

References (for Constrained Resource Planning)

- [AYT91] M. R. Akhter, D. Y. Y. Yun and H. Tian, "A Resource Management Approach to Schedule Manufacturing Processes", University of Hawaii MS thesis and Technical Report, 1991.
- [B&J92] Bowers, M. R. and J. P. Jarvis, "A Hierarchical Production Planning and Scheduling Model," **Decision Sciences**, **23** (1992), 144-159.
- [Barn91a] J. Barney, "The Resource-Based Model of the Firm: Origins, Implications, and Prospects", **Journal of Management**, 1991, Vol. 17, No. 1, pp. 97-98.
- [Barn91b] J. Barney, Firm Resources and Sustained Competitive Advantage, **Journal of Management**, **Vol. 17, No. 1**, 1991, pp. 99-120.
- [Ben83] P. S. Bender, **Resource Management - An Alternative View of the Management Process**, John Wiley & Sons, 1983.
- [BDW91] Blazewicz, J., M. Dror, and J. Weglarz, Mathematical programming formulations for machine scheduling: A survey, **European Journal of Operational Research**, **51** (1991), 283-300.
- [B&J92] M. R. Bowers, and J. P. Jarvis, A Hierarchical Production Planning and Scheduling Model, **Decision Sciences**, **23**(1992), 144-159.
- [C&Y91] T. Cheng and D. Y. Y. Yun, "Reasoning Three-Dimensional Relationships from Two-Dimensional Drawings by Planning," *Proceedings of OCEANS'91*, Honolulu, HI., 1991.
- [C&Y92] W. K. Chou and D. Y. Y. Yun, "Logic Minimization: A Planning Approach", *Proceedings of the 1992 International Computer Symposium (ICS'92)*, Dec. 1992, Taiwan.
- [C&Y94a] T. Cheng and D. Y. Y. Yun, Drawing Labeling by a Cascaded Planning Model - CCRP, *Proc. 3rd International Conf. on Automation, Robotics and Computer Vision (ICARCV '94)*, SPICIS'94, pp.B483-488, Nov. 1994, Singapore.
- [C&Y94b] T. Cheng and D. Y. Y. Yun, Canonical Modeling and Multiview Indexing for 3D Object Recognition, *Proc. 3rd Intern'l Conf. on Automation, Robotics and Computer Vision (ICARCV '94)*, pp.2000-2004, Nov. 1994, Singapore.
- [C&Y97] C. W. Chen and D. Y. Y. Yun, Variable Block-size Image Coding by Resource Planning, *Proc. International Conference on Imaging Science, Systems, and Technology*, June 1997, Las Vegas, NV.
- [C&Y98] C. W. Chen and D. Y. Y. Yun, Automation of 3D Object Modeling from Multiple Line-Drawing Views, *1998 Symposium on Image, Speech, Signal Processing, and Robotics*, Sept. 1998, Hong Kong, China.
- [C&Y96] H. M. Chen and D. Y. Y. Yun, Sharing Computational Resources and Medical Images via ACTS-linked Networks, *Proc. 18th Annual Pacific Telecommunication Conference*, January 1996, Honolulu, HI; also published in **Pacific Telecommunication Review Vol. 17, No. 4**, June 1996, pp. 15-28.
- [Cheng94] T. Cheng, **Automatic Labeling, Modeling and Recognition for Line-Drawing Interpretation**, Ph.D. Dissertation, (Advisor: D. Y. Y. Yun), University of Hawaii, 1994.
- [CYGK96] H.-M Chen, D. Y. Y. Yun, Y. Ge and J. Khan, "Computer-Aided Resource Planning and Scheduling for Radiological Services," *Proceedings of PACS Design and Evaluation: Engineering and Clinical Issues, Medical Image 1996, Newport, California, 1996*.
- [Elma93] Elmaghraby, S. E., Resource Allocation Via Dynamic Programming in Activity Networks, **European Journal of Operational Research**, **64**, 1993, 199-215.
- [FQY94] S. M. Feng, B. G. Qiu and D. Y. Y. Yun, A Graphic Simulator for Autonomous Underwater Vehicle Docking Operations, *Proc. of OCEANS '94*, Sept. 13-16, 1994, Brest, France.
- [F&Y92] X. M. Feng and D. Y. Y. Yun, Scheduling of Steerable Antenna on Satellite by Resource management, *Advanced Communications Technology Satellite Conference '92*.
- [Flo56] M. M. Flood, The Traveling-Salesman Problem, **Operation Research**, **4** (1956), 61-75.
- [FTY92] X. Feng, H. Tian, and D. Y. Y. Yun, Autonomous Underwater Vehicle Control by Neural Network, *Proceedings of Artificial Neural Networks in Engineering (ANNIE'92)*, Nov. 1992, St. Louis.
- [G&F92] K. C. Gilbert and R. B. Hofstra, "A New Multi-period Multiple Traveling Salesman Problem with Heuristic and Application to a Scheduling Problem," **Decision Sciences**, **23** (1992), 250-259
- [G&H94] Gu, J. and X. Huang, Efficient Local Search With Search Space Smoothing: A Case Study of the Traveling Salesman Problem, **IEEE Transactions on Systems, Man, and Cybernetics**, **24, 5** (1994), 728-735.
- [G&W92] D. G. Gattysse and L. N. V. Wassenhove, A Survey of Algorithms for the Generalized Assignment Problem, **European J. of Operational Research**, **Vol. 60**, 1992, pp. 260-272.

- [G&Y95] H. M. C. Garcia and D. Y. Y. Yun, Intelligent Distributed Medical Image Management, *Proc. SPIE Medical Imaging*, February 1995, San Diego, CA.
- [G&Y96a] Y. Ge and D. Y. Y. Yun, "Simultaneous Compression of Makespan and Number of Processors Using CRP," *Proceedings of 1996 International Parallel Processing Symposium*, Honolulu, April, 1996
- [G&Y96b] Y. Ge and D. Y. Y. Yun, "A Method that Determines Optimal Grain Size and Inherent Parallelism Concurrently," *Proceedings of International Symposium on Parallel Architecture, Algorithms, and Networks (ISPAN)*, 1996.
- [G&Y96c] Y. Ge and D. Y. Y. Yun, Simultaneous Determination of Optimal Grain Size and Inherent Parallelism for Parallel Programming Environments, *Proc. of IEEE Second International Conference on Algorithms and Architectures for Parallel Processing*, June 1996, Beijing, China.
- [G&Y96d] Y. Ge and D. Y. Y. Yun, A General Planning and Scheduling Methodology for Solving Task Scheduling with Multiple Objectives, *Proc. of IASTED International Conf. on Artificial Intelligence, Expert Systems and Neural Networks*, August 19-22, 1996, Honolulu, HI.
- [Ge96] Y. Ge, **A Simultaneous Compression Model for Multiprocessor Scheduling**, Ph.D. Dissertation (Advisor: D. Y. Y. Yun), Department of Electrical Engineering, University of Hawaii at Manoa, August, 1996.
- [GGKY96] H. M. C. Garcia, Y. Ge, and J. Khan and D. Y. Y. Yun, Computer-Aided Resource Planning and Scheduling for Radiological Services, *Proc. SPIE workshop on PACS Design and Evaluation: Engineering and Clinical Issues*, February 1996, Long Beach, CA.
- [GMD90] J. J. Gray, D. McIntire and H. J. Doller, Preferences for specific work schedules: Foundation for an expert-system scheduling program, *Dallas Veterans Administration Hospital Technical Report*, 1990.
- [H&K70+1] Held, M. and R. M. Karp, The travelling Salesman Problem and Minimum Spanning Trees, Part I, **Operational Research**, **18** (1970), 1138-1162; and Part II, **Mathematical Programming**, **1** (1971), 6-26.
- [H&C90] Y. H. Hu and S. J. Chen, "GM_Plan: a gate matrix layout algorithm based on artificial intelligence planning techniques", **IEEE Transactions on Computer-Aided Design**, Vol. **9**, No. **8**, Aug. 1990
- [H&Y87] P. W. Huang and D. Y. Y. Yun, "A Representation Model and Inference Procedure for Intelligent Agents", *Proceedings of the 2nd International Conference on Applications of Artificial Intelligence in Engineering*, Aug. 1987, Cambridge, MA.
- [H&Y91] Y. H. Hu and D. Y. Y. Yun, "Model-Based Expert System for Digital System Design", IEEE Computer Society Press, Tutorial: **Knowledge-Based Systems: Fundamentals and Tools**, O. N. Garcia and Y-T Chien, eds., 1991.
- [HYH85] Ho, W. P-C., D. Y. Y. Yun, and Y. H. Hu, Planning Strategies for Switchbox Routing, *Proceedings of IEEE International Conference on Computer Design*, (1985), 463-467.
- [HPT93] Hsu, W.-L., M. J. Prietula, and G. L. Thompson, "A Mixed-Initiative Scheduling Workbench: Integrating AI, OR and HCI," **Decision Support Systems**, **9** (1993), 245-257
- [Huang89] P. W. Huang, **The Formation and Application of an Intelligent Agent Model**, Ph.D. Dissertation (Advisor: D. Y. Y. Yun), Computer Science and Engineering Department, SMU, 1989.
- [HYH85] W. P-C. Ho, D. Y. Y. Yun and Y. H. Hu, "Planning Strategies for Switchbox Routing", *Proc. IEEE International Conference on Computer Design*", Oct. 1985, pp. 463-467.
- [J&B93] Jeffcoat, D. E. and R. L. Bulfin, "Simulated Annealing for Resource-Constrained Scheduling," **European Journal of Operational Research**, **70**, 1993, pp. 43-51.
- [K&Y89] N. P. Keng and D. Y. Y. Yun, "A Planning/Scheduling Methodology for the Constrained Resource Problem", *Proc. of the Eleventh International Joint Conf. on Artificial Intelligence*, Aug. 1989, pp. 20-25.
- [K&Y91] Y. H. Kuo and D. Y. Y. Yun, "A CRP-based Planning and Scheduling Shell for Resource Management", EE Technical Report, University of Hawaii, Jan. 1991
- [Keng88] N. P. Keng, **Planning and Scheduling with the Constrained-Resource Model (CR-Model)**, Ph.D. Dissertation (Advisor: D. Y. Y. Yun), Computer Science and Engineering Department, SMU, 1988.
- [KHY87] N. P. Keng, W. P-C. Ho and D. Y. Y. Yun, "**The Manual of the Switchbox Router**", SMU Computer Science and Engineering Technical Report 87-CSE-2, Jan. 1987.
- [KHY87b] N. P. Keng, W. Ho, and D. Y. Y. Yun, Interaction-Sensitive (Intelligent) Backtracking in a Planning System for Switchbox Routing, *Proc. of Applications of Artificial Intelligence in Engineering 87*.
- [Kir83] Kirkpatrick, S. et al, Optimization by Simulated Annealing, **Science**, **220** (1983), 671.
- [KLY88] G. Klein, I. C. Liu, and D. Y. Y. Yun, "Artificial Intelligence in the Architecture of Decision Support Systems", *Proceedings of the Conference on Impact of Artificial Intelligence on Business and Industry*, Denton TX, Oct. 1988.

- [KLY90] G. Klein, I. C. Liu, and D. Y. Y. Yun, "An Agent for Intelligent Model Management", **Journal of Management Science**, May 1990.
- [KYR88] N. P. Keng, D. Y. Y. Yun, and M. Rossi, "Interaction-Sensitive Planning System for Job-Shop Scheduling", **Expert Systems and Intelligent Manufacturing**, M. Oliff (ed.), N. Holland, 1988, pp.57-69.
- [L&K77] Lin, S. and B. W. Kernighan, "An Effective Heuristic Algorithm for the Travelling Salesman Problem," **Operational Research**, **21** (1977), 498-516.
- [L&M93] Lawrence, S. R. and T. E. Morton, "Resource-Constrained Multi-Project Scheduling with Tardy Costs: Comparing Myopic, Bottleneck, and Resource Pricing Heuristics," **European Journal of Operational Research**, **64** (1993), 168-187.
- [L&R89] Leclerc, M. and F. Rendl, "Constrained Spanning Trees and the Travelling Salesman Problem," **European Journal of Operational Research**, **39** (1989), 96-102.
- [L&Y96a] Ling, Z. and D. Y. Y. Yun, "Solving Subgraph Isomorphism Problem by a New Planning Methodology", *Proceedings of IASTED International Conference on Artificial Intelligence, Expert Systems and Neural Networks*, Honolulu, Hawaii, USA, August 19-22, 1996.
- [L&Y96b] Ling, Z. and D. Y. Y. Yun, "An Efficient Subcircuit Extraction Algorithm by Resource Management Approach", *Proceedings of Second International Conference On ASIC*, Shanghai, P. R. China, 21-24, 10/96.
- [L&Y97] T. Y. Lu and D. Y. Y. Yun, Optimal Iso-Surface Triangulation, *Proc. International Conference on Imaging Science, Systems, and Technology*, June 1997, Las Vegas, NV.
- [Leun92] Leung, J., "A New Graph-Theoretic Heuristic for Facility Layout," **Management Science**, **4**, **38** (1992), 594-607
- [Liu89] I. C. Liu, An Intelligent Agent to the Decision Support Model/Knowledge Base, Ph.D. Dissertation (Advisor: D. Y. Y. Yun), Computer Science and Engineering Department, SMU, 1989.
- [LKY96] T. Y. Lu, J. Khan and D. Y. Y. Yun, An Optimizing Algorithm for 3D Object Surface Triangulation, to appear in *Proc. of IASTED International Conf. on Artificial Intelligence, Expert Systems and Neural Networks*, August 19-22, 1996, Honolulu., HI.
- [LLKS85] Lawler, E. L., J. K. Lenstra, A. H. G. R. Kan and D. B. Shmoys, *The Travelling Salesman Problem: A Guided Tour of Combinatorial Optimization*, John Wiley & Sons, NY, 1985.
- [Luss92] Luss, H., "Minimax Resource Allocation Problems: Optimization and Parametric analysis," **European Journal of Operational Research**, **60** (1992), 76-86.
- [LYK89] I. C. Liu, D. Y. Y. Yun and G. Klein, "An Intelligent Agent Consulting System for Production and Operations Management", *Proceedings of the Third International Conference on Expert Systems and the Leading Edge in Production and Operations Management*, Hilton Head, SC, May 21-24, 1989.
- [LYK90] I. C. Liu, D. Y. Y. Yun and G. Klein, "An Agent for Intelligent Model Management," **Journal of Management Information Systems**, **7**, **1** (1990), 101-122.
- [M&M89] Magirou, V. F. and J. Z. Milis, An Algorithm for the Multiprocessor Assignment Problem, **Operations Research Letter**, **8**, 1989, 351-356.
- [M&P91] Miller, D. L. and J. F. Perkny, Exact Solution of Large Asymmetric Travelling Salesman Problems, **Science**, **251**, 1991, 754-761.
- [P&K89] Prentis, E. L. and B. M. Khumawala, "Efficient Heuristics for MRP Lot Sizing with Variable Production/Purchasing Costs," **Decision Sciences**, **20** (1989), 439-450
- [P&S93] Padman, R. and D. E. Smith-Daniels, "Early-Tardy Cost Trade-Offs in Resource Constrained Projects with Cash Flows: An Optimization-Guided Heuristic Approach," **European Journal of Operational Research**, **64** (1993), 295-311.
- [Padm90] Padmanabhan, G., "Analysis of Multi-item inventory systems under resource constraints: A Non-linear Goal Programming Approach," **Engineering Costs and Production Economics**, **20**, **2** (1990), 121
- [Q&F91] B. G. Qiu and X. M. Feng, "Trajectory Planning of Underwater Vehicle using Dynamic CRP Model", *Proceedings of OCEANS'91*, Oct. 1991, Honolulu, HI.
- [Rossi89] M. A. Rossi, Application of the Constrained-Resource Model (CR-Model) toward Flexible Job-shop Scheduling, MS Thesis, (Advisor: D. Y. Y. Yun), Computer Science and Engineering Dept., SMU, 1989.
- [S&F90] N. Sadeh and M. Fox, "Variable and Value Ordering Heuristics for Activity-based Job-shop Scheduling", School of Computer Science Report, Carnegie Mellon University, 1990.
- [S&T85] Shen, C. C. and W. H. Tsai, "A graph matching Approach to Optimal Task Assignment in Distributed Computing Systems Using a Minimax Criterion," **IEEE Transactions on Computers**, **34** (1985), 197-203.
- [Sac74] E. D. Sacerdoti, Planning in a Hierarchy of Abstraction Spaces, **Artificial Intelligence**, **5**, 1974, 115-35.

- [Sadeh90] N. Sadeh, "Generating Advice for Hard Constraint Satisfaction Problems: an Application to Job-Shop Scheduling", *School of Computer Science Report*, Carnegie Mellon University, 1990.
- [SMJ93] Sun, T., P. Meakin and T. Jossang, A Fast Optimization Method Based on Hierarchical Strategy for the Travelling Salesman Problem, **PHYSICA**, (1993).
- [Sofi92] Sofianopoulou, S., "The Process Allocation Problem: a Survey of the Application of Graph-Theoretic and Integer programming Approaches," also published in **the Journal of Operational Research Society**, **43, 5**, 1992, pp. 407-413.
- [Ston77] Stone, H. S., "Multiprocessor Scheduling With the Aid of Network Flow Algorithms," **IEEE Transactions on Software Engineering**, **3** (1977), pp. 85-93
- [SYL94] Sim, S. K., K. T. Yeo and W. H. Lee, An Expert Neural Network System for Dynamic Job Shop Scheduling, **International Journal of Production Research**, **32, 8** (1994), 1759.
- [T&Y91a] H. Tian and D. Y. Y. Yun, "A Requirements/Knowledge Acquisition Methodology", *Proceedings of AAAI'91 Workshop on Automatic Software Design*, July 1991, Anaheim, USA
- [T&Y91b] H. Tian and D. Y. Y. Yun, "A Heuristic Methodology for Oceanic Resource Management", *Proceedings of OCEANS'91*, Oct. 1991, Honolulu, HI.
- [T&Y91c] H. Tian and D. Y. Y. Yun, "A More Complete Knowledge Acquisition Methodology", *Proceedings of The World Congress on Expert Systems*, Dec. 1991, Orlando, USA
- [Tsai81] Tsai, W. H., Nonlinear Multiproduct CVP Analysis With 0-1 Mixed Integer Programming, **Engineering Costs and Production Economics**, **20, 1** (1990), 81
- [Tsai88] R. L. Tsai, **A Heuristic for Static Task-to-Processor Assignment using a Constraint Satisfaction Approach**, Ph.D Dissertation (Advisor: D. Y. Y. Yun), Computer Science and Engineering Dept., SMU, 1988.
- [W&E93] Warkentin, M. and P. Evans, AI in Business and Management, **PC AI**, **7, 2** (1993), 35.
- [WHYH90] J. G. Wu, Y. H. Hu, D. Y. Y. Yun, and W. P. C. Ho, "A Model-based Expert System for Digital System Design", **IEEE Design and Test of Computers**, Dec. 1990, pp. 24-41.
- [Wilk88] Wilkins, D. E., *Practical Planning: Extending the Classical Planning Paradigm*, Morgan Kaufmann Publishers, Inc., (1988).
- [Wils92] Wilson, J. M., "Approaches to Machine Load Balancing in Flexible Manufacturing Systems," **OR: the Journal of Operational Research Society**, **43, 5** (1992), 415-423.
- [Y&G93] Yun, D. Y. Y. and Y. Ge, "A CRP-based Production Optimization Methodology," *UH Technical Report*, 1993.
- [Y&F93] Yun, D. Y. Y. and X. Feng, "Solving 2-Dimensional Packing Problem by Constraint Resource Planning Model with Efficient Symmetry Detection," *UH Technical Report*, 1993.
- [Y&T91] D. Y. Y. Yun and H. Tian, "A Heuristic Methodology for Oceanic Resource Management", *Proceedings of OCEANS'91*, Oct. 1991, Honolulu, HI
- [YQC92] D. Y. Y. Yun, B. G. Qiu and Z. L. Chen, Solving Travelling Salesman Problems by Planning, *Proceedings of the International Conference on Intelligent Information Processing & Systems*, (**Keynote Paper**), Beijing, China, Oct. 1992.
- [YSY89] S. Yih, B. Shirazi and D. Y. Y. Yun, "Neural Network for Control System Modeling and Design," *Proceedings of Twentieth Annual Pittsburgh Conference on Modeling and Simulation*, May 4-5, 1989.
- [YTY89a] L. Yin, M. Tanik, and D. Y. Y. Yun, "Intelligent Interactive Interfaces for Laboratory Equipment", *Proceedings of Thirteenth Annual Computer Science Conference*, Irving, Texas, April 1989.
- [YTY89b] L. Yin, M. Tanik, and D. Y. Y. Yun, "Design Activity Agent: A Knowledge-Based Software Design Environment", *Proceedings of the International Conference on Software Engineering and Knowledge Engineering*, (**Keynote Paper**), Chicago, June 1989.
- [Yun90] D. Y. Y. Yun, "The Evolution of Computing Software Tools" (**Keynote Paper**), **Computing Tools for Scientific Problem Solving**, Academic Press, 1990, pp. 7-22.
- [Yun92] D. Y. Y. Yun, **CRP - an Intelligent Engine for Resource and Production Management**, exhibition brochure for **COMDEX '92**, nominated for **Byte Magazine** best new software award.
- [Zong93] Y. Zong, T. Yang and J. P. Ignizio, "An Expert System Using an Exchange Heuristic for the Resource-Constrained Scheduling Problem," **Expert Systems with Applications**, **6, 3**, 1993, 327.