac OS X

Free and commercial \LaTeX{}2ε implementations for Mac OS X are available on the Internet. If you have always used a Mac, the best starting point is to download and install one of these systems. However if you have always used Linux and now find yourself in front of a brand new Mac OS X machine and have no time to learn new tools from scratch, your best option would be to use your familiar Linux applications on Mac OS X. This paper aims to show you how to install and configure a Linux-like \LaTeX{}2ε environment in Mac OS X, using Fink, \texttt{teTeX} and Kile.

JÉRÔME LAURENS, Will \TeX{} ever be WYSIWYG or the pdf synchronization story

Why can editing Plain, \TeX{} or ConTeXt documents be such a pain? Of course, we can use dedicated text editors and environments that are very handy, but we are far from the efficient graphical user interface of a modern word processor. In this article, we will point out some of the reasons why \TeX{} has no WYSIWYG (What You See Is What You Get) user interface and we will discuss the possible remedies. One of them is the pdf synchronization implemented in the pdfsync package. This technology will be explained, and we will see its benefits and its limitations. Finally, we consider routes towards a better user experience. Here, we are mainly concerned with \LaTeX{} and pdf output.

ALEXANDER TSYPYLAkov, \texttt{TpX} — a drawing tool for \LaTeX{}

This article describes \texttt{TpX}, a lightweight, easy-to-use graphical editor for the Windows platform, presents guidelines for its use, and discusses some features and limitations.

DUVVURI VENUGOPAL, Tools for creating bibliographic databases for use with \texttt{Bib}\LaTeX{}

By using \texttt{Bib}\LaTeX{} we can easily change the style of bibliography/references according to the style of the journal. But creating bibliographic databases for use with \texttt{Bib}\LaTeX{} is very cumbersome. This article describes the various software tools available for creating bibliographic databases easily, particularly for the Windows platform.

UWE ZIEGENHAGEN, \LaTeX{} document management with Subversion

From the single-author composition of a bachelor’s thesis to the creation of a book by a team, there are many occasions where version management of a document may be helpful. With the aim of overcoming the shortcomings of CVS (Concurrent Version System) the Subversion version control system was implemented.

In this article I will describe the Subversion setup on Windows and Linux systems, the elementary steps of document management and various \LaTeX{} packages working hand in hand with Subversion.

MARTIN SCHARRER, Version control of \LaTeX{} documents with \texttt{svn-multi}

This paper describes how to use the Subversion software to version control your \LaTeX{} files while also placing the current revision information in your document using the package \texttt{svn-multi} (v1.3 or later).
It covers all steps needed to set up and use Subversion, and to manage multi-file documents. Usage examples are provided for both basic and advanced features, to allow the reader to get the most out of the package.

DAVID WALDEN, Travels in \TeX{} Land: Fonts, self-publishing and another reason I like \TeX{}

In this column in each issue I muse on my wanderings around the \TeX{} world. Section 1 of this column describes some work I did organizing my experiences of using different fonts within \TeX{}. Section 2 describes use of an external processor in combination with \TeX{}. Section 3 gives an update on my self-publishing efforts using \TeX{}.

THE EDITORS, Ask Nelly: How do I create inline numbered lists the \LaTeX{} way?

THE EDITORS, Distractions — Alea iacta est!

The \textit{Prac\TeX{} Journal} 2007-4, December 2007

Issue theme: Teaching \LaTeX{} and \TeX{}.

PAUL BLAGA and LANCE CARNES, From the Editor

THE EDITORS, News from Around: Conferences in Pisa and Cluj (Romania); \LaTeX{} workshop in Berkeley; Helvetica — the movie

PAUL BLAGA, Teaching \LaTeX{}: Why and how?

We discuss some of the problems related to the process of learning \LaTeX{} and the opportunities presented by a \LaTeX{} course. We also propose a syllabus for such a course and briefly mention some of the \LaTeX{} books which, in our opinion, are suitable to be adopted as course material.

VINCENT VERFAILLE, A new package for conference proceedings

The new \texttt{confproc} package is a simple and efficient solution to build conference proceedings. Built from scripts developed for the DAFx-06 proceedings, it deals with various aspects: layout issues, table of contents, index of authors, maybe a general bibliography, etc. It combines the \texttt{pdfpages} package (to include PDF papers), the \texttt{hyperref} package (to provide hyperlinks) and other packages; and it runs \texttt{pdflatex}.

KUMAR M SENTHIL, \LaTeX{} tools for life scientists (Bio\LaTeX{}niques?)

\LaTeX{} has been a long time favorite of mathematicians and physicists. However, many packages are now available that have tremendously extended the capabilities of \LaTeX{} beyond routine typesetting and provide biologists new avenues to not only typeset documents, but also help in the visualization of membrane proteins and in the analysis of DNA or amino acid sequences by multiple sequence alignment. I will discuss with examples some of the \LaTeX{} packages and tools that are presently available for the biologists. Some scientific journals (for biological research) now accept \LaTeX{} formatted manuscripts, although they are still a rarity. This article will provide references for those sources that might be helpful to prospective authors from life sciences who want to submit manuscripts in \LaTeX{} format. This article is written from the perspective of a biologist who might be interested in creating better documents using \LaTeX{} & friends.

ROHIT VISHAL KUMAR, Using \LaTeX{} for writing a thesis

\LaTeX{} has been successfully used for typesetting widely different document formats. However, the complexity of typesetting some commonly used documents acts as a deterrent for some people who would like to use \LaTeX{} for their work. Over the years, I have noticed students who come to \LaTeX{} eager in their anticipation of using \LaTeX{}, lose their enthusiasm midway, and revert back to using Word. In this article, I have tried to described my own experiences of typesetting a doctoral thesis using widely available packages, in the hope that students can see the ease with which \LaTeX{} can be used for complex work.

WYBO DEKKER, The \texttt{ctable} package

The \texttt{ctable} package provides a \texttt{\ctable} command for typesetting table and figure floats. You will not need to type the usual nested begin...end sequences, as \texttt{\ctable} is a command, not an environment. \texttt{\ctable} takes only four arguments, but the optional first one may hold many \texttt{key=\texttt{value}} pairs and makes \texttt{\ctable} very flexible and extensible. It uses Simon Fear's \texttt{booktabs} package for better vertical spacing around horizontal rules and it provides facilities for making table footnotes.

NICOLA TALBOT, Teaching \LaTeX{} for a staff development course

I taught \LaTeX{} at the University of East Anglia from 1997 to 2004 as part of the staff development course. In this article I will describe the headaches and lessons I learnt which helped me improve the course. This article is intended to assist those who are planning to teach \LaTeX{} in a practical environment.

S. PARTHASARATHY, Brevity is the soul of wit: How \LaTeX{} can help

This essay is about using “lists” in \LaTeX{}. Lists are very useful, in presenting material in a crisp
and compact form. This makes technical documents, less verbose, and easier to follow. The author hopes that this paper will make \LaTeX{} enjoyable for more people.

**Keith Jones**, Writing your dissertation using \LaTeX{}

The old adage, “You can lead a horse to water, but you can’t make it drink,” applies when trying to convince students to change to \LaTeX{} for writing their thesis or dissertation. Students like to stay in their “comfort” zone and do not look favorably toward the work of learning a new software system. To date I have convinced one professor and two students to use \LaTeX{} as their primary document formatting system.

**Jonathan Fine**, Interactive \TeX{} training and support

It is today practical and helpful to provide \TeX{} as a web service. This allows us a new approach to learning \TeX{}.

**Lapo Mori** and **Maurizio Himmelmann**, Writing curriculum vitae with \LaTeX{}

This paper presents the tools that are currently available to prepare the curriculum vitae with \LaTeX{} with a critical analysis of packages and classes.

**David Walden**, Travels in \TeX{} Land: Benefits of thinking a little bit like a programmer

In this column in each issue I muse on my wanderings around the \TeX{} world. Section 1 of this column provides another illustration of the benefit of defining a few simple macros for a particular \TeX{} project. Section 2 gives another example of using an external processor in combination with \TeX{}. Section 3 gives another example.

**The Editors**, Ask Nelly: How do I write matrices in the text?

**The Editors**, Distractions — Music scores with \LaTeX{}

**The Prac\TeX{} Journal 2008-1, April 2008**

Issue theme: \LaTeX{}niques.

**Yuri Robbers**, From the Editor

**The Editors**, News from Around: \TeX{} program updates; Bigelow introduces Grotesque; Day of \LaTeX{}; Keming (?)

**Lapo Mori**, Writing a thesis with \LaTeX{}

This article provides useful tools to write a thesis with \LaTeX{}. It analyzes the typical problems that arise while writing a thesis with \LaTeX{} and suggests improved solutions by handling easy packages. Many suggestions can be applied to book and article styles, as well.

**Jim Hefferson**, \LaTeX{} goes with the flow

One advantage of \TeX{} and friends is that they fit naturally into a work flow where there are many tools, each good at its own job. This paper gives an example involving a system for doing class evaluations online.

**Ista Zahn**, Learning to Sweave in APA style

Until recently I used Microsoft Word and clones such as OpenOffice to write academic manuscripts, as do most in my field. The standard software toolkit for many psychology professors and graduate students also includes SPSS for performing statistical analyses, and perhaps EndNote or similar reference manager software for generating bibliographies. These tools work, but my experience suggests that \LaTeX{}-based solutions have significant advantages. This article describes how to use Sweave to write \LaTeX{} documents in APA style, complete with results, tables, and figures generated by R.

**Yogeshwarsing Calleecharan**, Using \Bib\TeX{} to produce customized layouts

Normal \LaTeX{} and \TeX{} usage does not require touching existing .bst files nor creating new ones. However, \Bib\TeX{} offers several interesting commands which can be used to do many things apart from bibliography generation. In this article, it is demonstrated how customized layouts for a database can be created without much trouble.

**David Walden**, Travels in \TeX{} Land: Another ornament for “thought breaks”

In this column in each issue I muse on my wanderings around the \TeX{} world. I suggested at the end of section 2 of my last column that I would continue my investigation of colors and \TeX{} in this issue. However, I was distracted for much of the period between issues by a health problem (now resolved). Thus, in this issue I only have time to touch briefly again on a topic from my column in TPJ 2005-4 — another ornament to use for “thought breaks”.

**The Editors**, Ask Nelly: How do I find the files required to compile my document?

**The Editors**, Distractions — Spirograph with PSTricks