Software

Editorial: EncTEX, by Petr Olšák

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The motto introducing the following article, by Petr Olšák, describes Donald Knuth's original vision for TEX, to be used mainly by him and his secretary.

Things haven't turned out that way.

Publishers of scientific and mathematical journals now produce them with TEX, from TEX manuscripts prepared by the authors, adhering to uniform guidelines — any divergence causes problems in automated production, with associated delays and costs. For this reason and others — joint authorship with manuscripts shipped back and forth, preprint archives on the Web, ... — there is enormous peer pressure in much of the TEX community (at least in the English speaking part of it) to use standard implementations and macro sets. Portability has become paramount. However, as printed languages accumulate more and more accented letters, or use different alphabets, TEX-out-of-the-box becomes less and less usable without workarounds, sometimes elaborate ones.

That is the environment in which Petr Olšák finds himself, and he is trying to solve the problems that will make TEX as easy to use for a computer-literate, Czech-language-literate novice as it is for a similarly well-educated English-speaking novice. How much more difficult it would be to learn a different natural language before you could use a computer tool created with that language in mind.

Three potential reviewers were asked to look at this article. Two refused outright, stating personal biases that might color their opinions. The third agreed, but warned of a similar bias, and made a strong (and successful) effort to overcome his prejudice. All three strongly agreed that the article should be published, as it forms a solid basis for discussion of this knotty problem.

Work is now going on to extend TEX to (ultimately) 16bit encodings; the transition has to be planned with care, and it is going more slowly than anyone really wants. The stability of TEX and the conservatism with respect to adding features have been proven out by the fact that TEX is still in active use after nearly 20 years, while most other systems of this vintage are long dead.

I invite discussion in particular from implementors of TEX, its successors and adjuncts. Space will be reserved in the next issues for this discussion.