Neeraj Verma

Roll No.:170005020 B.Tech - Computer Science and Engineering Minor in Humanities and Social Sciences Indian Institute Of Technology Indore +91-7974610164 mems170005020@iiti.ac.in the.n.verma@gmail.com linkedin.com/in/n-verma

### **EDUCATION**

Degree/Certificate	${\bf Institute/Board}$	CGPA/Percentage	Year
B.Tech. Major	Indian Institute of Technology Indore	8.62 (Current)	2017-Present
Senior Secondary	CBSE Board	95.2%	2017
Secondary	CBSE Board	95.0%	2015

### PROJECTS

#### • Skin Cancer Detection and Classification

Jan. 2020 - Jul. 2020

Dr. Aruna Tiwari

- Implemented a Convolutional Neural Network model to identify and classify skin cancer.
- Tested various standard CNN models and custom CNN models for accuracy.

### • Computer Graphics Steam Engine

Jan. 2020 - Jul. 2020

Dr. Somnath Dey

- Immitated the working of a Steam Engine using OpenGL.

## • Grid Task Scheduling

Aug. 2019 - Nov. 2019

Dr. Kapil Ahuja

- Applied Particle Swarm Optimisation, Ant Colony Optimisation to solve the Grid-Task Scheduling problem with given number of resources and tasks with their mapping.

• Music Map

Dr. Abhishek Srivastava

- Implemented a Music Map for Indore city, marked various locations and its speciality with respect to music.
- Used google API for map plotting and Node.js, Bulma-CSS for website development.

### • Course Time-Tabling

Jan. 2019 - May 2019

Dr. Kapil Ahuja

- Applied Evolutionary Algorithms to design a course time-table for a given set of constraints.
- Algorithms used : Genetic Algorithm, Ant Colony Optimization.
- Analyzed them for their optimality and efficiency.

### • Clinic Management System

Aug. 2018 - Nov. 2018

Dr. Aruna Tiwari

- Created a database to model automated Clinic Management System, viz., appointment, room allotment, billing, etc.
- Used JavaScript as a link between database and front-end; hosted on Tomcat server

# TECHNICAL SKILLS

- **Programming**: Python, C/C++, \*Java
- Technical: Machine Learning, Artificial Intelligence, Image Recognition, Computer Graphics
- Tools/Frameworks: Keras, Tensorflow, Node.JS (with express), DJango
- Database: MySQL/MariaDB

\* Elementary proficiency

### KEY COURSES TAKEN

- Mathematics: Calculus, Linear Algebra, Differential Equations, Complex Analysis & Numerical Methods
- Computer Science and Engineering: Discrete Mathematical Structures, Data Structures and Algorithms, Database and Information Systems, Automata Theory and Logic, Design and Analysis of Algorithms, Logic Design, Software Engineering, Operating Systems, Computer Architecture, Optimisation Algorithms and Techniques, Parallel Computing, Computational Intelligence, Compiler Design, Computer Networks, Computer Graphics
- Minor & Others: Psychology, History of India, International Economics, Chemistry, English Language and Communication, Engineering Graphics, Bio-sciences, Physics, Basic Electrical and Electronics Engineering, Basic Mechanical Engineering, Basic Manufacturing Techniques, Fundamental of Economics, Calculus, Linear Algebra, Differential Equations, Complex Analysis, Numerical Methods

Positions of	RESPONSIBILITY
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• Head, Department of Creative Media, IIT Indore	Jul. 2019 - Apr. 2020
• Cheif Editor, Cinephiles, IIT Indore - Movie Making Club	Apr. 2019 - present
• Captain, St. Anne's School, Jodhpur	Jul. 2016 - Apr. 2017
Extra Curricular	
• Technical Team Member, FLUXUS'19 - Annual event of IIT Indore	2019
• Design Co-ordinator, FLUXUS'19 - Annual event of IIT Indore	2019
• Runner-up, Screenplay Writing, Inter-IIT	2018
• Team Member, Mystic Hues, IIT Indore - Photography Club	2018-present
Other Achievements	
• Branch Change, Metallurgy to Computer Science	2018
• Certificate of Completion, Machine Learning A-Z course, Udemy	2018
• Gold Medal, Fictional Documentary, Inter-Branch Cultural Clash, IIT Indore	2019