

ANUBHAV BIMBISARIYE

Department of Computer Science and Engineering
Indian Institute of Technology, Kanpur

Contact: +918127335583
Email: anubhab@iitk.ac.in,
anubhavamagic@gmail.com

EDUCATION

Name of Institute/Board	Year	Performance (CPI/aggregate)
Indian Institute of Technology, Kanpur	2015(expected)	6(Six semesters)
Central Board Of Secondary Education class12 th (AISSE)	2010	82.4%
Central Board Of Secondary Education class10 th (AISSE)	2008	85.16%

INTERSHIPS

- **NeoCortex bulk ad settings and configuration management engine** (May '14 – July '14)
Summer Internship at The Perfect Future Technologies (Semusi), Noida under the guidance of Brijraj Singh (Senior Technical Architect, TPF) and Munish Malhotra(Technical Lead, TPF)
 - Project aimed at developing an engine to create, update and manage ad setting files, for various mobile applications, addressing difficulties with existing system, to be released publically.
 - Basic Version: Developed a web style, database driven interface on Amazon Web Services, managed and configured through admin panel. It handles static, unique settings, allowing management features like app search, bulk edit, settings update and more.
 - Advanced Version: Designed the extension of basic version to handle automatic generation of dynamic configuration file based on a request's parameters like time, day, region of settings request. Released the basic structure of the advance version to develop on.
 - **Selenium automation**: Worked on automation of a store as a part of project to auto-release user apps across multiple app stores and languages.

ACADEMIC PROJECTS

- **Data Integration** (Jan '14- May'14)
Course project for CS315: Principles of Data Base Systems under Guidance of Dr. Arnabb Bhattacharya
 - The project aims to integrate data from multiple incomplete sources to provide a unified view of database to the user.
 - Integrated excel files data in python using MySQL using static **data warehousing** technique, filling missing information from other files.
- **C to Assembly Language(MIPS Architecture) compiler** (Jan '14- May'14)
Course project for CS335: Compiler Design under Guidance of Dr. Subhajit Roy
 - Developed a compiler from scratch for C using **lex and yacc** tools with python as the front end.
 - The compiler had the capabilities for efficient type checking, parsing and lexical analysis to simulate final code on MIPS architecture.
 - Supported C features like functions with multiple parameters, lexical scoping, loops, recursion and control statements.
- **Natural Language Processing - Acronym Detection in Hindi text** (Jan '14- May'14)
Course project for CS365: Artificial Intelligence under Guidance of Dr. Amitabha Mukerjee
 - Project aimed at researching and analyzing acronyms occurring in Hindi corpus and to make a suitable **acronym extractor**.
 - Acronym extractor had first results close to our reference research on French by Ménard and Ratte yielding **recall** and **precision** of **90% and 89.74%** respectively, implemented in python.

- **Pattern matching, rules based** detection and **dictionary word** elimination techniques were tested.

- **Multi-Class classification of images based on Visual content** (Jan '14- May'14)
Course project for CS676: Computer Vision and Image Processing under Guidance of Dr. Vinay P. Namboodiri
 - Implemented a **multiclass classifier** which can classify images into five classes viz. Planes, Cars, Faces, Animals and Flowers
 - Utilized one-vs-one and one-vs-all implementation for **SVM with SIFT / dense SIFT** features as the feature vector.
- **Artificial Neural Network Ludo Game** (Summer '13)
Under Guidance of Dr. Arnabb Bhattacharya
 - Developed ludo game in python using **pygame** playable in 2/4 player mode or **v/s Computer**.
 - A simple **reflex agent** calculates priority of bricks depending on benefit, risk and progress to move.
 - Aim to make a **model based reflex agent** that can learn from its previous moves so that it can think more like a human brain and using **search** heuristics to make an intelligent agent.
- **General Purpose Computer and MIPS compiler** (Jan '13- May'13)
Course project for CS220: Computer Organization under Guidance of Dr. Subhajit Roy
 - Implemented an 8 bit general purpose computer on FPGA board in Verilog using load-store architecture.
 - Made a MIPS assembly language to binary executable code converter in C as a basic compiler to generate machine code for the general purpose computer.
- **Box Filling Game** (Jan '13- May'13)
Course project for CS252: Computing Laboratory under Guidance of Dr. Arnabb Bhattacharya
 - Developed interactive GUI based box filling game in python playable by 2, 3 or 4 players.
 - Made a MIPS assembly language to binary executable code converter in C as a basic compiler to generate machine code for the general purpose computer.
- **Basic website** (Jul '12- Dec'12)
Course project for CS251: Computing Laboratory under Guidance of Dr. Arnabb Bhattacharya
 - Created a web interface for faculty and students to schedule lecture rooms.
 - Used Database management system to schedule lectures and provide user login.
 - Used PHP-MySQL to provide user registration and session management.

EXTRA-CURRICULAR PROJECTS

- **RC Canard Plane** (May '12-Jun'12)
Project for aeromodelling club, under guidance of coordinators, aeromodelling club, IIT Kanpur
- Fabricated the first working model of canard configuration plane in campus.
- Scratch built from Styrofoam, other stationary, brushless motors and servos.
- Refabricated the plane for a more efficient, slower and controllable model.

TECHNICAL SKILLS

- **Languages & technologies:** C, Codeigniter PHP MVC framework, Python, HTML5, PHP5, MySQL, CSS3, JavaScript, JQuery, AJAX, Bootstrap, Selenium automation, JSON, XML, Xpath, Assembly language (MIPS architecture).
- **Tools:** Latex, Lex/Yacc, Octave/Matlab.

RELEVANT COURSES

Introduction to computer graphics*
Computer Vision and Image Processing
Computer Networks*
Compilers
Principles of Data Base Systems
Algorithms – II

Theory of Computation
Operating Systems
Artificial Intelligence Programming
Discrete Mathematics
Data Structures and Algorithms
Mathematics – II (Linear Algebra and Complex Numbers)

**To be completed before November 2014, #On Udacity/Coursera*

EXTRA-CURRICULAR ACHIEVEMENTS

- Secured **2nd position**, out of over 50 participants in Hover-Rush, **Techkriti** 2013, a Hovercraft fabrication and race competition.
- Secured **3rd position** with certificate of excellence in Powerless, **Techfest** 2013(IIT Bombay) an unpowered glider fabrication and endurance competition.
- **National Cadet Corpse** Cadet 2011-12.

POSITIONS OF RESPONSIBILITY

- **Secretary, Skating Club** *(May '11-July '12)*
 - **Mentored and guided** new enthusiasts in the field of skating and roller hockey.
 - Conducted several skating workshops and competitions and participated in Josh 2013 Roller hockey games.
- **Secretary, Aeromodelling Club** *(May '12-July '13)*
 - Organized, managed new lectures addressing technicalities of club workshops.
 - Managed and conducted workshops and inter-insitute competitions.
 - Mentored and guided the Aeromodelling projects **Flying wing** and **RC Ornithopter** to successful completion.
- **Assistant Coordinator, Skating Club** *(May '12-July '13)*
 - Helped form new events, managing the secretaries to ensure their smooth conduction.
 - Responsible for management and organization of workshops.
- **Secretary, Take Off, Techkriti** *(Feb '12)*
 - Managed the organization of aeromodelling competitions.
- **Secretary, Informals, Antaragni** *(Aug '12)*
 - Responsible and accountable for success of a stage event and popularity of self-made functional pinball table for gaming arena.
- **Coordinator, Informals, Antaragni** *(Oct '13)*
 - Devised new events, games, fun competitions for a wide audience of five thousand.
 - Managed a huge team, modularized it to ensure efficient work and ease of operation.

MISCELLANEOUS ACTIVITIES

- **Stage Magic**
 - Have been performing magic shows on stage semi-professionally, for organizations like Indian Oil, Lions Club, Rotary club, Schools and many other forums.
 - Performed in Deepanjali for students of IIT Kanpur.
 - Performed magic in Galaxy 2013 as a part of dance routine for group dance competition.

- **Music Theory course**
 - Cleared Initial and First Grade in music theory and staff notation, Trinity Guild Hall.
- **Skilled RC flying of small scale aero models**
 - Flew for all Aeromodelling competitions participated in.