



dr. ir. Joaquin Vanschoren

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Professional Profile

Assistant professor of Machine Learning at the Eindhoven University of Technology. My passion is to empower everyone to use machine learning to make the world a better place. My research focuses on automating machine learning, as well as making it more open and collaborative. I founded OpenML.org, a popular online machine learning platform where scientists across disciplines can easily share data, code, models and experiments. Moreover, OpenML automatically learns from all these experiments to recommend techniques and help people perform machine learning better and easier. I also do large-scale data analysis on all types of data (social, streams, geo-spatial, sensors, networks, text). I have a passion to associate, to connect what is not connected, to meet people from different backgrounds, to bring separate data sources, ideas and people together and create.

Professional Experience

- **Eindhoven University of Technology**
 - **Assistant Professor** Department of Mathematics and Computer Science Jan 2014 - now
- **Mobile Vikings**
 - **Data Scientist** Large-scale recommender systems. 150,000+ users. Jan 2013 - Dec 2013
- **Leiden University**
 - **Guest researcher.** Leiden Institute for Advanced Computer Science. Oct 2013 - now
 - **Post-doctoral Fellow** Leiden Institute for Advanced Computer Science. Sep 2010 - Sept 2013
Lecturer, NWO Project Lead, PhD Supervisor, Researcher
- **University of Leuven**
 - **Guest researcher.** Computer Science Department. Sep 2010 - Sep 2016
 - **Post-doctoral Fellow.** Computer Science Department. May 2010 - Sep 2010
 - **PhD Candidate.** Computer Science Department. Aug 2005 - May 2010
Original machine learning research on meta-learning, Teaching assistance

Education and Degrees

- **PhD in Engineering, University of Leuven, Belgium** 17 May 2010
 - PhD thesis: “Understanding Machine Learning Performance with Experiment Databases”
Data-driven analysis of machine learning techniques, the foundation of OpenML.org.
- **Master in Engineering: Computer Science, University of Leuven, cum laude** 8 July 2005
 - Master’s thesis: “Development of a framework for high-level perception”, magna cum laude
On bottom-up reconstruction and interpretation of visual scenes, used in face recognition systems.
- **High school education**
 - Sint Jan Berchmansinstituut Zonhoven: Latin-Mathematics 1995-1999
 - Vrije Middenschool Zonhoven: Latin 1993-1995

Competence Summary

- **Programming languages:** Python, R, Java, PHP, Javascript, C++, C#, Matlab
- **Languages:** English (proficient), Dutch (native), Spanish (native), French (fluent), German (basic)
- **Technologies:** Machine learning algorithms and systems (incl. deep learning), MapReduce/Spark, Web technology, Databases, Semantic Web
- **Software development:** Data structures, Algorithms, Design patterns. Agile, Scrum, Git. Open source development (OpenML), production-level recommender systems (CityLife app)
- **Leadership:** Research project leader, Open source project lead, PhD/MSc Supervisor, Conference chair.
- **Speaking and authorship:** University lecturer, (invited) speaker at many international conferences and workshops. Author of many scientific publications, grant applications and project reports.
- **International collaboration** with researchers and professionals from many universities and companies (Philips, Amazon, Microsoft, Yandex, KNIME, RapidMiner, Strukton)
- **Organization** of international scientific conferences and workshops: General chair (LION, Benelearn), Associate chair (ECML-PKDD), Workshop Chair of AutoML, ICML, ECML and ECAI workshops
- **Reviewing** for major scientific journals (MLJ, JMLR, DaMi, SWJ, COIN), programme committee member for large scientific conferences (NIPS, ICML, KDD, ECML-PKDD, IJCAI, IJCNN, ESWC).

References

Recommendations can also be found at <http://www.linkedin.com/in/jvanschoren>

- **Prof. dr. Mykola Pechenizkiy** current superior
Full research professor, Eindhoven University of Technology, The Netherlands
Phone: +31 40 247 26 02, e-mail: debra@win.tue.nl
- **Prof. dr. ir. Hendrik Blockeel** PhD promotor
Full research professor, University of Leuven, Belgium
Phone: +32 16 32 76 43, e-mail: hendrik.blockeel@cs.kuleuven.be
- **Prof. dr. Geoff Holmes** PhD supervisor
Dean of the School of Computing and Mathematical Sciences, Waikato University, New Zealand
Phone: +64 7 838 4405, e-mail: geoff@waikato.ac.nz

Other interests

Triathlon, Marathon running, Photography (published), Improvisational theater

Awards

- Dutch Data Prize, Research Data Netherlands, Nov 2016
- Microsoft Azure Research Award, July 2016
- Best Hadoop Application Award, SURFsara Hadoop day, 2010
- Best Demo Award, 17th European Conference on Machine Learning (ECML-PKDD), 2009

Grants

- NWO Commit2Data on Evolutionary data €854,045, Jul 2017
 - ‘Dynamic Data Analytics through automatically Constructed Machine Learning Pipelines’, Particip.
- DARPA Data Driven Discovery of Models, €324,000, Apr 2017
 - ‘AutoFlow: Automatic Workflow Construction and Optimization’, Participant
- Lorentz Center Workshop grant, €6,875, Oct 2017
 - ‘Open Machine Learning 2017’, Coordinator
- Microsoft Azure Research Award, €20,000, Sep 2016
 - ‘A Cloud-Based Platform for Automated Machine Learning’, Principal Investigator
- Lorentz Center Workshop grant, €3,125, Mar 2016
 - ‘Open Machine Learning 2016’, Coordinator
- Dutch Science Foundation (NWO) Free Competition research grant, €240,000, Sep 2012 - Sep 2016
 - ‘Massively Collaborative Data Mining’, Principal Investigator
- EU PASCAL Harvest grant, €30,000, Aug 2012 - Feb 2013
 - ‘MLOpen Machine Learning Platform’, Principal Investigator

Invited Talks

- National eScience Symposium, Amsterdam, The Netherlands, Oct 2017
- ICML Workshop on Reproducible Machine Learning, Sydney, Australia, Aug 2017
- Big data tools for physics and astronomy workshop, Amsterdam, The Netherlands, Jun 2017
- Amazon Research, Berlin, Germany, Apr 2017
- Amazon Research, Cambridge, UK, Feb 2017
- Neural Information Processing Systems (NIPS) Workshop on Challenges in Machine Learning (CiML), Barcelona, Spain, Dec 2016
- Dutch Society for Pattern Recognition, Eindhoven, The Netherlands, Nov 2016
- IBM Watson Research Center, New York, USA, Jun 2016
- Machine Learning for High Energy Physics, Lund, Sweden, Jun 2016
- Heavy Flavour Data Mining workshop, Zurich, Switzerland, Feb 2016
- Open Data Science @ Sheffield workshop, Sheffield, UK, Dec 2015
- High Tech Campus Technology Seminar, Eindhoven, The Netherlands, Nov 2015
- Intelligent Data Analysis 2015 (IDA), Horizon Talk, St Etienne, France, Oct 2015
- Department of Computer Science, Robert Gordon University, Aberdeen, UK, Aug 2015
- Statistical Computing (StatComp), Ulm, Germany, Jul 2015
- International Conference on Machine Learning (ICML) AutoML Workshop, Lille, France, Jul 2015
- INRIA, Université Paris-Saclay, Paris, France, Nov 2014
- European Conference on Data Analysis (ECDA), Bremen, Germany, Jul 2014
- Department of Computer Science, TU Dortmund, Germany, Jan 2014
- SIS Classification and Data Analysis Group Conference (CLADAG), Modena, Italy, Sep 2013
- Dutch Hadoop User Group (NL-HUG), Amsterdam, The Netherlands, Apr 2012
- Department of Computer Science, University of Waikato, Hamilton, New Zealand, Feb 2011

Video's available on <http://www.win.tue.nl/~jvanscho>

Society Membership

- OpenML steering committee member, Mar 2017 - ...
- Co-chair of the W3C ML-Schema Community Group, Oct 2015 - ...
- Senior member of the Dutch School for Information and Knowledge Systems (SIKS), Jan 2014 - ...

Conference and Reviewing Activities

Conference organization:

- Industry Track Chair, BeNeLearn 2017, Eindhoven, The Netherlands
- General Chair, Learning and Intelligent OptimizatioN Conference (LION 2016), Ischia, Italy
- Associate Chair (Demo track), European Conference on Machine Learning (ECMLPKDD 2013), Prague, Czech Republic
- Program Chair, BeNeLearn 2011, The Hague, The Netherlands
- Program Chair, BeNeLearn 2010, Leuven, Belgium

Conference Workshop chair:

- Automatic Machine Learning, ICML 2017, Sydney, Australia
- Automatic Machine Learning, ECMLPKDD 2017, Skopje, Macedonia
- The Data Science Process, DALI 2017, Tenerife, Spain
- Automatic Machine Learning, ICML 2016, New York, USA
- Meta-Learning and Algorithm Selection, ECMLPKDD 2015, Porto, Portugal
- Meta-Learning and Algorithm Selection, ECAI 2014, Montpellier, France
- Learning from Unexpected Results, ECMLPKDD 2012, Bristol, UK
- Planning to Learn, ECAI 2012, Montpellier, France

Other workshops and hackathons

- Open Machine Learning Workshop (OpenML 2017), Lorentz Center, Leiden, The Netherlands
- Open Machine Learning Workshop (OpenMLdev 2017), Munich, Germany
- Open Machine Learning Workshop (OpenMLdev 2016), Eindhoven, The Netherlands
- Configuration and Selection of Algorithms (COSEAL 2016), Eindhoven, The Netherlands
- Open Machine Learning Workshop (OpenML 2016), Lorentz Center, Leiden, The Netherlands
- Open Machine Learning Workshop (OpenML 2015), Eindhoven, The Netherlands

Conference Program Committee Member:

- Neural Information Processing Systems (NIPS 2016-2017)
- European Conference on Machine Learning (ECML-PKDD 2012-2017)
- Machine Learning Conference of Belgium and The Netherlands (BeneLearn 2010-2017)
- European Conference on Artificial Intelligence (ECAI 2014-2016)
- ACM SIGKDD Conference on Knowledge Discovery and Data Mining (KDD 2016)
- Learning and Intelligent OptimizatioN Conference (LION 2016)
- International Joint Conference on Neural Networks (IJCNN 2015)
- International Joint Conference on Artificial Intelligence (IJCAI 2015)
- Extended Semantic Web Conference (ESWC 2011-2015)
- International Conference on Knowledge Discovery and Information Retrieval (KDIR 2010-2012)

Journal referee for:

- Machine Learning Journal (MLJ)
- Journal of Machine Learning Research (JMLR)
- Data Mining and Knowledge Discovery (DaMi)
- Semantic Web Journal (SWJ)
- Computational Intelligence (COIN)

Invited Participant:

- Dagstuhl International Research Center for Computer Science, 2016, Wadern, Germany
- Dagstuhl International Research Center for Computer Science, 2014, Wadern, Germany

Research Visits

- University of Waikato, New Zealand (August 14-19, 2017)
- Robert Gordon University, Aberdeen, UK (August 9-12, 2015)
- University of Bournemouth, UK (February 16-19, 2015)
- University of Paris-Sud, France (November 3-7, 2014)
- University of Dortmund, Germany (January 27-31, 2014)
- University of Waikato, New Zealand (February-March 2011)
- Universities of Geneva and Zurich, Switzerland (June 14-18, 2010)
- University of Porto, Portugal (June 7-11, 2010)
- University of Aberystwyth, UK (July-August, 2009)
- Jozef Stefan Institute, Slovenia (July 4-11, 2009)
- University of Waikato, New Zealand (March-June, 2008)
- University of Indiana, USA (August 2004)

Academic Supervision

Doctoral Advisor for PhD Students

- (Vacancy), Eindhoven University of Technology, 2017-...
- Chao Zhang, Eindhoven University of Technology, 2015-...
- Rafael Mantovani, PhD, University of Sao Paulo University, 2014-...
- Jan van Rijn, PhD, Leiden University, 2012-2016

PhD Committee Member

- Gitte Vanwinckelen, University of Leuven, Oct 2017
- Michel Camilleri, University of Malta, Nov 2016
- Jakub Šmíd, Charles University Prague, Sep 2016
- Bo Gao, University of Leuven, Dec 2015

PDEng Thesis supervision (Professional Doctorates)

- Karthik Srinivasan, PDEng, Preventing Burglaries and Other Incidents, TU Eindhoven, 2014-2015.

MSc Thesis supervision

- Hugo Spee, Deep reinforcement learning for automating machine learning, TU Eindhoven, 2017-2018
- Pieter Gijbbers, Automatic construction of machine learning pipelines, TU Eindhoven, 2016-2017
- Jeroen van Hoof, Optimus: An automated machine learning tool, TU Eindhoven, 2016-2017
- Joana Iljazi, Machine learning for vertical farming, TU Eindhoven - Philips, 2016-2017
- Aditya Bhadoria, Plant growth prediction using machine learning, TU Eindhoven - Philips, 2016-2017
- Shefali Chand, Anomaly detection in IoT systems, TU Eindhoven - Philips, 2016-2017
- Jun Lin, A course recommender system TU Eindhoven - StudyPortals, 2016-2017
- Sjoerd van Bavel, Predicting Heat Capacity in Greenhouses, TU Eindhoven, 2016-2017
- Roy Haanen, Predicting Aircraft Performance on Final Approach, TU Eindhoven, 2015-2016
- Chung-Kit Lee, Residential Burglary Prediction Model, TU Eindhoven - Interpolis, 2014-2015
- Hilda F. Bernard, Enhanced Sleepiness Prediction with Improved CASH, TU Eindhoven - Philips, 2015-2016
- Mikhail Evchenko. Frugal Learning, TU Eindhoven, 2015-2016
- Kris van Tienhoven, Gamification and Scientific Community Building, TU Eindhoven, 2015-2016
- Ruben Moonen, Object Recognition Framework using information retrieval and machine learning techniques, TU Eindhoven, 2013-2014
- Anton den Hoed, MapReduce Algorithms for Time Series Data, Leiden University, 2011-2012
- Mohammed Alaeikhaneshir, Data mining to improve customer service, Leiden University, 2011-2012
- Thomas De Craemer, Algorithm for a Recommendation Engine, Leuven University, 2010-2011
- Wouter Deroey, Semi-automated Corpus-based Ontology Population, Leuven University, 2010-2011
- Xushuang Gao, Active meta-learning, Leuven University, 2009-2010

- Bo Gao, Advanced visualizations for learning behavior, Leuven University, 2009-2010
- Jeroen Peelaerts, Visualizing learning behavior, Leuven University, 2007-2008
- Jan Callewaert, Simulating Biologically Inspired Brood Sorting in Ant-Like Agents, Leuven University, 2005 - 2006
- Anton Dries, DM^2 , Analysis of Data Mining Results Through Data Mining, Leuven University, 2005 - 2006

Industrial internship supervision

- Martijn Knippenberg, Fujitsu Research, 2016-2017
- Lian Zitong, Philips Research, 2015-2016
- Nitin Narayan, Philips Research, 2015-2016
- Hilda F. Bernard, Philips Research, 2015-2016

Teaching Activities

Bachelor-level Teaching:

- Data Mining, Jheronimus Academy of Data Science (JADS), The Netherlands (2016 - ...)
 - Responsible lecturer. 1st year Bachelor course. Introduction to data mining and machine learning
 - Student evaluation: 80% (teaching), 84% (course) - among highest
- Web Technology, Eindhoven University of Technology, The Netherlands (2014 - ...)
 - Responsible lecturer. 2nd year Bachelor course. Theory and practice of developing web apps and APIs (HTML/CSS/JS, REST, Angular, Node.js, Django)
 - Student evaluation: 72% (teaching), 69% (course)
- Web Analytics, Eindhoven University of Technology, The Netherlands (2014 - ...)
 - Instructor. 2nd year Bachelor course. Introductory course in web analysis and data mining. Includes a data mining challenge (using OpenML.org) and MapReduce-based social network analysis.
 - Student evaluation: 72%
- Data Mining, Leiden University, The Netherlands (2011 - 2014)
 - Lecturer. 3rd year Bachelor course, Dutch. Theory of machine learning and data mining techniques and practical assignment in the form of a data mining challenge. 6 ECTS-credits.
 - Student evaluation: 76%

Master-level Teaching:

- Foundations of Data Mining, Eindhoven University of Technology, The Netherlands (2015 - ...)
 - Responsible lecturer. 1st year Master course. Theory and practice of designing, using and evaluating machine learning algorithms.
 - Student evaluation: 75% (teaching), 78% (course) - among highest
- Web-scale Information Systems, Eindhoven University of Technology, The Netherlands (2014 - 2015)
 - Responsible lecturer. 1st year Master course. Theory and practice of developing scalable web architectures (search engines, recommendation systems, social network analysis, MapReduce)
 - Student evaluation: 77%

Advanced courses for PhD students:

- SURFsara Research Bootcamp, Eindhoven University of Technology (2017). 20 students.
- Introduction to Machine Learning, Geilo Winter School, Norway (2017). 128 students.
- Data Mining for Data Scientists, Eindhoven University of Technology (2015). 30 students.

Conference Tutorials:

- Automatic Machine Learning (ECMLPKDD, 2017)
- Connecting R to the Machine Learning Platform OpenML (UseR, 2017)
- Meta-learning and Algorithm Selection (ECMLPKDD, 2015)
- Meta-learning and Algorithm Selection (ECAI, 2014)

Other:

- Student coach for Bachelor students, Eindhoven University of Technology (2015-...)
 - Guide students through first years, discuss their ambitions in small groups
- Mentor for Master students, Eindhoven University of Technology (2015-...)
 - Orientation towards future ambitions, aligning coursework, help with (international) internships
- Learning Analytics Project ‘Vak voor Vak’ (2011-2012)
 - Development of online dashboard for teacher evaluations. SURF Learning Analytics Research grant.
- Teaching Assistant, University of Leuven, 2005-2010
 - Artificial Intelligence, University of Leuven, 2007-2010
 - Machine Learning and Inductive Inference, University of Leuven, 2006-2007
 - Software Methodology, University of Leuven, 2005-2006

Publications

All full texts available on <http://www.win.tue.nl/~jvanscho>

(* Joint first author, 25+ citations)

Refereed Articles (Journal and Conference papers)

1. van Rijn, J.N., Holmes, G., Pfahringer, B., Vanschoren, J. (2017) Heterogeneous Ensembles for Data Streams. *Machine Learning* (Accepted)
2. Olier, I., Sadawi, N., Bickerton, G.R., Vanschoren, J., Grosan, C., Soldatova, L., King, R.D. (2017) Meta-QSAR: learning how to learn QSARs. *Machine Learning* (Accepted)
3. Abdulrahman, S, Brazdil, P., van Rijn, J.N., Vanschoren, J. (2017) Speeding up Algorithm Selection via Meta-learning and Active Testing. *Machine Learning* (Accepted)
4. Mantovani, R.G., Horvath, T., Cerri, R., Vanschoren, J., Carvalho, A.P.L.F. (2017) Tuning Trees: on hyperparameter optimization for decision trees, *Applied Soft Computing* (Accepted)
5. Casalicchio, G., Hofner, B., Lang, M., Kirchoff, D., Kerschke, P., Seibold, H., Bossek, J., Vanschoren, J., Bischl, B. (2017) OpenML: An R Package to Connect to the Networked Machine Learning Platform. *Computational Statistics* 32 (3), 1-15
6. Mantovani, R.G., Horvath, T., Cerri, R., Carvalho, A.P.L.F., Vanschoren, J. (2016) Hyper-parameter Tuning of a Decision Tree Induction Algorithm, *Brazilian Conference on Intelligent Systems (BRACIS 2016)*
7. Eerikainen, L.M., Vanschoren, J., Rooijakkers, M.J., Vullings, R., Aarts, R.M. (2016) Reduction of false arrhythmia alarms using signal selection and machine learning. *Physiological Measurement*, 37 (8), 1204-1216
8. **Bischl, B., Kerschke, P., Kotthoff, L., Lindauer, M., Malitsky, Y., Frechette, A., Hoos, H., Hutter, F., Leyton-Brown, K., Tierney, K., Vanschoren, J. (2016) ASlib: A Benchmark Library for Algorithm Selection. *Artificial Intelligence*, 237, 41-58**
9. Gao, B., Berendt, B. and Vanschoren, J. (2016) Towards understanding online sentiment expression. An interdisciplinary approach with subgroup comparison and visualization. *Social Network Analysis and Mining*, 6 (1), 68:1-68:16
10. van Rijn, J.N., Abdulrahman, S.M., Brazdil, P. and Vanschoren, J. (2016) On the Evaluation of Algorithm Selection Problems. *Machine Learning Conference of Belgium and The Netherlands*, 1-2.
11. van Rijn, J.N., Holmes, G., Pfahringer, B., Vanschoren, J. (2015) Having a Blast: Meta-Learning and Heterogeneous Ensembles for Data Streams. *IEEE Proceedings of ICDM 2015*, 1003-1008.
12. Vanschoren, J., Bischl, B., Hutter, F., Sebag, M., Keggl, B., Schmid, M., Napolitano, G., Wolstencroft, K., Williams, A.R, and Lawrence, N (2015) Towards a Data Science Collaboratory. *Lecture Notes in Computer Science* (IDA 2015), 9385, XIX-XXI
13. van Rijn, J.N., Abdulrahman, S.M., Brazdil, P. and Vanschoren, J. (2015) Fast Algorithm Selection Using Learning Curves. *Lecture Notes in Computer Science* (IDA 2015), 9385, 298-309
14. Eerikainen, L.M., Vanschoren, J., Rooijakkers, M.J., Vullings, R., Aarts, R.M. (2015) Decreasing the False Alarm Rate of Arrhythmias in Intensive Care Using a Machine Learning Approach. *IEEE Computing in Cardiology*, 42, 293-297
15. Vanschoren, J., van Rijn, J.N. and Bischl, B. (2015) Taking machine learning research online with OpenML. *JMLR Workshop and Conference Proceedings* (BigMine 2015), 41, 1-4.
16. van Rijn, J.N., Holmes, G., Pfahringer, B., Vanschoren, J. (2015) Case Study on Bagging Stable Classifiers for Data Streams. *Machine Learning Conference of Belgium and The Netherlands*, 1-6.
17. Gao, B., Berendt, B. and Vanschoren, J. (2015) Who is more positive in private? Analyzing sentiment differences across privacy levels and demographic factors in Facebook chats and posts. *IEEE/ACM Proceedings of ASONAM 2015*, 605-610
18. Mantovani, R.G., Rossi, A.D.L, Vanschoren, J., Bischl, B., Carvalho A.C.P.L.F. (2015) To tune or not to tune: recommending when to adjust SVM hyper-parameters via Meta-learning. *IEEE Proceedings of the International Joint Conference on Neural Networks (IJCNN 2015)*, 1-8
19. Mantovani, R.G., Rossi, A.D.L, Vanschoren, J., Bischl, B., Carvalho A.C.P.L.F. (2015) Effectiveness of Random Search in SVM hyper-parameter tuning. *IEEE Proceedings of the International Joint Conference on Neural Networks (IJCNN 2015)*
20. van Rijn, J.N., Holmes, G., Pfahringer, B. and Vanschoren, J. (2014) Algorithm Selection on Data Streams. *Lecture Notes in Computer Science* (Discovery Science), 8777, 325-336.
21. **Vanschoren, J., van Rijn, J.N., Bischl, B. and Torgo, L. (2013) OpenML: networked science**

- in machine learning. *ACM SIGKDD Explorations*, 15 (2), 49-60.
22. van Rijn, J., Bischl, B., Torgo, L., Gao, B., Umaashankar, V., Fischer, S., Winter, P., Wiswedel, B., Berthold, M.R., and Vanschoren, J. (2013) OpenML: A Collaborative Science Platform. *Lecture Notes in Computer Science (ECML PKDD 2013)*, 8190, 645-649
 23. Vanschoren, J., Braun, M. and Ong, C.S. (2013) Open science in machine learning. *Proceedings of CLADAG 2013*, 462-465. ISBN: 9788867871179
 24. van Rijn, J., Umaashankar, V., Fischer, S., Bischl, B., Torgo, L., Gao, B., Winter, P., Wiswedel, B., Berthold, M.R., and Vanschoren, J. (2013) A RapidMiner extension for Open Machine Learning. *Proceedings of RCOMM 2013*, 59-70. ISBN: 978-3-8440-2145-5
 25. Serban, F.*, Vanschoren, J.*, Kietz, J.U. and Bernstein, A. (2012) A Survey of Intelligent Assistants for Data Analysis. *ACM Computing Surveys*, 45 (3), Art. 31
 26. Vanschoren, J., Blockeel, H., Pfahringer, B. and Holmes, G. (2012) Experiment Databases: A new way to share, organize and learn from experiments. *Machine Learning*, 87(2), 127-158
 27. Reutemann, P., Vanschoren, J. (2012) Scientific Workflow Management with ADAMS. *Lecture Notes in Computer Science (ECML PKDD 2012)*, 7524, 833-837
 28. Vespier, U., Knobbe, A.J., Nijssen, S., Vanschoren, J. (2012) MDL-Based Analysis of Time Series at Multiple Time-Scales. *Lecture Notes in Computer Science (ECML PKDD 2012)*, 7524, 371-386
 29. Leite, R., Brazdil P., Vanschoren, J. (2012) Selecting Classification Algorithms with Active Testing. *Lecture Notes in Computer Science (MLDM 2012)*, 7376, 117-131
 30. Gao, B. and Vanschoren, J. (2011) Visualizations of Machine Learning Behavior with Dimensionality Reduction Techniques. *Machine Learning Conference of Belgium and The Netherlands*, 35-42.
 31. Vespier, U., Knobbe, A., Vanschoren, J., Miao, S., Koopman, A., Obladen, B., and Bosma, C. (2011) Traffic Events Modeling for Structural Health Monitoring. *Lecture Notes in Computer Science (IDA 2011)*, 7014, 276-387
 32. Vanschoren, J., Soldatova, S. (2010). Exposé: An Ontology for Data Mining Experiments. *Workshop on Third Generation Data Mining at ECML PKDD 2010*, 31-46.
 33. Vanschoren, J., Blockeel, H. (2009). A community-based platform for machine learning experimentation. *Lecture Notes In Computer Science (ECML-PKDD 2009)*, 5782, 750-754 - Best demo award
 34. Vanschoren, J., Pfahringer, B., Holmes, G. (2008). Learning from the past with experiment databases. *Lecture Notes in Artificial Intelligence (PRICAI 2008)*, 5351, 485-496
 35. Vanschoren, J., Blockeel, H., Pfahringer, B., Holmes, G. (2008). Organizing the world's machine learning information. *Comm. in Computer and Information Science (ISOLA 2008)*, 17, 693-708
 36. Vanschoren, J. (2008). Experiment databases for machine learning. *NIPS Workshop on Machine Learning Open Source Software at NIPS 2008*.
 37. Vanschoren, J., Blockeel, H. (2008). Investigating classifier learning behavior with experiment databases. *Data Analysis, Machine Learning and Applications (GfKL 2007)*, 421-428
 38. Blockeel, H.*, Vanschoren, J.* (2007). Experiment databases: Towards an improved experimental methodology in machine learning. *Lecture Notes in Computer Science (ECML 2007)*, 4702, 6-17. (Best Demo Award)
 39. Vanschoren, J., Van Assche, A., Vens, C., Blockeel, H. (2007). Meta-learning from experiment databases: An illustration. *Machine Learning Conference of Belgium and The Netherlands*, 120-127.
 40. Vanschoren, J., Blockeel, H. (2006). Towards understanding learning behavior. *Machine Learning Conference of Belgium and The Netherlands*, 89-96.

Refereed Workshop Articles and Abstracts

41. Gijssbers, P., Vanschoren, J., Olson, R.S. (2017) Layered TPOT: Speeding up Tree-based Pipeline Optimization. *Proceedings of the 2017 ECMLPKDD AutoML Workshop*.
42. Lawrynowicz, A., Esteves, D., Panov, P., Soru, T., Dzeroski, S., Vanschoren, J (2016) An Algorithm, Implementation and Execution Ontology Design Pattern. *ISWC Workshop on Ontology and Semantic Web Patterns: 1-12*
43. Bernard, H. F., Heinrich, A., Vanschoren, J. (2016) Improved driver sleepiness prediction with CASH. *European Data Forum 2016*.
44. Zhang, C., van Wissen, A., Lakens, D., Vanschoren, J., de Ruyter, B.E.R., IJsselsteijn, W.A. (2016) Anticipating habit formation: a psychological computing approach to behavior change support. *UbiComp Adjunct 2016*: 1247-1254
45. Bischl, B., Bossek, J., Casalicchio, G., Hofner, B., Kerschke, P., Kirchhoff, D., Lang, M., Seibold, H., Vanschoren, J. (2016) Connecting R to the OpenML project for Open Machine Learning. *useR Conference*

2016.

46. Abdulrahman, S, Brazdil, P., van Rijn, J.N., Vanschoren, J. (2015) Algorithm Selection via Meta-learning and Sample-based Active Testing. *CEUR Workshop Proceedings* (ECMLPKDD 2015 Workshop on Meta-learning and Algorithm Selection), 1455, 55-66
47. Mantovani, R.G., Rossi, A.L.D., Vanschoren, J., Carvalho, A.C.P.L.F. (2015) Meta-learning Recommendation of Default Hyper-parameter Values for SVMs in Classification Tasks. *CEUR Workshop Proceedings* (ECMLPKDD 2015 Workshop on Metalearning and Algorithm Selection), 1455, 80-92
48. van Rijn, J.N., Vanschoren, J. (2015) Sharing RapidMiner Workflows and Experiments with OpenML. *CEUR Workshop Proceedings* (ECMLPKDD 2015 Workshop on Metalearning and Algorithm Selection), 1455, 93-103
49. Vukicevic, M., Radovanovic, S., Vanschoren, J., Napolitano, G., Delibasic, B. (2015) Towards a Collaborative Platform for Advanced Meta-Learning in Healthcare Predictive Analytics. *CEUR Workshop Proceedings* (MetaSel @ ECMLPKDD 2015), 1455, 112-114
50. Knobbe A.J., Meeng M. Vanschoren J., Rees Jones S., Merlo Penning S. (2015) Reconstructing Medieval Social Networks from English and Latin Charters. Population Reconstruction 2014
51. van Rijn, J.N., Holmes, G., Pfahringer, B. and Vanschoren, J. (2014) Towards Meta-learning on Data Streams. Workshop on Meta-learning and Algorithm Selection *CEUR Workshop Proceedings* (MetaSel @ ECMLPKDD 2014), 1201, 37-38.
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