

Student Life Cycle Management in a Medical University

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Detailed parameters for a comprehensive Student Life Cycle Management System in a Medical University.

Create a Entry Forms to capture following students information:

A. Application & Administrative Details:

- Application Number : (Auto generated and Unique)
- Course Code : (Should get allocated automatically)
- Course Name : (List Box)
- Advertisement Number : Optional
- Advertisement Date :
- Date of Entry (Application) : (System Generated)

B. Application Fee Details

- **Application Number (Should pass internally from A)**
- Last Date of Receiving Application Fee : (To be displayed from master data on right top corner.)
- Department : (List Box)
- Payment Type : (Online)
- Payment Transaction ID :
- Payment Date
- Amount Paid (Rs.)
- Name of Bank
- Branch Details
- Remarks (Payment)

C. Personal Details:

Application Number (Should pass internally from A)

- Name
- Applicant Signature
- Date of Birth
- Age (As on last date)
- Gender
- Place of Birth
- Marital Status
- Nationality
- Social Status (Others/SC-A/B/C/D/ST/BC-A/B/C/D/EWS/PH/Exservicemen/Sports/NCC/NSS/Freedom Fighter/ Category)
- Differently Abled (No/ Physical / Hearing/ Dumb/ Mental)
- Photograph

C. Applicant Identity Details :

- **Application Number (Should pass internally from A)**
- Identification Mark 1
- Identification Mark 2

- Aadhar Number
- PAN Card
- Driving License Number
- Passport Number
- Voter Id
- In-service (Govt.)

D. Contact Information:

- Correspondence Address
- Correspondence Country
- Correspondence State
- Correspondence District
- Correspondence Pin Code
- Correspondence Mobile No.
- Correspondence E-mail Id
- Permanent Address
- Permanent Country
- Permanent State
- Permanent District
- Permanent Pin Code
- Permanent Mobile No.
- Permanent E-mail Id
- Father's Email

E. Parent/Spouse Details:

- Father's Name
- Father's Age
- Father's Occupation
- Father's Gross Monthly Income
- Mother's Name
- Mother's Age

- Mother's Occupation
- Mother's Gross Monthly Income
- Spouse Name
- Spouse Age
- Spouse Occupation
- Spouse Gross Monthly Income

E. Educational Details:

- University Area
- TG EAPCET Registration Number
- TG EAPCET Hall Ticket Number
- TG EAPCET Rank

E.1 Course Name – (Intermediate/ X/XI/XII/B.Sc etc.,:

- Course Code
Course
- Year
Semester (I/II)
- Subject Code
Subject
Paper Code – Theory/Practicals
Exam Code – Semester End/MidTerm/Internal/Practical
Max Marks
- E.2 Applicant Code
Course Code
Year
Semester
Exam Code
Subject Code
Paper Code
Marks Obtained

Previous Academic Record (for each class listed):

- Class (e.g., Inter 2nd Year, 10th Class)
- Year of Study

- Name of School/College
- Place
- State
- District

VI. Documents Submitted (List of document types):

- CASTE CERTIFICATE
- 10th Class Marks Memo
- INTERMEDIATE MARKS MEMO
- 6TH to 10TH Study and Conduct Certificate
- INTER STUDY AND CONDUCT CERTIFICATE
- TRANSFER OR MIGRATION CERTIFICATE of Intermediate
- TELANGANA STATE EAPCET-2025 RANK CARD

Following are the additional parameters related to PG medical students.

I. Pre-Admission Phase (PG Specific):

- **Entrance Examination Details:**
 - PG Entrance Exam Name (e.g., NEET PG, INI-CET, State PG Entrance Exam)
 - PG Entrance Exam Roll Number
 - PG Entrance Exam Score/Percentile
 - PG Entrance Exam Rank
- **Prior Medical Qualification Details:**
 - Undergraduate Degree (e.g., MBBS, BDS)
 - University/Institution of Undergraduate Degree
 - Year of Passing Undergraduate Degree
 - Undergraduate Aggregate Percentage/GPA
 - Internship Completion Date
 - Medical Council Registration Number (State/MCI/NMC)
 - Medical Council Registration Date
 - Experience (if any, post-internship/UG)
- **Specialty Preference:**

- Preferred PG Specialty 1
- Preferred PG Specialty 2
- Preferred PG Specialty 3
- **Bond Details (if applicable):**
 - Rural Service Bond Status (Yes/No)
 - Bond Duration
 - Bond Amount

II. Admission & Onboarding Phase (PG Specific):

- **Mentor/Guide Allotment:**
 - Assigned Guide/Mentor Name
 - Guide/Mentor Department
 - Guide/Mentor Contact Information
- **Stipend Bank Account Details:** (Often more critical for PG students receiving regular stipends)
 - Bank Name
 - Account Number
 - IFSC Code

III. Academic & Ongoing Management Phase (PG Specific):

- **Thesis/Dissertation Management:**
 - Thesis/Dissertation Topic
 - Thesis/Dissertation Guide
 - Date of Thesis/Dissertation Proposal Submission
 - Date of Ethics Committee Approval
 - Progress Report Submission Dates
 - Final Thesis/Dissertation Submission Date
 - Viva Voce Date
 - Thesis/Dissertation Status (e.g., Approved, Under Review, Revisions Required)
- **Research & Publication Activity:**
 - Research Project Titles

- Role in Research Projects (e.g., Principal Investigator, Co-Investigator)
- Publications (Journal Name, Title, Year, Co-authors)
- Conference Presentations (Conference Name, Title, Year)
- **Clinical Rotations:**
 - Department Rotated
 - Start Date of Rotation
 - End Date of Rotation
 - Performance Evaluation by Head of Department/Unit
- **Logbook/Case Record Management:**
 - Number of Cases Presented/Procedures Performed
 - Logbook Submission Status
 - Logbook Reviewer/Sign-off Authority
- **Academic Presentations:**
 - Seminar/Journal Club Presentation Dates
 - Presentation Topics
 - Evaluation by Faculty
- **PG Leave Management:** (Specific to resident doctors' duties)
 - On-Duty Leave Approvals (for conferences, external postings)
 - Sick Leave/Casual Leave balance and utilization
- **Appraisal/Performance Review:**
 - Annual Performance Review Dates
 - Feedback from Department Head/Guide
 - Areas of Improvement/Strengths

IV. Examination & Assessment Phase (PG Specific):

- **Internal Assessment for PG:**
 - Internal Assessment Marks (Theory, Practical, Clinical)
 - Periodical Assessment Dates
- **PG Final Examination Details:**
 - Theory Papers Passed/Failed

- Practical/Clinical Exam Status
- Viva Voce Status
- Eligibility for Final Exit Exam

V. Post-Completion & Alumni Phase (PG Specific):

- **Specialty Certification:**
 - PG Degree Awarded (e.g., MD, MS, M.Ch., DM, DNB)
 - Date of Degree Award
- **Post-PG Registration:**
 - Updated Medical Council Registration Number (with PG qualification)
 - Updated Medical Council Registration Date
- **Employment Details (Initial Post-PG):**
 - First Employer Name
 - Position
 - Start Date
- **Further Fellowships/Super-Specialization:**
 - Applied for Fellowship/Super-Specialization (Yes/No)
 - Fellowship/Super-Specialization Program Name

1. Application Code:

- **Application Deadlines:** Start and end dates for each admission cycle.
- **Eligibility Criteria:** Minimum academic qualifications (e.g., specific subjects, percentage/grades), age limits, medical fitness, entrance exam scores (if any, reservation category wise).
- **Required Documents (Scanned Copies/Uploads):** Academic transcripts (10th, 12th, graduation if applicable), identity proof, address proof, passport-sized photographs, caste/category certificate (if applicable), medical fitness certificate, entrance exam scorecards.
- **Application Form Fields:** Personal details (name, DOB, gender, nationality), contact information, parent/guardian details, academic history, preferred course, declaration.
- **Application Fee Details:** Amount, payment gateway integration, payment status tracking, refund policy (if any).

- **Application Status Tracking:** Real-time updates for applicants (e.g., submitted, under review, shortlisted, rejected).
- **Communication Templates:** Automated emails/SMS for application receipt, reminders, status updates.

2. Apply by Colleges and Individuals – Approve – Schedule:

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- **Approval Workflow:** 1- , initial screening, 2 academic verification, 3 entrance exam score verification).
- **Reviewer Roles & Permissions:** Assign specific individuals/departments to review applications.
- **Shortlisting Parameters:** Criteria for shortlisting candidates (e.g., cutoff scores, academic performance, category).
- **Interview/Counseling Scheduling:** Dates, times, venue (online/offline), panel members, notification to candidates.
- **Interview/Counseling Parameters:** Evaluation rubrics, scoring mechanisms, document verification during the process.
- **Decision Recording:** Outcome of interview/counseling (selected, waitlisted, rejected).

II. Admission & Onboarding Phase:

3. Allotment of Course:

- **Allotment Logic:** Based on merit rank, preference given by student, availability of seats, reservation policies.
- **Course Quotas:** General, reserved categories (SC/ST/OBC/EWS), management quota, NRI quota.
- **Allotment Confirmation:** Mechanism for students to accept or reject the allotted course.
- **Waitlist Management:** Prioritization and automatic allocation from waitlist if seats become available.
- **Course Change Request:** Policy and procedure for students requesting a change in allotted course (if allowed).

4. Registration:

- **Registration Period:** Dates for completing the registration process.
- **Required Information for Registration:** Updated contact details, emergency contacts, medical history (if required for university records).
- **Undertakings/Declarations:** Anti-ragging undertaking, code of conduct agreement, academic integrity pledge.
- **Course Registration (for specific subjects/modules):** If applicable, allowing students to select elective courses within their program.
- **Registration Status Tracking:** Complete/Incomplete status.
- **Enrollment Number Generation:** Unique identifier for each registered student.
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5. Admission:

- **Admission Confirmation Checklist:** Verification of all required original documents.
- **Admission Letter Generation:** Official document confirming admission, including course details, start date, and fee structure.
- **Student Profile Creation:** Comprehensive digital profile in the university's Student Information System (SIS).

- **Biometric Data Capture:** Fingerprints, facial scan for attendance/access control (optional but increasingly common).
- 6. Fee Collection (Initial Admission Fees):**
- **Fee Components:** Tuition fees, admission fees, library fees, lab fees, caution deposit, hostel fees (if applicable), examination fees (initial).
 - **Payment Modes:** Online payment gateway (credit card, debit card, UPI, net banking), bank transfer, demand draft, cash (rarely for large amounts).
 - **Installment Options:** Defined payment schedules and due dates for installments.
 - **Late Fee Policy:** Penalties for delayed payments.
 - **Receipt Generation:** Automated, printable receipts with transaction details.
 - **Fee Status Tracking:** Paid, partially paid, due, overdue.
 - **Refund Policy:** Detailed terms and conditions for fee refunds upon withdrawal.
- 7. ID Card Generation:**
- **Data Fields:** Student Name, Enrollment Number, Course, Blood Group, Validity Date, University Logo, Student Photograph, Barcode/QR Code.
 - **Design Template:** Standardized design for all student ID cards.
 - **Issuance Process:** Distribution schedule and acknowledgment of receipt.
 - **Lost/Damaged ID Policy:** Procedure for requesting duplicate ID cards, associated fees.
- 8. Originals Storage & Retrieval System with QR Code:**
- **Document List:** Definitive list of original documents to be collected (e.g., 10th/12th mark sheets, degree certificates, transfer certificates, migration certificates, caste certificates).
 - **Storage Location:** Secure, fire-proof, climate-controlled physical storage.
 - **Indexing System:** Unique identifier for each document bundle, linking to student ID.
 - **QR Code Integration:** QR code on each student's document file/folder linking to their digital profile for quick verification and retrieval.
 - **Access Control:** Authorized personnel only for retrieval and deposition.
 - **Retrieval Request Process:** Formal request form, approval workflow, tracking of documents taken out and returned.
 - **Return Policy:** Procedure for returning original documents to students upon course completion, No Due Certificate clearance.
- 9. Upload Documents:**
- **Document Types:** Categorization (e.g., academic, identity, medical, fee receipts, consent forms).
 - **File Formats:** Permitted formats (PDF, JPG, PNG).
 - **File Size Limits:** Maximum size for each upload.
 - **Versioning:** Ability to upload updated versions of documents.
 - **Verification Status:** System to mark documents as "verified," "pending verification," or "rejected" with reasons.
 - **Student Access:** Students can view their uploaded documents.
- III. Academic & Ongoing Management Phase:**
- 10. Time and Attendance Management:**
- **Attendance Modes:** Biometric (fingerprint/facial recognition), manual marking by faculty, RFID.
 - **Lecture/Lab/Clinical Duty Schedules:** Integration with academic timetable.

- **Attendance Thresholds:** Minimum attendance percentage required for various activities (e.g., exam eligibility, practical completion).
- **Real-time Tracking:** Live attendance data availability for students and faculty.
- **Absenteeism Reporting:** Automated alerts for extended absences.
- **Leave Application Process:** Student requests for leave, approval workflow, and impact on attendance.
- **Attendance Reports:** Daily, weekly, monthly, course-wise, student-wise reports.

11. **Scholarship / Stipend Management:**

- **Scholarship Schemes:** Internal university scholarships, government schemes, external grants.
- **Eligibility Criteria:** Academic performance, financial need, category-specific requirements.
- **Application Process:** Online application form, required documents (income certificates, academic records).
- **Selection Committee/Process:** Defined committee and evaluation criteria.
- **Disbursement Schedule:** Dates and methods of stipend/scholarship payment.
- **Performance Monitoring:** Criteria for continuation of scholarship (e.g., maintaining GPA).
- **Reporting:** Tracking of disbursed amounts, beneficiary lists.

12. **Attendance (Specific Eligibility):**

- **Purpose:** Specifically for determining eligibility for examinations or course completion.
- **Minimum Percentage:** University-defined minimum attendance (e.g., 75% or 80%) for theory and practical components.
- **Condonation Policy:** Rules for condoning attendance shortages (e.g., medical reasons, participation in university events) and the process for applying for condonation.
- **Defaulter List Generation:** Automated lists of students not meeting attendance criteria.
- **Communication:** Notifications to students and parents regarding attendance shortages.

13. **Observership Programmes:**

- **Program Details:** Duration, department/specialty, objectives, learning outcomes.
- **Application Process:** Internal/external student application, faculty approval.
- **Eligibility:** Academic standing, year of study.
- **Placement Matching:** Matching students with available slots/mentors.
- **Tracking:** Monitoring student participation and completion.
- **Certificate of Completion:** Issuance upon successful completion.

IV. Examination & Assessment Phase:

14. **Exam Schedule:**

- **Academic Calendar Integration:** Sync with university's overall academic calendar.
- **Exam Types:** Internal assessments (unit tests, mid-terms), end-semester exams, supplementary exams, practical exams, viva-voce.
- **Dates & Times:** Precise scheduling of theory papers, practicals, viva.
- **Venue Allocation:** Assignment of examination halls/labs based on student count.
- **Invigilator Assignment:** Roster for faculty invigilation duties.
- **Notifications:** Release of schedule to students and faculty, usually well in advance.
- **Clash Management:** System to identify and resolve timetable clashes.

15. **Exam Eligible Students:**

- **Eligibility Criteria:** Minimum attendance, completion of internal assessments, no outstanding fees, prior exam pass status (for subsequent exams).
- **Defaulter List:** Generation of lists of students ineligible for exams.
- **Review and Appeal Process:** Mechanism for students to appeal against ineligibility.
- **Communication:** Notification to eligible and ineligible students.

16. Hall Ticket Generation:

- **Data Fields:** Student Name, Enrollment Number, Course, Roll Number, Exam Dates, Subjects, Exam Centre, Photograph, Instructions.
- **Security Features:** Barcode/QR code for authenticity, watermark.
- **Download Portal:** Online portal for students to download and print their hall tickets.
- **Verification at Exam Hall:** Checking hall ticket against ID card.

17. Examination – External / Internal / Theory / Practical:

- **Question Paper Management:** Secure generation, moderation, and distribution.
- **Exam Conduction Protocols:** Rules for students (allowed/disallowed items), invigilation guidelines.
- **Answer Sheet Collection & Security:** Secure transport and storage.
- **Evaluation Process:** Double-blind evaluation, external examiners for specific exams.
- **Mark Entry & Tabulation:** Digital system for secure mark entry and automated tabulation.
- **Result Processing:** Calculation of internal marks, external marks, total marks, grades, and pass/fail status.
- **Re-evaluation/Re-totalling Process:** Application, fee, and procedure for mark verification.

18. Theory Exam:

- **Specific Marking Scheme:** Detailed breakdown of marks per question/section.
- **Duration:** Time allocated for each paper.
- **Question Paper Format:** MCQ, descriptive, short answer, long answer.
- **Blueprints:** Content coverage and weightage.

19. Practical Exam:

- **Components:** Lab performance, viva-voce, case presentation, spotters.
- **Evaluation Rubrics:** Detailed criteria for assessing practical skills.
- **External Examiners:** Mandatory presence for certain practical exams.
- **Infrastructure Requirements:** Availability of labs, equipment, patients/models.

20. Exit Exam:

- **Mandatory/Optional:** Whether it's a compulsory licensing exam or a university-specific exit assessment.
- **Scope & Syllabus:** Comprehensive assessment of the entire medical curriculum.
- **External Body Involvement:** Often conducted or overseen by a national medical council.
- **Passing Criteria:** Specific cutoffs for clearance.

V. Post-Completion & Alumni Phase:

21. No Due Certificate:

- **Clearance Departments:** Library, Hostel, Accounts, Academic Department, Sports, Labs, Administration.
- **Checklist:** Verification of return of all university property, payment of all outstanding dues.
- **Process Flow:** Student initiates request, departments provide clearance, final certificate issued.

- **Digital Workflow:** Automated routing of clearance requests.

22. Degree Issuance:

- **Eligibility for Degree:** Successful completion of all courses, passing all examinations, cleared all dues.
- **Degree Certificate Template:** Standardized format with university seal, signatures, security features.
- **Convocation Ceremony:** Planning and execution of the graduation event.
- **Dispatch/Collection:** Procedure for students to receive their degrees (in person, by mail).
- **Digital Degree/Blockchain Integration:** Future-proofing for verifiable digital degrees (emerging trend).

23. Alumni List Management:

- **Alumni Database Fields:** Name, contact info, course, graduation year, current profession, employer, achievements.
- **Alumni Engagement:** Communication channels (newsletter, social media), events (reunions, webinars).
- **Career Services:** Support for alumni career development.
- **Mentorship Programs:** Connecting current students with alumni.
- **Donation/Funding Campaigns:** Engaging alumni for university development.

24. Duplicate Certificate Issuance:

- **Application Process:** Formal application, affidavit (for lost certificates), police FIR (for lost certificates).
- **Required Documents:** Identity proof, original application copy (if available).
- **Fees:** Applicable charges for duplicate certificates.
- **Verification Process:** Cross-verification of student records.
- **Processing Time:** Defined turnaround time for issuance.
- **Security Features:** "Duplicate" stamp, unique serial number.