

Iman Malik

+447429052560 | imanmalik.com
imanadeemalik@gmail.com
21 • Female • Bristol, U.K

"I want to expand the state of the art in Artificial Creativity to help humans better express themselves. I believe in a future where humans and AI collaborate creatively."

EXPERIENCE

UNIVERSITY OF BRISTOL

RESEARCH ASSISTANT

Jul 2017 - Present

JP MORGAN CHASE & CO.

TECHNOLOGY SUMMER ANALYST

Jun - Aug 2016

EDUCATION

UNIVERSITY OF BRISTOL

MENG COMPUTER SCIENCE

Oct 2013 - Jun 2017

First Class Honours ≈ GPA 4.00

FOURTH YEAR

Robotic Systems
Cloud Computing
Algorithmic Aspects of the Internet
Learning in Autonomous Systems
Advanced Computer Architecture
Sustainability, Technology and Business

THIRD YEAR

High Performance Computing
Web Technologies
Computational Bioinformatics
Computational Neuroscience
Image Processing
Computer Graphics
Character and Set Design

SECOND YEAR

Signals, Patterns and, Symbols
Data Structures and Algorithms
Human Computer Interaction
Cognitive Psychology
Concurrent Computing
Networking
Operating Systems
Compilers

FIRST YEAR

Programming and Algorithms
Japanese
Biological Psychology

A-LEVEL/IGCSES

SELF-TAUGHT IN SAUDI ARABIA

Sept 2011 - June 2013

- AAAB in Mathematics, Physics, Chemistry and Biology A-Level.

- 6A*AB in English, Chemistry, Biology, Physics, Geography, ICT, Mathematics, and Urdu IGCSE.

TECHNICAL SKILLS

EXPERIENCED

Python • C • Tensorflow • Matlab • MPI • OpenCL
Bash • OpenMP • OpenCV • HTML & CSS • \LaTeX

FAMILIAR

Ruby on Rails • Haskell • R • JavaScript/Node.js
Java (+ Android SDK) • SQL

ACHIEVEMENTS

- 2017** Teaching Assistant for Computer Graphics
- 2016** Top marks in Computational Bioinformatics and Computer Graphics.
- 2014-16** E&D Officer of the Computer Science Society.
- 2014** Selected for the Schlumberger Women in Technology programme.
- 2013** Started university at the early age of 17.

RECENT PROJECTS

FINAL YEAR MASTER'S PROJECT

"NEURAL TRANSLATION OF MUSICAL STYLE"

Jan 2017 - May 2017

Working under supervision of Dr. Carl Henrik Ek to investigate whether it is possible for a suitable computational model to learn musical style and, successfully perform using sheet music. A neural network architecture called [StyleNet](#) was designed to learn musical style through the dynamics of music. A dataset called the Piano dataset was created for the purposes of learning musical style. The research concluded that StyleNet's musical performances successfully pass the musical Turing test; the designed architecture can successfully synthesise the dynamics of sheet music.

THIRD YEAR GAMES PROJECT

"ROLLOUT"

Sept 2015 - May 2016

Developed an augmented reality robot battle game in a team of six. The game included two spherical robots in a projected virtual arena. Challenges included producing a real-time tracking system using image processing while working within the constraints of the colours and objects in the game environment. Other contributions included game design, and creating a 3D sound system suitable for public showcasing.

GENETIC ALGORITHM PROJECT

Sept 2016 - Dec 2016

Researched, designed, and implemented a genetic algorithm for optimising the Capacitated Vehicle Routing Problem.

ROBOTICS PROJECT

Sept 2016 - Dec 2016

Developed a particle filter for localising a real-life robot.

HIGH PERFORMANCE COMPUTING PROJECT

Sept 2015 - Jan 2016

Optimised computationally expensive code for Lattice-Boltzmann problems using OpenMP, OpenMPI, and OpenCL on the university's supercomputer, BlueCrystal.

HOBBIES

DANCE

Performer in the Bollywood Dance Society.

MUSIC

Creating experimental/electronic music.

YOUTUBE

[Algorithm Channel](#) on YouTube.

REFERENCES

SUPERVISOR

Dr. Carl Henrik Ek
carlhenrik.ek@bristol.ac.uk