Erfurt, DE +49 151 46805589 hello@rahulbohare.com

Rahul Bohare

Senior Machine Learning Engineer

ABOUT ME

Curious software professional with >5 years of full-time experience specializing in building production-ready data science and machine learning end-to-end pipelines.

EDUCATION

TU München (2020)
M.Sc. Computer Science (GPA: 1,7)

SRM University, Chennai (2016)
B.Sc. Computer Science (GPA: 9.1/10)

LANGUAGES

English – native
Hindi – native
German – C1

TRAININGS

- MLOps – ML in Production Specialization @ Coursera
- Generative AI with LLM (AWS Course) @ Coursera
- Deep Learning Specialization @ Coursera

WORK EXPERIENCE

SENIOR ML ENGINEER, WAIYS GmbH
11/2025 - today
Leading end-to-end AI project delivery and platform development teams for enterprise clients.

SOFTWARE ENGINEER, Robert Bosch GmbH
06/2022 – 10/2025
Focused on delivering data-driven AI solutions to various clients in diversified industries.

MACHINE LEARNING ENGINEER, Spleenlab GmbH
10/2020 – 05/2022
Responsible for the development and maintenance of the visual perception pipeline using deep neural networks.

TEACHING ASSISTANT, CHAIR OF DATA ANALYTICS AND MACHINE LEARNING, TU München
10/2019 – 04/2020
TA for *IN2064: Machine Learning* for one semester. Graded weekly homework assignments helped organize the final exam and graded it.

TEACHING ASSISTANT, CHAIR OF DYNAMIC VISION AND LEARNING, TU München
12/2017 – 09/2019
TA for IN2346: Introduction to Deep Learning for four semesters. Held regular office hours, graded homework assignments, helped organize the exams, and graded them.

WORKING STUDENT, Osram GmbH
05/2017 – 12/2018
Developed and configured various detection models on Jetson embedded devices based on then-state-of-the-art architectures (ResNet, VGG among others).

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PROJECTS

LEADING DEVELOPMENT OF A PERSONAL AI ASSISTANT PLATFORM, WAIYS

11/2025 - present

Building an enterprise WhatsApp-based AI agents for real-time data querying and business intelligence at DAMAC Properties. Overseeing end-to-end development of multi-agent RAG system with 95% accuracy SLA, integrating Monday.com, CRM, and proprietary market intelligence platforms.

Tools: Azure (AI Foundry, Document Intelligence, AI Search, PostgreSQL, Monitor), Python, Redis

DEVELOPING AZURE DOCUMENT INTELLIGENCE RAG PIPELINE, WAIYS

11/2025 - present

Architected a production-grade document processing system from system design to implementation using Azure DI, OpenAI embeddings, and AI Search to extract and index content from image-embedded PDFs, achieving 95% pipeline reliability with comprehensive cost/latency metrics across 8 integrated Azure services.

Tools: Azure (Blob, Document Intelligence, OpenAI, AI Search, AI Language, Monitor etc), Python, Langchain

STREAMLINED VERSION MANAGED SHIPPING ACROSS ORGANIZATIONAL CODEBASE, WAIYS

11/2025 - 12/2025

*Implemented automated semantic versioning for the org's repositories to replace brittle manual tag management, using a **manual-trigger + semantic-release** approach where merges to main branch happen freely while Product Managers control release timing via a manual GitLab CI job automatically calculating version bumps (patch/minor/major) from commit history.*

Tools: Giltab CI/CD Pipelines, semantic-release, Python

DEVELOPING AN AI ONBOARDING ASSISTANT, Bosch

06/2025 – 10/2025

Led development of a Large Language Model based AI assistant leveraging Retrieval-Augmented Generation (RAG) framework, with OpenWebUI tools and asynchronous Python libraries to dynamically generate structured project guides tailored to various team roles.

Tools: Python, httpx, async-lru, pydantic, OpenWebUI

BUILDING AN RAG SYSTEM WITH LLMS, Bosch

07/2024 – 10/2025

Integrated various LLMs with the company's proprietary knowledge base to provide natural language query results to our colleagues, plus evaluating the results on several qualitative and quantitative metrics.

Tools: Python, Docker, FastAPI, Confluence API, OpenAI API, PyTest, ChromaDB, Sphinx, CodeQL, RAGAS

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TRAILER WEIGHT DETECTION PIPELINE, Hyundai Motor Company

10/2023 – 12/2024

Acted as a consultant in developing an easily configurable trailer weight detection pipeline using novel neural network architectures and deployed the model on NVIDIA's embedded System-on-a-chip module to enable real time solution.

Tools: Python, TensorFlow, Conda, NVIDIA Jetson, Keras, NumPy

AUTONOMOUS DRIVING PIPELINE DEVELOPMENT, Bosch

07/2022 – 07/2023

As part of the team classifying various light sources while driving an automobile, was responsible for configuring the label detection pipeline to be used in fine-tuning the model(s) on various light sources.

Tools: Python, C++, Gtest, Voxel51, AzureML, Docker

CELL TOWER ANOMALY DETECTION, Spleenlab

05/2021 – 08/2021

Responsible for training an object-based detection system to identify and locate any visible faults in the components of cell towers. Further deployed the model on a Jetson embedded device to be run in real-time. Achieved this using model quantization with TensorRT.

Tools: Python, NumPy, Conda, Docker, TensorRT

DRONE LANDING AREA DETECTION, Spleenlab

10/2020 – 06/2021

Researched, implemented, trained, and further fine-tuned state-of-the-art semantic segmentation and object detection models to classify an area of land as being safe for a drone landing. Further deployed the model on a Jetson embedded device by utilizing model distillation techniques thereby reducing the inference time of the model substantially.

Tools: Python, NumPy, Conda, Docker

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SKILLS

Programming Languages

Python	★★★★★
C++	★★★☆☆
MATLAB	★★☆☆☆
JavaScript	★★☆☆☆

Database & Query Languages

SQL	★★★★☆

Libraries, Tools & Frameworks

PyTorch	★★★★☆
TensorFlow	★★★★☆
OpenCV	★★★★☆
Scikit-Learn	★★★★☆
ROS	★★★★☆
Git	★★★★☆
Conda	★★★★☆
Docker	★★★★☆
Pandas	★★★★☆
Keras	★★★★☆
Jenkins (CI/CD)	★★★★☆
OpenWebUI	★★★★☆
Azure	★★★★☆
FastAPI	★★☆☆☆
Kubernetes	★★☆☆☆
PySpark	★★☆☆☆
LLM APIs:	★★★☆☆
OpenAI	★★★★☆
Langchain	★★★★☆
Huggingface	★★☆☆☆

Operating Systems

Linux	★★★★★
Windows	★★★★★
MacOS	★★★★☆

Embedded Systems

Nvidia Jetson	★★★★☆
Google TPU	★★☆☆☆

Technische Universität München

With this diploma the
Technische Universität München
awards

Mr.

RAHUL BOHARE

born 2 November 1993 in Bhind, Madhya Pradesh

the academic title

MASTER OF SCIENCE

(M.Sc.)

for demonstrating completion of the associated academic requirements and successfully completing the master's examination at the Technische Universität München.
This academic title may also include the name of the awarding university:
"MASTER OF SCIENCE (TUM)" or "M.Sc. (TUM)"

The result of the master's examination has been compiled in the certificate.

München, 17 February 2020

(signed by)

Prof. Dr. Thomas F. Hofmann
President

Technische Universität München

Die
Technische Universität München
verleiht mit dieser Urkunde

Herrn
RAHUL BOHARE
geboren am 2. November 1993 in Bhind, Madhya Pradesh

den akademischen Grad
MASTER OF SCIENCE
(M.Sc.)

nachdem er die vorgeschriebenen wissenschaftlichen Studienleistungen nachgewiesen und die Masterprüfung an der Technischen Universität München erfolgreich abgelegt hat.
Dieser akademische Grad kann auch mit der Herkunftsbezeichnung geführt werden:
"MASTER OF SCIENCE (TUM)" bzw. "M.Sc. (TUM)"

Das Ergebnis der Masterprüfung ist im Zeugnis dokumentiert.

München, 17. Februar 2020

Prof. Dr. Thomas F. Hofmann
Präsident

Transcript of Records

Technische Universität München

Familienname/Family Name:
Bohare

Vorname(n)/First Name(s):
Rahul

Geburtsdatum/Date of Birth:
2. November 1993
2 November 1993

Geschlecht/Gender:
männlich
male

Geburtsort/Place of Birth:
Bhind, Madhya Pradesh

Matrikelnummer/Student ID Number:
03680963

Studiengang/Degree Program:
Informatik
Informatics

Akademischer Grad/Academic Title:
Master of Science (M.Sc.)

Zeugnisdatum/Certificate Date:
17. Februar 2020
17 February 2020

Gesamtnote und -credits: Overall Grade and Credits:	**1,7**	**123**
Prädikat: Designation:	**gut bestanden** passed with merit	

Modul-ID Module ID	**Modulbezeichnung** Module Title	**Note** Grade	**Credits** Credits	
Master's Thesis Master's Thesis				
IN2108	Master's Thesis Master's Thesis	2,0	30	
	Thema: Bewertung der Eigenschaften von mHealth Feedback in mobilen Ernährungsanwendungen Die Thesis wurde in englischer Sprache verfasst. Topic: Evaluation of mHealth Feedback Characteristics in Mobile Nutrition Applications The thesis was written in English.			

Modul-ID Module ID	Modulbezeichnung Module Title	Note Grade	Credits Credits	
Master-Praktikum **Advanced Practical Course**				
IN2106	Master-Praktikum Advanced Practical Course Praktikum - Roboy Student Team Advanced Practical Course - Roboy Student Team	1,0	10	
Master-Seminar **Advanced Seminar Course**				
IN2107	Master-Seminar Advanced Seminar Course Seminar Deep Learning for Medical Applications Advanced Seminar Course Deep Learning for Medical Applications	1,3	5	
Interdisziplinäres Projekt **Interdisciplinary Project**				
IN2334	Interdisziplinäres Projekt in einem Anwendungsfach Interdisciplinary Project in an Application Subject Anwendung von Predictive Modeling auf Entwicklungen im Immobilienmarkt Application of Predictive Modeling on Development in the Real Estate Market	1,0	16	
Wahlmodulkatalog Informatik **Elective Modules Informatics**				
Algorithmen und Wissenschaftliches Rechnen (AWR) **Algorithms and Scientific Computing**				
IN2322	Protein Prediction I for Computer Scientists Protein Prediction I for Computer Scientists	1,7	8	
Computergrafik und -vision (CGV) **Computer Graphics and Vision**				
IN2346	Introduction to Deep Learning Introduction to Deep Learning	1,0	6	
IN2364	Advanced Deep Learning for Computer Vision Advanced Deep Learning for Computer Vision	2,7	8	
Künstliche Intelligenz und Robotik (KIR) **Artificial Intelligence and Robotics**				
IN2067	Robotik Robotics	2,0	6	
IN2064	Maschinelles Lernen Machine Learning	3,7	8	
IN2222	Kognitive Systeme Cognitive Systems	2,0	5	

Modul-ID Module ID	Modulbezeichnung Module Title	Note Grade	Credits Credits	
Verteilte Systeme, Rechnernetze und Sicherheit (VRS) **Distributed Systems, Computer Networks, and Security**				
IN2119	Benutzermodellierung und Recommendersysteme User Modeling and Recommender Systems	1,0	5	
Wahlmodule ohne Zuordnung zu einem Fachgebiet **Elective Modules not Assigned to any Area**				
IN2169	Forschungsarbeit unter Anleitung Guided Research Lineare und Quadratische Programmierung mit tiefen neuronalen Netzen Linear and Quadratic Programming Using Deep Neural Networks	1,3	10	
Wahlkatalog Überfachliche Grundlagen **Support Electives**				
SZ0303	Deutsch als Fremdsprache A2.1 German as a Foreign Language A2.1	1,7	6	

Der Vorsitzende des Prüfungsausschusses
Chair, Examination Board

Prof. Dr. Bernd Brügge

Zentrale Prüfungsangelegenheiten
Central Examination Office

Ulrike Scholz

Erläuterungen

1. Die Bewertung der Modulprüfungen wird durch folgende Noten ausgedrückt:

   Note 1 "sehr gut"
   Note 2 "gut"
   Note 3 "befriedigend"
   Note 4 "ausreichend"
   Note 5 "nicht ausreichend"

   Zur differenzierteren Bewertung können die Notenziffern um 0,3 erniedrigt oder erhöht werden.

   Die Note 4,3 gilt als "nicht ausreichend".
   Die Noten 0,7 und 5,3 sind ausgeschlossen.

2. Die Modulnote lautet

   von 1,0 bis 1,5 "sehr gut"
   von 1,6 bis 2,5 "gut"
   von 2,6 bis 3,5 "befriedigend"
   von 3,6 bis 4,0 "ausreichend"
   von 4,1 bis 5,0 "nicht ausreichend"

   Wird ein Modul durch Modulteilprüfungen abgeschlossen, so errechnet sich die Modulnote aus dem gewichteten Durchschnitt der einzelnen Teilprüfungen. Die erste Stelle nach dem Komma wird berücksichtigt, alle weiteren werden ohne Rundung gestrichen.

3. Das Prädikat lautet bei einer Gesamtnote

   von 1,0 bis 1,2 "mit Auszeichnung bestanden"
   von 1,3 bis 1,5 "sehr gut bestanden"
   von 1,6 bis 2,5 "gut bestanden"
   von 2,6 bis 3,5 "befriedigend bestanden"
   von 3,6 bis 4,0 "bestanden"

4. Bei der Berechnung der Gesamtnote wird nur die erste Nachkommastelle berücksichtigt. Genauere Informationen zur Gewichtung der Modulnoten und zur Berechnung der Gesamtnote sind in der Fachprüfungs- und Studienordnung (FPSO) für diesen Studiengang zu finden.

5. Folgende weitere Abkürzungen und Begriffe wurden in diesem Dokument verwendet:
   BE: bestanden
   Credits: gemäß dem European Credit Transfer System (ECTS) Maßeinheit für die Arbeitsbelastung eines Studierenden; ein Credit entspricht der Arbeitszeit von 30 Stunden

6. Das Zeugnisdatum entspricht dem Datum der letzten Leistung.

7. *) = anerkannt
   **) = enthält anerkannte Leistungen

Explanations

1. The grades for module examinations are assigned according to the following scale:

   grade 1 "very good"
   grade 2 "good"
   grade 3 "satisfactory"
   grade 4 "sufficient"
   grade 5 "fail"

   For the purpose of a more differentiated assessment, the above grades may be raised or lowered by 0,3.

   A grade of 4,3 means "fail".
   The grades 0,7 and 5,3 are not possible.

2. The module grade is assigned according to the following scale:

   1,0 to 1,5 "very good"
   1,6 to 2,5 "good"
   2,6 to 3,5 "satisfactory"
   3,6 to 4,0 "sufficient"
   4,1 to 5,0 "fail"

   If completion of a module requires more than one examination component, the grade for the module represents the weighted average of the individual examination components. The first decimal place following the decimal separator will be taken into account without rounding. All subsequent decimal places are insignificant.

3. The designation is awarded according to the following scale:

   1,0 to 1,2 "passed with high distinction"
   1,3 to 1,5 "passed with distinction"
   1,6 to 2,5 "passed with merit"
   2,6 to 3,5 "passed"
   3,6 to 4,0 "conceded pass"

4. The first decimal place following the decimal separator will be taken into account in calculating the overall grade. The Academic and Examination Regulations (FPSO) of the relevant degree program contain detailed information regarding the weighting of module grades and the calculation of the overall grade.

5. The following additional abbreviations and terms were used in this document:
   BE: pass
   Credits: a unit of measure within the European Credit Transfer System (ECTS) representing student workload. A credit is equal to 30 hours of work.

6. The certificate date is identical to the date of completion of the last exam.

7. *) = accredited
   **) = contains accredited exams

Technische Universität München

Transcript of Records: Zusatzleistungen

Transcript of Records: Additional Exams

Familienname/Family Name:
Bohare

Vorname(n)/First Name(s):
Rahul

Geburtsdatum/Date of Birth:
2. November 1993
2 November 1993

Geschlecht/Gender:
männlich
male

Geburtsort/Place of Birth:
Bhind, Madhya Pradesh

Matrikelnummer/Student ID Number:
03680963

Studiengang/Degree Program:
Informatik
Informatics

Akademischer Grad/Academic Title:
Master of Science (M.Sc.)

Zeugnisdatum/Certificate Date:
17. Februar 2020
17 February 2020

Modul-ID **Module ID**	**Modulbezeichnung** **Module Title**	**Note** **Grade**	**Credits** **Credits**
Zusatzfächer **Additional Examinations**			
	Blockkurs Deutsch als Fremdsprache A1.2 Intensive Course German as a Foreign Language A1.2	1,7	4
	Grundlagen der Künstlichen Intelligenz Techniques in Artificial Intelligence	2,7	5
	Blockkurs Deutsch als Fremdsprache B1.1 Intensive Course German as a Foreign Language B1.1	4,0	4
	Deutsch als Fremdsprache A2.2 German as a Foreign Language A2.2	3,0	6
	Blockkurs Deutsch als Fremdsprache B1.2 Intensive Course German as a Foreign Language B1.2	3,0	4

Erläuterungen/Explanations:

Notenskala: 1,0-1,5 sehr gut, 1,6-2,5 gut, 2,6-3,5 befriedigend, 3,6-4,0 ausreichend, 4,1-5,0 nicht ausreichend
Grades: 1,0-1,5 very good, 1,6-2,5 good, 2,6-3,5 satisfactory, 3,6-4,0 sufficient, 4,1-5,0 fail

Bewertung von Studienleistungen: BE = bestanden NB = nicht bestanden
Performance Key: BE = pass NB = fail

Credits: Gemäß dem European Credit Transfer System (ECTS) Maßeinheit für die Arbeitsbelastung eines Studierenden; ein Credit entspricht der Arbeitszeit von 30 Stunden.
Credits: a unit of measure within the European Credit Transfer System (ECTS) representing student workload. A credit is equal to 30 hours of work.

Alle in dieser Anlage aufgeführten Ergebnisse gehen über die für das Bestehen des Studiengangs erforderlichen Leistungen hinaus. Die erzielten Noten und Credits fließen nicht in das Gesamtergebnis des Studiengangs ein.
The modules and courses listed on this document are not required for the successful completion of the degree program. As such, the grades and credits earned for these modules are not included in the calculation of the student's overall grade and credit total.