"Translator's Workbench: Multilingual Documentation and Communication."

Talk given by Dr. Khurshid Ahmad of University of Surrey on 11 February 1993 at King's College, London.

Dr. Ahmad started by explaining that the Translator's Workbench was the product of 6 companies and 4 Universities, in 5 different countries and funded as Project 2315 in the European ESPRIT initiative, and that its development was now being extended as TWB II as Project 6005 in ESPRIT II for completion in 1994.

The aim of the original project was to develop and integrate a set of computer-based multilingual text processing tools for language professionals, particularly translators.
Dr. Ahmad stressed that the project did not have the aim of providing a means of Automatic Machine Translation, though it does allow the user to make use of some MT systems as an aid for translation.

The software consists of a number of "tools" obtainable through one interface on a single computer. The system was originally designed for larger companies using SUN workstations, but was now being prepared for use on PCs, though with some reduced functionality.

The principal components are;

* Document Manager
* Terminology Databank
* Checking facilities;
  spelling checker
  grammar checker
  Style checker
* Pre-translation editors
* Post-translation editors
* MT access facilities

The Project started in 1989 with an in-depth survey of real translation work to find out what tools translators actually needed.

From this a requirements specification was drawn up and separate aspects of the work were then allocated to the project's varied partners.

The project is mainly for use in specialist areas with specific vocabularies in science and engineering, and is being designed and tested at Mercedes-Benz in Germany.

The system has standard interfaces with the outside world and translators do not need to know anything about networks, or 'logon' procedures etc. They have remote access to METAL, an MT system built by Siemens AG, and SYSTRAN, the ECs main MT system. They also have remote access to the European terminological database, EURODICAUTOM, and to a local terminology database of specialist terms.

Translators also have access to conventional word-based spell-checkers which are available for all four of the languages of the project, English, German, Greek, and Spanish.

Dr. Ahmad stressed the importance of obtaining correct translations of specialist terms for accurate knowledge transfer and went on to explain the principles behind MATE (Machine Assisted Terminology Elicitation) developed by the University of Surrey.

This system is corpus based and requires a suitable body of material containing all the terms likely to be met in a specialist area to start with. When this material has been analysed automatically and sorted the word frequencies are then compared with those in normal text. In practice this highlights 'ordinary' words being used as terms in the specialism, which are then transferred to the special local term base with their correct translation obtained by a similar process in the other language(s).

The MATE system allows specialist technical term banks to be created practically automatically by linguist translators, and the University of Surrey are preparing to run workshops next year to demonstrate its use.
Although the TWB provides remote access to large scale MT systems such as METAL it was thought appropriate to provide an intermediate small scale system locally. This is called the Translation Memory and it is particularly useful for repetitive tasks, re-translations and for specialist technical phrases peculiar to the user's organisation. The Translation Memory system is inherently language independent, enabling the database to be easily trained for any pair of languages.

Further information about the Translators Workbench and its availability may be obtained from Dr. Ahmad at the University of Surrey.

References;

"Translator's Workbench", Final Report ESPRIT Project 2315 March 1992

"The Translator's Workbench", ReCALL No. 6 May 1992, pp 3-9