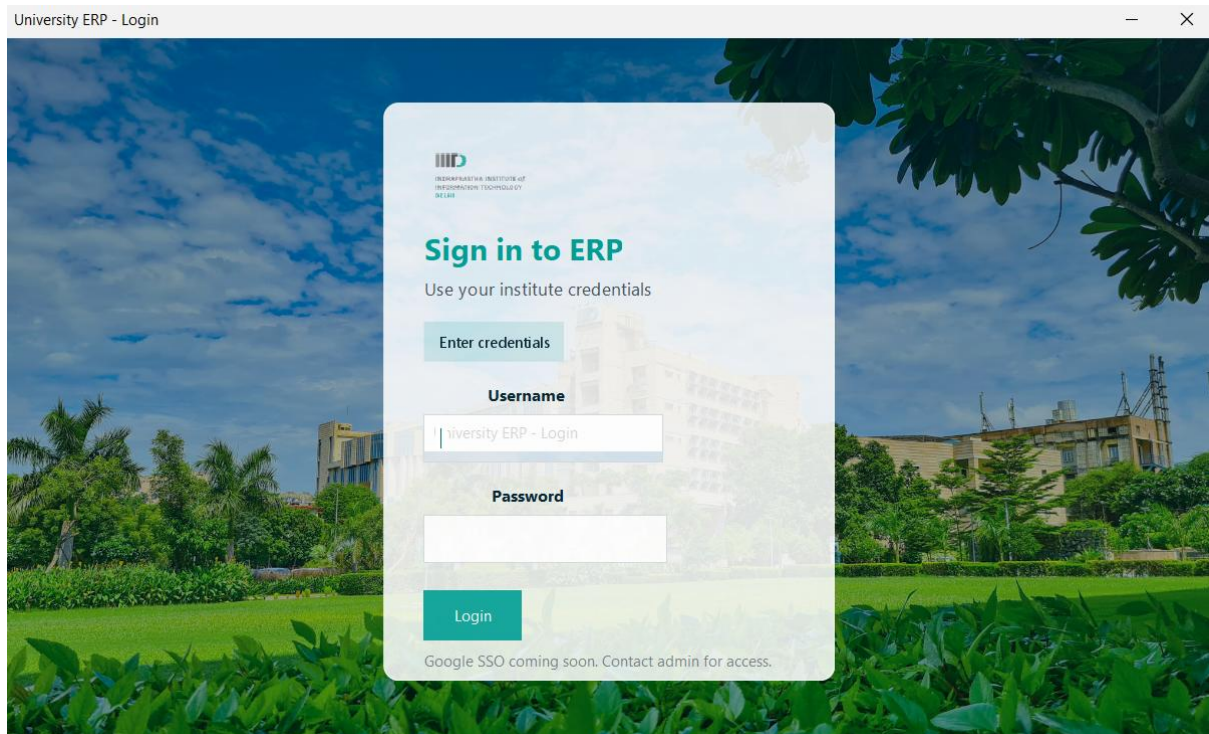


# University ERP Sample Report

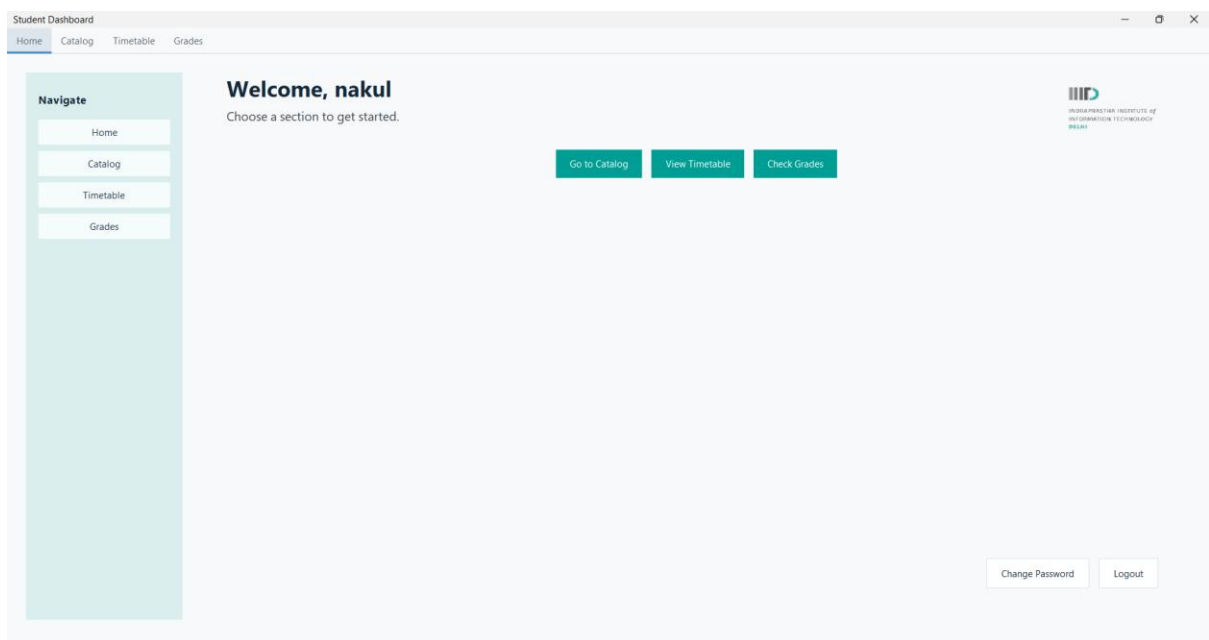
## OVERVIEW & SCREENSHOTS

### 1) Login Screen:



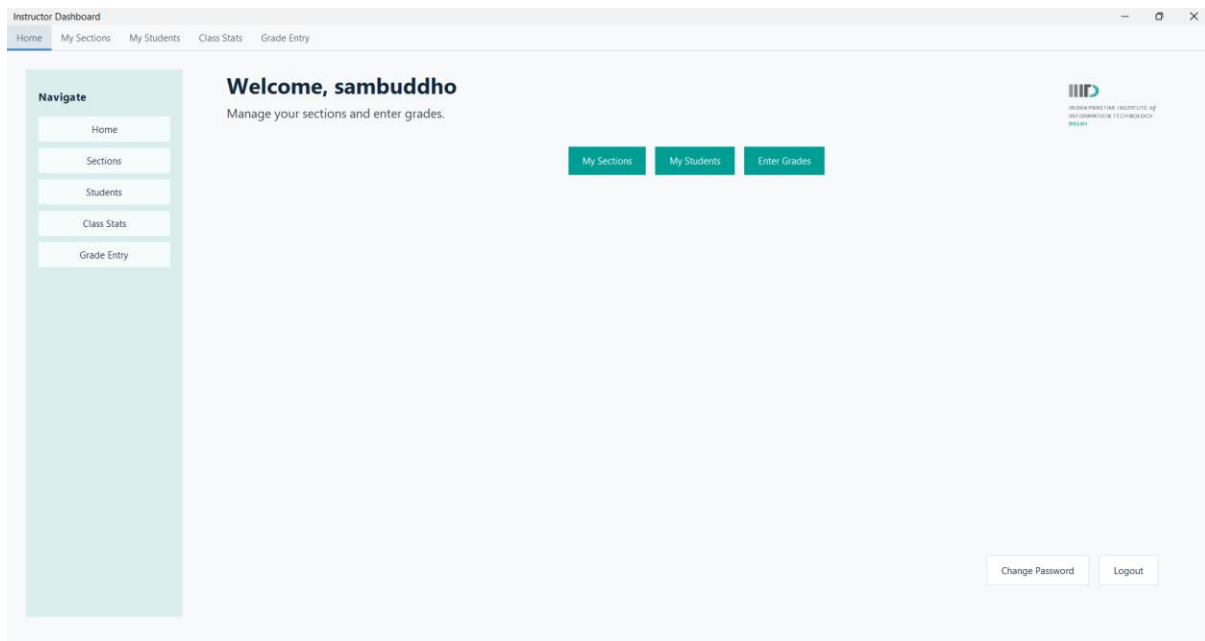
Shows role-agnostic login, banner for errors

### 2) Student Dashboard:



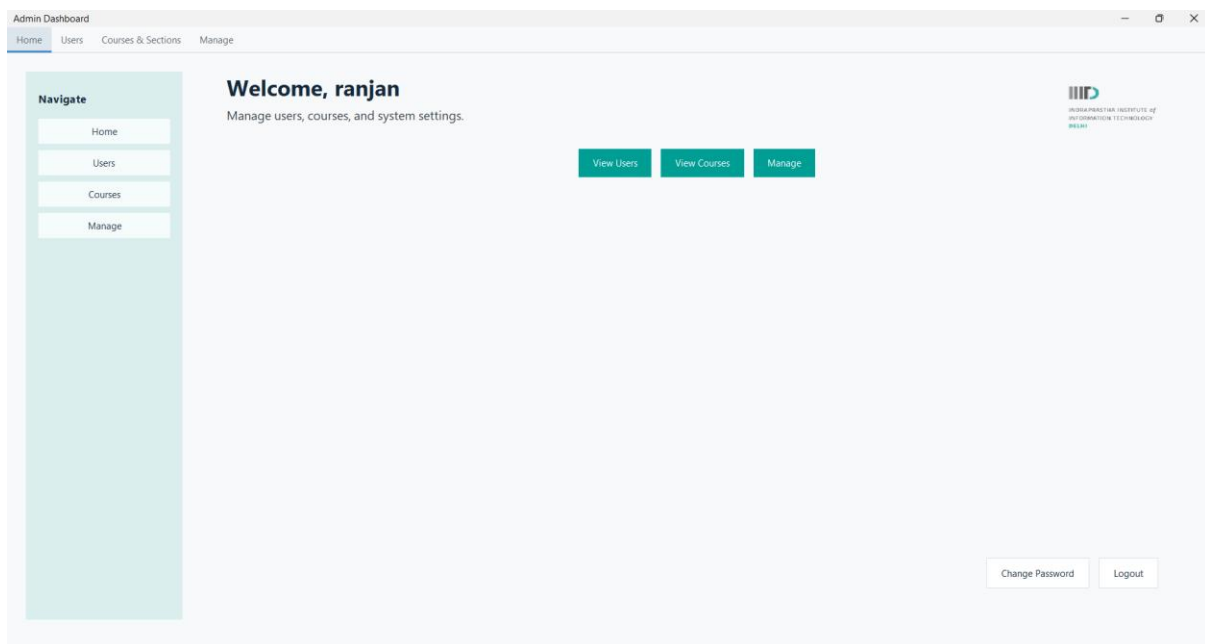
Catalog + registrations + grades widgets

### 3) Instructor Dashboard:



Section list, grade entry table, final-grade calculator

### 4) Admin Dashboard:



User/course/section forms, maintenance toggle

## FINAL-GRADE WEIGHTING RULE

Each section persists:

- `weighting_rule`: comma-separated integers that sum to 100 (e.g. 30,30,40)
- `component_names`: matching components (Quiz, Midterm, Final)

FLOW:

1. Instructor enters component scores (0–100)
2. System multiplies each score by `weight/100`
3. Sum populates `grade_books.final_grade` and UI label
4. Rules shown to instructor to avoid confusion

Examples (from `database.sql`):

- SEC-DB-001 → 30,30,40 for Quiz, Midterm, Final
- SEC-OS-001 → 20,30,50 for Lab, Midterm, Final
- SEC-HI-001 → 25,35,40 for Essay, Midterm, Final (deadline passed scenario)

## ROLES & MAINTENANCE ENFORCEMENT

1) ROLES:

- Auth DB (`erp_auth.auth_users`) stores username, role, `password_hash`
- After login, ERP DB provides profile (students or instructors)
- `AccessController` enforces:
  - \* Students → only their catalog/registrations/grades
  - \* Instructors → only their sections and students
  - \* Admin → full CRUD + maintenance toggle

2) MAINTENANCE MODE:

- Toggle stored in `erp_data.settings` (`maintenance_on`)
- Admin console button flips the flag; UI banners update instantly
- When ON:
  - \* Students: register/drop disabled; read-only access with warning
  - \* Instructors: grade entry & section modifications blocked; message displayed

\* Admin: still allowed to manage data for emergency fixes

- When OFF: normal operations immediately resume

Admin Dashboard

HomeUsersCourses & SectionsManage

Navigate

HomeUsersCoursesManage

Manage System

Add users, courses, sections, and manage maintenance mode.

Capacity:

Semester (1 or 2):

Academic Year:

Registration Deadline (YYYY-MM-DD):

Weighting Rule (e.g., 20,30,50):

Component Names (e.g., Quiz,Midsem,Endsem):

Add Section

Maintenance Mode

Turn OFF

Data Utilities

Seed 100 Demo Courses

Backup Courses & Sections

Restore Backup

Maintenance Mode ON — read-only operations.

Student Dashboard

HomeCatalogTimetableGrades

Navigate

HomeCatalogTimetableGrades

Course Catalog

Browse every open section, see real-time capacity, and take action instantly.

Section ID	Course	Title	Credits	Instructor	Schedule	Capacity	Taken
SEC-DB-001	CS301	Database S...	4	Associate P...	MONDAY 0...	1	1
SEC-OS-001	CS302	Operating S...	4	Associate P...	WEDNESD...	40	1
SEC-HI-001	HIST101	Modern His...	3	Associate P...	FRIDAY 11...	30	1

Refresh CatalogDownload Transcript (CSV)Drop SectionRegister Section

My Registrations

Section	Course	Day	Time	Room
SEC-OS-001	CS302	Wednesday	14:00 - 15:30	LH-201

Message

Maintenance mode is ON. Registration is read-only.

OK

Maintenance Mode ON — read-only operations.

## DATABASE TABLE LISTS

Schema	Table	Purpose
erp_auth	auth_users	Credentials & auth metadata
erp_data	students	Student profiles tied to auth user_id
	instructors	Instructor profiles
	courses	Course catalog
	sections	Course offerings
	enrollments	Student registrations
	grade_books	Final grade per enrollment
	grade_components	Component scores per enrollment
	settings	Key/value settings (maintenance flag)

## EXTRAS & ENHANCEMENTS

Feature	Description
Backup/Restore	Admin can export/import catalog
Transcript Export	Students download CSV from grades panel
Capacity & Deadline Guards	UI + DB constraints ensure no edge cases fail
Maintenance Banner	Visual banner + disabled buttons
Testing Pack	Acceptance plan & summary documented