



## **Department of Mechanical Engineering**

# Report of training session on 3D Printing 9th August 2022

Training Program on "Installation and demonstration of 3D printing - Fused Deposion Modelling (FDM)" was conducted by Mr. Prahalad Solanki from Vektor3D Systems LLP, Chembur, Mumbai on 9<sup>th</sup> August 2022 in CNC and 3D printing lab, SJCEM, B-wing ground floor.

Following topics were covered in session: -

- 1. Installation and assembly of FDM 3D Printer (Flashforge creator pro)
- 2. Demonstration of part printing on 3D printer
- 3. Use of software in processing parts to be fabricated.

Following staff members attended the training session

- 1. Mr. Vivek Narnaware
- 2. Mr. Rakesh Shinde
- 3. Mr. Sangam Rane
- 4. Mr. Vinod Surange
- 5. Dr. Kishor Rambhad
- 6. Mr. Rajesh Bisane
- 7. Mr. Ambeprasad Kushwaha
- 8. Mr. Gyanchand Yadav
- 9. Mr. Sandip Sankhe
- 10. Mr. Alpesh Naik

Faculty coordinators: Dr. Kishor Rambhad and Mr. Vinod Surange



#### **Profile of Expert Faculty:**

#### Contact

www.linkedin.com/in/ prahaladsolanki (Linkedin)

#### Top Skills

Microsoft Office

**AutoCAD** 

Matiab

#### Languages

Marathi

Hindi

**English** 

Marwari

Punjabi

#### Certifications

MIT-BOTS IIT Initiative Autonomous Robotics

#### **Publications**

3D Printers: Future Basic Need

## Prahalad Solanki

Founder at Vektor3D Systems LLP Mumbai, Maharashtra, India

#### Summary

A dynamic professional with total about 7 Years of experience into manufacturing of 3D printer along with sales and it's services. Founded Vektor3D Systems LLP, whose Moto is to promote make in India products by cultivating in-house production of various 3d printer technology Systems.

Current product road map includes industrial grade FFF PEEK 3d printer, extra large build volume and cost effective resin 3d printers, WAAM (wire arc additive manufacturing) 3d printers and metal 3d printing Systems.

Major focusing area includes research & development, decoding complex hardware & software Systems and working on upcoming future technologies such as IoT, Robotics and advance manufacturing techniques like 3d printing.

In the process of being a catalyst for implementation of Industry 4.0 into the Indian Market.

We are currently looking for angel inventors or seed funders to help us in joining the hands in the next industrial revolution.

#### Expertise:

- Product development.
- Quality Control standards
- Marketing and channel development
- Machine maintenance and troubleshooting.
- Decoding complex hardware and software systems.
- Enhancing products quality and optimising for maximum efficiency.
- Working on developing Filament Extruder machine and Research on developing new series of 3D printing consumables.
- Research with various 3d printer consumables such as filaments,
   Nozzles, PCB's, Circuits testing & their properties and implementing new changes to design or hardware parts.



Head of Department
Mechanical Engineering
St. John College of Engineering
& Management, Palghar

Jenn

Conducting Seminars and Providing Product Training to distributors in or on site.

Reach to us at info@vektor3ds.com Www.vektor3ds.com +91-9082020416

#### Experience

Vektor3D Systems LLP Founder April 2020 - Present (2 years 8 months) Mumbai, Maharashtra

3Idea Technology Technical Head July 2016 - March 2020 (3 years 9 months) Mumbai, Maharashtra, India

Working with Leading 3D Printer Desktop Segment giant XYZ 3D Printing(Taiwan), providing technical services and participating in research and development of FDM, SLA & DLP 3D Printers.

J Group Robotics
Quality Control Manager
September 2014 - June 2016 (1 year 10 months)
Mumbai

- Testing of all Electronics & Mechanical Parts Before sending it for production and Providing Quality Certification for the Parts & Machine.
- 2. Calibration using Repetier 1.6.1 and Calibration of other Mechanical Parts.
- G code Generation using Simplify3D & troubleshooting on Gcode along with giving technical support on call, going for service.
- 4. 3D printer with Quality Checking & Control of all the mechanical as well as electronic assembly parts along with Doing R&D on developing new 3D printers.
- 5. Product testing & Quality Inspection.
- 6. Material Safety Datasheet (MSDS) Report Generation
- 7. 3D Scanning of body and mechanical parts.

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### Glimpse of training session:











# **Department of Mechanical Engineering Report**

# of training session on DLP 3D Printing

## 01st September 2022

Training Program on "Installation and demonstration of 3D printing - DLP" was conducted by Mr. Prahalad Solanki from Vektor3D Systems LLP, Chembur, Mumbai on 01<sup>st</sup> Setember 2022 in CNC and 3D printing lab, SJCEM, B-wing ground floor.

Following topics were covered in session: -

- 1. Installation and assembly of DLP 3D Printer
- 2. Demonstration of part printing on DLP 3D printer
- 3. Use of software in processing parts to be fabricated.

Following staff members attended the training session

- 1. Mr. Vivek Narnaware
- 2. Mr. Rakesh Shinde
- 3. Mr. Sangam Rane
- 4. Mr. Vinod Surange
- 5. Dr. Kishor Rambhad
- 6. Mr. Rajesh Bisane
- 7. Mr. Ambeprasad Kushwaha
- 8. Mr. Gyanchand Yadav
- 9. Mr. Sandip Sankhe

10. Mr. Alpesh Naik

Faculty coordinators: Dr. Kishor Rambhad and

Hum Mr. Vinod Surange

## Glimpse of training session:







# Aldel Education Trust's St. John College of Engineering and Management, Palghar

(A Christian Religious Minority Institution)
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St. John Technical Campus, Vevoor, Manor Road, Palghar (E), Dist. Palghar, Maharashtra-401404

NAAC Accredited with Grade 'A'



#### REPORT ON

#### Workshop on "Citation and Reference management using Mendeley"

Workshop on **Citation and Reference management using Mendeley** was organised for B.E. Final Year Students of Mechanical Engineering Department of St. John College of Engineering and Management, Palghar.

**Resource person** – Dr. Upendra Maurya, Assistant Professor, Mechanical Engineering, SJCEM, Palghar

Date of Workshop- 16-03-2023

No. Of Student attended – 40

During the workshop Dr. Upendra Maurya gave the detail information of different components of the reference management and available tools. He also explained each components in detail. This workshop will help to prepare student a research paper and project report on their final year project.







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# Introduction to Mendeley

By Dr. Upendra Maurya







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# Adding New Research

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Mendeley Web Importer

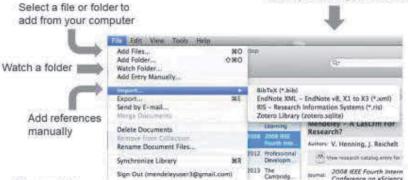
#### Mendeley Research Catalog





# Adding Documents

Import your references from BibTex, Endnote, RIS or Zotero



You can also:

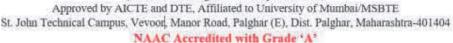
- Use the Web Importer to add from online databases
- · Find new articles in the Mendeley Web Catalog







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# Drag and Drop







# Document details

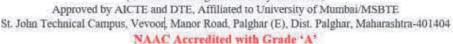








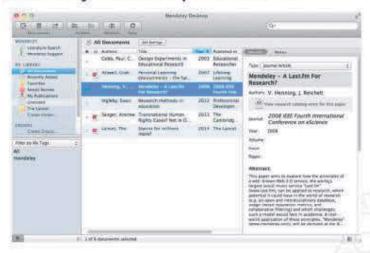
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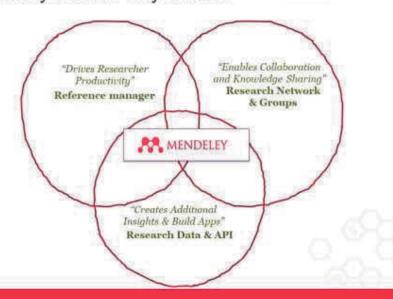


# Mendeley Desktop overview



# Mendeley's Three Key Values



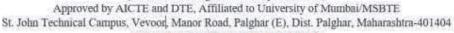






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#### What is Mendeley?



...and an academic collaboration network with 4 Million users to connect like-minded researchers & discover research trends and statistics.



Mendeley is a reference manager allowing you to manage, read, share, annotate and cite your research papers...



... forming a crowdsourced database with a unique layer of social research information and an Open API





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#### REPORT ON

#### **Workshop on Technical Paper writing**

Workshop on Technical Paper Writing was organised for B.E. Final Year Students of Mechanical Engineering Department of St. John College of Engineering and Management, Palghar.

Resource person - Dr. Kishor Rambhad, HOD, Mechanical Engineering, SJCEM, Palghar

Date of Workshop- 15-03-2023

No. Of Student attended – 22

During the workshop Dr. Kishor Rambhad gave the detail information of different components of the technical paper. He also explained each components in detail. This workshop will help to prepare student a research paper on their final year project.







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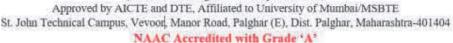








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# Research Paper Structure

- 1. Title
- 2. Abstract
- 3. Introduction
- 4. Methods/experimentation
- 5. Results
- 6. Discussion
- 7. Conclusion
- 8. Reference
- 9. appendix



