Details on Project: EtsaTrans Multilingual Project

Focus Area

OTHER

Particulars of Applicant

Project Leader	Me Leandra (L) Ehlers
Faculty	The Humanities
Department/Unit/ Centre	Language Management and Language Practice

Proposal Details

Title	EtsaTrans Multilingual Project
Description	The project is concerned with automatic translation of texts into different languages and the development of a database of language pairs to do the translation with. Stage I consisted of research concerning the legacy system, Lexica. It was researched how to adopt a rule-based method of machine translation to improve the system and to translate from one South African language to another, for example English – Afrikaans – Sesotho. The result of testing was published by Snyman & Naudé (2003) and Daelemans, Du Plessis, Snyman & Teck (2005). The result shows that poor rule-based methods of machine translation are a dead end. Stage II consists of research on how to develop the EtsaTrans system as an example-based method whereby machine translation is done on the basis of existing translations and at that stage it was the newest development in the research field. The new example-based method has more options for migration as new technology develops, which the old system could not do. Research was conducted to solve word-order differences by pattern-matching (especially in the African languages); The results were published by Snyman, Ehlers & Naudé (2007). Two further articles in this regard were submitted for publication in 2007/8 in which it is shown that the accuracy of translation can only be further improved with dedicated research on the nature of domain specific databases. The focal point of Stage III concerns research on the nature of the database (language pairs i.e. English-Sesotho, English-isiXhosa, English-Afrikaans, English-isiZulu etc.) to use as examples for translation. The research relates to the optimization of the database and the way to create and to include language special purposes (LSP) pairs.
	 2007 Development of the EtsaTrans translation system prototype and its integration into the Parnassus meeting administration system. Accredited Journal: Southern African Linguistics and Applied Language Studies, volume 25. Authors: Snyman, F.P.J.; Ehlers, L. & Naudé, J.A. 2005 Multilingualism and Electronic Language Management. Proceedings of the 4th International MIDP Colloquium, 22-23 September 2003, Bloemfontein, South Africa. Pretoria: Van Schaik Publishers Co-editors: Daelemans, W., Du Plessis, L.T., Snyman, F.P.J. & Teck, L. 2003 The assessment of translation accuracy of the Lexica Translation System. Accredited Journal: Journal for Southern African Linguistics and Applied Language Studies 21 (4):295-306. Authors: Snyman, F.P.J. & Naudé, J.A. DUUR VAN PROJEK/ DUUR VAN PROJECT 2003 to date
Funding	University of the Free State

Members

N Matebula (PanSalb) Mnr Cobus (FPJ) Snyman Prof Jacobus (JA) Naude