

CONTENTS

PREFACE	v
WORKSHOP COMMITTEES	vii
Grid Scheduling and Filesystem	1
An Advance Reservation-Based Computation Resource Manager for Global Scheduling	3
<i>H. Nakada, A. Takefusa, K. Ookubo, T. Kudoh, Y. Tanaka and S. Sekiguchi</i>	
Reputation Based Job Scheduling in Desktop Grids	15
<i>X. Liu, C. Jiang, C. Wang and Y. Zhao</i>	
A Dataflow Model for .Net-Based Grid Computing Systems	25
<i>C. Jin, R. Buyya, L. Stein and Z. Zhang</i>	
Performance Evaluation of Gfarm Version 1.4 as a Cluster Filesystem	38
<i>Y. Tanimura, Y. Tanaka, S. Sekiguchi and O. Tatebe</i>	
Grid Workflow	51
Temporal Decomposition and Scheduling of Grid Workflow	53
<i>F. Long and H. K. Pung</i>	
A Flow Model of Web Services for the Grid	65
<i>E. P. Sulaiman, Y. S. Ong, M. S. Habibullah and T. Hung</i>	
A Comparison Study Between Distributed and Centralized Job Workflow Execution Models	76
<i>Y. Feng and W. Cai</i>	
Grid Environment and Programming	89
Rendering-On-Demand Service Across Heterogeneous Grid Environment	91
<i>B. S. Lee, A. Sourin, C. L. Tien, K. Y. Chan, T. Hung, Q. T. Ho, J. Wei, D. Oh, S. Miller, J. Zhang, A. Chong and K. Levinski</i>	

Collaborative Workspace Over Service-Oriented Grid	104
<i>Z. Shen, H. Shen, C. Miao, Z. Yang, R. Gay and G. Zhao</i>	
Opal OP: An Extensible Grid-Enabling Wrapping Tool for Legacy Applications	117
<i>K. Ichikawa, S. Date, S. Krishnan, W. Li, K. Nakata, Y. Yonezawa, H. Nakamura and S. Shimojo</i>	
Security Monitoring Extension for MOGAS	128
<i>S. Takeda, S. Date, J. Zhang, B. S. Lee and S. Shimojo</i>	
Grid Applications	139
Distributed Automatic Frame Generation for Cartoon Animation	141
<i>H. S. Seah, F. Tian, Y. Lu, J. Qiu and Q. Chen</i>	
Phenotype Genotype Exploration on a Desktop GPU Grid	154
<i>C. Chen, A. Singh, W. Liu, K. W. Müller-Wittig, W. Mitchell and B. Schmidt</i>	
Digital Media Portal for the Grid	166
<i>B. S. Lee, M. Tang and J. Zhang</i>	
Poster Papers	179
Exploring the PC Grid Technology for Research Computation — The NUS Experience	181
<i>C. C. Tan and J. Wang</i>	
Grid Computing for Stochastic Super-Resolution Imaging: Fundamentals and Algorithms	190
<i>J. Tian and K. K. Ma</i>	
Supporting Large-Scale Collaborative Virtual Environment in Grid	196
<i>L. Zhang, Q. Lin, H. K. Neo, G. Huang, R. Gay and G. Feng</i>	
Designing an Experimental Gaming Platform for Trading Grid Resources	202
<i>D. Oh, S. F. Cheng, M. Dan and R. Bapna</i>	