

Research Gaps and Trends in Cloud Computing: A Systematic Mapping Study

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Appendix: Classification of 523 Papers from CLOUD 2009 to CLOUD 2014 by Topic

Table I: Classification of CLOUD 2009 Papers

Category (Topic)	No. Studies	Subcategory (Subtopic)
Functional Aspect	4	Cloud Services: [1]; Deployment Model: [2-4]
Non-Functional Aspect	5	Performance: [5-7]; Security: [8]; Scalability: [9]
Architectural Aspect	3	Cloud Architecture & Design: [10]; Middleware: [11, 12]
Resource Aspect	3	Resource Management: [13]; Energy Efficiency: [14, 15]
Adoption Aspect	1	Cost: [16];
Domain Aspect	1	Satellite Data Processing [17]
Total	17	

Table II: Classification of CLOUD 2010 Papers

Category (Topic)	No. Studies	Subcategory (Subtopic)
Functional Aspect	22	Cloud Services: [18-21]; Cloud Deployment: [22, 23]; Application Support: [22, 24-33]; Application Development Framework: [34-38]; Measurement: [39, 40]
Non-Functional Aspect	9	Security: [41-45]; Privacy: [46]; Performance: [47, 48]; Availability: [49, 50]; Scalability: [51]
Architectural Aspect	14	Cloud Architecture & Design: [52-57]; Virtual Machine: [58-60]; Middleware: [61-63]
Resource Aspect	8	Resource Management: [64-71]; Load Balancing [72]
Adoption Aspect	8	Cost: [73, 74]; Pricing: [75]; Billing: [76]; Accounting: [77]; Cloud Migration: [78-80]
Domain Aspect	4	Domain Applications: [81], [82]
Total	65	

Table III: Classification of CLOUD 2011 Papers

Category (Topic)	No. Studies	Subcategory (Subtopic)
Functional Aspect	31	Cloud Services: [83-90]; Service Deployment: [91-97]; Application Development Framework: [98-103]; Application Support: [104-112]; Measurement: [113, 114]
Non-Functional Aspect	26	Trust: [115, 116]; Security: [117-123]; Performance: [124-130]; Data Integrity: [131, 132]; Scalability: [133-135]; Elasticity: [136-139]; Fault-Tolerance: [140]
Architectural Aspect	13	Cloud Architecture & Design: [141-145]; Programming Language: [146]; Virtual Machine: [147-152];
Resource Aspect	9	Resource Management: [153-155]; Energy Efficiency: [156-158]; Load Balancing: [159-161]
Adoption Aspect	10	Cost: [162-164]; Cloud Adoption & Migration: [165-168]; Contract & SLA: [169-173];
Domain Aspect	2	Domain Applications: [106, 163]
Total	91	

Table IV: Classification of CLOUD 2012 Papers

Category (Topic)	No. Studies	Subcategory (Subtopic)
Functional Aspect	31	Cloud Services: [174-183] [184-186]; Cloud Deployment: [187, 188]; Application Support: [189-193]; Application Development Framework: [194-207]
No-Functional Aspect	25	Trust: [208]; Security: [209-214]; Privacy: [215-217]; Performance: [218-230]; Scalability: [231, 232]; Elasticity: [233].
Architectural Aspect	19	Cloud Architecture & Design: [234-242]; Virtual Machine: [243-252]; Middleware: [253];
Resource Aspect	22	Resource Management: [254-266]; Scheduling: [267, 268]; Load Balancing: [269, 270]; Energy Efficiency: [271-276]
Adoption Aspect	13	Cost: [277-282]; Pricing: [283, 284]; Billing: [285]; Service Broker: [286, 287]; Contract & SLA: [288, 289]
Domain Aspect	6	Domain Applications: [185, 187, 197, 232, 236, 255]
Total	116	

Table V: Classification of CLOUD 2013 Papers

Category (Topic)	No. Studies	Subcategory (Subtopic)
Functional Aspect	51	Service Delivery Model: [290-301]; Service Deployment: [302-304]; Service Configuration: [305]; Application Development Framework: [306-318]; Measurement: [319-332]; Cloud Maturity Model: [333]; Application Support: [334-341]
Non-Functional Aspect	24	Security: [342-349]; Privacy: [350-354]; Performance: [355]; Availability: [356-359]; Scalability: [360, 361]; Elasticity: [362-364]; Fault-Tolerance: [365, 366]
Architectural Aspect	18	Cloud Architecture & Design: [367-376]; Virtual Machine: [377-386];
Resource Aspect	11	Resource Management: [387-390]; Scheduling: [391, 392]; Load Balancing: [393-397];
Adoption Aspect	11	Cost: [398-402]; Pricing: [403, 404]; Cloud Adoption & Migration: [405, 406]; Cloud Broker: [407]; Contract & SLA: [408];
Domain Aspect	4	Domain Applications: [334, 357, 368, 372]
Total	119	

Table VI: Classification of CLOUD 2014 Papers

Category (Topic)	No. Studies	Subcategory (Subtopic)
Functional Aspect	58	Cloud Services: [409-417]; Deployment Model: [418-423]; Cloud Broker: [424, 425]; Application Support: [426-447]; Application Development Framework: [448-458]; Tool Development: [459-469]; Measurement: [470]
Non-Functional Aspect	18	Trust: [471, 472]; Security: [473, 474]; Privacy: [475, 476]; Performance: [477-482]; Scalability: [483-485]; Elasticity: [486-488];
Architectural Aspect	8	Cloud Architecture & Design: [489, 490]; Virtual Machine: [491-496]
Resource Aspect	16	Resource Management: [497-507]; Energy Efficiency: [508-513];
Adoption Aspect	10	Cost: [514-518]; Pricing: [519-521]; Accounting: [522]; Cloud Migration: [523]
Domain Aspect	5	Domain Applications: [413, 432-434, 506]
Total	115	

References

CLOUD 2009

- [1] C. Hong, Z. Ke, Z. Ming Jun, G. Wei, C. Jun Jie, and M. Xinsheng, "An End-to-End Methodology and Toolkit for Fine Granularity SaaS-ization," in *Cloud Computing, 2009. CLOUD '09. IEEE International Conference on*, 2009, pp. 101-108.
- [2] H. Jegadeesan and S. Balasubramaniam, "A Method to Support Variability of Enterprise Services on the Cloud," in *Cloud Computing, 2009. CLOUD '09. IEEE International Conference on*, 2009, pp. 117-124.

- [3] C. Hong, Z. Ke, W. MiaoMiao, L. JiaLin, S. Lei, and M. Xinsheng, "Customer Centric Cloud Service Model and a Case Study on Commerce as a Service," in *Cloud Computing, 2009. CLOUD '09. IEEE International Conference on*, 2009, pp. 57-64.
- [4] L. Ardissono, A. Goy, G. Petrone, and M. Segnan, "From Service Clouds to User-Centric Personal Clouds," in *Cloud Computing, 2009. CLOUD '09. IEEE International Conference on*, 2009, pp. 1-8.
- [5] J. Z. Li, J. Chinneck, M. Woodside, and M. Litou, "Deployment of Services in a Cloud Subject to Memory and License Constraints," in *Cloud Computing, 2009. CLOUD '09. IEEE International Conference on*, 2009, pp. 33-40.
- [6] G. Somani and S. Chaudhary, "Application Performance Isolation in Virtualization," in *Cloud Computing, 2009. CLOUD '09. IEEE International Conference on*, 2009, pp. 41-48.
- [7] A. W. Malik, A. Park, and R. M. Fujimoto, "Optimistic Synchronization of Parallel Simulations in Cloud Computing Environments," in *Cloud Computing, 2009. CLOUD '09. IEEE International Conference on*, 2009, pp. 49-56.
- [8] M. Jensen, J. Schwenk, N. Gruschka, and L. L. Iacono, "On Technical Security Issues in Cloud Computing," in *Cloud Computing, 2009. CLOUD '09. IEEE International Conference on*, 2009, pp. 109-116.
- [9] J. Yang, Q. Jie, and L. Ying, "A Profile-Based Approach to Just-in-Time Scalability for Cloud Applications," in *Cloud Computing, 2009. CLOUD '09. IEEE International Conference on*, 2009, pp. 9-16.
- [10] L.-J. Zhang and J. Zhang, "Architecture-Driven Variation Analysis for Designing Cloud Applications," in *Cloud Computing, 2009. CLOUD '09. IEEE International Conference on*, 2009, pp. 125-134.
- [11] Y. Chang Ho, H. Hyuck, J. Hae-Sun, Y. Heon Young, and L. Yong-Woo, "Intelligent Management of Remote Facilities through a Ubiquitous Cloud Middleware," in *Cloud Computing, 2009. CLOUD '09. IEEE International Conference on*, 2009, pp. 65-71.
- [12] W. Qian and R. Deters, "SOA's Last Mile-Connecting Smartphones to the Service Cloud," in *Cloud Computing, 2009. CLOUD '09. IEEE International Conference on*, 2009, pp. 80-87.
- [13] C. Yang, W. Tianyu, and L. Jianxin, "An Efficient Resource Management System for On-Line Virtual Cluster Provision," in *Cloud Computing, 2009. CLOUD '09. IEEE International Conference on*, 2009, pp. 72-79.
- [14] L. Bo, L. Jianxin, H. Jinpeng, W. Tianyu, L. Qin, and Z. Liang, "EnaCloud: An Energy-Saving Application Live Placement Approach for Cloud Computing Environments," in *Cloud Computing, 2009. CLOUD '09. IEEE International Conference on*, 2009, pp. 17-24.
- [15] X. X. Tian, X. L. Wang, and A. Zhou, "DSP RE-Encryption: A Flexible Mechanism for Access Control Enforcement Management in DaaS," in *Cloud Computing, 2009. CLOUD '09. IEEE International Conference on*, 2009, pp. 25-32.
- [16] L. Xinhui, L. Ying, L. Tiancheng, Q. Jie, and W. Fengchun, "The Method and Tool of Cost Analysis for Cloud Computing," in *Cloud Computing, 2009. CLOUD '09. IEEE International Conference on*, 2009, pp. 93-100.
- [17] N. Golpayegani and M. Halem, "Cloud Computing for Satellite Data Processing on High End Compute Clusters," in *Cloud Computing, 2009. CLOUD '09. IEEE International Conference on*, 2009, pp. 88-92.

CLOUD 2010

- [18] S. Hagen and A. Kemper, "Model-Based Planning for State-Related Changes to Infrastructure and Software as a Service Instances in Large Data Centers," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 11-18.
- [19] L. Feng, G. Weiping, Z. Zhi Qiang, and C. Wu, "SaaS Integration for Software Cloud," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 402-409.
- [20] L. C. Voicu, H. Schuldt, Y. Breitbart, and H. J. Schek, "Flexible Data Access in a Cloud Based on Freshness Requirements," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 180-187.
- [21] X. Dutreilh, N. Rivierre, A. Moreau, J. Malenfant, and I. Truck, "From Data Center Resource Allocation to Control Theory and Back," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 410-417.
- [22] G. Li, G. Yike, and T. Xiangchuan, "IC Cloud: A Design Space for Composable Cloud Computing," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 394-401.
- [23] M. R. Head, A. Sailer, H. Shaikh, and D. G. Shea, "Towards Self-Assisted Troubleshooting for the Deployment of Private Clouds," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 156-163.
- [24] T. Dornemann, E. Juhnke, T. Noll, D. Seiler, and B. Freisleben, "Data Flow Driven Scheduling of BPEL Workflows Using Cloud Resources," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 196-203.
- [25] C. Bunch, C. Navraj, C. Krintz, J. Chohan, J. Kupferman, P. Lakhina, et al., "An Evaluation of Distributed Datastores Using the AppScale Cloud Platform," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 305-312.
- [26] S. Hosono, H. He, T. Hara, Y. Shimomura, and T. Arai, "A Lifetime Supporting Framework for Cloud Applications," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 362-369.
- [27] B. Jing, Z. Zhiliang, T. Ruixiong, and W. Qingbo, "Dynamic Provisioning Modeling for Virtualized Multi-tier Applications in Cloud Data Center," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 370-377.
- [28] M. Rodriguez-Martinez, J. Seguel, and M. Greer, "Open Source Cloud Computing Tools: A Case Study with a Weather Application," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 443-449.
- [29] Y. Simmhan, C. van Ingen, G. Subramanian, and L. Jie, "Bridging the Gap between Desktop and the Cloud for eScience Applications," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 474-481.
- [30] P. Teregowda, B. Uргаonkar, and C. L. Giles, "Cloud Computing: A Digital Libraries Perspective," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 115-122.
- [31] K. Chard, S. Caton, O. Rana, and K. Bubendorfer, "Social Cloud: Cloud Computing in Social Networks," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 99-106.
- [32] P. Noordhuis, M. Heijkoop, and A. Lazovik, "Mining Twitter in the Cloud: A Case Study," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 107-114.
- [33] M. Brock and A. Goscinski, "Toward Ease of Discovery, Selection and Use of Clusters within a Cloud," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 289-296.
- [34] I. Gouri, J. Guitart, and J. Torres, "Characterizing Cloud Federation for Enhancing Providers' Profit," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 123-130.
- [35] M. Mazzucco, D. Dyachuk, and R. Deters, "Maximizing Cloud Providers' Revenues via Energy Aware Allocation Policies," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 131-138.
- [36] C. Fehling, F. Leymann, and R. Mietzner, "A Framework for Optimized Distribution of Tenants in Cloud Applications," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 252-259.
- [37] V. Chang, G. Wills, and D. De Roure, "A Review of Cloud Business Models and Sustainability," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 43-50.
- [38] A. Chazalet, "Service Level Checking in the Cloud Computing Context," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 297-304.
- [39] P. Xing, L. Ling, M. Yiduo, S. Sivathanu, K. Younggyun, and C. Pu, "Understanding Performance Interference of I/O Workload in Virtualized Cloud Environments," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 51-58.

- [40] M. Yiduo, L. Ling, P. Xing, and S. Sivathanu, "Performance Measurements and Analysis of Network I/O Applications in Virtualized Cloud," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 59-66.
- [41] S. Bertram, M. Boniface, M. Surrige, N. Briscoe, and M. Hall-May, "On-Demand Dynamic Security for Risk-Based Secure Collaboration in Clouds," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 518-525.
- [42] Z. Rui and L. Ling, "Security Models and Requirements for Healthcare Application Clouds," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 268-275.
- [43] P. Saripalli and B. Walters, "QUIRC: A Quantitative Impact and Risk Assessment Framework for Cloud Security," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 280-288.
- [44] N. Gruschka and M. Jensen, "Attack Surfaces: A Taxonomy for Attacks on Cloud Services," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 276-279.
- [45] S. Jajodia, W. Litwin, and T. Schwarz, "LH*RE: A Scalable Distributed Data Structure with Recoverable Encryption," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 354-361.
- [46] A. Squicciarini, S. Sundareswaran, and D. Lin, "Preventing Information Leakage from Indexing in the Cloud," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 188-195.
- [47] V. Hien Nguyen, F. D. Tran, and J. M. Menaud, "Performance and Power Management for Cloud Infrastructures," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 329-336.
- [48] R. Pereira, M. Azambuja, K. Breitman, and M. Endler, "An Architecture for Distributed High Performance Video Processing in the Cloud," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 482-489.
- [49] B. Addis, D. Ardagna, B. Panicucci, and Z. Li, "Autonomic Management of Cloud Service Centers with Availability Guarantees," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 220-227.
- [50] N. Bonvin, T. G. Papaioannou, and K. Aberer, "An Economic Approach for Scalable and Highly-Available Distributed Applications," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 498-505.
- [51] S. Weidong, L. Yang, L. Zhu, and J. Engelsma, "Scalable Support for 3D Graphics Applications in Cloud," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 346-353.
- [52] M. Azambuja, R. Pereira, K. Breitman, and M. Endler, "An Architecture for Public and Open Submission Systems in the Cloud," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 513-517.
- [53] I. Brandic, S. Dustdar, T. Anstett, D. Schumm, F. Leymann, and R. Konrad, "Compliant Cloud Computing (C3): Architecture and Language Support for User-Driven Compliance Management in Clouds," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 244-251.
- [54] A. Celesti, F. Tusa, M. Villari, and A. Puliafito, "How to Enhance Cloud Architectures to Enable Cross-Federation," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 337-345.
- [55] M. Farwick, B. Agreiter, R. Breu, Ha, x, M. ring, *et al.*, "Towards Living Landscape Models: Automated Integration of Infrastructure Cloud in Enterprise Architecture Management," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 35-42.
- [56] T. Longji, D. Jing, Z. Yajing, and Z. Liang-Jie, "Enterprise Cloud Service Architecture," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 27-34.
- [57] M. Stecca and M. Maresca, "An Architecture for a Mashup Container in Virtualized Environments," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 386-393.
- [58] L. Chunxiao, A. Raghunathan, and N. K. Jha, "Secure Virtual Machine Execution under an Untrusted Management OS," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 172-179.
- [59] S. Sivathanu, L. Ling, Y. Mei, and P. Xing, "Storage Management in Virtualized Cloud Environment," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 204-211.
- [60] H. Woomin, R. Yangwoo, P. Youngwoo, P. Ki-Woong, and P. Kyu-Ho, "HyperDealer: Reference-Pattern-Aware Instant Memory Balancing for Consolidated Virtual Machines," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 426-434.
- [61] Z. Wenbing, P. M. Melliar-Smith, and L. E. Moser, "Fault Tolerance Middleware for Cloud Computing," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 67-74.
- [62] D. de Oliveira, E. Ogasawara, Baia, x, F. o, and M. Mattoso, "SciCumulus: A Lightweight Cloud Middleware to Explore Many Task Computing Paradigm in Scientific Workflows," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 378-385.
- [63] A. Azeez, S. Perera, D. Gamage, R. Linton, P. Siriwardana, D. Leelarathne, *et al.*, "Multi-tenant SOA Middleware for Cloud Computing," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 458-465.
- [64] M. Husain, L. Khan, M. Kantarcioglu, and B. Thuraisingham, "Data Intensive Query Processing for Large RDF Graphs Using Cloud Computing Tools," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 1-10.
- [65] Z. Ying, H. Gang, L. Xuanzhe, and M. Hong, "Integrating Resource Consumption and Allocation for Infrastructure Resources on-demand," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 75-82.
- [66] Y. O. Yazir, C. Matthews, R. Farahbod, S. Neville, A. Guitouni, S. Ganti, *et al.*, "Dynamic Resource Allocation in Computing Clouds Using Distributed Multiple Criteria Decision Analysis," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 91-98.
- [67] M. Hassan, Z. Weiliang, and Y. Jian, "Provisioning Web Services from Resource Constrained Mobile Devices," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 490-497.
- [68] C. Fangzhe, J. Ren, and V. Ramesh, "Optimal Resource Allocation in Clouds," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 418-425.
- [69] H. He and W. Liqiang, "P&P: A Combined Push-Pull Model for Resource Monitoring in Cloud Computing Environment," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 260-267.
- [70] J.-J. Wu, P. Liu, and Y.-C. Chung, "Metadata Partitioning for Large-Scale Distributed Storage Systems," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 212-219.
- [71] S. Jin, W. Hao, W. Qianxiang, and M. Hong, "A Runtime Model Based Monitoring Approach for Cloud," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 313-320.
- [72] S. Ferretti, V. Ghini, F. Panzieri, M. Pellegrini, and E. Turrini, "QoS Aware Clouds," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 321-328.
- [73] R. Van den Bossche, K. Vanmechelen, and J. Broeckhove, "Cost-Optimal Scheduling in Hybrid IaaS Clouds for Deadline Constrained Workloads," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 228-235.
- [74] Y. Sangho, D. Kondo, and A. Andrzejak, "Reducing Costs of Spot Instances via Checkpointing in the Amazon Elastic Compute Cloud," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 236-243.
- [75] T. A. Henzinger, A. V. Singh, V. Singh, T. Wies, and D. Zufferey, "FlexPRICE: Flexible Provisioning of Resources in a Cloud Environment," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 83-90.
- [76] P. Ki-Woong, P. Sung Kyu, H. Jaesun, and P. Kyu-Ho, "THEMIS: Towards Mutually Verifiable Billing Transactions in the Cloud Computing Environment," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 139-147.

- [77] A. Mihoob, C. Molina-Jimenez, and S. Shrivastava, "A Case for Consumer-Centric Resource Accounting Models," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 506-512.
- [78] Z. Gong, L. Chiu, and L. Ling, "Adaptive Data Migration in Multi-tiered Storage Based Cloud Environment," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 148-155.
- [79] C. Ward, N. Aravamudan, K. Bhattacharya, K. Cheng, R. Filepp, R. Kearney, *et al.*, "Workload Migration into Clouds Challenges, Experiences, Opportunities," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 164-171.
- [80] A. Khajeh-Hosseini, D. Greenwood, and I. Sommerville, "Cloud Migration: A Case Study of Migrating an Enterprise IT System to IaaS," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 450-457.
- [81] D. Habich, W. Lehner, S. Richly, and U. Assmann, "Using Cloud Technologies to Optimize Data-Intensive Service Applications," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 19-26.
- [82] L. Hyun Jung and K. Soo Dong, "A Conceptual Framework for Provisioning Context-aware Mobile Cloud Services," in *Cloud Computing (CLOUD), 2010 IEEE 3rd International Conference on*, 2010, pp. 466-473.

CLOUD 2011

- [83] S. Nepal, C. Shiping, Y. Jinhui, and D. Thilakanathan, "DaaS: Data Integrity as a Service in the Cloud," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 308-315.
- [84] S. Jie, H. Feng, Y. Zhenxing, L. Guoqi, and Z. Zhiliang, "A SaaSify Tool for Converting Traditional Web-Based Applications to SaaS Application," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 396-403.
- [85] D. Bernbach, M. Klems, S. Tai, and M. Menzel, "MetaStorage: A Federated Cloud Storage System to Manage Consistency-Latency Tradeoffs," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 452-459.
- [86] C. Navraj, C. Bunch, C. Krantz, and Y. Nomura, "Database-Agnostic Transaction Support for Cloud Infrastructures," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 692-699.
- [87] L. Qianhui and L. Bu-Sung, "Delivering High Resilience in Designing Platform-as-a-Service Clouds," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 676-683.
- [88] J. Minsung and K. Schwan, "STRATUS: Assembling Virtual Platforms from Device Clouds," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 476-483.
- [89] L. Fan, W. Buchanan, C. Thummler, O. Lo, A. Khedim, O. Uthmani, *et al.*, "DACAR Platform for eHealth Services Cloud," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 219-226.
- [90] M. Mazzucco and M. Dumas, "Reserved or On-Demand Instances? A Revenue Maximization Model for Cloud Providers," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 428-435.
- [91] F. Pei, W. Ji, Z. Zhibin, and M. R. Lyu, "Toward Optimal Deployment of Communication-Intensive Cloud Applications," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 460-467.
- [92] K. Yu, Z. Yangfan, Z. Zhibin, and M. R. Lyu, "A User Experience-Based Cloud Service Redeployment Mechanism," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 227-234.
- [93] F. F. Moghaddam, M. Cheriet, and N. Kim Khoa, "Low Carbon Virtual Private Clouds," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 259-266.
- [94] T. D. Nielsen, C. Iversen, and P. Bonnet, "Private Cloud Configuration with MetaConfig," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 508-515.
- [95] R. Ahmad and L. Janczewski, "Governance Life Cycle Framework for Managing Security in Public Cloud: From User Perspective," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 372-379.
- [96] T. Fengguang and C. Keke, "Towards Optimal Resource Provisioning for Running MapReduce Programs in Public Clouds," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 155-162.
- [97] J. Cervino, F. Escribano, P. Rodriguez, I. Trajkovska, and J. Salvachua, "Videoconference Capacity Leasing on Hybrid Clouds," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 340-347.
- [98] M. Cardosa, A. Singh, H. Pucha, and A. Chandra, "Exploiting Spatio-temporal Tradeoffs for Energy-Aware MapReduce in the Cloud," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 251-258.
- [99] H. Li-Yung, W. Jan-Jan, and L. Pangfeng, "Optimal Algorithms for Cross-Rack Communication Optimization in MapReduce Framework," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 420-427.
- [100] W. Yongzhi and W. Jinpeng, "VIAF: Verification-Based Integrity Assurance Framework for MapReduce," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 300-307.
- [101] D. E. M. Arnaut, R. Schroeder, and C. S. Hara, "Phoenix: A Relational Storage Component for the Cloud," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 684-691.
- [102] S. Rozsnyai, A. Slominski, and Y. Doganata, "Large-Scale Distributed Storage System for Business Provenance," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 516-524.
- [103] D. Alves, P. Bizarro, and P. Marques, "Deadline Queries: Leveraging the Cloud to Produce On-Time Results," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 171-178.
- [104] S. Genaud and J. Gossa, "Cost-Wait Trade-Offs in Client-Side Resource Provisioning with Elastic Clouds," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 1-8.
- [105] H. Sijin, G. Li, and G. Yike, "Real Time Elastic Cloud Management for Limited Resources," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 622-629.
- [106] P. Wright, T. Harmer, J. Hawkins, and S. Yih Leong, "A Commodity-Focused Multi-cloud Marketplace Exemplar Application," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 590-597.
- [107] S. Sudevalayam and P. Kulkarni, "Affinity-Aware Modeling of CPU Usage for Provisioning Virtualized Applications," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 139-146.
- [108] C. Fehling, F. Leymann, D. Schumm, R. Konrad, R. Mietzner, and M. Pauly, "Flexible Process-Based Applications in Hybrid Clouds," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 81-88.
- [109] X. Etchevers, T. Coupaye, F. Boyer, and N. De Palma, "Self-Configuration of Distributed Applications in the Cloud," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 668-675.
- [110] R. Sweha, V. Ishakian, and A. Bestavros, "Angels in the Cloud: A Peer-Assisted Bulk-Synchronous Content Distribution Service," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 97-104.
- [111] E. Juhnke, T. Dornemann, D. Bock, and B. Freisleben, "Multi-objective Scheduling of BPEL Workflows in Geographically Distributed Clouds," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 412-419.
- [112] J. Cervino, P. Rodriguez, I. Trajkovska, A. Mozo, and J. Salvachua, "Testing a Cloud Provider Network for Hybrid P2P and Cloud Streaming Architectures," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 356-363.
- [113] D. Battre, N. Frejnik, S. Goel, K. Odej, and D. Warneke, "Evaluation of Network Topology Inference in Opaque Compute Clouds through End-to-End Measurements," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 17-24.

- [114] K. Mills, J. Filliben, and C. Dabrowski, "An Efficient Sensitivity Analysis Method for Large Cloud Simulations," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 724-731.
- [115] C. C. Tan, L. Qin, and W. Jie, "Secure Locking for Untrusted Clouds," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 131-138.
- [116] I. Khan, H. Rehman, and Z. Anwar, "Design and Deployment of a Trusted Eucalyptus Cloud," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 380-387.
- [117] M. Almorsy, J. Grundy, and A. S. Ibrahim, "Collaboration-Based Cloud Computing Security Management Framework," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 364-371.
- [118] B. Bertholon, S. Varrette, and P. Bouvry, "Certicloud: A Novel TPM-based Approach to Ensure Cloud IaaS Security," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 121-130.
- [119] M. Deng, M. Petkovic, M. Nalin, and I. Baroni, "A Home Healthcare System in the Cloud--Addressing Security and Privacy Challenges," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 549-556.
- [120] M. Jensen, J. Schwenk, J. M. Bohli, N. Gruschka, and L. L. Iacono, "Security Prospects through Cloud Computing by Adopting Multiple Clouds," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 565-572.
- [121] I. Muller, J. Han, J. G. Schneider, and S. Versteeg, "Tackling the Loss of Control: Standards-Based Conjoint Management of Security Requirements for Cloud Services," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 573-581.
- [122] Y. Simmhan, A. G. Kumbhare, C. Baohua, and V. Prasanna, "An Analysis of Security and Privacy Issues in Smart Grid Software Architectures on Clouds," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 582-589.
- [123] J. Idziorek and M. Tannian, "Exploiting Cloud Utility Models for Profit and Ruin," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 33-40.
- [124] D. de Oliveira, K. Ocana, E. Ogasawara, J. Dias, F. Baiao, and M. Mattoso, "A Performance Evaluation of X-Ray Crystallography Scientific Workflow Using SciCumulus," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 708-715.
- [125] D. Jayasinghe, S. Malkowski, W. Qingyang, J. Li, X. Pengcheng, and C. Pu, "Variations in Performance and Scalability When Migrating n-Tier Applications to Different Clouds," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 73-80.
- [126] S. Kikuchi and Y. Matsumoto, "Performance Modeling of Concurrent Live Migration Operations in Cloud Computing Systems Using PRISM Probabilistic Model Checker," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 49-56.
- [127] A. Lenk, M. Menzel, J. Lipsky, S. Tai, and P. Offermann, "What Are You Paying For? Performance Benchmarking for Infrastructure-as-a-Service Offerings," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 484-491.
- [128] P. Patil, P. Kulkarni, and U. Bellur, "VirtPerf: A Performance Profiling Tool for Virtualized Environments," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 57-64.
- [129] W. Yangyang and Z. Ming, "Performance Modeling of Virtual Machine Live Migration," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 492-499.
- [130] A. J. Younge, R. Henschel, J. T. Brown, G. von Laszewski, J. Qiu, and G. C. Fox, "Analysis of Virtualization Technologies for High Performance Computing Environments," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 9-16.
- [131] S. Sundareswaran, A. Squicciarini, D. Lin, and H. Shuo, "Promoting Distributed Accountability in the Cloud," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 113-120.
- [132] T. Aditya, P. K. Baruah, and R. Mukkamala, "Space-Efficient Bloom Filters for Enforcing Integrity of Outsourced Data in Cloud Environments," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 292-299.
- [133] S. K. Doddavula, M. Rani, S. Sarkar, H. R. Vachhani, A. Jain, M. Kaushik, et al., "Implementation of a Scalable Next Generation Sequencing Business Cloud Platform--An Experience Report," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 598-605.
- [134] J. Ekanayake, J. Jackson, L. Wei, R. Barga, and A. S. Balkir, "A Scalable Communication Runtime for Clouds," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 211-218.
- [135] M. Husain, J. McGlothlin, L. Khan, and B. Thuraisingham, "Scalable Complex Query Processing over Large Semantic Web Data Using Cloud," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 187-194.
- [136] B. Satzger, W. Hummer, P. Leitner, and S. Dustdar, "Esc: Towards an Elastic Stream Computing Platform for the Cloud," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 348-355.
- [137] D. Moran, L. M. Vaquero, and F. Galan, "Elastically Ruling the Cloud: Specifying Application's Behavior in Federated Clouds," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 89-96.
- [138] A. Ishii and T. Suzumura, "Elastic Stream Computing with Clouds," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 195-202.
- [139] H. Ghanbari, B. Simmons, M. Litoiu, and G. Iszlai, "Exploring Alternative Approaches to Implement an Elasticity Policy," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 716-723.
- [140] Z. Yilei, Z. Zibin, and M. R. Lyu, "BFTCloud: A Byzantine Fault Tolerance Framework for Voluntary-Resource Cloud Computing," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 444-451.
- [141] Q. L. Nguyen and A. Lake, "Content Server System Architecture for Providing Differentiated Levels of Service in a Digital Preservation Cloud," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 557-564.
- [142] H. Yu-Chiao, H. Yu-Chieh, L. Ching-Hu, and F. Li-Chen, "A Cloud-Based Accessible Architecture for Large-Scale ADL Analysis Services," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 646-653.
- [143] A. Iwai and M. Aoyama, "Automotive Cloud Service Systems Based on Service-Oriented Architecture and Its Evaluation," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 638-645.
- [144] M. Rodriguez-Martinez, J. Seguel, M. Sotomayor, J. P. Aleman, J. Rivera, and M. Greer, "Open911: Experiences with the Mobile Plus Cloud Paradigm," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 606-613.
- [145] S. Bobrowski, "Optimal Multitenant Designs for Cloud Apps," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 654-659.
- [146] L. Dongxi and J. Zic, "Cloud#: A Specification Language for Modeling Cloud," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 533-540.
- [147] D. Anh Vu, C. Junliang, W. Chen, L. Young Choon, A. Y. Zomaya, and Z. Bing Bing, "Profiling Applications for Virtual Machine Placement in Clouds," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 660-667.
- [148] W. Jingzheng, D. Liping, Y. Wang, and H. Wei, "Identification and Evaluation of Sharing Memory Covert Timing Channel in Xen Virtual Machines," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 283-291.
- [149] Y. Kejiang, J. Xiaohong, H. Dawei, C. Jianhai, and W. Bei, "Live Migration of Multiple Virtual Machines with Resource Reservation in Cloud Computing Environments," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 267-274.
- [150] T. Knauth and C. Fetzer, "Scaling Non-elastic Applications Using Virtual Machines," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 468-475.
- [151] S. Zaman and D. Grosu, "Efficient Bidding for Virtual Machine Instances in Clouds," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 41-48.
- [152] M. Mishra and A. Sahoo, "On Theory of VM Placement: Anomalies in Existing Methodologies and Their Mitigation Using a Novel Vector Based Approach," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 275-282.

- [153] K. Zhen, X. Cheng-Zhong, and G. Minyi, "Mechanism Design for Stochastic Virtual Resource Allocation in Non-cooperative Cloud Systems," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 614-621.
- [154] C. Franke, S. Morin, A. Chebotko, J. Abraham, and P. Brazier, "Distributed Semantic Web Data Management in HBase and MySQL Cluster," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 105-112.
- [155] Z. Rui, R. Routray, D. M. Eyers, D. Chambliss, P. Sarkar, D. Willcocks, *et al.*, "IO Tetris: Deep Storage Consolidation for the Cloud via Fine-Grained Workload Analysis," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 700-707.
- [156] P. Graubner, M. Schmidt, and B. Freisleben, "Energy-Efficient Management of Virtual Machines in Eucalyptus," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 243-250.
- [157] Y. Yunqi, X. Liangliang, I. L. Yen, and F. Bastani, "Leveraging Service Clouds for Power and QoS Management for Mobile Devices," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 235-242.
- [158] H. Lei, J. Qin, W. Xin, Y. Shuang, and L. Baochun, "PCube: Improving Power Efficiency in Data Center Networks," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 65-72.
- [159] N. Roy, A. Dubey, and A. Gokhale, "Efficient Autoscaling in the Cloud Using Predictive Models for Workload Forecasting," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 500-507.
- [160] S. Pacheco-Sanchez, G. Casale, B. Scotney, S. McClean, G. Parr, and S. Dawson, "Markovian Workload Characterization for QoS Prediction in the Cloud," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 147-154.
- [161] D. Ardagna, S. Casolari, and B. Panicucci, "Flexible Distributed Capacity Allocation and Load Redirect Algorithms for Cloud Systems," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 163-170.
- [162] S. Agarwala, D. Jadav, and L. A. Bathen, "iCostale: Adaptive Cost Optimization for Storage Clouds," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 436-443.
- [163] Y. Dong, Y. Yun, L. Xiao, and C. Jinjun, "A Local-Optimisation Based Strategy for Cost-Effective Datasets Storage of Scientific Applications in the Cloud," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 179-186.
- [164] L. Haitao, Z. Lili, L. Jiangchuan, L. Bo, and X. Ke, "Cost-Effective Partial Migration of VoD Services to Content Clouds," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 203-210.
- [165] A. Khajeh-Hosseini, I. Sommerville, J. Bogaerts, and P. Teregowda, "Decision Support Tools for Cloud Migration in the Enterprise," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 541-548.
- [166] C. Yi-Min, Z. Nianjun, M. Fan Jing, S. Bagheri, and Z. Peide, "A Pattern-Based Approach to Cloud Transformation," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 388-395.
- [167] M. A. Chauhan and M. A. Babar, "Migrating Service-Oriented System to Cloud Computing: An Experience Report," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 404-411.
- [168] P. Saripalli and G. Pingali, "MADMAC: Multiple Attribute Decision Methodology for Adoption of Clouds," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 316-323.
- [169] M. A. Bochicchio and A. Longo, "Modelling Contract Management for Cloud Services," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 332-339.
- [170] P. A. Jamkhedkar, C. C. Lamb, and G. L. Heileman, "Usage Management in Cloud Computing," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 525-532.
- [171] H. Goudarzi and M. Pedram, "Multi-dimensional SLA-Based Resource Allocation for Multi-tier Cloud Computing Systems," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 324-331.
- [172] Z. Zhiliang, B. Jing, Y. Haitao, and C. Ying, "SLA Based Dynamic Virtualized Resources Provisioning for Shared Cloud Data Centers," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 630-637.
- [173] M. Seibold, A. Kemper, and D. Jacobs, "Strict SLAs for Operational Business Intelligence," in *Cloud Computing (CLOUD), 2011 IEEE International Conference on*, 2011, pp. 25-32.

CLOUD 2012

- [174] M. Altamimi, R. Palit, K. Naik, and A. Nayak, "Energy-as-a-Service (EaaS): On the Efficacy of Multimedia Cloud Computing to Save Smartphone Energy," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 764-771.
- [175] C. A. Ardagna, E. Damiani, F. Frati, D. Rebecani, and M. Ughetti, "Scalability Patterns for Platform-as-a-Service," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 718-725.
- [176] S. T. Ruehl, U. Andelfinger, A. Rausch, and S. A. Verclas, "Toward Realization of Deployment Variability for Software-as-a-Service Applications," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 622-629.
- [177] S. Shi, S. Xiang, Z. Yongxin, H. Tian, Y. Shunqing, and L. Shiming, "Prototyping Efficient Desktop-as-a-Service for FPGA Based Cloud Computing Architecture," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 702-709.
- [178] R. Ganesan, S. Sarkar, and A. Narayan, "Analysis of SaaS Business Platform Workloads for Sizing and Collocation," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 868-875.
- [179] V. Pacheco and R. Puttini, "Defining and Implementing Connection Anonymity for SaaS Web Services," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 479-486.
- [180] H. Qiang, J. Han, Y. Yun, J. Grundy, and J. Hai, "QoS-Driven Service Selection for Multi-tenant SaaS," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 566-573.
- [181] F. Paraiso, N. Haderer, P. Merle, R. Rouvoy, and L. Seinturier, "A Federated Multi-cloud PaaS Infrastructure," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 392-399.
- [182] A. Ojala, "Software Renting in the Era of Cloud Computing," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 662-669.
- [183] M. Bjorkqvist, L. Y. Chen, and W. Binder, "Opportunistic Service Provisioning in the Cloud," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 237-244.
- [184] R. Gracia-Tinedo, M. Sanchez-Artigas, Garci, x, L. a, x, *et al.*, "F2Box: Cloudifying F2F Storage Systems with High Availability Correlation," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 123-130.
- [185] R. Gracia-Tinedo, M. Sanchez-Artigas, A. Moreno-Martinez, Garci, x, L. a, *et al.*, "FriendBox: A Hybrid F2F Personal Storage Application," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 131-138.
- [186] M. Chonglei, D. Taylor, W. Chenyu, A. Chandra, and J. Weissman, "Sharing-Aware Cloud-Based Mobile Outsourcing," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 408-415.
- [187] F. Pei, C. Zhenbang, W. Ji, Z. Zibin, and M. R. Lyu, "Topology-Aware Deployment of Scientific Applications in Cloud Computing," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 319-326.
- [188] K. Yu, Z. Zibin, and M. R. Lyu, "A Latency-Aware Co-deployment Mechanism for Cloud-Based Services," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 630-637.
- [189] L. JongHyuk, F. Tao, S. Weidong, A. Bedagkar-Gala, S. K. Shah, and H. Yoshida, "Towards Quality Aware Collaborative Video Analytic Cloud," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 147-154.

- [190] T. M. Al-Khateeb, M. M. Masud, L. Khan, and B. Thuraisingham, "Cloud Guided Stream Classification Using Class-Based Ensemble," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 694-701.
- [191] T. Binz, C. Fehling, F. Leymann, A. Nowak, and D. Schumm, "Formalizing the Cloud through Enterprise Topology Graphs," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 742-749.
- [192] P. Butler, A. Rhodes, and R. Hasan, "MANTICORE: Masking All Network Traffic via IP Concealment with OpenVPN Relaying to EC2," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 487-493.
- [193] C. Yu-Jung, C. Chien-Chih, H. Jan-Ming, and C. Chuen-Liang, "De Novo Assembly of High-Throughput Sequencing Data with Cloud Computing and New Operations on String Graphs," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 155-161.
- [194] C. Chunqing, Y. Shixing, Z. Guopeng, L. Bu Sung, and S. Singhal, "A Systematic Framework Enabling Automatic Conflict Detection and Explanation in Cloud Service Selection for Enterprises," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 883-890.
- [195] J. Hartog, Z. Fadika, E. Dede, and M. Govindaraju, "Configuring a MapReduce Framework for Dynamic and Efficient Energy Adaptation," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 914-921.
- [196] X. Hong and L. Baochun, "A General and Practical Datacenter Selection Framework for Cloud Services," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 9-16.
- [197] Y. Lei, C. Jiannong, T. Shaojie, L. Tao, and A. S. Chan, "A Framework for Partitioning and Execution of Data Stream Applications in Mobile Cloud Computing," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 794-802.
- [198] B. Sharma, R. Prabhakar, S. Lim, M. T. Kandemir, and C. R. Das, "MROrchestrator: A Fine-Grained Resource Orchestration Framework for MapReduce Clusters," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 1-8.
- [199] G. von Laszewski, J. Diaz, W. Fugang, and G. C. Fox, "Comparison of Multiple Cloud Frameworks," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 734-741.
- [200] C. Wei, Q. Xiaoqiang, W. Jun, and H. Tao, "A Profit-Aware Virtual Machine Deployment Optimization Framework for Cloud Platform Providers," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 17-24.
- [201] M. AbdelBaky, K. Hyunjoon, I. Rodero, and M. Parashar, "Accelerating MapReduce Analytics Using CometCloud," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 447-454.
- [202] Y. Cairong, Y. Xin, Y. Ze, L. Min, and L. Xiaolin, "IncMR: Incremental Data Processing Based on MapReduce," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 534-541.
- [203] M. Hammoud, M. S. Rehman, and M. F. Sakr, "Center-of-Gravity Reduce Task Scheduling to Lower MapReduce Network Traffic," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 49-58.
- [204] K. HyeongSik, P. Ravindra, and K. Anyanwu, "Scan-Sharing for Optimizing RDF Graph Pattern Matching on MapReduce," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 139-146.
- [205] D. Bi-Ru and I. C. Lin, "Efficient Map/Reduce-Based DBSCAN Algorithm with Optimized Data Partition," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 59-66.
- [206] Z. Fadika, M. Govindaraju, R. Canon, and L. Ramakrishnan, "Evaluating Hadoop for Data-Intensive Scientific Operations," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 67-74.
- [207] S. Vijayakumar, A. Bhargavi, U. Praseeda, and S. A. Ahamed, "Optimizing Sequence Alignment in Cloud Using Hadoop and MPP Database," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 819-827.
- [208] S. M. Khan and K. W. Hamlen, "Hatman: Intra-cloud Trust Management for Hadoop," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 494-501.
- [209] C. Benninger, S. W. Neville, Y. O. Yazir, C. Matthews, and Y. Coady, "Maitland: Lighter-Weight VM Introspection to Support Cybersecurity in the Cloud," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 471-478.
- [210] A. S. Ibrahim, J. Hamlyn-Harris, J. Grundy, and M. Almsory, "Supporting Virtualization-Aware Security Solutions Using a Systematic Approach to Overcome the Semantic Gap," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 836-843.
- [211] L. Dongxi and W. Shenlu, "Programmable Order-Preserving Secure Index for Encrypted Database Query," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 502-509.
- [212] A. Kumbhare, Y. Simmhan, and V. Prasanna, "Cryptonite: A Secure and Performant Data Repository on Public Clouds," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 510-517.
- [213] W. Jingzheng, D. Liping, L. Yuqi, N. Min-Allah, and Y. Wang, "XenPump: A New Method to Mitigate Timing Channel in Cloud Computing," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 678-685.
- [214] T. Rings and J. Grabowski, "Pragmatic Integration of Cloud and Grid Computing Infrastructures," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 710-717.
- [215] W. Boyang, L. Baochun, and L. Hui, "Oruta: Privacy-Preserving Public Auditing for Shared Data in the Cloud," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 295-302.
- [216] Y. Brun and N. Medvidovic, "Keeping Data Private while Computing in the Cloud," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 285-294.
- [217] M. H. Diallo, B. Hore, E. C. Chang, S. Mehrotra, and N. Venkatasubramanian, "CloudProtect: Managing Data Privacy in Cloud Applications," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 303-310.
- [218] R. Birke, L. Y. Chen, and E. Smirni, "Data Centers in the Cloud: A Large Scale Performance Study," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 336-343.
- [219] W. Ellens, M. Zivkovic, J. Akkerboom, R. Litjens, and H. van den Berg, "Performance of Cloud Computing Centers with Multiple Priority Classes," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 245-252.
- [220] J. Gueyoung, N. Gnanasambandam, and T. Mukherjee, "Synchronous Parallel Processing of Big-Data Analytics Services to Optimize Performance in Federated Clouds," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 811-818.
- [221] D. Jayasinghe, G. Swint, S. Malkowski, J. Li, W. Qingyang, P. Junhee, et al., "Expertus: A Generator Approach to Automate Performance Testing in IaaS Clouds," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 115-122.
- [222] S. Kikuchi and Y. Matsumoto, "Impact of Live Migration on Multi-tier Application Performance in Clouds," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 261-268.
- [223] M. Ming and M. Humphrey, "A Performance Study on the VM Startup Time in the Cloud," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 423-430.
- [224] R. Neumann, S. Taggeselle, R. Dumke, A. Schmietendorf, F. Muhss, and A. Fiegler, "Combining Query Performance with Data Integrity in the Cloud: A Hybrid Cloud Storage Framework to Enhance Data Access on the Windows Azure Platform," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 518-525.
- [225] Z. Qian and T. Tung, "A Performance Interference Model for Managing Consolidated Workloads in QoS-Aware Clouds," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 170-179.
- [226] E. Roloff, F. Birck, M. Diener, A. Carissimi, and P. O. A. Navaux, "Evaluating High Performance Computing on the Windows Azure Platform," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 803-810.

- [227] J. S. van der Veen, B. van der Waaij, and R. J. Meijer, "Sensor Data Storage Performance: SQL or NoSQL, Physical or Virtual," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 431-438.
- [228] W. Wei, H. Xiang, Q. Xiulei, Z. Wenbo, W. Jun, and Z. Hua, "Application-Level CPU Consumption Estimation: Towards Performance Isolation of Multi-tenancy Web Applications," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 439-446.
- [229] L. Zheng, L. O'Brien, R. Cai, and Z. He, "Towards a Taxonomy of Performance Evaluation of Commercial Cloud Services," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 344-351.
- [230] Z. Zhenyun and C. Yao-Min, "Optimizing JMS Performance for Cloud-Based Application Servers," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 828-835.
- [231] V. Padhye and A. Tripathi, "Scalable Transaction Management with Snapshot Isolation on Cloud Data Management Systems," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 542-549.
- [232] S. Dutta, S. Gera, V. Akshat, and B. Viswanathan, "SmartScale: Automatic Application Scaling in Enterprise Clouds," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 221-228.
- [233] K. Konstanteli, T. Cucinotta, K. Psychas, and T. Varvarigou, "Admission Control for Elastic Cloud Services," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 41-48.
- [234] I. Santana-Perez and M. S. Perez-Hernandez, "A Semantic Scheduler Architecture for Federated Hybrid Clouds," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 384-391.
- [235] V. S. Sharma, S. Sengupta, and K. M. Annervaz, "ReLoC: A Resilient Loosely Coupled Application Architecture for State Management in the Cloud," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 906-913.
- [236] D. Agarwal and S. K. Prasad, "Lessons Learnt from the Development of GIS Application on Azure Cloud Platform," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 352-359.
- [237] C. Fehling, T. Ewald, F. Leymann, M. Pauly, J. Rutschlin, and D. Schumm, "Capturing Cloud Computing Knowledge and Experience in Patterns," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 726-733.
- [238] H. Li-Yung, W. Jan-Jan, and L. Pangfeng, "Distributed Graph Database for Large-Scale Social Computing," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 455-462.
- [239] C. Taylor and J. Pasquale, "A Remote I/O Solution for the Cloud," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 670-677.
- [240] N. Tien-Dung, N. Mui Van, and H. Eui-Nam, "Service Image Placement for Thin Client in Mobile Cloud Computing," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 416-422.
- [241] C. Tzi-cker, T. Cheng-Chun, W. Yu-Cheng, W. Pai-Wei, L. Kai-Wen, and H. Yu-Ming, "Peregrine: An All-Layer-2 Container Computer Network," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 686-693.
- [242] H. Yan, Z. Ming, X. Yong, C. Kai, and L. Yanlin, "GARDEN: Generic Addressing and Routing for Data Center Networks," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 107-114.
- [243] X. Jielong, T. Jian, K. Kwiat, Z. Weiyi, and X. Guoliang, "Survivable Virtual Infrastructure Mapping in Virtualized Data Centers," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 196-203.
- [244] F. Oliveira, T. Eilam, M. Kalantar, and F. Rosenberg, "Semantically-Rich Composition of Virtual Images," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 277-284.
- [245] M. Seibold, A. Wolke, M. Albutiu, M. Bichler, A. Kemper, and T. Setzer, "Efficient Deployment of Main-Memory DBMS in Virtualized Data Centers," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 311-318.
- [246] N. M. Calcevecchia, O. Biran, E. Hadad, and Y. Moatti, "VM Placement Strategies for Cloud Scenarios," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 852-859.
- [247] D. Jeswani, M. Gupta, P. De, A. Malani, and U. Bellur, "Minimizing Latency in Serving Requests through Differential Template Caching in a Cloud," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 269-276.
- [248] Z. Wei, T. Hong, J. Hao, Y. Tao, L. Xiaogang, and Z. Yue, "Multi-level Selective Deduplication for VM Snapshots in Cloud Storage," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 550-557.
- [249] S. Akiyama, T. Hirofuchi, R. Takano, and S. Honiden, "MiyakoDori: A Memory Reusing Mechanism for Dynamic VM Consolidation," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 606-613.
- [250] M. Zafer, S. Yang, and L. Kang-Won, "Optimal Bids for Spot VMs in a Cloud for Deadline Constrained Jobs," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 75-82.
- [251] S. Zaman and D. Grosu, "An Online Mechanism for Dynamic VM Provisioning and Allocation in Clouds," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 253-260.
- [252] C. Fangzhe, V. Ramesh, and T. L. Wood, "Placement in Clouds for Application-Level Latency Requirements," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 327-335.
- [253] Z. Liang, S. Sakr, and A. Liu, "Application-Managed Replication Controller for Cloud-Hosted Databases," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 922-929.
- [254] W. Dargie and A. Schill, "Analysis of the Power and Hardware Resource Consumption of Servers under Different Load Balancing Policies," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 772-778.
- [255] M. Ferber, T. Rauber, M. H. C. Torres, and T. Holvoet, "Resource Allocation for Cloud-Assisted Mobile Applications," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 400-407.
- [256] R. Ghosh and V. K. Naik, "Biting Off Safely More Than You Can Chew: Predictive Analytics for Resource Over-Commit in IaaS Cloud," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 25-32.
- [257] K. Halder, U. Bellur, and P. Kulkarni, "Risk Aware Provisioning and Resource Aggregation Based Consolidation of Virtual Machines," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 598-605.
- [258] J. Idziorek, M. Tannian, and D. Jacobson, "Attribution of Fraudulent Resource Consumption in the Cloud," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 99-106.
- [259] H. Inkwon and M. Pedram, "Portfolio Theory-Based Resource Assignment in a Cloud Computing System," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 582-589.
- [260] S. Malkowski, Y. Kanemasa, C. Hanwei, M. Yamamoto, W. Qingyang, D. Jayasinghe, et al., "Challenges and Opportunities in Consolidation at High Resource Utilization: Non-monotonic Response Time Variations in n-Tier Applications," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 162-169.
- [261] M. Maurer, I. Brandic, and R. Sakellariou, "Self-Adaptive and Resource-Efficient SLA Enactment for Cloud Computing Infrastructures," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 368-375.
- [262] H. Sijin, G. Li, M. Ghanem, and G. Yike, "Improving Resource Utilisation in the Cloud Environment Using Multivariate Probabilistic Models," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 574-581.
- [263] H. Ting, C. Shiyao, K. Hyoil, T. Lang, and L. Kang-Won, "Scheduling Parallel Tasks onto Opportunistically Available Cloud Resources," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 180-187.
- [264] Y. O. Yazir, Y. Akbulut, R. Farahbod, A. Guitouni, S. W. Neville, S. Ganti, et al., "Autonomous Resource Consolidation Management in Clouds Using IMPROMPTU Extensions," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 614-621.

- [265] Z. I. Yusoh and T. Maolin, "Composite SaaS Placement and Resource Optimization in Cloud Computing Using Evolutionary Algorithms," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 590-597.
- [266] J. Diaz, G. von Laszewski, W. Fugang, and G. Fox, "Abstract Image Management and Universal Image Registration for Cloud and HPC Infrastructures," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 463-470.
- [267] K. Bessai, S. Youcef, A. Oulamara, C. Godart, and S. Nurcan, "Bi-criteria Workflow Tasks Allocation and Scheduling in Cloud Computing Environments," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 638-645.
- [268] S. Kraft, G. Casale, A. Jula, P. Kilpatrick, and D. Greer, "WIQ: Work-Intensive Query Scheduling for In-Memory Database Systems," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 33-40.
- [269] W. Long, R. A. Hosn, and T. Chunqiang, "Remediating Overload in Over-Subscribed Computing Environments," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 860-867.
- [270] K. Y. Oktay, V. Khadilkar, B. Hore, M. Kantarcioglu, S. Mehrotra, and B. Thuraisingham, "Risk-Aware Workload Distribution in Hybrid Clouds," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 229-236.
- [271] M. A. Adnan, R. Sugihara, and R. K. Gupta, "Energy Efficient Geographical Load Balancing via Dynamic Deferral of Workload," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 188-195.
- [272] E. Feller, C. Rohr, D. Margery, and C. Morin, "Energy Management in IaaS Clouds: A Holistic Approach," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 204-212.
- [273] H. Goudarzi and M. Pedram, "Energy-Efficient Virtual Machine Replication and Placement in a Cloud Computing System," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 750-757.
- [274] G. Metri, S. Srinivasaraghavan, S. Weisong, and M. Brockmeyer, "Experimental Analysis of Application Specific Energy Efficiency of Data Centers with Heterogeneous Servers," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 786-793.
- [275] M. A. Salehi, P. Radha Krishna, K. S. Deepak, and R. Buyya, "Preemption-Aware Energy Management in Virtualized Data Centers," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 844-851.
- [276] W. Dargie, "Analysis of the Power Consumption of a Multimedia Server under Different DVFS Policies," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 779-785.
- [277] I. Fetai and H. Schultdt, "Cost-Based Data Consistency in a Data-as-a-Service Cloud Environment," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 526-533.
- [278] M. Hadji and D. Zeghlache, "Minimum Cost Maximum Flow Algorithm for Dynamic Resource Allocation in Clouds," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 876-882.
- [279] P. Leitner, W. Hummer, B. Satzger, C. Inzinger, and S. Dustdar, "Cost-Efficient and Application SLA-Aware Client Side Request Scheduling in an Infrastructure-as-a-Service Cloud," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 213-220.
- [280] O. Mazhelis, G. Fazekas, and P. Tyrvaainen, "Impact of Storage Acquisition Intervals on the Cost-Efficiency of the Private vs. Public Storage," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 646-653.
- [281] F. F. Moghaddam, R. F. Moghaddam, and M. Cheriet, "Carbon Metering and Effective Tax Cost Modeling for Virtual Machines," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 758-763.
- [282] T. Shaojie, Y. Jing, and L. Xiang-Yang, "Towards Optimal Bidding Strategy for Amazon EC2 Cloud Spot Instance," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 91-98.
- [283] U. Lampe, M. Siebenhaar, A. Papageorgiou, D. Schuller, and R. Steinmetz, "Maximizing Cloud Provider Profit from Equilibrium Price Auctions," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 83-90.
- [284] T. Wei-Tek and Q. Guanqiu, "DICB: Dynamic Intelligent Customizable Benign Pricing Strategy for Cloud Computing," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 654-661.
- [285] M. Rodriguez-Martinez, H. Valdivia, J. Riveria, J. Seguel, and M. Greer, "MedBook: A Cloud-Based Healthcare Billing and Record Management System," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 899-905.
- [286] P. Pawluk, B. Simmons, M. Smit, M. Litoiu, and S. Mankovski, "Introducing STRATOS: A Cloud Broker Service," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 891-898.
- [287] S. Sundareswaran, A. Squicciarini, and D. Lin, "A Brokerage-Based Approach for Cloud Service Selection," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 558-565.
- [288] A. L. Freitas, N. Parlavantzas, and J. L. Pazat, "An Integrated Approach for Specifying and Enforcing SLAs for Cloud Services," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 376-383.
- [289] S. Sakr and A. Liu, "SLA-Based and Consumer-centric Dynamic Provisioning for Cloud Databases," in *Cloud Computing (CLOUD), 2012 IEEE 5th International Conference on*, 2012, pp. 360-367.

CLOUD 2013

- [290] R. Costa Lima Junior, R. Hollanda Filho, A. Sampaio, and N. Mendonca, "TrexCloud: Java EE IaaS Cloud Deployment Made Easy," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 470-477.
- [291] F. Fotrousi, K. Izadyan, and S. A. Fricker, "Analytics for Product Planning: In-Depth Interview Study with SaaS Product Managers," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 871-879.
- [292] S. T. Ruehl, H. Wache, and S. A. Verclas, "Capturing Customers' Requirements towards Mixed-Tenancy Deployments of SaaS-Applications," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 462-469.
- [293] M. Sellami, S. Yangui, M. Mohamed, and S. Tata, "PaaS-Independent Provisioning and Management of Applications in the Cloud," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 693-700.
- [294] V. S. Sharma, S. Sengupta, and S. Nagasamudram, "MAT: A Migration Assessment Toolkit for PaaS Clouds," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 794-801.
- [295] J. Wettinger, V. Andrikopoulos, S. Strauch, and F. Leymann, "Enabling Dynamic Deployment of Cloud Applications Using a Modular and Extensible PaaS Environment," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 478-485.
- [296] L. Weiming, Z. Liangju, S. Jian, W. Baogang, and Z. Yueting, "Digital Library Engine: Adapting Digital Library for Cloud Computing," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 934-941.
- [297] N. Kaaniche, A. Boudguiga, and M. Laurent, "ID Based Cryptography for Cloud Data Storage," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 375-382.
- [298] G. Vernik, A. Shulman-Peleg, S. Dippl, C. Formisano, M. C. Jaeger, E. K. Kolodner, et al., "Data On-Boarding in Federated Storage Clouds," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 244-251.
- [299] Y. Yunqi, X. Liangliang, C. Yinzi, I. L. Yen, F. Bastani, and C. Ing-Ray, "Access Protocols in Data Partitioning Based Cloud Storage," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 398-405.
- [300] X. Lai, P. De Vrieze, and J. Nan, "Incident Notification Process as a Service for Electricity Supply Systems," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 926-933.

- [301] M. Nassar, A. Erradi, F. Sabri, and Q. M. Malluhi, "Secure Outsourcing of Matrix Operations as a Service," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 918-925.
- [302] N. Ferry, A. Rossini, F. Chauvel, B. Morin, and A. Solberg, "Towards Model-Driven Provisioning, Deployment, Monitoring, and Adaptation of Multi-cloud Systems," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 887-894.
- [303] L. Brandwacht, E. Meeuwissen, H. van den Berg, and M. Ivkovic, "Models and Guidelines for Dimensioning Private Clouds," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 880-886.
- [304] Z. Huanyang, L. Kangkang, C. C. Tan, and W. Jie, "User-Based CPU Verification Scheme for Public Cloud Computing," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 732-739.
- [305] S. Kikuchi, T. Uchiumi, S. Kitajima, and Y. Matsumoto, "Configuration Policy Extraction for Parameter Settings in Cloud Infrastructure Using UML/OCL Verification," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 67-74.
- [306] M. Fan Jing, Z. Xuejun, Y. Bo, X. Jing Min, J. Pu, A. Apte, et al., "A Generic Framework for Application Configuration Discovery with Pluggable Knowledge," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 236-243.
- [307] H. He, W. Liqiang, T. Byung Chul, W. Long, and T. Chunqiang, "CAP3: A Cloud Auto-Provisioning Framework for Parallel Processing Using On-Demand and Spot Instances," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 228-235.
- [308] L. Kisung, L. Ling, T. Yuzhe, Z. Qi, and Z. Yang, "Efficient and Customizable Data Partitioning Framework for Distributed Big RDF Data Processing in the Cloud," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 327-334.
- [309] K. Mershad and H. Artail, "A Framework for Implementing Mobile Cloud Services in VANETs," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 83-90.
- [310] M. A. Adnan and R. Gupta, "Path Consolidation for Dynamic Right-Sizing of Data Center Networks," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 581-588.
- [311] E. Dede, B. Sendir, P. Kuzlu, J. Hartog, and M. Govindaraju, "An Evaluation of Cassandra for Hadoop," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 494-501.
- [312] P. Dhawalia, S. Kailasam, and D. Janakiram, "Chisel: A Resource Savvy Approach for Handling Skew in MapReduce Applications," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 652-660.
- [313] M. Hammoud and M. F. Sakr, "MC2: Map Concurrency Characterization for MapReduce on the Cloud," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 17-26.
- [314] J. Schad, J. A. Quianee-Ruiz, and J. Dittrich, "Elephant, Do Not Forget Everything! Efficient Processing of Growing Datasets," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 252-259.
- [315] M. Shtern, B. Simmons, M. Smit, and M. Litoiu, "Toward an Ecosystem for Precision Sharing of Segmented Big Data," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 335-342.
- [316] Y. Yi, W. Jiayin, S. Bo, and M. Ningfang, "Using a Tunable Knob for Reducing Makespan of MapReduce Jobs in a Hadoop Cluster," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 1-8.
- [317] W. Yongzhi, W. Jinpeng, and M. Srivatsa, "Result Integrity Check for MapReduce Computation on Hybrid Clouds," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 847-854.
- [318] J. Yuting, T. Lang, H. Ting, T. Jian, L. Kang-Won, and Z. Li, "Improving Multi-job MapReduce Scheduling in an Opportunistic Environment," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 9-16.
- [319] M. B. Chhetri, S. Chichin, V. Quoc Bao, and R. Kowalczyk, "Smart CloudBench -- Automated Performance Benchmarking of the Cloud," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 414-421.
- [320] M. Cunha, N. Mendonca, and A. Sampaio, "A Declarative Environment for Automatic Performance Evaluation in IaaS Clouds," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 285-292.
- [321] Z. Qi, L. Ling, R. Yi, L. Kisung, T. Yuzhe, Z. Xu, et al., "Residency Aware Inter-VM Communication in Virtualized Cloud: Performance Measurement and Analysis," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 204-211.
- [322] J. W. Smith and I. Sommerville, "Understanding Tradeoffs between Power Usage and Performance in a Virtualized Environment," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 725-731.
- [323] S. Spicuglia, L. Y. Chen, and W. Binder, "Join the Best Queue: Reducing Performance Variability in Heterogeneous Systems," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 139-146.
- [324] Z. Zhuoyao, L. Cherkasova, and B. T. Loo, "Performance Modeling of MapReduce Jobs in Heterogeneous Cloud Environments," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 839-846.
- [325] A. Fiegler, A. Zwanziger, N. Zenker, R. Dumke, and R. Neumann, "Advanced Quality Measurement for Cloud Services," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 786-793.
- [326] R. Gracia-Tinedo, M. Sanchez Artigas, A. Moreno-Martinez, C. Cotes, and P. Garcia Lopez, "Actively Measuring Personal Cloud Storage," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 301-308.
- [327] P. Costa, J. P. Santos, and M. M. da Silva, "Evaluation Criteria for Cloud Services," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 598-605.
- [328] T. Mastelic and I. Brandic, "TimeCap: Methodology for Comparing IT Infrastructures Based on Time and Capacity Metrics," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 131-138.
- [329] W. Qingyang, Y. Kanemasa, J. Li, D. Jayasinghe, T. Shimizu, M. Matsubara, et al., "An Experimental Study of Rapidly Alternating Bottlenecks in n-Tier Applications," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 171-178.
- [330] Z. Hao, L. Xin, O. Zhonghong, and K. Aberer, "Impact of Instance Seeking Strategies on Resource Allocation in Cloud Data Centers," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 27-34.
- [331] J. Gueyong, N. Sharma, F. Goetz, and T. Mukherjee, "Cloud Capability Estimation and Recommendation in Black-Box Environments Using Benchmark-Based Approximation," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 293-300.
- [332] A. Smirnov, M. Zhidko, P. Yingshiuan, T. Po-Jui, L. Kuang-Chih, and C. Tzi-cker, "Evaluation of a Server-Grade Software-Only ARM Hypervisor," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 855-862.
- [333] A. Duarte and M. M. da Silva, "Cloud Maturity Model," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 606-613.
- [334] Z. Liangzhao, C. Perng, and A. Mohindra, "Provisioning Legacy Simulation Applications in Product Lifecycle Management via a Cloud Platform," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 831-838.
- [335] J. Conejero, P. Burnap, O. Rana, and J. Morgan, "Scaling Archived Social Media Data Analysis Using a Hadoop Cloud," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 685-692.
- [336] H. Dan and E. Stroulia, "HGrid: A Data Model for Large Geospatial Data Sets in HBase," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 910-917.
- [337] R. Gracia-Tinedo, M. Sanchez Artigas, and P. Garcia Lopez, "Cloud-as-a-Gift: Effectively Exploiting Personal Cloud Free Accounts via REST APIs," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 621-628.
- [338] Z. Jieming, Z. Zibin, and M. R. Lyu, "DR2: Dynamic Request Routing for Tolerating Latency Variability in Online Cloud Applications," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 589-596.

- [339] D. Kliazovich, J. E. Pecero, A. Tchernykh, P. Bouvry, S. U. Khan, and A. Y. Zomaya, "CA-DAG: Communication-Aware Directed Acyclic Graphs for Modeling Cloud Computing Applications," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 277-284.
- [340] M. R. Rahimi, N. Venkatasubramanian, and A. V. Vasilakos, "MuSIC: Mobility-Aware Optimal Service Allocation in Mobile Cloud Computing," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 75-82.
- [341] N. Rapolu, S. Chakradhar, A. Hassan, and A. Grama, "M-Lock: Accelerating Distributed Transactions on Key-Value Stores through Dynamic Lock Localization," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 179-187.
- [342] C. Orencik, M. Kantarcioglu, and E. Savas, "A Practical and Secure Multi-keyword Search Method over Encrypted Cloud Data," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 390-397.
- [343] E. Pattuk, M. Kantarcioglu, V. Khadilkar, H. Ulusoy, and S. Mehrotra, "BigSecret: A Secure Data Management Framework for Key-Value Stores," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 147-154.
- [344] J. Powers and K. Chen, "Secure Computation of Top-K Eigenvectors for Shared Matrices in the Cloud," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 155-162.
- [345] F. Rashid, A. Miri, and I. Woungang, "Secure Enterprise Data Deduplication in the Cloud," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 367-374.
- [346] C. M. Revoredo da Silva, J. L. Costa da Silva, R. B. Rodrigues, G. M. Medeiros Campos, L. Marques do Nascimento, and V. Cardoso Garcia, "Security Threats in Cloud Computing Models: Domains and Proposals," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 383-389.
- [347] M. Schnjakin and C. Meinel, "Scrutinizing the State of Cloud Storage with Cloud-RAID: A Secure and Reliable Storage Above the Clouds," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 309-318.
- [348] M. Godfrey and M. Zulkernine, "A Server-Side Solution to Cache-Based Side-Channel Attacks in the Cloud," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 163-170.
- [349] J. Hizver and T. C. Chiueh, "Cloud-Based Application Whitelisting," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 636-643.
- [350] A. Basu, J. Vaidya, H. Kikuchi, and T. Dimitrakos, "Privacy-Preserving Collaborative Filtering on the Cloud and Practical Implementation Experiences," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 406-413.
- [351] C. Lingfeng and D. B. Hoang, "Addressing Data and User Mobility Challenges in the Cloud," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 549-556.
- [352] B. K. Samanthula and J. Wei, "Efficient Privacy-Preserving Range Queries over Encrypted Data in Cloud Computing," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 51-58.
- [353] V. Sidorov and N. Wee Keong, "Complex Queries in a Shared Multi User Relational Cloud Database," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 903-909.
- [354] L. Yingmin and O. Boucelma, "Provenance Monitoring in the Cloud," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 802-809.
- [355] S. K. Ejaz, D. Behrens, T. Knauth, and C. Fetzer, "Improving Wide-Area Replication Performance through Informed Leader Election and Overlay Construction," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 422-429.
- [356] L. Jim Zhanwen, L. Qinghua, Z. Liming, L. Bass, X. Xiwei, S. Sakr, *et al.*, "Improving Availability of Cloud-Based Applications through Deployment Choices," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 43-50.
- [357] V. Kamath, R. Giri, and R. Muralidhar, "Experiences with a Private Enterprise Cloud: Providing Fault Tolerance and High Availability for Interactive EDA Applications," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 770-777.
- [358] A. Kanso and Y. Lemieux, "Achieving High Availability at the Application Level in the Cloud," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 778-785.
- [359] L. Qinghua, X. Xiwei, Z. Liming, L. Bass, L. Zhanwen, S. Sakr, *et al.*, "Incorporating Uncertainty into In-Cloud Application Deployment Decisions for Availability," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 454-461.
- [360] A. El Rheddane, N. De Palma, F. Boyer, F. Dumont, J. M. Menaud, and A. Tchana, "Dynamic Scalability of a Consolidation Service," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 748-754.
- [361] L. Fei, M. Voegler, M. Claessens, and S. Dustdar, "Efficient and Scalable IoT Service Delivery on Cloud," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 740-747.
- [362] F. Durr, "Improving the Efficiency of Cloud Infrastructures with Elastic Tandem Machines," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 91-98.
- [363] K. Salah, "A Queueing Model to Achieve Proper Elasticity for Cloud Cluster Jobs," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 755-761.
- [364] P. Hoenisch, S. Schulte, S. Dustdar, and S. Venugopal, "Self-Adaptive Resource Allocation for Elastic Process Execution," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 220-227.
- [365] I. P. Egwutuoha, C. Shiping, D. Levy, B. Selic, and R. Calvo, "Energy Efficient Fault Tolerance for High Performance Computing (HPC) in the Cloud," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 762-769.
- [366] B. B. Nandi, H. S. Paul, A. Banerjee, and S. C. Ghosh, "Fault Tolerance as a Service," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 446-453.
- [367] D. Dapeng and J. Herbert, "A Proactive Cloud Management Architecture for Private Clouds," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 701-708.
- [368] E. Korpeoglu, C. Sahin, D. Agrawal, A. El Abadi, T. Hosomi, and Y. Seo, "Dragonfly: Cloud Assisted Peer-to-Peer Architecture for Multipoint Media Streaming Applications," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 269-276.
- [369] D. Thatmann, M. Slawig, S. Zickau, and A. Kupper, "Deriving a Distributed Cloud Proxy Architecture for Managed Cloud Service Consumption," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 614-620.
- [370] Z. Wei, L. Weimin, C. Xiao, and L. Shaowei, "Architecture and Key Issues of IMS-Based Cloud Computing," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 629-635.
- [371] I. Jangjaimon and T. Nian-Feng, "Design and Implementation of Effective Checkpointing for Multithreaded Applications on Future Clouds," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 438-445.
- [372] K. Singh and V. Krishnaswamy, "Building Communicating Web Applications Leveraging Endpoints and Cloud Resource Service," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 486-493.
- [373] S. Baucke, R. Ben Ali, J. Kempf, R. Mishra, F. Ferioli, and A. Carossino, "Cloud Atlas: A Software Defined Networking Abstraction for Cloud to WAN Virtual Networking," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 895-902.
- [374] K. Kimura, Y. Nomura, H. Kurihara, K. Yamamoto, and R. Yamamoto, "Multi-query Unification for Generating Efficient Big Data Processing Components from a DFD," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 260-268.
- [375] H. Li-Yung, W. Jan-Jan, and L. Pangfeng, "Data Replication for Distributed Graph Processing," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 319-326.
- [376] L. Xiang, J. Xiaohong, Y. Kejiang, and H. Peng, "DartCSim+: Enhanced CloudSim with the Power and Network Models Integrated," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 644-651.

- [377] T. Fung Po, G. Hamilton, K. Oikonomou, and D. P. Pezaros, "Implementing Scalable, Network-Aware Virtual Machine Migration for Cloud Data Centers," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 557-564.
- [378] H. Inkwon and M. Pedram, "Hierarchical Virtual Machine Consolidation in a Cloud Computing System," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 196-203.
- [379] A. Melekhova, "Machine Learning in Virtualization: Estimate a Virtual Machine's Working Set Size," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 863-870.
- [380] M. M. Nejad, L. Mashayekhy, and D. Grosu, "A Family of Truthful Greedy Mechanisms for Dynamic Virtual Machine Provisioning and Allocation in Clouds," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 188-195.
- [381] Z. Xinkui, Y. Jianwei, C. Zuoning, and H. Sheng, "Workload Classification Model for Specializing Virtual Machine Operating System," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 343-350.
- [382] H. Yaohui, L. Tianlin, Y. Ping, and K. Gopalan, "An Application-Level Approach for Privacy-Preserving Virtual Machine Checkpointing," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 59-66.
- [383] L. Yazdanov and C. Fetzer, "VScaler: Autonomic Virtual Machine Scaling," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 212-219.
- [384] R. Yi, L. Ling, Z. Qi, W. Qingbo, W. Jie, K. Jinzhu, et al., "Residency-Aware Virtual Machine Communication Optimization: Design Choices and Techniques," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 823-830.
- [385] A. Karve and A. Kochut, "Redundancy Aware Virtual Disk Mobility for Cloud Computing," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 35-42.
- [386] D. Sheng, W. Cho-Li, D. Kondo, and H. Guodong, "Towards Payment-Bound Analysis in Cloud Systems with Task-Prediction Errors," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 502-509.
- [387] M. Dhingra, J. Lakshmi, S. K. Nandy, C. Bhattacharyya, and K. Gopinath, "Elastic Resources Framework in IaaS, Preserving Performance SLAs," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 430-437.
- [388] L. M. Leslie, L. Young Choon, L. Peng, and A. Y. Zomaya, "Exploiting Performance and Cost Diversity in the Cloud," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 107-114.
- [389] M. M. Alansari and B. Bordbar, "An Architectural Framework for Enforcing Energy Management Policies in Cloud," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 717-724.
- [390] L. Mon-Yen, L. Shang-Wei, and C. Jun-Yi, "Towards Network Virtualization Management for Federated Cloud Systems," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 597-597.
- [391] G. Yihong, M. Huadong, Z. Haitao, K. Xiangqi, and W. Wangyang, "Concurrency Optimized Task Scheduling for Workflows in Cloud," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 709-716.
- [392] T. A. Genez, L. F. Bittencourt, and E. R. M. Madeira, "Using Time Discretization to Schedule Scientific Workflows in Multiple Cloud Providers," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 123-130.
- [393] H. Goudarzi and M. Pedram, "Geographical Load Balancing for Online Service Applications in Distributed Datacenters," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 351-358.
- [394] L. Hong, J. Thomas, and P. Khethavath, "Moving Target with Load Balancing in P2P Cloud," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 359-366.
- [395] Y. Jingqi, L. Chuanchang, S. Yanlei, M. Zexiang, and C. Junliang, "Workload Predicting-Based Automatic Scaling in Service Clouds," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 810-815.
- [396] V. K. Naik, K. Beatty, N. Vogl, and J. Sanchez, "Workload Monitoring in Hybrid Clouds," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 816-822.
- [397] G. A. Santos, J. G. R. Maia, L. O. Moreira, F. R. C. Sousa, and J. C. Machado, "Scale-Space Filtering for Workload Analysis and Forecast," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 677-684.
- [398] M. Devarakonda, P. Gupta, and T. Chunqiang, "Labor Cost Reduction with Cloud: An End-to-End View," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 534-540.
- [399] P. Kokkinos, T. A. Varvarigou, A. Kretsis, P. Soumplis, and E. A. Varvarigos, "Cost and Utilization Optimization of Amazon EC2 Instances," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 518-525.
- [400] V. S. Prakash, W. Yuanfeng, and S. Weidong, "Tape Cloud: Scalable and Cost Efficient Big Data Infrastructure for Cloud Computing," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 541-548.
- [401] C. Shaoming, H. Yue, and P. Lu, "Optimization of Electricity and Server Maintenance Costs in Hybrid Cooling Data Centers," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 526-533.
- [402] A. Strunk, "A Lightweight Model for Estimating Energy Cost of Live Migration of Virtual Machines," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 510-517.
- [403] X. Zichuan and L. Weifa, "Minimizing the Operational Cost of Data Centers via Geographical Electricity Price Diversity," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 99-106.
- [404] V. Di Valerio, V. Cardellini, and F. Lo Presti, "Optimal Pricing and Service Provisioning Strategies in Cloud Systems: A Stackelberg Game Approach," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 115-122.
- [405] V. Andrikopoulos, S. Zhe, and F. Leymann, "Supporting the Migration of Applications to the Cloud through a Decision Support System," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 565-572.
- [406] J. Miranda, J. Guillen, J. M. Murillo, and C. Canal, "Assisting Cloud Service Migration Using Software Adaptation Techniques," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 573-580.
- [407] I. Petri, M. Punceva, O. F. Rana, and G. Theodorakopoulos, "Broker Emergence in Social Clouds," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 669-676.
- [408] L. Kuan, R. Yahyapour, P. Wieder, C. Kotsokalis, E. Yaqub, and A. I. Jehangiri, "QoS-Aware VM Placement in Multi-domain Service Level Agreements Scenarios," in *Cloud Computing (CLOUD), 2013 IEEE Sixth International Conference on*, 2013, pp. 661-668.

CLOUD 2014

- [409] C. Bin, "MediaPaaS: A Cloud-Based Media Processing Platform for Elastic Live Broadcasting," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 713-720.
- [410] E. Caron and J. R. Cornabas, "Improving Users' Isolation in IaaS: Virtual Machine Placement with Security Constraints," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 64-71.
- [411] J. Kross and A. Wolke, "Cloudburst - Simulating Workload for IaaS Clouds," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 841-848.
- [412] E. Qevani, M. Panagopoulou, C. Stampoltas, A. Tsitsipas, D. Kyriazis, and M. Themistocleous, "What Can OpenStack Adopt from a Ganeti-Based Open-Source IaaS?," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 833-840.
- [413] S. T. Ruehl, M. Rupperecht, B. Morr, M. Reinhardt, and S. A. W. Verclas, "Mixed-Tenancy in the Wild - Applicability of Mixed-Tenancy for Real-World Enterprise SaaS-Applications," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 865-872.

- [414] K. Tsakalozos, V. Verroios, M. Roussopoulos, and A. Delis, "Time-Constrained Live VM Migration in Share-Nothing IaaS-Clouds," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 56-63.
- [415] R. Van Den Bossche, K. Vanmechelen, and J. Broeckhove, "Optimizing IaaS Reserved Contract Procurement Using Load Prediction," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 88-95.
- [416] S. Ayoubi, K. Shaban, and C. Assi, "Multicast Virtual Network Embedding in Cloud Data Centers with Delay Constraints," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 482-489.
- [417] T. Liebetaut, K. Rechert, I. Valizada, K. Meier, and D. Von Suchodoletz, "Emulation-as-a-Service - The Past in the Cloud," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 906-913.
- [418] H. Ghanbari, M. Litoiu, P. Pawluk, and C. Barna, "Replica Placement in Cloud through Simple Stochastic Model Predictive Control," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 80-87.
- [419] A. Ghosh, A. Sapello, A. Poylisher, C. J. Chiang, A. Kubota, and T. Matsunaka, "On the Feasibility of Deploying Software Attestation in Cloud Environments," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 128-135.
- [420] Z. Qi, L. Ling, L. Kisung, Z. Yang, A. Singh, N. Mandagere, et al., "Improving Hadoop Service Provisioning in a Geographically Distributed Cloud," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 432-439.
- [421] C. Quinton, D. Romero, and L. Duchien, "Automated Selection and Configuration of Cloud Environments Using Software Product Lines Principles," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 144-151.
- [422] Z. Chunwang and C. Ee Chien, "Processing of Mixed-Sensitivity Video Surveillance Streams on Hybrid Clouds," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 9-16.
- [423] T. Kushida and G. S. Pingali, "Industry Cloud - Effective Adoption of Cloud Computing for Industry Solutions," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 753-760.
- [424] G. F. Anastasi, E. Carlini, M. Coppola, and P. Dazzi, "QBROKAGE: A Genetic Approach for QoS Cloud Brokering," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 304-311.
- [425] Q. Xuanjia, W. Chuan, L. Hongxing, L. Zongpeng, and F. C. M. Lau, "Federated Private Clouds via Broker's Marketplace: A Stackelberg-Game Perspective," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 296-303.
- [426] T. Byung Chul and T. Chunqiang, "AppCloak: Rapid Migration of Legacy Applications into Cloud," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 810-817.
- [427] L. Chien An, W. Qingyang, J. Kimball, J. Li, P. Junhee, and C. Pu, "IO Performance Interference among Consolidated n-Tier Applications: Sharing Is Better Than Isolation for Disks," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 24-31.
- [428] L. Gherardi, D. Hunziker, and G. Mohanarajah, "A Software Product Line Approach for Configuring Cloud Robotics Applications," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 745-752.
- [429] S. Gomez Saez, V. Andrikopoulos, F. Leymann, and S. Strauch, "Towards Dynamic Application Distribution Support for Performance Optimization in the Cloud," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 248-255.
- [430] F. Haupt, F. Leymann, A. Nowak, and S. Wagner, "Lego4TOSCA: Composable Building Blocks for Cloud Applications," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 160-167.
- [431] H. Huihong, M. Zhiyi, C. Hongjie, Y. Chih-Yi, and S. Weizhong, "An Aspect-Oriented Approach to SLA-Driven Monitoring Multi-tenant Cloud Application," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 857-864.
- [432] J. P. Walters, A. J. Younge, K. Dong In, Y. Ke Thia, K. Mikyung, S. P. Crago, et al., "GPU Passthrough Performance: A Comparison of KVM, Xen, VMWare ESXi, and LXC for CUDA and OpenCL Applications," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 636-643.
- [433] Y. Xin, L. Min, Y. Ze, and L. Xiaolin, "Taming Computation Skews of Block-Oriented Iterative Scientific Applications in MapReduce Systems," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 176-183.
- [434] Z. Zhenyun, T. Cuong, H. Ramachandra, and B. Sridharan, "Ensuring High-Performance of Mission-Critical Java Applications in Multi-tenant Cloud Platforms," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 618-626.
- [435] T. Cucinotta, D. Lugones, D. Cherubini, and E. Jul, "Data Centre Optimisation Enhanced by Software Defined Networking," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 136-143.
- [436] L. Fang, N. Wee Keong, and Z. Wei, "Encrypted Scalar Product Protocol for Outsourced Data Mining," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 336-343.
- [437] H. Horie, M. Asahara, H. Yamada, and K. Kono, "Minimizing WAN Communications in Inter-datacenter Key-Value Stores," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 490-497.
- [438] H. Jinho, Z. Wei, R. C. Chiang, T. Wood, and H. H. Huang, "UniCache: Hypervisor Managed Data Storage in RAM and Flash," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 216-223.
- [439] R. K. L. Ko and M. A. Will, "Progger: An Efficient, Tamper-Evident Kernel-Space Logger for Cloud Data Provenance Tracking," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 881-889.
- [440] D. Krol, R. Slota, J. Kitowski, L. Dutka, and J. Liput, "Data Farming on Heterogeneous Clouds," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 873-880.
- [441] J. D. Montes, Z. Mengsong, R. Singh, T. Shu, and M. Parashar, "Data-Driven Workflows in Multi-cloud Marketplaces," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 168-175.
- [442] M. A. Salehi, T. Caldwell, A. Fernandez, E. Mickiewicz, E. W. D. Rozier, S. Zonouz, et al., "RESeED: Regular Expression Search over Encrypted Data in the Cloud," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 673-680.
- [443] V. Sidorov and N. Wee Keong, "Model of an Encrypted Cloud Relational Database Supporting Complex Predicates in WHERE Clause," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 667-672.
- [444] S. Zawoad, R. Hasan, M. M. Haque, and G. Warner, "CURLA: Cloud-Based Spam URL Analyzer for Very Large Datasets," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 729-736.
- [445] M. Zhen, X. Qingjun, Z. Yian, and C. Shigang, "On Deletion of Outsourced Data in Cloud Computing," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 344-351.
- [446] M. Zhen, Z. Yian, C. Shigang, and X. Chengzhong, "Enabling Non-repudiable Data Possession Verification in Cloud Storage Systems," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 232-239.
- [447] W. Akio Goya, M. Risse de Andrade, A. Carvalho Zucchi, N. Mimura Gonzalez, R. de Fatima Pereira, K. Langona, et al., "The Use of Distributed Processing and Cloud Computing in Agricultural Decision-Making Support Systems," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 721-728.
- [448] M. Arafati, G. G. Dagher, B. C. M. Fung, and P. C. K. Hung, "D-Mash: A Framework for Privacy-Preserving Data-as-a-Service Mashups," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 498-505.
- [449] N. Jain and J. Lakshmi, "PriDyn: Framework for Performance Specific QoS in Cloud Storage," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 32-39.
- [450] M. Sangwhan, L. Jaehwan, and K. Yang Suk, "Introducing SSDs to the Hadoop MapReduce Framework," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 272-279.
- [451] Y. Ze, L. Min, Y. Xin, and L. Xiaolin, "Palantir: Reseizing Network Proximity in Large-Scale Distributed Computing Frameworks Using SDN," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 440-447.

- [452] A. Haque, B. Parker, L. Khan, and B. Thuraisingham, "Evolving Big Data Stream Classification with MapReduce," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 570-577.
- [453] W. Hsiang Huang, Y. Tse Chen, and W. Chien Min, "Multiple Two-Phase Data Processing with MapReduce," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 352-359.
- [454] F. Xiaoyi, M. Xiaoqiang, L. Jiangchuan, and L. Dan, "Dependency-Aware Data Locality for MapReduce," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 408-415.
- [455] C. Chien Hung, L. Jenn Wei, and K. Sy Yen, "Deadline-Constrained MapReduce Scheduling Based on Graph Modelling," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 416-423.
- [456] W. M. A. Habib, H. M. O. Mokhtar, and M. E. El Sharkawi, "MapReduce Algorithms for Processing Universal Quantifier Queries," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 578-585.
- [457] X. Huanle and L. Wing Cheong, "Speculative Execution for a Single Job in a MapReduce-Like System," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 586-593.
- [458] X. Xiaoyong and T. Maolin, "A More Efficient and Effective Heuristic Algorithm for the MapReduce Placement Problem in Cloud Computing," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 264-271.
- [459] K. M. Al-Naami, S. Seker, and L. Khan, "GISQF: An Efficient Spatial Query Processing System," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 681-688.
- [460] K. Benz and T. M. Bohnert, "Impact of Pacemaker Failover Configuration on Mean Time to Recovery for Small Cloud Clusters," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 384-391.
- [461] W. Jiayin, Y. Yi, M. Ying, S. Bo, and M. Ningfang, "FRESH: Fair and Efficient Slot Configuration and Scheduling for Hadoop Clusters," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 761-768.
- [462] J. Lamps, I. Palmer, and R. Sprabery, "WinWizard: Expanding Xen with a LibVMI Intrusion Detection Tool," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 849-856.
- [463] N. Le Scouarnec, C. Neumann, and G. Straub, "Cache Policies for Cloud-Based Systems: To Keep or Not to Keep," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 1-8.
- [464] K. Minseok, D. Zuochao, W. Heinzelman, T. Soyata, B. He, and S. Jiye, "Use of Network Latency Profiling and Redundancy for Cloud Server Selection," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 826-832.
- [465] A. Rezgui, G. Quezada, M. M. Rafique, and Z. Malik, "A Capacity Allocation Approach for Volunteer Cloud Federations Using Poisson-Gamma Gibbs Sampling," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 288-295.
- [466] Y. Thoss, C. Pohl, M. Hoffmann, J. Spillner, and A. Schill, "User-Friendly Visualization of Cloud Quality," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 890-897.
- [467] M. Unuvar, Y. Doganata, M. Steinder, A. Tantawi, and S. Tosi, "A Predictive Method for Identifying Optimum Cloud Availability Zones," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 72-79.
- [468] Z. Weida, L. King Tin, and W. Cho-Li, "Adaptive Live VM Migration over a WAN: Modeling and Implementation," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 368-375.
- [469] L. Yuanyao and W. Zhengping, "Non-intrusive Critical System Event Recognition and Prediction in Cloud," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 659-666.
- [470] Z. Xu, L. Ling, Z. Qi, and D. Xiaoshe, "Improving MapReduce Performance in a Heterogeneous Cloud: A Measurement Study," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 400-407.
- [471] J. Lacroix and O. Boucelma, "Trusting the Cloud: A PROV + RBAC Approach," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 652-658.
- [472] K. Bernsmed, W. K. Hon, and C. Millard, "Deploying Medical Sensor Networks in the Cloud - Accountability Obligations from a European Perspective," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 898-905.
- [473] D. Thilakanathan, R. A. Calvo, C. Shiping, S. Nepal, L. Dongxi, and J. Zic, "Secure Multiparty Data Sharing in the Cloud Using Hardware-Based TPM Devices," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 224-231.
- [474] C. A. Kanhua, L. Kwiat, K. A. Kwiat, J. S. Park, Z. Ming, and M. Rodriguez, "Game Theoretic Modeling of Security and Interdependency in a Public Cloud," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 514-521.
- [475] C. Jianwei and M. Huadong, "Privacy-Preserving Decentralized Access Control for Cloud Storage Systems," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 506-513.
- [476] X. Lei, S. Weidong, and S. Taeweon, "PFC: Privacy Preserving FPGA Cloud - A Case Study of MapReduce," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 280-287.
- [477] S. Akiyama, T. Hirofuchi, R. Takano, and S. Honiden, "Fast Live Migration with Small IO Performance Penalty by Exploiting SAN in Parallel," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 40-47.
- [478] M. B. Chhetri, S. Chichin, V. Quoc Bao, and R. Kowalczyk, "Smart CloudMonitor - Providing Visibility into Performance of Black-Box Clouds," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 777-784.
- [479] R. Householder, S. Arnold, and R. Green, "Simulating the Effects of Cloud-Based Oversubscription on Datacenter Revenues and Performance in Single and Multi-class Service Levels," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 562-569.
- [480] M. Musleh, V. Pai, J. P. Walters, A. Younge, and S. Crago, "Bridging the Virtualization Performance Gap for HPC Using SR-IOV for InfiniBand," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 627-635.
- [481] M. Peiris, J. H. Hill, J. Thelin, S. Bykov, G. Kliot, and C. Konig, "PAD: Performance Anomaly Detection in Multi-server Distributed Systems," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 769-776.
- [482] L. Yang, G. Li, A. Supratak, and G. Yike, "Enabling Performance as a Service for a Cloud Storage System," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 554-561.
- [483] C. A. Ardagna, E. Damiani, F. Frati, G. Montalbano, D. Rebecani, and M. Ughetti, "A Competitive Scalability Approach for Cloud Architectures," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 610-617.
- [484] T. Goldschmidt, A. Jansen, H. Koziolek, J. Doppelhamer, and H. P. Brevold, "Scalability and Robustness of Time-Series Databases for Cloud-Native Monitoring of Industrial Processes," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 602-609.
- [485] H. Yanzhang, J. Xiaohong, W. Zhaohui, Y. Kejiang, and C. Zhongzhong, "Scalability Analysis and Improvement of Hadoop Virtual Cluster with Cost Consideration," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 594-601.
- [486] R. Simoes and C. Kamienski, "Elasticity Management in Private and Hybrid Clouds," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 793-800.
- [487] W. Yufeng, C. C. Tan, and M. Ningfang, "Using Elasticity to Improve Inline Data Deduplication Storage Systems," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 785-792.
- [488] A. El Rheddane, N. de Palma, A. Tchana, and D. Hagimont, "Elastic Message Queues," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 17-23.
- [489] D. F. Kassa and K. Nahrstedt, "SCDA: SLA-Aware Cloud Datacenter Architecture for Efficient Content Storage and Retrieval," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 120-127.

- [490] R. Krebs, M. Loesch, and S. Kounev, "Platform-as-a-Service Architecture for Performance Isolated Multi-tenant Applications," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 914-921.
- [491] U. Deshpande, Y. Yang, D. Chan, N. Bila, and K. Gopalan, "Fast Server Deprovisioning through Scatter-Gather Live Migration of Virtual Machines," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 376-383.
- [492] S. Kashyap, J. S. Dhillon, and S. Purini, "RLC - A Reliable Approach to Fast and Efficient Live Migration of Virtual Machines in the Clouds," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 360-367.
- [493] D. Kimura, E. Numata, and M. Kawatsu, "Performance Modeling to Divide Performance Interference of Virtualization and Virtual Machine Combination," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 256-263.
- [494] H. Nguyen Trung, M. Di Francesco, and A. Yla-Jaaski, "A virtual machine placement algorithm for balanced resource utilization in cloud data centers," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 474-481.
- [495] K. Qazi, L. Yang, and A. Sohn, "Workload Prediction of Virtual Machines for Harnessing Data Center Resources," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 522-529.
- [496] H. Teyeb, A. Balma, N. Ben Hadj-Alouane, and S. Tata, "Optimal Virtual Machine Placement in Large-Scale Cloud Systems," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 424-431.
- [497] F. Caglar and A. Gokhale, "iOverbook: Intelligent Resource-Overbooking to Support Soft Real-Time Applications in the Cloud," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 538-545.
- [498] R. L. F. Cunha, M. D. Assuncao, C. Cardonha, and M. A. S. Netto, "Exploiting User Patience for Scaling Resource Capacity in Cloud Services," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 448-455.
- [499] P. Y. Delul, R. Griffith, A. Holler, K. Shankari, Z. Xiaoyun, R. Soundararajan, et al., "Crowdsourced Resource-Sizing of Virtual Appliances," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 801-809.
- [500] Z. Fan and M. Sakr, "Performance Variations in Resource Scaling for MapReduce Applications on Private and Public Clouds," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 456-465.
- [501] C. Ghribi and D. Zeglache, "Exact and Heuristic Graph-Coloring for Energy Efficient Advance Cloud Resource Reservation," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 112-119.
- [502] R. K. L. Ko, A. Y. S. Tan, and G. P. Y. Ng, "'Time' for Cloud? Design and Implementation of a Time-Based Cloud Resource Management System," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 530-537.
- [503] J. Li, W. Qingyang, L. Chien-An, P. Junhee, D. Yokoyama, and C. Pu, "The Impact of Software Resource Allocation on Consolidated n-Tier Applications," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 320-327.
- [504] L. Mashayekhy, M. M. Nejad, D. Grosu, and A. V. Vasilakos, "Incentive-Compatible Online Mechanisms for Resource Provisioning and Allocation in Clouds," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 312-319.
- [505] A. Wolke and L. Ziegler, "Evaluating Dynamic Resource Allocation Strategies in Virtualized Data Centers," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 328-335.
- [506] L. Yazdanov and C. Fetzer, "Lightweight Automatic Resource Scaling for Multi-tier Web Applications," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 466-473.
- [507] Y. Yi, W. Jiayin, S. Bo, J. Lin, and M. Ningfang, "HaSTE: Hadoop YARN Scheduling Based on Task-Dependency and Resource-Demand," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 184-191.
- [508] M. A. Adnan and R. K. Gupta, "Workload Shaping to Mitigate Variability in Renewable Power Use by Data Centers," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 96-103.
- [509] F. Farahnakian, A. Ashraf, P. Liljeberg, T. Pahikkala, J. Plosila, I. Porres, et al., "Energy-Aware Dynamic VM Consolidation in Cloud Data Centers Using Ant Colony System," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 104-111.
- [510] Y. Feng, L. Cherkasova, Z. Zhuoyao, and E. Smirni, "Optimizing Power and Performance Trade-offs of MapReduce Job Processing with Heterogeneous Multi-core Processors," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 240-247.
- [511] F. L. Tena, T. Knauth, and C. Fetzer, "PowerCass: Energy Efficient, Consistent Hashing Based Storage for Micro Clouds Based Infrastructure," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 48-55.
- [512] X. Chi, Z. Ziyang, W. Haiyang, and L. Jiangchuan, "On the Interplay between Network Traffic and Energy Consumption in Virtualized Environment: An Empirical Study," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 392-399.
- [513] L. Xue, W. Yanzhi, X. Qing, and M. Pedram, "Energy and Performance-Aware Task Scheduling in a Mobile Cloud Computing Environment," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 192-199.
- [514] S. Al Noor, R. Hasan, and M. M. Haque, "CellCloud: A Novel Cost Effective Formation of Mobile Cloud Based on Bidding Incentives," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 200-207.
- [515] V. Andrikopoulos, A. Reuter, X. Mingzhu, and F. Leymann, "Design Support for Cost-Efficient Application Distribution in the Cloud," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 697-704.
- [516] J. Inman, G. Grider, and C. Hsing Bung, "Cost of Tape versus Disk for Archival Storage," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 208-215.
- [517] J. L. Lucas Simarro, R. Moreno Vozmediano, F. Desprez, and J. Rouzard Cornabas, "Image Transfer and Storage Cost Aware Brokering Strategies for Multiple Clouds," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 737-744.
- [518] E. Teixeira Gomes de Sousa, F. A. Aires Lins, E. A. Guimaraes Tavares, and P. Romero Martins Maciel, "Performance and Cost Modeling Strategy for Cloud Infrastructure Planning," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 546-553.
- [519] U. Bellur, A. Malani, and N. C. Narendra, "Cost Optimization in Multi-site Multi-cloud Environments with Multiple Pricing Schemes," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 689-696.
- [520] S. Chichin, V. Quoc Bao, and R. Kowalczyk, "Adaptive Market Mechanism for Efficient Cloud Services Trading," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 705-712.
- [521] F. Haoming, L. Zongpeng, W. Chuan, and C. Xiaowen, "Core-Selecting Auctions for Dynamically Allocating Heterogeneous VMs in Cloud Computing," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 152-159.
- [522] L. Dongxi and J. Zic, "User-Controlled Identity Provisioning for Secure Account Sharing," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 644-651.
- [523] G. Mwansa and E. Mnkandla, "Migrating Agile Development into the Cloud Computing Environment," in *Cloud Computing (CLOUD), 2014 IEEE 7th International Conference on*, 2014, pp. 818-825.