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Address: Bhatinda ,Punjab,India - 151211

Expertise

Humanities, Multidisciplinary

Mathematics

Work experience

1. Guru Nanak College, Killianwali 2017 — Present

Assistant Professor
Sri Muksar Sahib

2. Govt. Rajindra College, Bathinda 2017 — 2017

Assistant Professor
Bathinda

3. D.A.V. College, Bathinda 2015 — 2016

Assistant Professor
Bathinda

4. Baba Farid College of Engineering & Technology, Bathinda 2014 — 2015

Assistant Professor
Bathinda

5. Multani Mal Modi College, Patiala 2012 — 2014

Assistant Professor
Patiala

6. Maharishi Markandeshwar (Deemed to be University) 2011 — 2012

Research Scholar
Ambala

Education

1. Ph.D - 2017

Maharishi Markandeshwar (Deemed to be University)

2. M.Phil - 2011

Maharishi Markandeshwar (Deemed to be University)

3. M.Sc - 2009

Khalsa College Patiala

4. Graduation - 2007

Govt. Ripudaman College Nabha

Honours and Awards

1. M.Phil with distinction - 2011

MMU Mullana

Publication

1. Calculus-1

Dr.Payal Singla
Calculus-1, Volume , Year 2021, Pages

2. 3- Stage Production Scheduling with the Concept of Set-Up Time Including Arbitrary Lags

Dr. Payal Singla , Dr. Deepak Gupta

Aryabhata Journal of Mathematics and Informatics, Volume Vol 13, No. 1, Year 2021, Pages 29-34

3. **Production problem with the conception of task (Job) block criteria**

Dr. Payal Singla , Dr. Deepak Gupta, Sourav

Advances in Mathematics: Scientific Journal, Volume 10, Year 2021, Pages 1389-1396

4. **Minimization of total waiting time of jobs in $n \times 3$ specially structured flowshop scheduling in which processing time with their respective probabilities including transportation time of jobs**

Dr. Payal Singla , Dr. Deepak Gupta

Advances in Mathematics: Scientific Journal, Volume 9, Year 2020, Pages 6547-6556

5. **Sequencing of n jobs on 3 machines with arbitrary lags**

Dr. Payal Singla

Special Issue on RDESTM-2020 Advances in Mathematics: Scientific Journal, Volume , Year 2020, Pages

6. **Optimal three stage specially structured flowshop scheduling to minimize the total waiting time of jobs, processing time associated with probabilities**

Dr. Payal Singla , Dr. Deepak Gupta

Advances in Mathematics: Scientific Journal, Volume 9, Year 2020, Pages 4597-4605

7. **COVID-19: General Overview with Mathematical Model**

Dr. Payal Singla

Dogo Rangsang Research Journal, Volume , Year 2020, Pages

8. **Specially Structured three stage Flow Shop Scheduling to Minimize the Total Waiting Time of Jobs**

Dr. Payal Singla , Dr. Deepak Gupta

Journal of Computational and Theoretical Nanoscience as a regular article, Volume Volume 17, Number 11, Year 2020, Pages 5091-5095

9. **Optimization of waiting time of jobs in three stage flow shop scheduling models with transportation time of jobs**

DEEPAK GUPTA, PAYAL SINGLA, AND SUKHVIR SINGH

Advances in Mathematics: Scientific Journal, Volume 9, Year 2020, Pages 1119-1128

10. **Sequencing of n jobs on three machines with arbitrary lags**

DEEPAK GUPTA, PAYAL SINGLA, AND SOURAV SINGLA1

Advances in Mathematics: Scientific Journal, Volume 9, Year 2020, Pages 3431-3438

11. **Gender Equality, Women Empowerment and Sustainable Development**

Dr. Payal Singla , Dr. Deepak Gupta

Sustainable Development in India-Innovative Practices, Volume , Year 2018, Pages

12. **Minimization of rental cost**

Dr. Payal Singla, Dr. Deepak Gupta

13. **Three Stage Specially Structured Flow Shop Scheduling Models**

Dr. Payal Singla, Dr. Deepak Gupta
Minimization of Rental Cost of Machines, Volume , Year 2014, Pages

14. **Branch and Bound Technique**

Dr. Payal Singla , Dr. Deepak Gupta
Weighted Flow Shop Scheduling , Volume , Year 2014, Pages

15. **Minimize the Rental Cost in Two Stage Flow Shop Scheduling Problem in Which Set Up Time Separated From Processing Time with Branch and Bound Technique**

Deepak Gupta, Payal Singla, Shashi Bala
International Journal of Emerging Technology and Advanced ISSN Number : 22502459Engineering,
Volume Vol. 3, No. 8, Year 2013, Pages 315-320

16. **Two Stage flow shop SCHEDULING PROBLEM Including transportation time and weightage of jobs with branch and bound method**

D. Gupta, P. Singla, Sh.Bala
International Journal of Applied Operational Research Islamic Azad University ISSN: 2251-6867 Electronic
ISSN: 2251-9432, Volume Vol. 3, No. 4, Year 2013, Pages pp. 1-6

17. **A heuristic for two machine open shop specially structured scheduling problem to minimize the rental cost, including job block criteria**

Deepak Gupta, Shashi Bala, Payal Singla
International Journal of Pure and Applied Mathematics, Volume 86, Year 2013, Pages 767-778

18. **Minimization of Elapsed Time in $N \times 3$ Flow Shop Scheduling Problem, The Processing Time Associated With Probabilities Including Transportation Time**

Dr. Payal Singla , Dr. Deepak Gupta
International Journal of Innovations in Engineering and Technology, Volume , Year 2013, Pages

19. **An Heuristic Approach $N \times 3$ Flow Shop Scheduling Problem In Which Processing Time Are Associated With Probabilities Including With Transportation Time And Job- Block Criteria**

Dr. Payal Singla , Dr. Deepak Gupta
International Journal of Innovations in Engineering and Technology, Volume , Year 2013, Pages

20. **$N \times 2$ Flow Shop Scheduling Model Using Branch and Bound Technique, Set up Times are Separated from Processing Times, With Job Block Criterion And Interval Of Non Availability Of Machines**

Dr. Payal Singla , Dr. Deepak Gupta
International Journal of Engineering and Innovative Technology (IJEIT) , Volume , Year 2013, Pages

21. **Two Stage Flow Shop Scheduling Model with Job Block Criteria and Unavailability of Machines Using Branch& Bound Technique**

Dr. Payal Singla , Dr. Deepak Gupta

22. **A New Heuristic Approach for Specially Structured Two Stage Flow Shop Scheduling to Minimize the Rental Cost, Processing Time, Associated With Probabilities Including Transportation Time, and Job Weightage**

Dr. Payal Singla , Dr. Deepak Gupta

International Journal of Emerging Trends in Engineering and Development, Volume , Year 2013, Pages

23. **Optimal Two Stage Flow Shop Scheduling Problem with Branch and Bound Method Including Transportation Time**

Dr. Payal Singla , Dr. Deepak Gupta

INTERNATIONAL CONFERENCE ON INFORMATION & MATHEMATICAL SCIENCES (IMS-13) proceeding published by Elsevier science and technology, Volume , Year 2013, Pages

24. **3-Stage Specially Structured Flow Shop Scheduling to Minimize the Rental Cost, Set Up Time Separated from Processing Time Including Transportation Time**

Dr. Payal Singla , Dr. Deepak Gupta

International Journal of Computer Applications , Volume , Year 2013, Pages

25. **Open Shop Scheduling**

Dr. Payal Singla , Dr. Deepak Gupta

Minimizing Make Span, Volume , Year 2013, Pages

26. **Heuristic Approach to Minimize the Rental Cost for Specially Structured Two Stage Flow Shop Scheduling Including Weightage of Jobs**

Deepak Gupta, ShashiBala, Payal Singla

International Journal Of Advanced Scientific And Technical Research ISSN 2249-9954, Volume Vol. 2, No. 2. , Year 2012, Pages Pp 150-157

27. **A Heuristic Approach for two stage Open Shop Scheduling with Transportation Time and Weightage of Jobs Including Job Block Criterion, the Processing Time Associated with Probabilities**

Deepak Gupta, Renuka, Payal Singla

International Journal of Scientific and Engineering Research, Vol. Research Publication IJSER 10685-B Hazelhurst Houston, TX 77043 USA ISSN 2250-3153, Volume Vol. 2, No. 7 , Year 2012, Pages Pp -01-20

28. **Specially Structured Two Stage Flow Shop Scheduling To Minimize the Rental Cost, Processing Time, Set up Time Are Associated With Their Probabilities Including Job Block Criteria And Job Weightage**

Deepak Gupta, Shashi Bala, Payal Singla

International journal of Engineering Research & Development ISSN 2278-067X 2278-800X, Volume Vol. 3, No. 5 , Year 2012, Pages Pp 72-77

29. **Optimal 3-Stage Schedule for specially Structured Flow Shop Problem to Minimize the Rental Cost including Transportation and Job Weightage**

Deepak Gupta Shashi Bala Payal Singla, Sameer Sharma

International Journal of Scientific & Engineering Research ISSN 2229-5518, Volume Vol. 3, No. 9. , Year 2012, Pages Pp 904:906

30. Specially structured three stages flow shop scheduling processing time associated with probabilities including transportation time to minimize the rental cost
Deepak Gupta, Shashi Bala, Payal Singla, Sameer Sharma
Gyanjyoti e Journal ISSN 2250-348X, Volume Vol. 2, No. 3, Year 2012, Pages Pp 10-16
31. Flow Shop Scheduling
Dr. Payal Singla
Branch and Bound Technique, Volume , Year 2012, Pages
32. Minimizing Rental Cost For Specially Structured Two Stage Flow Shop Scheduling, Processing Time, Setup Time Associated With Probabilities Including Weightage Of Jobs
Payal Singla, Deepak Gupta
Advances In Applied Science Research ISSN 0976-8610, Volume Vol. 3, No. 5 , Year 2012, Pages Pp 2906-2911
33. Branch and Bound Technique for $n \times 3$ Flow Shop Scheduling Problem Including Transportation Time and processing time associated with their respective probabilities
Dr. Payal Singla , Dr. Deepak Gupta
International Journal of Emerging Trends in Engineering and Development , Volume , Year 2012, Pages
34. Constrained N-Job, 3-Machine Flow Shop Scheduling Problem With Transportation Time
Dr. Payal Singla , Dr. Deepak Gupta
International Journal of Research in Engineering & Applied Sciences , Volume , Year 2012, Pages
35. Three Stage Flow Shop Scheduling Problem With Branch And Bound Technique In Which Processing Time Associated With Their Respective Probabilities Including Transportation Time And Break Down Interval
Dr. Payal Singla , Dr. Deepak Gupta
International Journal of Industrial Engineering & Technology, Volume , Year 2012, Pages
36. Application Of Branch And Bound Technique For $N \times 3$ Flow Shop Scheduling With Breakdown Interval
Dr. Payal Singla , Dr. Deepak Gupta
International Journal of Engineering Research and Application, Volume , Year 2012, Pages
37. $N \times 3$ Flow Shop Scheduling Problem To Minimize The Rental Cost In Which Processing Time Associated With Probabilities With Jobs In A String Of Disjoint Job Block
Dr. Payal Singla , Dr. Deepak Gupta
International Journal of Emerging Trends in Engineering and Development , Volume , Year 2012, Pages
38. Branch And Bound Approach In Two Stage Flow Shop Scheduling Problem Including Transportation Time And Idle Waiting Time Operator O_i, W For A Job Block
Dr. Payal Singla , Dr. Deepak Gupta

39. **Application Of Idle Waiting Time Operator For A Job Block In Two Stage Flow Shop Scheduling Problem With Branch And Bound Approach**
Dr. Payal Singla , Dr. Deepak Gupta
International Journal of Emerging Trends in Engineering and Development , Volume , Year 2012, Pages
40. **Branch And Bound Approach In Two Stage Flow Shop Scheduling Problem Including Job Block And Transportation Time**
Dr. Payal Singla , Dr. Deepak Gupta
International Journal of Emerging Trends in Engineering and Development , Volume , Year 2012, Pages
41. **Two Stage Flow Shop Scheduling Problem With The Help Of Branch And Bound Approach, Processing Time Associated With Probabilities Including Weightage Of Jobs**
Dr. Payal Singla , Dr. Deepak Gupta
International Journal of Computer Application, Volume , Year 2012, Pages
42. **Nx3 Specially Structured Flow Shop Scheduling To Minimize The Rental Cost Including Job Restrictions and Transportation Time**
Dr. Payal Singla , Dr. Deepak Gupta
International Journal of Research in Management, Volume , Year 2012, Pages
43. **The Idle Waiting Time Operator With Application To Multistage Flow Shop Scheduling To Minimize The Rental Cost Under Specified Rental Policy Where Processing Times Are Associated With Probabilities Including Transportation Time**
Dr. Payal Singla , Dr. Deepak Gupta
International Journal of Advanced Scientific & Technical Research, Volume , Year 2012, Pages
44. **Specially Structured N-Job, 3-Machine Flow Shop Scheduling To Minimize The Rental Cost With Separated Set Up Times**
Dr. Payal Singla , Dr. Deepak Gupta
International journal of environmental engineering and management, Volume , Year 2012, Pages
45. **Constrained Multi Stage Flow Shop Scheduling Including Transportation Time And Weightage Of Jobs With Break Down Interval Having Job Block Criteria , The Processing Time Associated With Respective Probabilities**
Dr. Payal Singla , Dr. Deepak Gupta
International Journal Of Mathematical Analysis, Volume , Year 2012, Pages
46. **Minimizing Rental Cost For Specially Structured Two Stage Flow Shop Scheduling Processing Time Associated With Probabilities Including Weightage Of Jobs And Job Block Criterion**
Dr. Payal Singla , Dr. Deepak Gupta
International Journal of Research in Management, Volume , Year 2012, Pages
47. **Optimal Two Stage Open Shop Scheduling , Processing Time Associated With Probabilities Including Transportation Time And Job Block Criterion**

Dr. Payal Singla , Dr. Deepak Gupta

International Journal Of Mathematical Archive, Volume , Year 2012, Pages

48. **Constrained multi-stage flowshop scheduling including transportation time and weights of jobs with break-down interval having job block criteria, the processing time associated with their respective probabilities**

International Journal of Mathematical Analysis, Volume 6, Year 2012, Pages 2133-2139

49. **Specially structure n-job, 3- machine flow shop scheduling to minimize the rental cost, with job block criteria**

Dr. Payal Singla , Dr. Deepak Gupta

International Journal of Applied Engineering Research, Volume 7, Year 2012, Pages 1161-1168

50. **Heuristic Approach for Specially Structured Two Stage Flow Shop Scheduling to Minimize the Rental Cost, Processing Time, Set Up Time Are Associated with Their Probabilities Including Transportation Time and Job Weightage,**

Dr. Payal Singla , Dr. Deepak Gupta

International Journal of Applied Operational Research, Volume , Year 2012, Pages

51. **Application of Branch and Bound Technique for 3-Stage Flow Shop Scheduling Problem with Transportation Time**

Deepak Gupta , Payal Singla, Shashi Bala

Industrial Engineering Letters ISSN Number : 2224-6096 2225-0581(e), Volume Vol. 2, No. 1, , Year 2012, Pages PP 1-5

52. **Minimize the rental cost for specially structured two stage flow shop scheduling processing time, set up time associated with their probabilities including job block criteria and transportation time**

Dr. Payal Singla , Dr. Deepak Gupta

International J. of Math. Sci. & Engg. Appls. (IJMSEA), Volume , Year 2012, Pages

53. **A New Heuristic Approach for Specially Structured Two Stage Flow Shop Scheduling to Minimize the Rental Cost, Processing Time, Associated with Probabilities Including Transportation Time, Job Block Criteria and Job Weightage**

Payal Singla,Deepak Gupta

Pelagia Research Library, Advances in Applied Science Research, ISSN:0976-8610, Volume Vol. 3, No. 4 , Year 2012, Pages Pp:2500-2507

54. **Optimal Two Stage Open Shop Specially Structured Scheduling To Minimize the Rental Cost, processing time Associated with Probabilities including transportation time**

Dr. Payal Singla , Dr. Deepak Gupta

IOSR Journal of Mathematics (IOSR-JM), Volume , Year 2012, Pages

55. **Specially Structured Two Stage Flow Shop Scheduling To Minimize The Rental Cost, Processing Time Each Associated With Probabilities Including Weightage of Jobs**

Deepak Gupta, ShashiBala, Payal Singla

56. **Network of Scheduling Problems**

Dr. Payal Singla , Dr. Deepak Gupta
Flow Shop Scheduling, Volume , Year 2012, Pages

57. **Specially Structured Flow Shop Scheduling**

Dr. Payal Singla , Dr. Deepak Gupta, Dr. Shashi Bala
Minimization of rental cost , Volume , Year 2012, Pages

58. **Branch and Bound Technique for Two Stage Flow Shop Scheduling with Breakdown Interval**

Payal Singla, Deepak Gupta
International Journal Of Advanced Scientific And Technical Research ISSN:22499954, Volume Vol. 2, No. 2 , Year 2012, Pages pp-92-98

59. **Optimal Two Stage Flow Shop Scheduling to Minimize the Rental Cost including Job Block Criteria, Set Up Times and Processing Times Associated with Probabilities**

Dr. Payal Singla , Dr. Deepak Gupta
European Journal of Business and Management , Volume , Year 2011, Pages

60. **Application of Branch and Bound Method for Optimal Two Stage Flow Shop Scheduling Problem with Group Job-Restrictions**

Dr. Payal Singla , Dr. Deepak Gupta
Journal of Information Engineering and Applications , Volume , Year 2011, Pages

61. **Minimizing Rental Cost For N-Jobs, 2-Machines Flow Shop Scheduling, Processing Time Associated With Probabilities Including Transportation Time And Job Block Criteria,**

Dr. Payal Singla , Dr. Deepak Gupta
Information and Knowledge Management, Volume , Year 2011, Pages