



**BHARATI VIDYAPEETH DEEMED TO BE UNIVERSITY
DENTAL COLLEGE AND HOSPITAL,
NAVI MUMBAI.**

Institutional Innovation Committee

Dr. Minal Kshirsagar
IIC Co-ordinator

Dr. V. Sreenivasan
Chairperson

IIC Report

MANIPAL DENTAL HACKATHON 2026

**REPORT ON PARTICIPATION IN MANIPAL DENTAL HACKATHON 2026:
CLINIC MANAGEMENT AND EARLY ORAL CANCER DETECTION APP**

Name of the Activity: Manipal Dental Hackathon 2026

Organized by: Institution's Innovation Council (IIC)

Type of Activity: Innovation / Skill Development / Healthcare Technology

Date: 5th March 2026 to 12th March 2026

Venue: Microsoft Teams (Online Mode)

1. Introduction

The Institution's Innovation Council (IIC) continuously strives to nurture innovation and entrepreneurial thinking among students. In line with this objective, a team of five students actively participated in the Manipal Dental Hackathon 2026 conducted in online mode. The hackathon provided a platform for students to develop technology-driven solutions addressing critical healthcare challenges. The participating team developed a **Clinic Management and Early Oral Cancer Detection Application**, focusing on improving clinical efficiency and promoting early diagnosis. The team worked under the guidance of **Dr. Karishma Ashok**, whose mentorship contributed significantly to the successful development of the project.

2. Objectives of the Activity

- To encourage students to apply innovative thinking in healthcare
- To develop practical and scalable digital solutions
- To enhance awareness about early detection of oral cancer
- To foster interdisciplinary collaboration and teamwork
- To bridge the gap between technology and healthcare services

3. Details of Participation

- Number of Participants: 5 Students 1 Faculty
Faculty: Dr Karishma Ashok
Miss Mrunali Gharat(Intern- Team leader)

Altamash Khan(2nd BDS)
Miss Sneha Patil(3rd BDS)
Aaditya Bhandekar (3rd BDS)
Miss Manasi Gawai(3rd BDS)

- Affiliation: Institution's Innovation Council (IIC) , Bharati Vidyapeeth (Deemed to be University) Dental College and Hospital, Navi Mumbai
- Mode of Participation: Online via Microsoft Teams
- Duration: One-week hackathon (5th March 2026 – 12th March 2026)

The team actively engaged in all stages of the hackathon, including ideation, design, development, and final presentation.

4. Description of the Project

The project developed during the hackathon is a **comprehensive digital healthcare solution** integrating clinic management with early oral cancer detection.

a) Clinic Management System

- Efficient patient registration and record maintenance
- Appointment scheduling system
- Digital prescription generation
- Streamlined doctor-patient interaction

b) Early Oral Cancer Detection Module

- Image-based screening for early signs of oral cancer
- Identification of suspicious lesions
- Preliminary risk indication for users
- Recommendation for further medical consultation

c) Additional Features

- User-friendly interface for accessibility
- Data storage and quick retrieval system
- Educational resources on oral hygiene and cancer prevention

5. Outcomes and Learning

- Enhanced practical knowledge in healthcare application development
- Awareness of the importance of early detection of oral cancer
- Improved technical skills in design and development
- Strengthened teamwork, communication, and time management skills
- Exposure to real-world healthcare challenges

6. Impact of the Activity

- Promoted student engagement in solving real-life healthcare problems
- Highlighted the importance of preventive healthcare and early diagnosis
- Encouraged innovation in digital health technologies
- Strengthened the institution's innovation ecosystem

7. Role of IIC

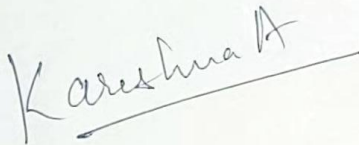
The Institution's Innovation Council played a vital role by:

- Encouraging student participation in the hackathon
- Providing guidance and mentorship
- Supporting the team during ideation and execution
- Promoting innovation-driven learning

8. Conclusion

The participation in the Manipal Dental Hackathon 2026 was a significant learning experience for the students. The developed **Clinic Management and Early Oral Cancer Detection App** demonstrates the potential of integrating technology with healthcare to address critical societal issues.

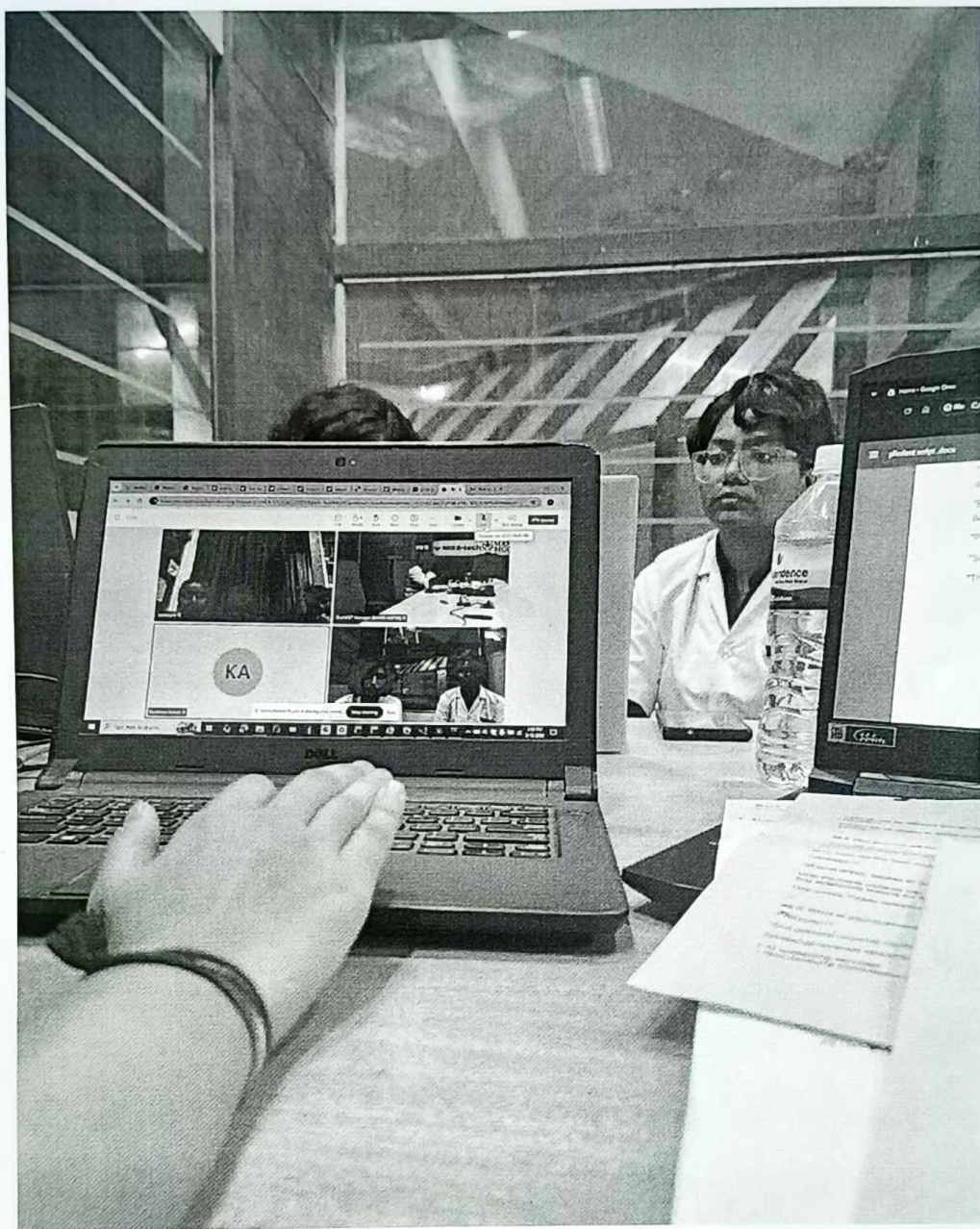
Such initiatives reflect the institution's commitment to fostering innovation, creativity, and socially relevant problem-solving among students.



Dr Karishma Ashok
(Member IIC)



Dr Minal Kshirsagar
(Coordinator IIC)



2:30



74



Guests are waiting to join.

View lobby



Proposed Solution

systems streamlining patient care from reception to treatment.

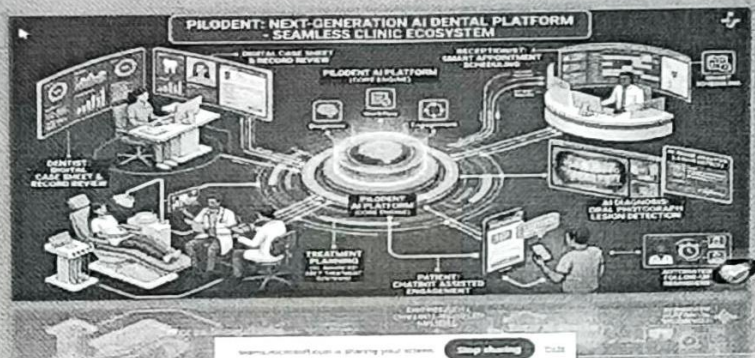
Current Solutions

Many clinics use dental management software such as:

- Dentrix
- Open Dental

However, these systems have limitations:

- Minimal patient engagement tools



Our Solution

DentPilot – AI Powered Dental Clinic Automation

DentPilot is an intelligent digital platform designed to simplify and automate dental practice management.

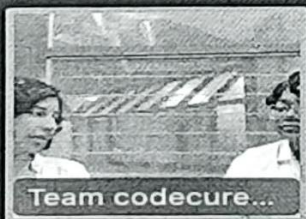
codecure (Unverified) ...

C

codecure (Un...

BM

BioNEST Man...



Team codecure...

KA



2:32



73



Meeting

04:08



Guests are waiting to join.

View lobby



Patient Data

Calendar

Prescriptions

Clinic Settings

Altamash Khan

70 yrs. Male

PHYSICIAN

9967029033

YOUR TITLE

Sharp

SICKLE ROOM

1-2 days

SICKLE ROOM

No

CURRENT ILLNESS

Cold

CURRENT ILLNESS

Tooth 15

Medical History

None

Allergies

None

Diagnoses

Further Clinical Evaluation Required

Share

Share your screen to help.

Stop sharing

Share

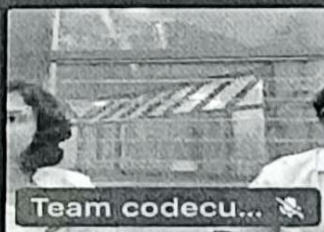
codecure (Unverified) ...

C

codecure (Un...)

BM

BioNEST Man...



Team codecure...

KA



2:33



73

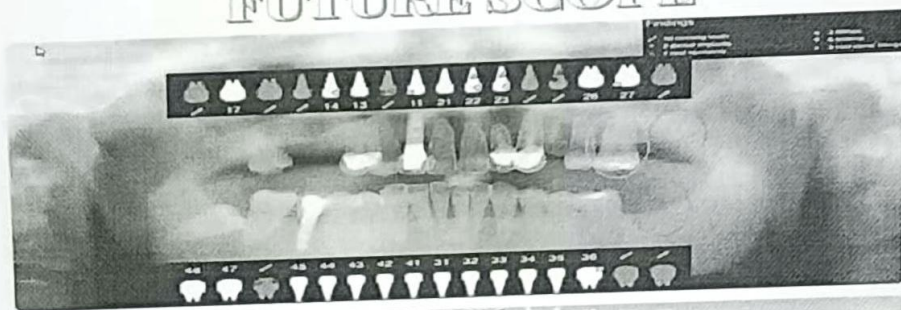


Guests are waiting to join.

View lobby



FUTURE SCOPE



Angeles et al. 2022

Screen sharing from a sharing your screen

Stop sharing

codecure (Unverified) ...

C

codecure (Unve...

BM

BioNEST Manag...

TC

Team codecure...

KA

