Andreas Bloch
Machine Learning Enthusiast
Computer Scientist **ETH** *zürich*

«My passion is to solve challenging problems for business and humanity through the power of cutting-edge machine learning technologies.»

andreas.d.bloch@gmail.com ✉

+41 79 422 17 44 📱

Zürich, Switzerland 📍

17 May, 1988 🗓

linkedin.com/in/andreas-bloch in

andbloch.github.io ⌂

WORK EXPERIENCE

Associate IT Consultant
Orbium

10/2013 – 05/2014   *Zürich & Berlin*

Parametrization of the Avaloq Banking Suite (E-Banking, Output Management) for three major banks in Germany. Requirements engineering in close collaboration with the clients.

Technologies: Avaloq, PL/SQL, XML

Research Assistant
ZHAW

05/2013 – 07/2013   *Winterthur*

Continuation of bachelor thesis: Implementation of a system for transportation mode detection (Android app and server app) for SBB and Swisscom. Conduction of software engineering trainings.

Technologies: Java (Spring Framework, WEKA Machine Learning Library), Android (Spring Mobile), MySQL

Web Developer
ZHAW & Press Play

12/2012 – 02/2013   *Winterthur*

Implementation of the website for the event and live voting of the Swiss Music Awards of 2013. Desktop and mobile client via responsive design.

Technologies: PHP (Drupal), JavaScript (jQuery), CSS (LESS), HTML

Junior Software Engineer
Namics

06/2012 – 09/2012   *St. Gallen*

Internship in software engineering: Integration of a rule-engine into the Swissport Lounge Check-in System.

Technologies: Java (Spring Framework, Hibernate, OpenRules), MySQL, HTML, JavaScript (jQuery)

Specialist Consumer Finance
Credit Suisse (Bank-now)

05/2008 – 08/2010   *Horgen*

Customer care for consumer credits in German, French, Italian and English.

Private Equity Salesman
Conseillers Suisse

11/2007 – 02/2008   *Zürich*

Cold calling for private equity investments in biodiesel companies.

Call Agent Outbound
RBC Solutions

01/2007 – 05/2007   *Feldmeilen*

Cold calling for Schuler wines, Landbote newspapers, AIG insurances.

SKILLS

Machine Learning   Deep Learning

Data Mining   Recommender Systems

Natural Language Processing

Software Development   Consulting

CERTIFICATES

Avaloq Certified Professional (2013-2015)

HONOR AWARDS

ZHAW School of Management and Law
Dean's list for best graduation in Business Information Technology (09/2013)

LANGUAGES

English	*Full Professional Proficiency*
German	*Native Proficiency (Bilingual)*
Italian	*Native Proficiency (Bilingual)*
French	*Full Professional Proficiency*
Portuguese	*Professional Proficiency*

INTERESTS

Kitesurfing   Swimming   Barbecue

Artificial Intelligence   Technology

Mathematics   Socializing

PUBLICATIONS

Battery-Efficient Transportation Mode Detection on Mobile Devices
Andreas Bloch, Robert Erdin, Sonja Meyer, Thomas Keller, Alexandre de Spindler, *June 2015*, 16th IEEE International Conference on Mobile Data Management.

EDUCATION

B.Sc. Computer Science   (Grade: 5.46/6.0)
ETH Zürich

09/2014 – 09/2019

Thesis: Mixed-Curvature Space Representations for Recommender Systems

Specialization: Elective courses in machine learning, including

- Deep Learning
- Data Mining
- Machine Learning
- Visual Computing
- Probabilistic Artificial Intelligence
- Learning and Intelligent Systems
- Building a Robot Judge

B.A.Sc. Business Administration   (Grade: 5.65/6.0)
ZHAW School of Management and Law

09/2010 – 09/2013

Thesis: Battery-Efficient Transportation Mode Detection on Mobile Devices

Specialization: Business Information Technology

High School Diploma
High School of Küsnacht

08/2002 – 08/2006

Linguistic profile (Italian)

PERSONAL PROJECTS

- **Open Source Contribution:**
  Contribution of κ-stereographic model to the geometric optimization library geoopt.
- **Machine Learning Blog:**
  Publication of several blogposts about topics in machine learning on andbloch.github.io.
- **Continuous Learning:**
  Regularly updating machine learning skills through research papers and online courses.

IT SKILLS IN DETAIL

Python
Pytorch, Tensorflow, Keras, Sklearn, Spacy, Numpy, Pandas, Matplotlib

Java
Spring, Hibernate, Android, Maven

C++, C, x86 Assembly
Eigen, OpenCV, OpenMP, MPI, OS Kernel Modules, IDA, GDB

Matlab

MySQL, PostgreSQL, PL/SQL

Amazon Web Services

Linux, Unix

PHP, HTML, CSS & JavaScript
Wordpress, Drupal, NodeJS, jQuery,Angular, WebGL, Less, Sass

Haskell