Asia is one of the largest and populous continents, covering about 60% of the world’s population, and has a wide diversity of religions, ethnicities, and societies shaping their culture. In recent years, communication among Asian countries has increased drastically which will help in strengthening the economic and social relationships among nations. Socio-economic relationships among Asian countries are more vital, and their association enhances the need to invent a medium that smoothens interaction among their people speaking different Asian languages. The linguistic barriers among Asian republics are a critical challenge to overcome. Recent advances in computational linguistics encourage Asian countries to expand their nations’ socio-economic growth by enabling communication among Asian people from a different region with a foreign language. The advancement in technology, including cloud computing, Big Data, artificial intelligence (AI), machine learning (ML), and deep learning, invokes the computational linguistic to understand human language structure and its deployment in social backgrounds. With such advancements in technology and the availability of an enormous amount of linguistic datasets, computational linguistics gain significant attention from researchers.

Since, Computational linguistics (CL) is the sub-domain of artificial intelligence that uses various computational methods to understand, learn, and generate structural content; implementing it in Asian languages can ease linguistic drawbacks among Asian people. Computational linguistics encourages human-human interaction, human to machine interaction, using several machine-dependent language translation systems and conversational agents. Advancement and integration of computation linguistic with recent intelligent techniques benefit both human and machine for analyzing and learning large quantities of linguistic data by facilitating smooth interaction.

This special issue focuses on recent advances in computational linguistics for Asian languages that explore research methodology and mathematical analysis covering various aspects of computational linguistic and natural language processing, including morphology, machine translation, computational resources, grammar, syntax, and semantics. We welcome only original and technology-oriented research article that includes an in-depth analysis of linguistic data for machine translation, automatic speech recognition, and text-to-speech based on the structural content of Asian language. We invite all potential research scholars and academicians to submit their research paper that explores algorithms and intelligent language translation tools, including discussion of standard evaluation and experimentation to strengthen the research and give potential to further study.

Topics
- ML-based computational linguistic for Automatic speech detection of Asian language
- Application of cloud computing and computational linguistic for Asian language
- Big data analysis of Asian linguistic data using computational linguistic
- Deep learning in computational linguistic for Asian language translation
• The human-to-human interaction model for Asian language using natural language processing
• Text-to-speech conversion based on computational linguistic with AI technique.
• Cloud computing-based teaching and learning model using computational linguistic for Asian language
• Contribution of computational linguistic towards tourism for Asian countries
• Design and develop: An interactive communication system with deep analysis of Asian linguistic data using natural language processing
• Corpus development of Asian language using machine learning and computational linguistic.
• Cognitive and computational models of Asian language processing based on computational linguistic tool
• Big data-enabled Intelligent tourism model for Asian Language using a cloud-integrated computational linguistic tool
• Challenges and opportunities of natural language processing in the Asian world
• Text analysis of Asian data based on computational linguistic tool
• Towards an understanding of computational linguistic for different Asian language

Important Dates
• Submissions deadline: September 15, 2021
• First-round review decisions: December 20, 2021
• Deadline for revision submissions: February 26, 2022
• Notification of final decisions: April 18, 2022
• Tentative publication: mid-2022

Submission Information

For questions and further information, please contact Dr. Vicente García Díaz / garciavicente@ieee.org.