



Rohit Nijhawan
Aerospace Engineering
Indian Institute of Technology, Bombay

100010028
UG Second Year
Male
DOB: 25-02-1991

Examination	University	Institute	Year	CPI / %
Graduation	IIT Bombay	IIT Bombay	2012	8.09
Intermediate/+2	CBSE	Blue Bells Model School, Gurgaon	2009	91.60
Matriculation	CBSE	Army School, Ahmednagar	2007	94.40

SCHOLASTIC ACHIEVEMENTS

- Secured the **1306th** position (**percentile : 99.71**) in **IIT JEE 2010**(out of more than **4 lac students**), the entrance examinations to the Indian Institutes of Technology.
- Was offered a **scholarship** of Rs. 25,000 per year for a period of 4 years for having been placed in the **top 500 (ranked 272, percentile : 99.97)** out of a total of more than **9 lac students** who gave the **All India Engineering Entrance Examination-2009**.
- Scholarship holder** under the prestigious **National Talent Search Examination** scheme, the most prestigious school level scholarship, awarded by the **MHRD, Government of India**
- Awarded a certificate of merit for having performed at par with the **top 0.1%** candidates in **Mathematics and Social Science** by the **Central Board of Secondary Education**.
- Secured **1st rank in academics** in school continuously for **ten years** (class 1-10).

SOFTWARE SKILLS

- Operating systems** : Windows and UNIX
- Programming languages** : C, C++, Java, FORTRAN.
- Software packages** : MATLAB, LT Spice, Latex, Eagle
- Photo and video editing** : Open CV(Image processing), Adobe Photoshop, Sony Vegas, Adobe Premiere Pro.
- Web development** : HTML and CSS.

PROJECTS UNDERTAKEN :

Missile Guidance (*Guide : Prof. H.B. Hablani, IIT Bombay*) 2011

Summer project

Simulated and studied the **launch, further advance and guidance of missiles** as part of an **intern under Prof. H.B. Hablani**, Department of Aerospace Engineering, IIT Bombay.

Radio-controlled Hovercraft 2011

Summer Project

As an **Electronics Club Summer Project (ECSP 2011)**, **IIT Bombay**, built an RC Hovercraft from scratch in a team of 4.

Grading System with secured access (*Guide : Prof. Rushikesh Joshi, IIT Bombay*) 2011

Course Project, Computer Science Programming and Utilization

In a team of 2, developed a **C++ based password-protected grading system** with access only to a limited number of faculty members.

Micro Aerial Vehicle : Tricopter (*Guide : Prof. K. P. Karunakaran, IIT Bombay*) 2011-present

- Pursuing a project on the **design of a remote controlled micro aerial vehicle : tricopter**, a copter that has 3 rotors.
- Later in the project, it can be moved to a specific place with the help of GUI software linked with the copter using Zig-bee modules and using a mounted camera can transmit live video to a computer

Universal Time-keeping and Dissemination System (Guide: Prof. K. Sudhakar, IIT Bombay)

2011-present

Course Project, Introduction to Engineering Design

Worked on an engineering design project to **synchronize the time on all the clocks** on the campus with the **Indian Standard Time(IST)**.

TECHNICAL EVENTS

Aerobotics, Shaastra 2011

2011

Aeromodelling cum robotics event of the annual technical festival of IIT Madras

- Developed a **hovercraft** that could be operated both manually using radio-control and autonomously to follow a given-coloured wall as part of the problem statement.

Zephyr 2011

2011

Annual Departmental Technical Festival, Aerospace Department, IIT Bombay

- Built a **radio-controlled plane** and participated in **Mach Infinity**, a competition based on remote-controlled plane design and flight-manoeuving skills
- Built a **water-propelled rocket** and participated in the **Water-rocketry competition**.

Trackmania

2010

Competition based on radio-controlled car designing and manoeuvring skills

- In a team of 4, built a **radio-controlled car** and clocked the **third best time** out of a total of around **150 teams**.
- Subsequently, **autonomous** control was integrated in the bot and was made into a **line-follower** using **IR sensors**.

POSITIONS OF RESPONSIBILITY

- **Convener** for **Aeromodelling Club, IIT Bombay**

2011-present

Coordinate all the activities of the club including flying sessions, competitions and lectures.

- **Organiser** for **Mood Indigo 2010**(Asia's Biggest Cultural Festival) and **Coordinator** for **Mood Indigo 2011**

2010-present

Worked in the 'Creatives' department and now in the 'Pronites' department

- **Organiser** for **Techfest 2011**(Asia's Biggest College Technical Festival) and **Coordinator** for **Techfest 2012**

2010-present

Worked in the 'Web and Publicity' department and now in the 'Technoholix' department

- **Coordinator** for **Entrepreneurship Cell, IIT Bombay**

2011-present

Coordinate the media and marketing activities of E-Cell

- **Tech-mentor, TechOne**

2011

Mentored a group of 22 freshmen into making a remote-controlled car for an intra-college car-racing competition

EXTRA-CURRICULAR ACTIVITIES AND ACCOMPLISHMENTS

- Part of the **editorial team** of **Insight**, the official **student media body and newsletter** of **IIT Bombay**.
- Part of the **editorial team** of **Enspace**, the **entrepreneurial magazine** of **IIT Bombay**.
- Member of **UDAAN**, a **social outreach programme** of the **Aerospace Engineering Department, IIT Bombay**.
- Secured the **first position** in the **video-making cum editing competition** of **Freshiezza**, the **Inter-Hostel Freshmen Cultural Festival**.
- Undertook the **NSO** course in **Yoga** in the first year.
- Have an avid interest in cricket, reading and hobby electronics(currently pursuing a **minor course** in the **Electrical Engineering**).

