MINI PROJECT LOGBOOK

(CSM601: Mini Project 2B)

GROUP MEMBERS

- 1. Varun Budhani (10/D12C)
- 2. Prem Ghundiyal (22/D12C)
- 3. Yash Ingale (29/D12C)
- 4. Harsh Pimparkar (51/D12C)

Dr. Sujata Khedkar



Department of Computer Engineering

Vivekanand Education Society's Institute of Technology,
HAMC, Collector's Colony, Chembur,
Mumbai-400074

University of Mumbai (AY 2024-25)

INSTITUTE VISION & MISSION

VISION:

To create a vibrant knowledge oriented environment with innovative teaching practices and to inculcate a tradition of socially conscious application of technology.

MISSION:

- To inculcate a culture of value based education.
- To enthuse students to develop in an ambient environment of caring and of sharing information.
- To enable students to work towards excellence in their chosen field with a professional bent of mind.

COMPUTER ENGINEERING DEPARTMENT

VISION:

To reach international standards by empowering students with Computing skills and cutting edge technology

MISSION:

- To sustain excellence in teaching and research and create centre of excellence
- To provide broad Educational and Research experiences through interdisciplinary and industrial collaboration programs.
- To prepare students to enter the world of computing and make them ready for productive employment in the public or private sectors, enhance their entrepreneurship skills and motivate them to pursue advanced degrees.

PROGRAM EDUCATIONAL OBJECTIVES (PEO's)

I	To provide students with a solid foundation in their core concepts of mathematical, scientific and
	computer engineering fundamentals required to comprehend, analyze and design solutions for
	real life problems.
II	To inculcate in students, a balanced outlook with professional and ethical attitude, develop
	effective communication skills, teamwork and leadership qualities with multidisciplinary
	approach.
III	To prepare students to excel in postgraduate programs through an excellent academic
	environment and make them ready for productive employment in the public or private sectors
	and provide lifelong learning experience.
IV	To provide broad educational and research experience through interdisciplinary and industry
	centric programs.

PROGRAM OUTCOMES (POs)

Program	
Outcome	Program Outcome Description
Code	
	Basic Engineering knowledge: An ability to apply the fundamental knowledge in
PO1	mathematics, science and engineering to solve problems in Computer engineering.
	Problem Analysis: Identify, formulate, research literature and analyze computer
PO2	engineering problems reaching substantiated conclusions using first principles of
	mathematics, natural sciences and computer engineering and sciences
	Design/ Development of Solutions: Design solutions for complex computer engineering
	problems and design system components or processes that meet specified needs with
PO3	appropriate consideration for public health and safety, cultural, societal and
103	environmental considerations.

	Conduct investigations of complex engineering problems using research-based					
PO4	knowledge and research methods including design of experiments, analysis and					
	interpretation of data and synthesis of information to provide valid conclusions.					
	Modern Tool Usage: Create, select and apply appropriate techniques, resources and					
PO5	modern computer engineering and IT tools including prediction and modeling to					
	complex engineering activities with an understanding of the limitations.					
	The Engineer and Society: Apply reasoning informed by contextual knowledge to assess					
PO6	societal, health, safety, legal and cultural issues and the consequent responsibilities					
	relevant to computer engineering practice.					
	Environment and Sustainability: Understand the impact of professional computer					
PO7	engineering solutions in societal and environmental contexts and demonstrate knowledge					
	of and need for sustainable development.					
	Ethics: Apply ethical principles and commit to professional ethics and responsibilities					
PO8	and norms of computer engineering practice.					
	Individual and Team Work: Function effectively as an individual, and as a member or					
PO9	leader in diverse teams and in multidisciplinary settings.					
10)	reader in diverse teams and in mattaiscipinary settings.					
	Communication: Communicate effectively on complex engineering activities with the					
PO10	engineering community and with society at large, such as being able to comprehend and					
	write effective reports and design documentation, make effective presentations and give					
	and receive clear instructions.					
	Project Management and Finance: Demonstrate knowledge and understanding of					
PO11	computer engineering and management principles and apply these to one's own work, as					
	a member and leader in a team, to manage projects and in multidisciplinary					
	environments.					
	Life-long Learning: Recognize the need for and have the preparation and ability to					
PO12	engage in independent and lifelong learning in the broadest context of technological					
	change.					

PROGRAM SPECIFIC OUTCOMES (PSOs)

PSO1	Professional Skills - The ability to develop programs for computer based systems of
	varying complexity and domains using standard practices.
	Successful Career - The ability to adopt skills, languages, environment and platforms for
PSO2	creating innovative career paths, being successful entrepreneurs or for pursuing higher
	studies.

STUDENT INFORMATION

Project Title:

	Student 1	Student 2	Student 3	Student 4	
UID/Roll No.	10	29	51	22	
Name	Varun Budhani	Yash Ingale	Harsh Pimparkar	Prem Ghundiyal	
Class with Division	D12C	D12C	D12C	D12C	
Contact No.	7020965092	9321889261	8451894399	9307702287	
	2022.varun.budhani@ve	2022.yash.ingale@v	2022.harsh.pimparkar	2022.prem.ghundiy	
E-mail	s.ac.in	es.ac.in	@ves.ac.in	al@ves.ac.in	
	Dlot no 24 kanyyar nagar	A-502,Dharma Sita	C/803 'Ekdant',	Chri Amba Vruna	
	Plot no.24,kanwar nagar	Park CHS	Sawlaram Srushti	Shri Ambe Krupa	
Address	Sindhi colony	Raju Nagar	New RTO road	Dwarkanath Colony	
	Jalgaon-425001	Dombivali - 421202	Kalyan-421301	Amravati - 444606	

INSTRUCTIONS TO STUDENTS:

- 1. The logbook must be submitted to the Guide or Co-Guide for verification and evaluation of project activities at least once in a week.
- 2. Logbook duly signed by the guide must be submitted with a project report for evaluation at the end of semester to the department.

DECLARATION

I declare that this project represents my ideas in my own words and wherever others' ideas or words have been included, I have adequately cited and referenced the original sources. I also declare that I have adhered to all principles of academic honesty and integrity and have not misrepresented or fabricated or falsified any idea/data/fact/source in my project work. I promise to maintain minimum 75% attendance, as per the University of Mumbai norms. I understand that any violation of the above will be cause for disciplinary action by the Institute.

Yours Faithfully

- 1. Varun Budhani (10)
- 2. Yash Ingale (29)
- 3. Harsh Pimparkar (51)
- 4. Prem Ghundiyal (22)

(Signature of Students)

Letter of Acceptance

I undersigned, **Prof. Sujata Khedkar** working in the Computer Engineering department, willing to guide the project titled **Data Insights using Large Language Models** for the Mini Project 2B Semester VI respectively for the *Academic Year 2024-25*. The names of the students are:

- 1. Varun Budhani (10)
- **2. Yash Ingale (29)**
- 3. Harsh Pimparkar (51)
- 4. Prem Ghundiyal (22)

(Project Mentor) (Mini Project Coordinator) (HOD Computer)

.

COURSE OUTCOMES

CO No.	COURSE OUTCOME	POs covered	PSOs covered
CO1	Identify problems based on societal /research needs.	PO1, PO2,PO4	PSO1,PSO2
CO2	Apply Knowledge and skill to solve societal problems in a group.	PO1,PO2,PO4, PO5,PO6,PO8	PSO1,PSO2
СОЗ	Develop interpersonal skills to work as a member of a group or leader.	PO1,PO2,PO4, PO9,PO11	PSO1,POS2
CO4	Draw the proper inferences from available results through theoretical/ experimental/simulations.	PO1,PO2,PO4, PO5,PO6,PO12	PSO1,POS2
CO5	Analyze the impact of solutions in societal and environmental context for sustainable development.	PO2,PO3,PO4, PO7,PO12	PSO1,POS2
CO6	Use standard norms of engineering practices	PO1,PO2,PO4, PO12	PSO1
CO7	Excel in written and oral communication.	PO1,PO4,PO8, PO9,PO10,PO12	PSO1
CO8		PO1,PO2,PO4, PO12	PSO1
CO9	Demonstrate project management principles during project work.	PO1,PO2,PO4, PO11,PO12	PSO1,POS2

CO-PO-PSO MAPPING

	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12	PSO1	PSO2
CO1	1	2	-	2	-	-	_	-	-	-	-	-	1	1
CO2	2	2	-	2	3	2	-	2	-	_	-	-	2	1
CO3	1	1	-	2	-	-	_	-	3	3	-	-	1	1
CO4	2	1	ı	1	2	2	_	-	ı	-	-	2	2	1
CO5	-	2	1	2	-	-	3	-	-	-	-	1	1	2
CO6	1	2	-	1	-	-	_	-	-	-	-	2	2	-
CO7	1	1	1	1	-	-	_	3	2	2	-	1	1	-
CO8	1	3	-	3	-	-	_	-	1	-		2	1	-
CO9	1	1	-	2	-	-	_	-	-	-	2	2	1	2

SCHEDULE FOR MINI PROJECT

Date	Wee k	Contents	Remark	Guide Sign
22/01/2	-	Integrated prompt-to-chart logic using LLM		
5	1	(Llama3/OpenAI)		
28/01/2	2	Improved prompt handling; added prompt templates and		
5		fallback logic		
05/02/2	3	Added dynamic chart generation using Matplotlib & Seaborn		
10/02/2	4	Enhanced layout and interaction in react; added loading		
5	4	states and validations		
18/02/2	_	Implemented export feature (chart image/PDF with explanation		
5	5	text)		
24/02/2		Research Paper draft and further project implementation		
5	6	discussion		
06/03/2	_	Performed cross-file testing (Excel/CSV), verified various		
5	7	chart types		
10/03/2	0	Final debugging, error logs review, and user flow		
5	8	refinement		
18/03/2	9	Finalising Research Paper.		
5	<i>)</i>			
25/03/2	10	Final documentation, code walkthrough, result summary,		
5	10	and PPT preparation		

PROGRESS/ATTENDANCE REPORT

Title of the Project:	Data Insights using Large Language Models
Group No. 09	Varun Budhani (10) Yash Ingale (29) Harsh Pimparkar (51) Prem Ghundiyal (22)
Name of the Project	Mentor: Dr. Sujata Khedkar

Sr.	Date Attendance	Date Attendance		Progress/Suggestion		Mappin	g		
No		1	2	3	4		СО	PO	PSO
1	22/01/2	\	>	~	~	Integrated prompt-to-chart logic using LLM (Llama3/OpenAI)			
2	28/01/2	>	٧	~	V	Improved prompt handling; added prompt templates and fallback logic			
3	05/02/2	~	~	~	~	Added dynamic chart generation using Matplotlib & Seaborn			
4	10/02/2	~	~	•	,	Enhanced layout and interaction in react; added loading states and validations			
5	18/02/2	>	٧	~	V	Implemented export feature (chart image/PDF with explanation text)			
6	24/02/2 5	•	>	~	•	Research Paper draft and further project implementation discussion			
7	06/03/2	>	٧	~	~	Performed cross-file testing (Excel/CSV), verified various chart types			
8	10/03/2	>	٧	~	'	Final debugging, error logs review, and user flow refinement			
9	18/03/2 5	~	~	V	~	Finalising Research Paper.			
10	25/03/2 5	~	~	,	,	Final documentation, code walkthrough, result summary, and PPT preparation			

EXAMINER'S FEEDBACK FORM

f External examiner:			
of External examiner:			
f Internal examiner:			
Examination://			
tudents in project team:			
ility of separate lab for the project: Yes / No			
t Performance Analysis (Put Tick as per your Observation)			
)		1
	(3)	(2)	(1)
Effective use of skill sets			
Effective use of standard engineering norms			
Contribution of an individual's as member or leader			
Clarity in written and oral communication			
Overall performance			
	•	? (Yes	/ No)
	tudents in project team: ility of separate lab for the project: Yes / No Performance Analysis (Put Tick as per your Observation) Excellent (3) Very Good (2) Good (1) Observation Quality of problem and Clarity Innovativeness in solutions Cost effectiveness and Societal impact Full functioning of working model as per stated requirements Effective use of skill sets Effective use of standard engineering norms Contribution of an individual's as member or leader Clarity in written and oral communication Overall performance	of External examiner: f Internal examiner: Examination: / tudents in project team: ility of separate lab for the project: Yes / No t Performance Analysis (Put Tick as per your Observation) Excellent (3) Very Good (2) Good (1) Observation (3) Quality of problem and Clarity Innovativeness in solutions Cost effectiveness and Societal impact Full functioning of working model as per stated requirements Effective use of skill sets Effective use of standard engineering norms Contribution of an individual's as member or leader Clarity in written and oral communication Overall performance	of External examiner: f Internal examiner: Examination: /