

Faculty of Dental Sciences
Department of Aesthetic Dentistry

## **University's Vision, Mission and Objectives**

The M. S. Ramaiah University of Applied Sciences (MSRUAS) will focus on student-centric professional education and motivates its staff and students to contribute significantly to the growth of technology, science, economy and society through their imaginative, creative and innovative pursuits. Hence, the University has articulated the following vision and objectives.

## Vision

MSRUAS aspires to be the premier university of choice in Asia for student centric professional education and services with a strong focus on applied research whilst maintaining the highest academic and ethical standards in a creative and innovative environment

## Mission

Our purpose is the creation and dissemination of knowledge. We are committed to creativity, innovation and excellence in our teaching and research. We value integrity, quality and teamwork in all our endeavors. We inspire critical thinking, personal development and a passion for lifelong learning. We serve the technical, scientific and economic needs of our Society.

## **Objectives**

- 1. To disseminate knowledge and skills through instructions, teaching, training, seminars, workshops and symposia in Engineering and Technology, Art and Design, Management and Commerce, Health and Allied Sciences, Physical and Life Sciences, Arts, Humanities and Social Sciences to equip students and scholars to meet the needs of industries, business and society
- To generate knowledge through research in Engineering and Technology, Art and Design, Management and Commerce, Health and Allied Sciences, Physical and Life Sciences, Arts, Humanities and Social Sciences to meet the challenges that arise in industry, business and society
- 3. To promote health, human well-being and provide holistic healthcare
- 4. To provide technical and scientific solutions to real life problems posed by industry, business and society in Engineering and Technology, Art and Design, Management and Commerce, Health and Allied Sciences, Physical and Life Sciences, Arts, Humanities and Social Sciences
- 5. To instill the spirit of entrepreneurship in our youth to help create more career opportunities in the society by incubating and nurturing technology product ideas and supporting technology backed business
- 6. To identify and nurture leadership skills in students and help in the development of our future leaders to enrich the society we live in
- 7. To develop partnership with universities, industries, businesses, research establishments, NGOs, international organizations, governmental organizations in India and abroad to enrich the experiences of faculties and students through research and developmental programmes

## **Programme Specifications: Skill Enhancement Training Programme in Aesthetic Dentistry**

Faculty	Dental Sciences
Department   Aesthetic Dentistry	
Programme Name         Skill Enhancement Training Programme in Aesthetic Dentistry	
Dean of the Faculty Dr. Kavitha Prasad	
Programme Director	Dr. Indiresha

- 1. Title of the Award: Skill Enhancement Training Programme
- 2. Mode of Study: Part Time
- 3. Awarding Institution /Body: M. S. Ramaiah University of Applied Sciences, Bengaluru
- 4. Joint Award: Not Applicable
- **5. Teaching Institution:** Faculty of Dental Sciences, M. S. Ramaiah University of Applied Sciences, Bengaluru
- 6. Date of Programme Specifications: September 2025
- 7. Date of Programme Approval by the Academic Council of MSRUAS: 27<sup>th</sup> September 2025
- 8. Next Review Date: September 2026
- 9. Programme Approving Regulating Body and Date of Approval:
- 10. Programme Accredited Body and Date of Accreditation:
- 11. Grade Awarded by the Accreditation Body:
- 12. Programme Accreditation Validity:
- 13. Programme Benchmark:

## 14. Rationale for the Programme

Aesthetic Dentistry program addresses the rising demand for dental professionals skilled in enhancing smiles while maintaining oral health. It combines science and artistry, focusing on procedures like whitening, veneers, bonding, and minimally invasive dentistry. The curriculum emphasizes diagnosis, treatment planning, and the latest technologies such as digital smile design and laser dentistry. It also promotes interdisciplinary collaboration for comprehensive care. Ultimately, the program equips dentists to meet modern aesthetic expectations and deliver high-quality, patient-centered outcomes in today's evolving aesthetics landscape.

## 15. Programme Mission

This Skill enhancement program strives to create an environment for participating Dentist to visualize and achieve aesthetic outcomes under the guidance of highly skilled professionals with a one on one training approach. It will also create confidence and opportunities for the participating Dentists to achieve better career trajectory owing to their newly acquired knowledge and skillset. This will be a

hallmark for the desire to excel and distinguish themselves in the field of aesthetic restorative dentistry.

## 16. Graduate Attributes (GAs)

- **GA-1. Oral health knowledge:** Ability to apply knowledge of basic and applied medical and dental science to address oral health issues.
- **GA-2. Problem Analysis:** Ability to analyze oral health problems, interpret data and arrive at meaningful conclusions involving appropriate investigations and diagnosis.
- **GA-3. Provide Solutions:** Ability to understand the etiopathology, clinical features of oral disease and provide solutions considering public health and safety, and the cultural, societal, and environmental considerations
- **GA-4. Conduct Instigations of Complex Problems:** Ability to understand and solve complex clinical situations by conducting experimental investigations
- **GA-5. Modern Tool Usage:** Ability to apply appropriate tools and techniques and understand utilization of resources appropriately to oral health activities
- **GA-6.** The Dental Expert and Society: Ability to understand the effect of oral health solutions on legal, cultural, social, and public health and safety aspects
- **GA-7. Environment and Sustainability:** Ability to develop sustainable solutions and understand their effect on society and environment
- **GA-8.** Ethics: Ability to apply ethical principles to dental practices and professional responsibilities
- **GA-9. Individual and Teamwork:** Ability to work as a member of a team, to plan and to integrate knowledge of various dental and allied disciplines and to lead teams in multidisciplinary settings
- **GA-10. Communication:** Ability to make effective oral presentations and communicate technical ideas to a broad audience using written and oral means
- **GA-11. Project Management and Finance:** Ability to lead and manage multidisciplinary teams by applying financial principles for practice management.
- **GA-12. Life-long learning:** Ability to adapt to the changes and advancements in technology and engage in independent and life-long learning

## 17. Programme Outcomes (POs)

Skill Enhancement Training Programme graduates will be able to:

- **PO1.** Demonstrate comprehensive knowledge of the scientific principles underlying dental aesthetics, including smile design, dental materials, and color science.
- **PO2.** Plan and execute individualized aesthetic treatment strategies that integrate occlusion, and patient-specific needs.

- **PO3.** Perform a wide range of aesthetic dentistry procedures such as veneers, laminates, direct and indirect restorations, bleaching, digital smile design, and minimally invasive cosmetic corrections with precision.
- **PO4.** Incorporate advanced diagnostic and digital technologies (e.g., intraoral scanners, digital photography, and shade-matching tools) for aesthetic treatment planning and execution.
- **PO5.** Critically analyze and solve complex aesthetic challenges by balancing biological, functional, and psychological aspects to achieve predictable and natural-looking outcomes

### 18. Programme Goal

The programme goal is to produce graduates having critical, analytical and problem-solving skills, and ability to think independently, and to pursue a career in Aesthetic Dentistry

## 19. Program Educational Objectives (PEOs)

The objectives of the Skill Enhancement Training Programme in Aesthetic Dentistry are to:

- **PEO-1.** Provide students with a strong foundation in basic dental sciences relevant to Aesthetic and Restorative Dentistry.
- **PEO-2.** Impart analytic and cognitive skills required to plan multidisciplinary treatment modalities specific to the needs of the patient.
- **PEO-3.** Train students in all levels of restorative, aesthetic and digital dentistry work flow incorporating advanced diagnostics and technology in patient management.
- **PEO-4.** Impart strong human values, entrepreneurial and leadership skills to evolve as global professionals and contribute to the well-being and welfare of the society.

## 20. Programme Specific Outcomes (PSOs)

At the end of the Skill Enhancement Training Programme in Aesthetic Dentistry, the graduate will be able to:

- **PSO-1.** Discuss clinical presentation, diagnosis and plan options for the patient requiring aesthetic corrections.
- **PSO-2.** Predict prognosis and implement a treatment strategy and justify an evidence-based treatment option to efficiently manage tooth with aesthetic concerns.
- **PSO-3.** Demonstrate proficiency in preventive and interventional restorative care including aesthetically challenging cases.
- **PSO-4.** Work as an effective leader with good communication skills in a multidisciplinary clinical care setup inculcating best practices in management and administration.

## 21. Programme Structure:

SI.	Course Title	Theory	Practical	Max.
No.	Course Title	Hrs	Hrs	Marks
1	Introduction & Fundamentals	03	10	30
2	Adhesion & Direct Anterior Esthetics	06	15	40
3	Indirect Esthetic Restorations	05	15	40
4	Digital Esthetic dentistry and Tooth Whitening Procedures	06	15	30
5	Posterior Esthetic Restorations & Crown Preparations		20	30
6	Advanced Esthetic Procedures	05	15	30
	Total	30	90	200
•	Total number of contact hours		120	

### 22. Module Delivery

Each module comprises a 3-4 days session, with classes scheduled from 8:30 AM to 1:00 PM and again from 2:00 PM to 4:30 PM.

## 23. Teaching and Learning Methods

- a. Team Teaching/ Integrated Teaching
- **b.** Face to Face Lectures using Audio-Visuals
- **c.** Case Based Discussions
- **d.** Group Discussions, Presentations
- e. Demonstrations on videos, computers and models
- f. Clinical based learning
- g. Laboratory work
- h. Interdepartmental meets

## 24. Assessment and Grading

## 24.1. Components of Grading

## **Continuous Evaluation at the end of each Module:**

At the end of each module the student will be assessed based on the log book submission and case presentation and graded accordingly as per description below

SI. No.	Grade Description	Grade
1	Excellent	Α
2	Good	В
3	Satisfactory	С

## Programme End Exam: It has two components, theory and Case Presentation

Theory Component is a written MCQ examination and has a weightage of 30%. Clinical Component has two parts, part A is a case presentation along with Viva-Voce and has a weightage of 35% and Component B is a log book assessment and has a weightage of 35%. A student is required to score a minimum of 50% in each component.

## 25. Student Support for Learning

- 1. Course Notes
- 2. Reference Books in the Library
- 3. Magazines and Journals
- 4. Internet Facility
- 5. Computing Facility
- 6. Laboratory Facility
- 7. Staff Support
- 8. Lounges for Discussions
- 9. Any other support that enhances their learning

## 26. Quality Control Measures

- 1. Review of Course Notes
- 2. Review of Question Papers
- 3. Student Feedback
- 4. Moderation of Assessed Work
- 5. Review by external examiners
- 6. Student exit feedback

## 27. Programme Map (Course-PO-PSO Map)

Module	Course Title	PO-1	PO-2	PO-3	PO-4	PO-5	PO-6	PSO-1	PSO-2	PSO-3	PSO-4
1	Introduction & Fundamentals	3					3	2	2	2	3
II	Adhesion & Direct Anterior Esthetics				3		2	2	2	2	
III	Indirect Esthetic Restorations			3			2	2	3	2	
IV	Digital Esthetic dentistry and Tooth Whitening Procedures						2	2	3	2	
V	Posterior Esthetic Restorations & Crown Preparations	3	3				2	2	3	2	3
VI	Advanced Esthetic Procedures					3	2	2	3	2	
3: Very Strong Contribution, 2: Strong Contribution, 1: Moderate Contribution											

## 28. Co-curricular Activities

Students are encouraged to take part in co-curricular activities like seminars, conferences, symposia, paper writing, attending industry exhibitions, project competitions and related activities for enhancing their knowledge and networking.

## 29. Cultural and Literary Activities

Annual cultural festivals are held to showcase the creative talents in students. They are involved in planning and organizing the activities.

## **30.** Sports and Athletics

Students are encouraged to take part in sports and athletic events regularly. Annual sports meet will be held to demonstrate sportsmanship and competitive spirit.

Course Specifications: Aesthetic Dentistry

Course Title	Aesthetic Dentistry	
Course Type	Skill Enhancement Training Programme	
<b>Department</b> Aesthetic Dentistry		
Faculty	Faculty Dental Sciences	

### I. Course Summary

## 1. Aim and Summary

This Skill enhancement program strives to create an environment for participating Dentist to visualize and achieve aesthetic outcomes under the guidance of highly skilled professionals with a one on one training approach. It will also create confidence and opportunities for the participating Dentists to achieve better career trajectory owing to their newly acquired knowledge and skillset. This will be a hallmark for the desire to excel and distinguish themselves in the field of aesthetic restorative dentistry.

This training program is for BDS graduates who hold a valid registered degree. MDS professionals who also wish to sub- specialize in this new field and develop the skills needed to succeed in Aesthetic restorative Dentistry will also benefit immensely from this Skill enhancement Program.

### 2. Course Size and Credits:

Number of Credits	05
Credit Structure (Lecture: Tutorial: Practical)	1:0:2
Total Hours of Interaction	120
Number of Weeks in a term	24
Delivery Method	Modular
Student Intake per Batch	5
Department Responsible	Conservative Dentistry and Endodontics
Total Course Marks	200
Pass Criterion	50% pass in each module, Clinical Record Submission and
rass Citterion	Case Presentation
Attendance Requirement	80 % attendance

## 3. Course Outcomes (COs)

After the successful completion of this course, the student will be able to:

- **CO-1.** To acquire knowledge regarding cosmetic esthetic procedures and identify clinical conditions indicated for such procedures.
- **CO-2.** To develop skills on the basics of Dental Photography and develop skills to document Aesthetic Restorative procedures.

- **CO-3.** To acquire knowledge and develop skills to clinically perform Microabrasion, Macroabrasion, Bleaching, Aesthetic direct Composite restorations.
- **CO-4.** To acquire adequate knowledge and develop skills regarding adhesive bonding protocols, Resin based composites and Porcelain Laminate Veneers.
- **CO-5.** To acquire adequate knowledge and develop skills regarding Tooth preparation techniques, Provisionalization methods and Impression Materials for Full Coverage Esthetic Anterior Crowns.
- **CO-6.** To acquire knowledge and develop skills to clinically using Diode Lasers for Soft tissue correction as needed for Aesthetic restorative procedures

### 4. Course Contents

### Clinical:

- 1. Isolation Methods
- 2. Dental Photography
- 3. Bonding Protocols.
- 4. Resin Based Composites
- 5. Bleaching Agents
- 6. Dental Ceramics and Zirconia
- 7. Impression Materials, Provisionalization materials and Luting Agents
- 8. Smile Designing and Porcelain Laminate Veneers
- 9. Diode Laser

### **Theory and Demonstration Content:**

### **Module 1: Introduction & Fundamentals**

- Introduction to Aesthetic Dentistry
- Principles of Smile Design & Esthetics
- Dental Photography and Documentation
- Basic Concepts of Adhesion
- Enamel Adhesion

## **Module 2: Adhesion & Direct Anterior Esthetics**

- Dentin Adhesive Systems
- Direct Anterior Composite Restorations (Class III, IV, V)
- Composite Veneer Techniques (layering, diastema closure, contouring, polishing)

## Module 3: Indirect Esthetic Restorations – Veneers

- Porcelain Veneers: preparation, bonding, finishing
- Composite Veneers: indications and protocols
- Clinical considerations for longevity of veneers

## **Module 4: Tooth Whitening & Esthetic Enhancements**

- Bleaching Procedures (in-office and at-home techniques)
- Management of discolored teeth (internal bleaching)
- Clinical case discussions

## **Module 5: Posterior Esthetic Restorations & Crown Preparations**

- Direct Posterior Composite Restorations
- Cavity design modifications for esthetic composites
- Crown Preparation principles (anterior & posterior, all-ceramic crowns)

### **Module 6: Advanced Esthetic Procedures**

- Soft Tissue Esthetic Procedures (esthetic crown lengthening)
- Soft Tissue Laser Procedures with Diode Laser
- Integration of esthetic dentistry with other disciplines
- Case Presentations and Clinical Evaluation

## **Preclinical Exercises on natural teeth/ typhodont:**

Anterior crowns -

- a) PFM 2
- b) All ceramic 2
- c) Veneers 2 (composite and ceramic)

Anterior composite restorations -

- a) Class III ----- 2 each
- b) Class IV ----- 2 each
- c) Class V ----- 2 each.

## **Clinical Exercises performed:**

- Anterior composite restoration (class III, class V, angle build up, closure of diastema, shaping) - 10
- Laminate veneer, direct composite, indirect ceramic veneers 3
- Bleaching vital and non-vital 4
- Ceramic crown for anterior teeth 5
- Dental Photography All cases to be documented
- Soft Tissue Laser Procedures with Diode Laser 5

Program Details	Module	Tentative Dates
<ul> <li>Isolation Techniques for Restorative Dentistry</li> <li>Direct Composite Restorations - Class I, II, III,</li> </ul>	1	3-5 working days a month
IV and V		
Midline Diastema Management		
Direct Composite Veneer	l II	3-5 working days a month
<ul> <li>Smile Designing and Porcelain Laminate</li> </ul>		
Veneers		
<ul> <li>Soft Tissue Laser Procedures with Diode Laser</li> </ul>	III	3-5 working days a month
<ul> <li>Anterior Esthetic Full Coverage Crown</li> </ul>	IV	3-5 working days a month
<ul> <li>Vital Bleaching, Microabrasion and</li> </ul>		
Macroabrasion		
<ul> <li>Direct and Indirect Posterior restorations</li> </ul>	٧	3-5 working days a month

## 5. Course Map (CO-PO-PSO Map)

		Program	nme Outc	omes (POs)	Programn	ne Specific	Outcom	es (PSOs)	
	PO-1	PO-2	PO-3	PO-4	PO-5	PSO-1	PSO-2	PSO-3	PSO-4
CO-1	3					3	2	2	2
CO-2				3		2	2	2	2
CO-3			3			2	2	3	2
CO-4						2	2	3	2
CO-5	3	3				2	2	3	2
CO-6					3	2	2	3	2
	3: Very Strong Contribution, 2: Strong Contribution, 1: Moderate Contribution								

6. Course Teaching and Learning Methods

Teaching and Learning Methods	Duration in hours	Total Duration in Hours
Face to Face Lectures	10	
Demonstrations		
1. Demonstration using Videos	00	10
2. Demonstration using Physical Models /Patients	10	
Practical Work		
Pre-Clinical laboratories	40	
Clinical Area	50	
Workplace based assessment methods	00	
Hospital Setup – MSRH	00	
Field work/dental camp	00	90
Outreach centres	00	
Advanced Learning Centre	00	
Projects	00	
Innovative methods – DOPS, mini CEX, OSCE/OSPE	00	
Others		
1. Case Study Presentation	05	
2. Guest Lecture	00	
3. Industry / Field Visit	00	07
4. Brain Storming Sessions	00	07
5. Group Discussions	02	
6. Discussing Possible Innovations	00	
Term Tests, Laboratory Examination/Written Exami	03	
Total	120	

## 7. Course Assessment and Reassessment

- Log book submission
- Clinical records with Photographs printed

The details of the components and subcomponents of course assessment is presented in the Programme Specifications document pertaining to the Skill Enhancement Training Programme. The procedure to determine the final course marks is also presented in the Programme Specifications document. The evaluation questions are set to measure the attainment of the COs. In either component (CE or Presentation) or subcomponent of CE, COs are assessed as illustrated in the following table.

	Component 1: CE (100% Weightage)
Subcomponent >	SC1: CE
Maximum Marks	50
CO-1	X
CO-2	X
CO-3	X
CO-4	X
CO-5	X
CO-6	X

The Course Leader assigned to the course, in consultation with the Head of the Department, shall provide the focus of COs in each component of assessment in the above template at the beginning of the semester.

Course reassessment policies are presented in the Academic Regulations document.

### 8. Achieving COs

The following skills are directly or indirectly imparted to the students in the following teaching and learning methods:

S. No	Curriculum and Capabilities Skills	How imparted during the course			
1.	Knowledge	Lectures, Case Based Discussion, Small Group discussion, Information Centre			
2.	Understanding	Lectures, Case Based Discussion, Small Group discussion, Information Centre, Assignment			
3.	Critical Skills	Case Based Discussion, Assignment			
4.	Analytical Skills	Class room lectures			
5.	Problem Solving Skills	Case Based Discussion, Small Group discussion, Assignment			
6.	Practical Skills	Clinical posting			
7.	Group Work	Case Based Discussion, Small Group discussion			
8.	Self-Learning	Assignment, Clinical posting, Information Centre			
9.	Written Communication	Assignment			

	Skills		
10.	Verbal Communication Skills	Clinical posting	
11.	Presentation Skills	Case Presentation	
12.	Behavioral Skills	Clinical posting	
13.	Information Management	Assignment, Information Centre	
14.	Personal Management	Clinical posting	
15.	Leadership Skills	Case Based Discussion, Small Group discussion	

### 9. Course Resources

## a. Essential Reading

- 1. Aschheim, K. and Dale, B. (2001). Esthetic dentistry. St. Louis: Mosby.
- 2. Freedman, G. (2012). Contemporary esthetic dentistry. St. Louis, Mo.: Mosby.
- 3. Goldstein, R. (1976). Esthetics in dentistry. Philadelphia: Lippincott.
- 4. Jordan, R. (1993). Esthetic composite bonding. St. Louis: Mosby-Year Book.
- 5. Paravina, R. and Powers, J. (2004). *Esthetic color training in dentistry*. St. Louis, Mo.: Elsevier Mosby.
- 6. Rufenacht, C. (2000). *Principles of esthetic integration*. Chicago: Quintessence Pub. Co.
- 7. Terry, D., Geller, W. and Terry, D. (2013). *Esthetic & restorative dentistry*. Chicago: Quintessence Pub. Co.
- 8. Touati, B., Miara, P. and Nathanson, D. (1999). *Esthetic dentistry and ceramic restorations*. London: Martin Dunitz.