

Toward Universal Network-based Speech Translation

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Abstract: The speech translation technology has been widely expected to play an important role in today global communication. This talk will address activities of a recently developed international consortium, called Universal Speech Translation Advanced Research (U-STAR), which composes 26 research organizations from 23 Asian and European countries. This largest research consortium has jointly developed a network-based speech translation service which supports translation among 23 languages and accepts up to 17 languages speech input. The service has been developed based on shared language resources in travel and sport domains. Users are able to access the service via a freely available iPhone application, namely VoiceTra4U-M. This talk will start by describing the initiation of the U-STAR consortium, followed by summarizing the development issues on both language resource and system engineering parts. Some statistics and analyses of the global usage during a few months field-testing after service launching will be revealed. Finally, challenging issues to improve the service accuracy and to extend the number of supported languages and translation domains will be discussed.

Bio: Chai Wutiwivatchai received his BEng (the first honor) and MEng degrees of electrical engineering from Thammasat and Chulalongkorn University, Thailand in 1994 and 1997 respectively. He received his PhD in Computer Science from Tokyo Institute of Technology in 2004 under the Japanese Governmental scholarship. He is now the Head of Speech and Audio Technology Laboratory, National Electronics and Computer Technology Center (NECTEC), Thailand. His research work includes several international collaborative projects in a wide area of speech and language processing including Universal Speech Translation Advanced Research (U-STAR), PAN Localization Network (PANL10N), and ASEAN Machine Translation. He is a member of International Speech Communication Association (ISCA), Institute of Electronics, Information and Communication Engineers (IEICE), and has served as a country representative in the ISCA international affair committee during 2007-2009.