A Heavy METAL User

Banks don't only crunch numbers, they also crunch words. If you are a bank based in Switzerland, that means documentation in at least four languages. Seeking relief, Union Bank of Switzerland turned to machine translation.

Siemens's METAL is the dark horse among commercial MT systems. Many people in the translation industry have heard of the system but few know much about it. Siemens does not market the system in the US; even in Europe it has a low profile, but this may be partly due to the language pairs available. The company originally acquired METAL from the University of Texas in the late 1970s to translate a switchboard manual from German into English, and for this historical reason this language pair has been the company's strongest. Not surprisingly, METAL's user base is centered largely in German-speaking countries. Notable METAL users include German companies Philips Kommunikations Industrie (Nürnberg), software house SAP (Walldorf), and Union Bank of Switzerland (UBS) in Zurich. UBS has been using METAL since 1992 to translate the kinds of materials for which many companies use MT: information technology and telecommunication texts. The Zurich bank has a large MIS department which develops applications for internal use; much of the documentation for these systems is written in German and translated into French, Italian, and English. METAL is used by the bank's translators to handle the bulk of the German-to-English texts.

At the beginning of September, UBS consolidated its terminology and translation groups as the Language Services Department under the direction of Doris Marty-Albisser. A translator by profession, Marty-Albisser's interest in MT was stimulated by a summer workshop held by Muriel Vasconcellos in 1987. Later, as a member of the UBS research lab, she was responsible for monitoring language technology, and when the time and technology looked ripe, she was closely involved in evaluating potential machine translation systems and the eventual selection of METAL for use within the bank. As such, Marty-Albisser is one of the business world's early pioneers with regard to MT evaluation, and she has documented the evaluation process well. Banks are obviously no strangers to long-term investment, but they do not like taking large risks. A lengthy and thorough evaluation process therefore preceded the introduction of METAL within the organization. This included not just a point-by-point evaluation of the linguistic capabilities of a number of systems, but also a weighing of additional factors, such as technical requirements, organizational implications, and the vendor involved. The latter consideration was an important one: UBS did not want to join the ranks of users of an "orphaned" MT system; it wanted to be able to count on support and future enhancements. Upon introducing METAL within the organization, Marty-Albisser did not adopt draconian measures to force translators to use it but introduced MT in what she calls "homeopathic" doses. Several translators were set to work using METAL; gradually the others began to express interest in moving from "stone age translation to high-tech translation," as they humorously put it. At UBS, METAL runs under a networked Unix environment and is used in conjunction with Framemaker and Word for Windows for document preparation.

The Language Services Department keeps close tabs on how METAL is used and the productivity gains it makes possible. Conversion, pre- and post-editing time is closely tracked and compared with manual translation times. According to Marty-Albisser, the UBS group can achieve productivity improvements on the order of fifty percent,

"depending on the domain." That is not achieved over-night, however. Marty-Albisser estimates it takes a new translator nine months to a year to get really up to speed with an MT system. After nearly two years of use, Marty-Albisser can resolutely state that the use of METAL is cost-effective for UBS, and the translation group is now looking into extending the use of METAL to the domains of general banking and economics. While there is always room in METAL for linguistic improvements, Marty-Albisser says conversion filters remain the key issue. File conversion hiccups inevitably mean text has to be reformatted or, worst of all, retyped. Jeannette Fraser, a UBS linguist, concurs; improved file filters is at the top of her METAL wish list. It is not a static matter but rather an ongoing issue: each time a new version of a wordprocessing or DTP package is released file filters need to be updated accordingly.

TerMS

UBS also commissioned the development of TerMS, a terminology management system developed by DEC which was brought online earlier this fall. Having examined the available commercial products, UBS deemed none suitable for the application it had in mind. TerMS, which runs under Unix, is a far cry from the simple "cardfile" approach of early PC packages. As UBS terminologist Patrick Burkhard explains, TerMS is designed for de-centralized terminology management at large sites. The system is currently set up to handle four languages plus alternate terms and regional variations; it has fields for a wide range of attributes. End-users and terminologists can easily modify the system's point-and-click interface, for monolingual or multilingual use, depending on their requirements. The UBS application boasts a vast classification hierarchy, literally an ontology of the UBS banking world. Burkhard sees TerMS as more than just a termbank; it could also be used for developing online help systems and other kinds of application sUBSystems.

Because TerMS contains largely banking terms, it is not used in conjunction with METAL. If and when UBS decides to extend use of METAL to banking texts, it would obviously be useful for the two systems to share terminology. This problem will be tackled in the future. According to Marty, Albisser, UBS has an open attitude to terminology; arrangements are being made to exchange terminology with other companies. DEC developed TerMS on a non-exclusivebasis, meaning that it may also offer the package to other customers.

Marty-Albisser is keen to get other resources online for her translators, but is impatient with dictionary publishers. "Why aren't any of the major bilingual dictionaries available in electronic form for client/server environments?," she asks. Marty-Albisser is also on the lookout for other additional language pairs for MT. German-French, in particular, has a very high priority. Meanwhile, UBS will evaluate and introduce additional computer,aided trans, lation tools where appropriate. Summing up her experience with METAL, Doris Marty, Albisser says, "vendors and users need to see MT as part of the document production process. For too long, MT has been an isolated object of study. MT systems and termbases need to be perceived in the context of the entire office automation process."

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