

# Bibliography

- [1] T. Aldowaisan and A. Allahverdi, *New heuristics for no-wait flowshops to minimize makespan*, Computers and Operations Research, 30(8) (2003), 1219-1231. 4.6
- [2] K. R. Baker and D. Trietsch, *Principles of sequencing and scheduling*, Wiley (2009). 1.1
- [3] R. Bar-Yehuda, S. Fogel, *Partitioning a sequence into few monotone subsequences*, Acta Inform. 35 (1998), 421-440. 2.2(a), 4
- [4] J. A. Bondy and U. S. R. Murty, *Graph Theory*, Springer (2008). 3.7(a)
- [5] M. C. Bonney and S. W. Gundry, *Solutions to the Constrained Flowshop Sequencing Problem*, Operational Research Quarterly, 27, No. 4, Part 1 (1976), 869-883. 4.1(a)
- [6] P. Brucker, *Scheduling Algorithms*, Springer (2009). 1.1
- [7] H. G. Campbell, R. A. Dudek and M. L. Smith, *A Heuristic Algorithm for the n Job, m Machine Sequencing Problem*, Management Science, 16 (1970), B630-B637. 4.1(a)
- [8] R. Chandrasekharan and H. Ziegler, *Ant-colony algorithms for permutation flowshop scheduling to minimiz makespan/total flowtime of jobs*, European Journal of Operational Research, 155(2) (2004), 426-438. 4.6
- [9] C. L. Chen, V. S. Vempati and N. Aljaber, *An application of genetic algorithms for flow shop problems*, European Journal of Operational Research, 80 (1995), 389-396. 4.6
- [10] D. G. Dannenbring, *An Evaluation of Flow Shop Sequencing Heuristics*, Management Science, 23 (1977), 1174-1182. 4.1(a)
- [11] X. Dong, H. Huang and P. Chen, *An improved NEH-based heuristic for the permutation flowshop problem*, Computers and Operations Research, 35 (2008), 3962-3968. 4.1(a), 4.6

- [12] P. Erdős and G. Szekeres, *A combinatorial problem in geometry*, Compositio Math. 2 (1935), 463-470. 2.1(b), 2.2(a)
- [13] S. Farahm, R. Ruiz and N. Boroojerdi, *New High Performing Heuristics for Minimizing Makespan in Permutation Flowshops*, Omega-International Journal of Management Science, 37 (2009), 331-345. 4.6
- [14] J. M. Framinan, J. N. D. Gupta and R. Leisten, *A review and classification of heuristics for permutation flow-shop scheduling with makespan objective*, Journal of the Operational Research Society, 55 (2004), 1243-1255. 4.1(a)
- [15] J. M. Framinan, R. Leisten and C. Rajendran, *Different initial sequences for the heuristic of Nawaz, Enscore and Ham to minimize makespan, idletime or flowtime in the static permutation flowshop sequencing problem*, International Journal of Production Research, 41 (2003), 121-148. 4.1(a), 4.3, 4.3
- [16] J. M. Framinan, R. Leisten and R. Ruiz-Usano, *Comparison of heuristics for flowtime minimisation in permutation Flowshops*, Computers and Operations Research, 32 (2005), 1237-1254.
- [17] H. N. Gabow and O. Kariv, *Algorithms for Edge Coloring Bipartite Graphs and Multigraphs*, SIAM J. Comput. 11 (1982), 117-129. 2.6
- [18] H. L. Gannt, *Work, Wages and Profits*, second edition, Engineering Magazine Co., New York, 1916. 1.4
- [19] M. R. Garey and D. S. Johnson, *Computers and Intractability*, W. H. Freeman and Company, San Francisco (1979). 3.7(a), 3.7(a)
- [20] M. R. Garey, D. S. Johnson and R. Sethi, *The Complexity of Flowshop and Jobshop Scheduling*, Math. Oper. Res. 1 (1976), 117-129. 1.2(c), 2.1
- [21] F. Gavril, *Algorithms for minimum coloring, maximum clique, minimum covering by cliques and maximum independent set of chordal graphs*, SIAM Journal on Computing, 1 (1972), 180-187. 3.7(b)
- [22] M. C. Golumbic, *Algorithmic Graph Theory and Perfect Graphs*, Academic Press (1980). 3.6, 3.6, 3.7(a), 3.7(b)
- [23] T. Gonzalez, S. Sahni, *Flowshop and jobshop schedules: complexity and approximation*, Operations Research 26 (1978), 36-52. 2.1(a)

- [24] R. L. Graham, E. L. Lawler, J. K. Lenstra and A. H. G. Rinnooy Kan, *Optimisation and approximation in deterministic sequencing and scheduling: a survey*, Annals of Discrete Mathematics, 5 (1979), 287-326. 1.3, 4.1
- [25] J. N. D. Gupta, *A Functional Heuristic Algorithm for the Flowshop Scheduling Problem*, Operational Research Quarterly(1970-1977) 22, No. 1 (1971), 39-47. 4.1(a)
- [26] J. N. D. Gupta, *Heuristic algorithms for multistage flowshop scheduling problem*, AIIE Transactions 4 (1972), 11-18. 4.1(a)
- [27] J. N. D. Gupta, C. Koulamas, G. Kypharisis, *Performance guarantees for flowshop heuristics to minimize makespan*, European Journal of Operational Research 169 (2006), 865-872. 2.1(a)
- [28] J. N. D. Gupta, E. F. Stattford Jr., *Flowshop scheduling after five decades*, European Journal of Operational Research 169 (2006), 699-711. 1.2
- [29] U. I. Gupta, D. T. Lee and J. Y. Leung, *Efficient algorithms for interval graphs and circular-arc graphs*, Networks 12 (1982), 459-467. 3.7(b)
- [30] L. A. Hall, *Approximability of flow shop scheduling*, Math. Program. 82 (1998), 175-190. 2.1(a), 5.2
- [31] S. R. Hejazi and S. Saghafian, *Flowshop-scheduling with makespan criterion: a review*, International Journal of Production Research, 43 (2005), 2895-2929. 4.1(a)
- [32] T. S. Hundal and J. Rajgopal, *An extension of Palmer's heuristic for flowshop scheduling problem*, International Journal of Production Research, 26 (1988), 1119-1124. 4.1(a)
- [33] K. Jansen, R. Solis-Oba and M. Sviridenko, *Makespan Minimization in Job Shops: a Linear Time Approximation Scheme*, SIAM Journal of Discrete Mathematics 16 (2003), 288-300. 5.2
- [34] S. M. Johnson, *Optimal two- and three-stage production schedules with setup times included*, Naval Res. Logist. Quart. 1 (1954), 61-68. 1.2, 1.2(c), 3.1, 4.1(a)
- [35] P. J. Kaczyński and J. Kamburowski, *An improved NEH heuristic to minimize makespan in permutation flowshops*, Computers and Operations Research, 35 (2008), 3001-3008. 4.1(a), 4.3, 4.3, 4.6

- [36] P. J. Kalczynski and J. Kamburowski, *On the NEH heuristic for minimizing the makespan in permutation flowshops*, The International Journal of Management Science, 35 (2005), 53-60. 4.3
- [37] C. Koulamas, *A new constructive heuristic for the flowshop scheduling problem*, European Journal of Operational Research, 105(1) (2005), 66-71. 4.1(a)
- [38] D. Knuth, *The Art of Computer Programming, Volume 3 - Sorting and Searching*, Addison-Wesley (1998). 3.7(b), 3.8
- [39] T. Murata, H. Ishibuchi and H. Tanaka, *Genetic algorithms for flowshop scheduling problems*, Computers and Industrial Engineering, 30(4) (1996), 1061-1071. 4.6
- [40] V. Nagarajan and M. Sviridenko, *Tight Bounds for Permutation Flow Shop Scheduling*, In Proceedings of IPCO 2008, 154-168. 2.1(a), 2.1(b), 2.5, 2.6
- [41] V. Nagarajan and M. Sviridenko, *Tight Bounds for Permutation Flow Shop Scheduling*, Mathematics of Operations Research 34 (2009), 417-427. 2.1(b)
- [42] M. Nawaz, E. E. Enscore Jr. and I. Ham, *A heuristic algorithm for the m-machine, n-job flow-shop sequencing problem*, Omega-International Journal of Management Science, 11 (1983), 91-95. 4.1, 4.1(a), 4.2
- [43] E. Nowicki and C. Smutnicki, *Worst-case analysis of an approximation algorithm for flow-shop scheduling*, Oper. Res. Lett. 8 (1989), 171-177. 2.1(a)
- [44] E. Nowicki and C. Smutnicki, *Worst-case analysis of Dannenbring's algorithm for flow-shop scheduling*, Oper. Res. Lett. 10 (1991), 473-480. 2.1(a)
- [45] E. Nowicki and C. Smutnicki, *New results in the worst-case analysis for flow-shop scheduling*, Discrete Appl. Math. 46 (1993), 21-41. 2.1(a), 4.3
- [46] I. Osman and C. Potts, *Simulated annealing for permutation flow-shop scheduling*, Omega-International Journal of Management Science, 17(6) (1989), 551-557. 4.6
- [47] E. S. Page, *An Approach to the Scheduling of Jobs on Machines*, Journal of the Royal Statistical Society. Series B (Methodological), 23 No.2 (1961), 484-492. 4.1(a)

- [48] D. S. Palmer, *Scheduling Jobs Through a Multi-Stage Process in the Minimum Total Time – A Quick Method of Obtaining a Near Optimum*, OR, 16 (1965), 101-107. 4.1(a)
- [49] M. L. Pinedo, *Scheduling: Theory, Algorithms and Systems*, Springer, 3rd Edition, 2008. 1.1, 3.1, 3.3, 3.9
- [50] C. Potts, D. Shmoys and D. Williamson, *Permutation vs. nonpermutation flow shop schedules*, Operations Research Letters 10 (1991), 281-284. 2.1(a)
- [51] P. Raghavan, *Probabilistic construction of deterministic algorithms: Approximating packing integer programs*, Journal of Computer and System Sciences 37 (1988), 130-143. 2.1(a)
- [52] C. R. Reeves, *A genetic algorithm for flowshop sequencing*, Computers and Operations Research, 22 (1) (1995), 5-13. 4.6
- [53] H. Röck and G. Schmidt, *Machine aggregation heuristics in shop-scheduling*, Methods of Operations Research 45 (1983), 303-314.
- [54] R. Ruiz and C. Maroto, *A comprehensive review and evaluation of permutation flowshop heuristics*, European Journal of Operational Research, 165 (2005), 479-494. 4.1(a), 4.2, 4.6
- [55] R. Ruiz and C. Maroto, *A genetic algorithm for hybrid flowshops with sequence dependent setup times and machine eligibility*, European Journal of Operational Research, 169 (2006), 781-800. 4.6
- [56] R. Ruiz and T. Stützle, *A simple and effective iterated greedy algorithm for the permutation flowshop scheduling problem*, European Journal of Operational Research, 177 (2007), 2033-2049. 4.1(a), 4.6, 4.6, 4.7
- [57] A. Schrijver, *Combinatorial optimization. Polyhedra and efficiency. Algorithms and Combinatorics*, Springer-Verlag, Berlin, 2003. 2.6, 3.7(b)
- [58] S. Sevastjanov, *On some geometric methods in scheduling theory: a survey*, Discrete Applied Mathematics 55 (1994), 59-82. 2.1(a)
- [59] J. Snoeyink, *Maximum independent set for intervals by divide and conquer with pruning*, Networks, 49(2)(2007), 158-159. 3.7(b)
- [60] D. Sotelo and M. Poggi, *An approximation algorithm for the permutation flow shop scheduling problem via Erdős-Szekeres theorem extensions*,

Monografias em Ciência da Computação, Departamento de Informática,  
PUC-Rio, 28 (2007). 2.1(b)

- [61] J. M. Steele, *Variations on the monotone subsequence theme of Erdős and Szekeres*, IMA Vol. Math. Appl. 72 (1995), 111-131. 2.2(a)
- [62] M. Sviridenko, *A Note on Permutation Flow Shop Problem*, Annals of Operations Research v. 129 (2004), 247-252. 2.1(a)
- [63] E. Taillard, *Some efficient heuristic methods for the flow shop sequencing problem*, European Journal of Operational Research, 47(1) (1990), 67-74. 4.1, 4.1(a), 4.2, 4.4(a), 4.6
- [64] E. Taillard, *Benchmarks for basic scheduling problems*, European Journal of Operational Research, 64(2) (1993), 278-285. 4.1, 4.4(c)
- [65] K. Wagner, *Monotonic coverings of finite sets*, Elektron. Informationsverarb. Kybernet., 20 (1984), 633-639. 2.2(a)
- [66] M. Widmer and A. Hertz, *A new heuristic method for the flow shop sequencing problem*, European Journal of Operational Research, 41(2) (1989), 186-193. 4.6