# **TRANSFORMING RHETORICAL DOCUMENT PROFILE INTO TAILORED SUMMARY OF SCIENTIFIC PAPER**

## aMasayu Leylia Khodra, bMohammad Dimas, cDwi Hendratmo Widyantoro, dE. Aminudin Aziz, eBambang Riyanto Trilaksono

a,b,c,eSekolah Teknik Elektro dan Informatika, Institut Teknologi Bandung, Jl. Ganesha 10 Bandung

dFakultas Seni dan Bahasa, Universitas Pendidikan Indonesia, Jl. Dr. Setiabudi 229 Bandung

E-Mail: a [masayu@stei.itb.ac.id](mailto:masayu@stei.itb.ac.id)

*Abstract*

*Since abstract of scientific paper is author biased, readers’ required information may not be included in the abstract. Tailored summary may help them to get a summary based on their information needs. This research is the first one that implements tailored summary system for scientific paper. Tailored summary applies information extraction that transforms a scientific paper into Rhetorical Document Profile, a structured representation of paper content based on rhetorical scheme of fifteen slots. This research adapted building plan that used rhetorical scheme of seven slots. We also implement tailored summary system. After generating initial summary, surface repair is conducted to improve summary readability. Each sentence in initial summary is combined with template phrase based on syntax-tree combination method. There are five groups of template phrases provided in surface repair. We construct evaluation standards by asking five human raters. The best method for sentence selection subsystem that uses Maximal Marginal Importance-Multi Sentence is employing TF.IDF weighting system with precision/recall of 0.61. The surface repair subsystem has acceptance of 0.91.*

*Key words: Tailored Summary*, *Rhetorical Document Profile*, *Building Plan*, *Maximal Marginal Importance – Multi Sentence*, *Surface Repair.*