

Preface

On behalf of the Programme Committee, we welcome you to *International Conference on Soft Computing Techniques and Engineering Application (SCTEA 2013)* held during September 25–27, 2013 in Kunming China. The main objective of SCTEA 2013 is to provide a platform for researchers, engineers, and academicians from all over the world to present their research results and recent developments in soft computing techniques and engineering application. This conference provides opportunities for them to exchange new ideas and application experiences face to face, to establish business or research relations, and to find global partners for future collaboration.

During the last decade, soft computing techniques have been recognized as one and most attractive alternatives to the standard, well-established “hard computing” paradigms. Traditional computing methods are often too cumbersome for the present day multiobjective problems, which requires a precisely stated analytical model and often consumes large computational time. Soft computing techniques, on the other hand, emphasize gains in understanding system behavior in exchange for unnecessary precision have proved to be important practical tools for many contemporary problems. There are various soft computing techniques available and popular for the engineering and other applications. They are artificial neural networks (NN), genetic algorithms (GA), fuzzy logic models (FLM), and particle swarm techniques. NNs and FLMs are universal approximators of any multivariate function because they can be used for modeling highly nonlinear, unknown, or partially known complex systems, plants, or processes. GA and particle swarm optimization techniques have emerged as potential and robust optimization tools in recent years.

The International Conference on Soft Computing Techniques and Engineering Application (SCTEA 2013) covers all areas of soft computing and its applications to engineering domain. We have received 232 numbers of papers through “Call for Paper,” out of which 67 numbers of papers were accepted for publication in the conference proceedings through double blind review process. The broad areas, which are covered in this Conference, are: theoretical computer science, computer systems organization, soft computing, computing methodologies, computer applications, and software engineering application.

We are sure this proceeding will contribute to the knowledge of soft computing and particularly its application to various engineering domains. We are sure the participants will share their innovations in this conference.

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