Table of Contents

Computational Models

Collision Probability in an In-Line Machines Model Eishi Chiba, Tetsuo Asano, Takeshi Miura, Naoki Katoh, and Ikuo Mitsuka	1
A Computational-Geometry Approach to Digital Image Contour Extraction	13
On Multiplicatively Weighted Voronoi Diagrams for Lines in the Plane	44
Fast Streaming 3D Level Set Segmentation on the GPU for Smooth Multi-phase Segmentation	72
Valued Dominance-Based Rough Set Approach to Incomplete Information System	92
An FPGA-Based Fault-Tolerant 2D Systolic Array for Matrix Multiplications	108
Networks and Augmented Reality	
Neural Network Based Lane Change Trajectory Prediction in Autonomous Vehicles	125
Conditional Privacy through Ring Signature in Vehicular Ad-Hoc Networks	147
Establishing a Museum Display Platform by Using Combination of Reflection Holograms and Tangible Augmented Reality	157



XX Table of Contents

Applying Augmented Reality to Consumer Garment Try-On	1.00
Experience	169
Alfred Chen, Chen-Yuan Kao, Ying-Hsiu Chen, and	
Wen-Cheng Wang	
Geospatial Knowledge Discovery Framework for Crime Domain	191
Ramesh Singh and Kush Sharma	
Author Index	205