

Curriculum Vitae of Francesco Corman, Ph.D.

PERSONAL INFORMATION

Name **PROF. DR. CORMAN FRANCESCO, PH.D**
Address Institute for Transport planning and Systems
Swiss Federal Institute of Technology ETH Zurich
HIL F 13.1
Stefano-Frascini-Platz 5
8093 Zürich
Switzerland
Telephone +31 6 83318966
E-mail francesco.corman@ivt.baug.ethz.ch <http://francescocorman.eu>
Nationality **Italian, Belgian**
Gender **Male**

WORK EXPERIENCE

- Aug 2017 – current
• Name of employer **Professor of Transport Systems (AP-TT)**
Swiss Federal institute of Technology, ETH Zurich
• Main activities and research interests Analytics, optimization and control in transport systems, focusing on operations, public transport, logistics systems
- Sept 2016 – July 2017
• Name of employer **Senior Data Scientist**
IBM The Netherlands, Global Business Services
• Main activities and research interests Advanced analytics and Optimization approaches for production, logistics, customer service and maintenance problems, proving quickly added value to customers
- January 2013– Sept 2016
• Name of employer **Assistant Professor**
Transport Engineering & Logistics, Delft University of Technology, The Netherlands
• Main activities and research interests Acquired and managed 8 research projects, 100+ kEuro as principal investigator, 10+MEuro as co-applicant; International cooperation, 6 research grants; Dissemination of research results at 20+ conferences and workshops for academia and practitioners; 50+ scientific publications.
Managing 4 Researchers and PhDs, Coaching 20+applied projects per year, teaching four courses in two engineering master programs.
Research on Railways (planning, technologies, reliability, control, delays, maintenance, equity); Multimodal freight logistics, Mathematical Optimization.
- January 2013-Sept 2016
• Name of employer **Staff Member**
• Main activities The Dutch Research School in Transport, Infrastructure and Logistics – TRAIL
Research Program Management and Coordination; Railway transportation
- January 2013– Sept 2016
• Name of employer **Guest Professor**
• Main activities Center for industrial management, KU Leuven, Belgium
International cooperation, 1 research grant; Supervising a PhD, Teaching 1 course
- February 2011 – Dec 2012
• Name of employer **Post-Doctoral Researcher**
Center for industrial management, KU Leuven, Belgium

- Main activities and research interests
 - Acquired, contributed and managed 6 projects of 300+ kEuro
 - Designed master programs, 3 courses in railway, transit, supply chain:
 - Developed international collaborations; 10+ conferences, 20+ Scientific papers
 - Research on design, operations, control of railways & multimodal transport.

 - January 2007 – Dec 2010
 - Name of employer
 - Main activities and interests
 - Ph.D. Researcher**
 - Transport & Planning Dept, Delft University of Technology, The Netherlands
 - Optimization of railway traffic control, signaling technologies, capacity analysis, simulation, scheduling and planning. 20+ scientific papers

 - October 2006 – Dec 2006
 - Name of employer
 - Main activities
 - Researcher, Software Developer**
 - ROMA TRE University, Rome, Italy
 - Optimization of railway traffic control
- EDUCATION**
- January 2007 – Dec 2010
 - Doctoral Degree (Ph.D.).** Delft University of Technology
 - Dissertation Title: “Real-time Railway Traffic Management: Dispatching in complex, large and busy railway networks”.

 - October 2004 – Decr 2006
 - Notes
 - Master’s degree** in Management & Automation Engineering, Roma TRE University **cum Laude**. Dissertation Title: “Routing and scheduling trains in real-time”
 - Winner of 2006 AIRO award for best thesis in Operations Research field
 - Winner of 2006 Galluzzi Prize for best thesis in Engineering
 - Winner of 2006/2007 Accenture- best thesis prize in Management Engineering
- Principal subjects covered
 - Operations Research, Project Management, Control, Telecommunications
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- October 2001 – Sept 2004
 - Principal subjects covered
 - Bachelor Degree** in Computer Science Engineering, Roma TRE University
 - Operations Research, Computer science, Control & Telecommunication System
- PROJECT COORDINATION, CONTRIBUTION AND MANAGEMENT (SELECTION)**
- Energy-Efficient Autonomous Driving Trains.** Funding: NWO Rubicon scheme, Recipient Pengling Wang. 200 KEur, 2018-2020
 - Trans ITS:** Public Transport Passenger Flows in the Era of ITS. Management Committee, Working Group. EU COST (TU1004). 530 kEuro. 2013-2015
 - ITT - Inter Terminal Transport:** Advanced transport solutions for container transport between multiple terminals. Funding: Port of Rotterdam 2013
 - ERTMS Capacity Study:** Capacity assessment of advanced signaling system on the Dutch Railway Network. Funding: Dutch Parliament, 120 kEuro, 2012
 - ONTIME:** Optimal Networks for Train Integration Management across Europe -. 19 practitioners & academic partners. Funding: EU-FP7 7.8 MEuro. 2013-2015
 - Passenger flows:** Dynamic train traffic control models with passenger choices. Funding: State Key Laboratory of Rail Traffic Control and Safety, Beijing.2013
 - ACM - Railway Market determination:** Competition and dominant positions in railway passenger and freight market. Dutch competition authority. 60 kEuro.
 - Integrated train & traffic control:** Models for energy efficient railway traffic control. State Key Laboratory of Rail Traffic Control and Safety, Beijing. 2015
 - National Data Warehouse:** Assessing quality requirements for data collection on the road network of the Netherlands. Dutch Ministry of Transport, 2011
 - Adifo NV:** Process optimization in the animal feed and food industry. Funding: IWT/KMO, 2011-2012

Punch Telematix / Trimble: Integrated solution for front end and back end truck navigation. Funding: IWT/O&O, 2011-2012

MobiRoute- Mobility and Routing: Multimodal Robust Routing Planner: KULeuven ICRI, U Gent; Be-Mobile, DUO. Funding: IWT/IBBT, 2011-2012

TRACS: Tracing Condition Status: modelling failures in railway transport infrastructures. Funding: TUDelft, Cohesion program. 50kEuro, 2016

iCAVE: integrated cooperative automated vehicle. Funding: STW, Perspectief scheme, 4MEuro, 2016

Complexity in Sychromodal Networks. Preparatory grant, NWO: CWI, TNO, port of Amsterdam

COMET-PS, Complexity in Sychromodal transport networks. NWO/TNO, CWI, TNO, Port of Amsterdam

**ACADEMIC ACTIVITY
(SELECTION)**

General organizer and program chair for the 6th International Conference on Computational Logistics – ICCL 2015, Delft.

Project Reviewer for EU COST, METRANS funding, University South California

Program committee member for conferences:

ATMOS11: Algorithms for Transportation Modelling Optimization, 2011;

3rd MT-ITS and 4th MT-ITS: Modeling and Technology for ITS, 2013, 2015;

ICSNC: IEEE Conference on Networking, Sensing and Control, 2014;

TRISTAN 2016; TSL Workshop 2017, EWGT 2018, RTDM 2018

Session Organizer at EURO 2013, July 2013.

General coordinator and Chair for the Informs- Railway Application Section (RAS) Problem Solving Competition, 2015 and 2016.

Committee member, Reviewer and Evaluator, Transportation Science and Logistics (TSL) Best PhD Thesis award, Informs, 2015

Invited **plenary speaker:**

Control in public transport networks UNI Luxembourg

Integrated operations and maintenance scheduling, Smart Maintenance Days 2018

Routing vehicles and passengers in public transport networks. Swiss OR Days 2018.

Routing in transit networks. MIT Transit lab 2018.

Strategic Interactions in Microscopic Delay Management - 4th International Symposium on railway research, Beijing Jiaotong October 2017

Using Wheel impact Load Detectors for condition-based maintenance of railway wheels, 4th Int. Symposium on Railway Research -Beijing Jiaotong Oct 2017

Optimizing trains or passengers? Dagstuhl seminar Algorithmic Methods for Optimization in Public Transport, April 2016

Railway traffic models, Dr. Xin, Zhengzhou University, March 2016

Railway traffic models, Prof Meng Beijing Jiaotong University, March 2016

Railway traffic models, Prof Anderson, Linkoping University, February 2016

Logistics control, Prof Gronalt, BOKU Universität, Vienna, 2015

Railway traffic control, Prof Tomii, RTRI Japan, Aug 2015

Passenger assignment in railway networks; COST, Paris May 2015

Distributed control strategies for transport networks, iCore, Paris. May 2015

Control in multi-stakeholders problems, rear-admiral Visser, Rotterdam 2014

Equity in railway traffic control, Prof Vansteenwegen, KU Leuven Dec 2014

**SUPERVISION ,
LEADERSHIP, MANAGEMENT**

Guest Editor:

Journal of Advanced Transportation (Simulation and Optimization for Railway Operations Management)

Transportation Res E (Computational Logistics at Work),

Transportation Res C (Integrated railway optimization model and algorithms)

Public Transport: Planning and Operations (Modeling and technologies for ITS)

Lecture Notes in Computer Science (proceedings of ICCL 2015 Conference)

Associate editor, journal of Urban Rail Transit (Springer)

Editorial Adv Board, Journal of Rail Transport Planning and Management (Elsevier)

Editorial Adv Board, Transportation Research, Part E (Elsevier)

National Representative for the Netherlands (MC), EU COST TUD1004 TransITS: Modelling Public Transport Passenger Flows in the Era of ITS.

Committee Member of the AR030 Railroad Operating Technologies, Transportation Research Board

Friend of Transportation Research Board Committees:

AR010 Intercity Passenger Rail

AT045 Intermodal Freight Transport

AT050 Intermodal Freight Terminal Design and Operation

Informa Member

Staff member and alumnus of The Netherlands Research School in Transport Infrastructure and Logistics –TRAIL

Member of the Transport Institute at Delft University of Technology, editor of the transport blog for the faculty of mechanical engineering

Initiator, organizer and manager of a research exchange program between TUDelft Transport Institute and **Beijing Jiaotong University**: supervision of two researchers from each side; obtained grants for two PhD students.

Founding Member and coordinator of the Chapter of The Italian Operation Research Society: Optimization in Public Transport and Shared Mobility (AIRO-OPTSM).

**AWARDS, NOMINATIONS,
POSITIONS IN APPEAL**

(supervision) Benefits of a dynamic impact zone when dealing with train conflict, S. Van Thielen; **Winner of 2nd place for the best paper 2017, in the student paper competition organized by the Railway Application Section, INFORMS**

Anna Valicek Award, Winner, for the paper **Metaheuristics for efficient aircraft scheduling and re-routing at busy terminal control areas**, coauthored by Samà, D'Ariano, Pacciarelli, AGIFORS oct 2016

Best Paper award for **Stochastic prediction of train delays with dynamic Bayesian networks**, coauthored by Kecman, Peterson, Joborn, CASPT 2015

Nominated (top 5) for best paper award for **Train Delay and Passenger Travel Time Minimization in Real-Time Railway Traffic Management**, CASPT 2015

Grant for research, international mobility and international collaboration, State Key Laboratory of Railway Control and Safety, Beijing, China, 2015; and 2013

(supervision) Optimization and equity in railway transport systems, X. Luan, Winner of **2nd place for the best paper 2014, in the student paper competition organized by the Railway Application Section, INFORMS**

Grant for research, international mobility, funding **EU COST STSM**, University of Luxembourg, optimization in sensor location and ITS, 2014

The article **A tabu search algorithm for rerouting trains during rail operations**. Transp Res B is within the Top 3 articles for citations in that journal, in 2009-2013, top article in the railway domain

The article **Bi-objective conflict detection and resolution in railway traffic management**. Transp Res C is within the Top 7 articles for citations in Elsevier Transportation journals, in 2012-2013, top article in the railway domain

Interviewed for a NWO-STW VENI Grant proposal, the most prestigious personal funding scheme for young researchers in the Netherland, 2013

Nominated (top 6) for best paper award for **“Railway line capacity consumption of different railway signalling systems under scheduled and disturbed conditions”** 5th ISROR – RailCopenhagen, 2013

Nominated (top 5) for the best paper award for **“Stochastic shortest path with correlation effects”** at the Vervoer Logistieke Werkdagen, Venlo, 2012

Ranked winner, scholarship “Rita Levi Montalcini” Italian Research Council, 2017

Eligible candidate for an assistant professor in Intelligent Networks, Center for Industrial Management, KULeuven, 2012

Recipient of an assistant professorship (tenure track) in Transport and Logistics, Maritime and Transport Technology, TUDelft, 2012

Grant for Post-Doctoral research 3 years, awarded by the FWO –Research Foundation Flanders, 2012

Nominated (top 5) for the EDDA Award for the best PhD Thesis in operations research, the *Association of the European Operational Research Societies 2012*

Nominated (top5) for the best paper award for **“Dispatching trains during seriously disrupted traffic situations”**, 8th IEEE ICNSC Conference, 2011

Best Paper award for the work **“A tabu search algorithm for rerouting trains during rail operations”**, by the Railway Application Section, INFORMS, 2007

Best master’s thesis in operations research, AIRO, Italian Association for Operations Research, 2007

Best master’s thesis prize in management engineering, Accenture, 2006

Galluzzi Prize for best thesis in Engineering, University “Roma TRE”, 2006

Teaching assistant fellowship, by University of Rome “Roma TRE, 2005

PHD STUDENTS

Daily Supervisor and Co-promotor (ETH Zurich) on:

Strategic interactions in railway transport systems, funding ETH: **BÜCHEL**

Daily Supervisor and Co-promotor (TUDelft) on:

Railway wheel defect and maintenance, funding Iranian Ministry of Science: **ALEMI**

Interfacing railways and terminals, funding Chinese Ministry of Science, **HU**

Railway control for freight flows, funding Chinese Ministry of Science **QU**

Non linear optimization models in railway systems, funding Chinese Ministry of Science, **LUAN**

Co-promotor (KULeuven) on

Railway Conflict Resolution, funding Infrabel: **AMEYE** and **VAN THIELEN**

Member of the Doctoral Examination Committee for projects on

Passenger demand in railway timetable rescheduling, **BINDER** (EPFL)

Robust Railway Timetabling, **DEWILDE** (KULeuven);

Decentralized traffic control, **RINALDI** (KULeuven)

Algorithms for job shop rerouting, **SAMÀ** (Uni Roma Tre)

Management and supervision of project for **exchange PhD Students:**

Reliability in railway traffic, **KHARKEABADI** (Iranian Ministry of Railways), 2013
Optimization models for railway control, **SAMÀ** (Roma TRE), 2014
Reliability & Disruptions in High speed railways, **XU** (Southwest Jiaotong), 2015

**MASTER STUDENTS
SUPERVISION**

ETH Zurich

Passenger interaction at train stations, A. Lunardi, March 2018

TU Delft

Synchromodal network design and operations, A. Pouliasi, July 2016
Passenger-oriented transit control, A. Gavriilidou, Sept 2016
Container Storage Optimization at ECT, M. Vester, June 2016
Human factors in container transportation, port of Rotterdam, R de Jong, Sept 2016
Maintenance for offshore structures, TOTAL, R. Haans, March 2016
Dynamic multimodal freight assignment models, FloraHolland, Z. Chen, Dec 2015
Operations management, GE Healthcare V Knops, August 2015
Equity in Air traffic operations, M. Tripathy, August 2015
Public Transport with automated Vehicles, K Winter, August 2015 (cum laude)
Rail freight terminal design, EMO terminals, L. Van De Water, July 2015
Maintenance of tram systems, HTM The Hague, S. Kraijema, June 2015
Logistic distribution networks design, Heineken R. van Blijenburgh, March 2015
Capacity assessment for light rail, HTM The Hague, T. Jongerius, December 2014
Dynamic Railway Traffic management, NS, N. de Vries, May 2014
Inter Terminal Transport, port of Rotterdam, H. Schröer, February 2014
Inter Terminal Transport, port of Rotterdam, F. Nieuwkoop, October 2013

KU Leuven

Flexible Railway Timetables, A. Clijsters, Sept. 2013
Railway Simulation, S. Gijssenbergh; July 2013, **TML Thesis Prize 2013**
Ridesharing models, P. Boyen, J. Broekhoven; July 2012

Roma Tre University (exchange)

Degradation trending and scheduling maintenance, G. Centulio, June-Sept 2016
Passenger flow optimization in railways; A. Marra, June-August 2015
Job shop rerouting heuristics, A. Toli, Sept-Dec 2014
Job shop models for train rerouting, G. Zaninotto Oct-Dec 2013 **Operation Research Society (AIRO) Best master thesis award 2013**
Passenger flows models in railways, F. Sabene, May-August 2013

Beijing Jiaotong University (Exchange)

High speed railway delays, Jingwen Guo, March 2015
Optimization and equity in railway transport systems, X. Luan, March 2014; Winner of **2nd place for the best paper 2014, in the student paper competition organized by the Railway Application Section, INFORMS**

TEACHING ACTIVITY

2017- onwards

Course coordinator, lecturer, Public Transport Design and Operations, ETH Zurich.

University Teaching Qualification, TU Delft, 2015.

2017

Guest lecturer, Beijing Jiaotong University Railway Traffic management

2011-2013

Member of the Permanent Education Committee (POC) for Master in Traffic, Logistics and Intelligent Transportation System, KU Leuven

2014-2016

Coordinator for the faculty of mechanical engineering: Interdisciplinary project,

Transport, Infrastructure and Logistics Master, TUDelft

- 2013-2016 **Lecturer, Course coordinator:** Introduction to Transport Engineering and Logistics; Quantitative Methods for logistics (TUDelft)
- 2012- 2016 **Lecturer, Teaching Assistant:** Masterclass Transport Engineering & Logistics, Control of Intelligent Transport Infrastructure, Introduction to TIL; Bachelor End Project. Mechanical Engineering & Transport, Infrastructure and Logistics Master (TUDelft)
- 2014 **Guest Lecturer,** Intelligent Transportation System; Traffic Planning and Management; Transport and Mobility, University of Luxembourg
- 2011/12 - 2015/16 **Course coordinator, Guest Lecturer, Teaching Assistant:** Public Transport Model and Operations; Integrated Practicum on Logistic Organization of Public Transport; Supply Chain Engineering. Master in Traffic, Logistics and Intelligent Transportation System , KULeuven
- 2010 Teaching Assistant Verkeerskunde Basis, Master in Civil Engineering, KULeuven
- 2008-2010 Teaching assistant: Design and Control of Public Transport Systems; Railway Traffic Management, Master in Transport and Planning, Master in Transportation Infrastructure and Logistics, TUDelft
- 2005 Teaching assistant, Lab teacher: Automatic Control 1, Automation Network and Systems (Bachelor degree in Informatics Engineering), Roma Tre University

PERSONAL SKILLS

MOTHER TONGUE

English

Reading	Writing	Verbal
Excellent	Excellent	Excellent

Dutch

Reading	Writing	Verbal
Proficient	Fair	Good

Spanish

Reading	Writing	Verbal
Good	Fair	Fair

German

Reading	Writing	Verbal
Fair	Fair	Fair

Italian, Near-Native in French

SOCIAL AND ORGANIZATIONAL SKILLS

Good relation and communication skills acquired in several months of team working
 Capability to manage and organize activities, people, resources, acquired by periods of responsibility in work management and organization;
 active participation in PhD Society Leuven; YoungDelft
 Mentor and coach within PhD Startup and TUDelft Graduate school

TECHNICAL SKILLS AND COMPETENCES

Excellent knowledge of Java, C++/C, C#, simulations, parallel computing, Matlab, PHP, Python,;Linux, SPSS Modeler, R, MS Windows, Office suite

ARTISTIC SKILLS AND COMPETENCES

Sport: Trekking/Hiking, Cycling
 Hobbies: Photography, Graphic arts

PUBLICATION LIST

PHD THESIS

F. Corman (2010). **Real-time Railway Traffic Management: Dispatching in complex, large and busy railway networks**. PhD Thesis, TRAIL Thesis Series 2010/14.
Defended on 10/12/2010. Promoter: Prof.Dr.-Ing I.A. Hansen, Transport and Planning Department, Delft University of Technology.

BIBLIOMETRICS

ISI web of science: h-index 15; 629 citations
Scopus: h-index: 18; 966 citations
Google scholar: h-index 23; 1695 citations

100+ scientific articles in 10 year research.
Currently about 360 citations/year in Google scholar

The journal article A tabu search algorithm for rerouting trains during rail operation is one of the hottest journal articles in Transportation Research Part B (top 25 for amount of searches) and one of the top 3 articles in Transportation Research Part B for amount of citations, 2009-2013, First one for domain of railways.

PUBLICATIONS IN JOURNALS OR BOOKS WITH IMPACT FACTOR

1. De Martinis V, Toletti A, Corman F Weidmann U.A., Nash, A (2018) Feedforward tactical optimization for energy efficient operation of freight trains: the Swiss case. Transportation Research Record
Impact Factor 0.522
2. Samà, M. D'Ariano, A, Corman, F, Pacciarelli D (2017) Coordination of scheduling decisions in the management of airport airspace and taxiway operations Transportation Research, Part A (ISTTT 2017)
Impact Factor 3.489
3. Luan, X. De Schutter B, Corman F, Lodewijks G (2018) Integrating Dynamic Signalling Commands Under Fixed-Block Signalling Systems Into Train Dispatching Optimization Models. Transportation Research Record
Impact Factor 0.522
4. Corman F, Quaglietta E., Goverde, R.M.P. (2018). Automated real-time railway traffic control: An experimental analysis of reliability, resilience and robustness. Transportation Planning and Technology accepted for publication
Impact factor: 0.512
5. Corman, F., Meng, L., Tang, T, Zhou X., (2018) Editorial Integrated optimization models and algorithms in rail planning and control. Transportation Research, Part C
Impact Factor 4.334
6. Centulio G, Meng L. D'Ariano A, Corman F (2018) Integrated stochastic optimization approaches for tactical scheduling of trains and railway infrastructure maintenance. Computers & Industrial Engineering <https://doi.org/10.1016/j.cie.2017.12.010>.
Impact Factor: 2.859
7. Negenborn, Corman (2017). Editorial: Computational logistics at work. Transportation Research, Part E 105 pp 149-151 10.1016/j.tre.2017.07.002
Impact factor: 3.791
8. Samà M., D'Ariano A., Corman F., Pacciarelli D., (2017). Metaheuristics for efficient aircraft scheduling and re-routing at busy terminal control areas. Transportation Research Part C 80 pp 485-511 10.1016/j.trc.2016.08.012.
Impact factor: 4.334
9. Xu, P. Corman, F., Peng, Q. Luan, X. (2017) A train rescheduling model integrating speed management for disruption management of high-speed traffic under a quasi-moving block system. Transportation Research, Part B. 10.1016/j.trb.2017.05.008
Impact Factor 4.822
10. Xu, P. Corman, F., Peng, Q. Luan, X. (2017) Timetable Rescheduling Approach and Transition Phases for High-Speed Railway Traffic During Disruptions. Transportation Research Record 2607 10.3141/2607-11
Impact Factor 0.544
11. Kraijema S. Corman F. Godjevac M. Lodewijks G. (2017) Optimizing preventive

- maintenance policy: a data-driven application for a light rail braking system. Proceedings of the Institution of Mechanical Engineers, Part O: Journal of Risk and Reliability. doi 10.1177/1748006X17712662
Impact Factor: 1.084
12. Shakibayi, M, Sheikholeslami, A., Corman, F., Shafahi, Y. (2017) An integrated rescheduling model for minimizing train delays in the case of line blockage. Operations Research – An International Journal. doi 10.1007/s12351-017-0316-7
Impact Factor: 0.600
 13. Luan, X., Miao, J., Meng, L., Corman, F., Lodewijks, G. (2017) Integrated Optimization on Train Scheduling and Preventive Maintenance Time Slots Planning. Transportation Research Part C 80 10.1016/j.trc.2017.04.010
Impact Factor: 4.334
 14. X. Luan, L. Meng, F. Corman (2017) Non-discriminatory train dispatching in a rail transport market with multiple competing and collaborative train operating companies, Transportation Research, Part C 80 pp148-174 doi 10.1016/j.trc.2017.04.011
Impact Factor: 4.334
 15. Shakibayi M., Sheikholeslami, A., Corman F. (2017) A simulation based optimization approach to train rescheduling problem. Scientia Iranica, doi: 10.24200/sci.2017.4186
Impact Factor: 1.025
 16. Corman, F., D'Ariano A., Marra, A., Pacciarelli D., Samà, M. (2016) Integrating Train Scheduling and Delay Management in Real-time Railway Traffic. Transportation Research Part E, doi:10.1016/j.tre.2016.04.007
Impact factor: 3.791
 17. Samà M., D'Ariano A., Corman, F. Pacciarelli.,D (2017) A variable neighbourhood search for fast train scheduling and routing during disturbed railway traffic situations. Computers and Operation Research 78 (C) pp 480-499, doi:10.1016/j.cor.2016.02.008
Impact Factor: 2.454. 3 Citations in ISI
 18. A. Alemi, Corman, F. Lodewijks, G. (2015) Condition monitoring approaches to the detection of railway wheel defects. Journal of Rail and Rapid Transit, 231(8), pp. 961 – 981
Impact Factor:0.857
 19. Xin, J., Negenborn, R.R., Corman, F. , Lodewijks, G. (2015) Control of interacting machines in automated container terminals using a sequential planning approach for collision avoidance. Transportation Research Part C 60, 377–396
Impact factor: 4.334, 5 Citations in ISI
 20. Corman F, Viti F, Negenborn R.R (2015) Equilibrium models in multi-modal container transport systems, Journal of Flexible Services and Manufacturing 29(1), 125-153. doi: 10.1007/s10696-015-9224-4
Impact Factor: 1.872
 21. Corman F.,Quaglietta, E. (2015). Closing the loop in railway traffic control: framework design and impacts on operations. Transportation Research C. 54, 15-39
doi: 10.1016/j.trc.2015.01.014
Impact factor: 4.334. 7 Citations in ISI
 22. Corman F., Meng, L., (2014) A Review of Online Dynamic Models and Algorithms for Railway Traffic Control. IEEE Transactions on ITS, 16 (3) p 1274 - 1284
doi: 10.1109/TITS.2014.2358392
Impact factor: 3.064 6 Citation in ISI
 23. Viti F., Rinaldi M., Corman F., Tampère, C. (2014) Assessing partial observability in network sensor location problems. Transportation Research, Part B 70, 65-89
doi: 10.1016/j.trb.2014.08.002
Impact factor: 4.822. 19 Citations in ISI
 24. Dollevoet, T., Corman, F., D'Ariano, A., Huisman, D. (2014) An iterative optimization framework for delay management and train scheduling, Journal of Flexible Services and Manufacturing, 26 (4), 490-515. Doi 10.1007/s10696-013-9187-2
Impact Factor: 1.872.9 Citations in ISI
 25. Corman, F, D'Ariano, A, Pacciarelli, D, Pranzo, M (2014). Dispatching and coordination in multi-area railway traffic management. Computers and Operations Research (44), 146-160
doi 10.1016/j.cor.2013.11.011.
Impact Factor: 2.454. 23 Citations in ISI

26. Corman, F., D'Ariano, A., Hansen, I.A. (2014) Evaluating disturbance robustness of railway schedules, *Journal of ITS*, 18(1), pp 106-120. doi 10.1080/15472450.2013.801714
Impact Factor : 1.514. 9 Citations in ISI
27. Larsen, R., Pranzo, M., D'Ariano, A., Corman, F., Pacciarelli, D. (2014) Susceptibility of Optimal Train Schedules to Stochastic Disturbances of Process Times, *Journal of Flexible Services and Manufacturing*, 26(4) , 466-489
Impact Factor: 1.872 4 Citations in ISI
28. Corman, F., D'Ariano, A., (2012) Assessment of advanced dispatching measures for recovering disrupted railway situations. *Transportation Research Records: Journal of the Transportation Research Board*. 2289/2012.
Impact Factor: 0.556: 5 Citations in ISI
29. Corman, F, D'Ariano, A, Pacciarelli, D, Pranzo, M (2012). Bi-objective conflict detection and resolution in railway traffic management. *Transportation Research Part C 20 (1)* pp 79-94.
Impact Factor: 4.334 43 Citations in ISI
Top 7 articles in Elsevier Transportation Journals for amount of citations, 2012-2013
30. Corman, F., D'Ariano, A., Pacciarelli, D., Pranzo, M. (2012). Optimal inter-area coordination of train rescheduling decisions. *Transportation Research Part E 48 (1)*, pp-71-88.
Impact Factor: 3.791 33 Citations in ISI
31. Corman, F, D'Ariano, A, Pranzo, M, Hansen, I A. (2011) Effectiveness of dynamic reordering and rerouting of trains in a complicated and densely occupied station area. *Transportation Planning and Technology 34 (4)*, 341-362.
Impact Factor: 0.627. 18 Citations in ISI
32. Corman, F., D'Ariano, A., Pacciarelli, D., Pranzo (2010), M. A tabu search algorithm for rerouting trains during rail operations. *Transportation Research Part B, Vol 44, 1*, 175-192
Impact Factor:4.822; 83 Citations in ISI.
Top 3 articles in Transportation Research Part B for amount of citations, 2009-2013
33. Corman, F, D'Ariano, A, Pacciarelli, D, Pranzo, M (2009). Evaluation of green wave policy in real-time railway traffic management. *Transportation Research Part C, Vol. 17, 6*, 607-616.
Impact Factor: 4.334; 30 Citations in ISI
34. D'Ariano, A, Corman, F, Pacciarelli, D & Pranzo, M (2008). A Reordering and local rerouting strategies to manage train traffic in realtime. *Transportation Science, Vol. 42, 4*, pp. 1–15.
Impact Factor: 3.753; 72 Citations in ISI

PUBLICATIONS IN PEER-REVIEWED, INTERNATIONAL JOURNALS OR BOOKS

1. Corman F., Negenborn, R.R. (2017) Accessibility of Ports and Networks. In *Ports and Networks: Strategies, Operations and Perspectives*. Geerlings, Kuipers, Zuidwijk (eds), Edwar Elgar Publishers.
2. Samà, M. D'Ariano, A, Corman, F, Pacciarelli D (2017) Coordination of scheduling decisions in the management of airport airspace and taxiway operations *Transportation Research Procedia* doi: 10.1016/j.trpro.2017.05.015
3. Quaglietta, E., Corman, F., Goverde, R.M.P (2015). ON-TIME: A Closed-Loop Real-Time Traffic Control Framework in a Realistic Railway Environment, *Problemy Kolejnictwa – Railway Reports*. Vol 58, Issue 168, pp 39-46 ISSN 0552-2145
4. Albrecht, Corman, (2015) Special issue on intelligent transportation systems Editorial. *Public Transport*, doi: 10.1007/s12469-015-0117-4
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6. Negenborn, R.R, Schott, D.L., Corman F. (2015) Port Equipment and Technology, *Encyclopedia of Marine and Offshore Engineering*
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IEEE Intelligent Transportation System conference, Annual Meeting of the Transportation Research Board, International Symposium of Transport and Traffic Theory (ISTTT), International symposium of transport reliability (INSTR), Symposium of the European Association for Research in Transportation (hEART), Modeling and Technology for Intelligent Transportation Systems (MT-ITS), World Conference on Transportation Research (WCTR), IFAC Conference on Manufacturing Modelling, Management and Control (MIM), International Network Optimization Conference (INOC), TRAIL congress, ODS conference, Euro Working Group on Transportation (EWGT)

Project evaluator METRANS transportation Center University Southern California, Swiss National Science Foundation – SNSF, COST proposal evaluator EU-H2020, Czech Science Foundation, DFG German science foundation.
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