Final Semester Project:

OBJECTIVE:

Evaluate both writing and speaking skills through data-driven projects. Emphasis is on the spoken component (70% speaking, 30% writing). These projects are designed to help you analyze data, tell a compelling story, and express your insights clearly in English.

RULES & FORMATS:

Individual or Group:

Projects can be done individually or in groups. In group projects, all members receive the same mark.

Formats:

- o **In Person or Video:** Preferred formats for presentations.
- o **Podcast:** Allowed, though not recommended due to the high level of vocal intonation required.

GENERAL GUIDELINES FOR SUCCESS:

Writing Component (10%):

- Produce a concise, well-structured report (approximately 300–500 words).
- Use formal academic language, precise data citations, and include visual aids (charts, graphs).
- Reference data from reliable sources such as:
 - World Bank: https://data.worldbank.org
 - Gapminder: https://www.gapminder.org/data/
 - Pew Research Center: https://www.pewresearch.org
 - Statista: https://www.statista.com

Speaking Component (20%):

- Prepare to speak for 5- to 7-minute each (in-person or video) to clearly explain your analysis.
- Practice your pacing and use discourse markers, etc., (e.g., "Firstly," "In contrast") throughout your talk.

Integrate visual aids to enhance your delivery and engage your audience. And, remember! Storytelling can help you create a successful presentation.

Project Ideas:

Energy Source Comparison: Global Insights

Task: Compare electricity generation sources (e.g., fossil fuels, renewables, nuclear) in two different countries.

Situation Details:

- Analyze government reports and international energy databases.
- > Discuss factors like cost, environmental impact, and sustainability. **Deliverables:**
- ➤ Writing: A 300–500 word report with pie charts and bar graphs.
- > **Speaking:** A video or in-person presentation explaining key trends and differences (minimum 5-minute, máximum 7 each person in the team).

Sources & Links:

- World Bank Energy Data: https://data.worldbank.org/topic/energy-and-mining
- International Energy Agency: https://www.iea.org/statistics

Survey & Analysis: Social Networks and Wellbeing

Task: Design and conduct a survey on the impact of social media on well-being among peers or community members.

Situation Details:

- Prepare a short questionnaire (online tools like Google Forms can be used).
- Interview people face-to-face or virtually about their social media habits and emotional responses.

Analyze trends: frequency of use, preferred platforms, and perceived effects (positive or negative).

Deliverables:

- ➤ **Writing:** A survey report including data visualizations (e.g., histograms, scatter plots) and interpretation of results.
- > **Speaking:** A presentation (video/in-person) summarizing your findings and discussing implications (minimum 5-minute, máximum 7 each person in the team).

Sources & Links:

- Pew Research Center Social Media Studies: https://www.pewresearch.org/internet/
- Google Forms: https://www.google.com/forms/about/

Market Share Investigation: Tech Industry Analysis

Task: Investigate the market shares of leading tech products (e.g., smartphones, streaming platforms).

Situation Details:

- Explore recent market reports and trends.
- Compare different brands or services using available statistical data.
- > Predict future trends based on current data.

Deliverables:

- Writing: A structured report with comparative pie charts and competitor analysis.
- > **Speaking:** A live presentation using slides (video or in-person) that highlights market trends and future projections (minimum 5-minute, máximum 7 each person in the team).

Sources & Links:

- Statista Market Data: https://www.statista.com
- > TechCrunch: https://techcrunch.com

Demographic Trends: Regional Analysis

Task: Analyze population data such as age distribution or population growth for a specific region or city.

Situation Details:

- Use demographic databases to understand growth trends, migration patterns, or aging populations.
- Discuss potential social and economic implications for local policy. **Deliverables:**
- Writing: A demographic report with clear visualizations and policy recommendations.
- Speaking: A 5-minute video presentation explaining the challenges and opportunities based on your analysis.
 Sources & Links:
- United Nations Demographic Data: https://population.un.org/wpp/
- Data.gov: https://www.data.gov

Budget Breakdown: Financial Analysis

Task: Study the budget allocation for a school, NGO, or local government.

Situation Details:

- Research and critique spending priorities and compare them with other institutions.
- Debate the effectiveness and fairness of the budget distribution. **Deliverables:**
- ➤ **Writing:** A 300–500 word critique with visual aids (charts/graphs) illustrating spending.
- Speaking: A debate-style presentation (video/in-person) defending or challenging the budget decisions.
 Sources & Links:
- Local Government Budget Reports: https://www.usa.gov/local-government

Open Budget Data: https://www.openbudgets.eu

Mathematical Paradoxes on YouTube: Explaining Complex Ideas

Task: Create a YouTube video that explains a mathematical paradox (e.g., the Monty Hall problem or Nash Equilibrium) using statistical analysis.

Situation Details:

- > Break down the paradox with clear examples and simulations.
- Use animations or whiteboard explanations to visualize concepts.
- Include interactive elements such as questions or quizzes. **Deliverables:**
- ➤ **Writing:** A script (300–500 words) that outlines your explanation, data analysis, and references.
- > **Speaking:** A video recording that makes the content accessible and engaging to a general audience (minimum 5-minute, máximum 7 each person in the team).

Sources & Links:

- Khan Academy Game Theory: https://www.khanacademy.org
- YouTube Educational Channels like Numberphile: https://www.youtube.com/user/numberphile

Teach the Teacher: Explaining Statistical Concepts

Task: Prepare a lesson in English where you explain a challenging statistical concept (e.g., confidence intervals, hypothesis testing, regression analysis) to your teacher.

Situation Details:

Develop clear, step-by-step explanations using examples, analogies, and visuals.

> Simulate a classroom environment where you anticipate questions and address them during the presentation.

Deliverables:

- > Writing: A detailed lesson plan (300–500 words) with supporting visuals.
- > **Speaking:** A video or in-person teaching session, emphasizing clarity and engagement (minimum 5-minute, máximum 7 each person in the team).

Sources & Links:

- MIT OpenCourseWare Statistics: https://ocw.mit.edu/courses/statistics/
- ➤ Coursera Statistical Inference Courses: https://www.coursera.org

Evaluation Rubric (30% of Final Mark):

Criteria	Writing (10%)	Speaking (20%)	
Content & Accuracy	Clear data interpretation and logical structure (3%)	Depth of analysis and relevance (5%)	
Accordey	and logical shoctore (576)	1616 (3/0)	
Clarity & Organization	Grammar, vocabulary, and formatting (4%)	Fluency, pacing, and logical flow (5%)	
Visual Aids	Effective use of charts/graphs (3%)	Good integration of visuals (5%)	
	1		
		Audience interaction,	
Engagement	N/A	tone, and enthusiasm (5%)	

Below is a detailed rubric chart that breaks down each criterion into specific performance levels with assigned points. The rubric is divided into two sections: Writing (10 points) and Speaking (20 points), totaling 30 points (or 30% of the final mark).

Writing Rubric (10 Points Total)	
Students in the Group:	
Project Title:	Project Choice: video / in person / podcast

Criteria	Max Points	Poor (0 Point)	Average (1–2 Points)	Good (3 Points)	Excellent (3 or 4* Points)
Content & Accuracy	/ 3		Basic data interpretation is present but lacks clarity or depth; structure is only partially logical.	Mostly clear and accurate interpretation with a logical structure; minor errors may be present.	Provides clear, accurate, and insightful data interpretation with a robust and logical structure.
Clarity & Organization	/ 4*	Numerous grammatical, vocabulary, and formatting errors that disrupt understanding; organization is lacking.	vocabulary that mildly affect clarity; organization is	Generally clear with few errors; well-organized overall but may have minor lapses in flow or formatting.	Exceptionally clear, error-free, and highly organized; ideas flow logically and coherently.
Visual Aids	/3	Visual aids are absent or poorly chosen, adding little or no value to the written report.	aligned with the content; limited	Visual aids support the content and are generally well-designed; they enhance understanding, though minor improvements are possible.	Visual aids are expertly selected and seamlessly integrated, greatly enhancing the report's clarity and persuasiveness.

Total Writing Points: ___ / 10

Speaking Rubric (20 Points Total)	
Students in the Group:	
Project Title:	Project Choice: video / in person / podcast

Criteria	Max Points	Poor (0–1 Point)	Average (2 Points)	Good (3 - 4 Points)	Excellent (5 Points)
Content & Analysis	/ 5	Analysis is superficial or off- topic; key points are missing or unclear.	Basic analysis is presented with limited depth; may miss some relevant points or connections.	covers most key points; demonstrates a	Offers in-depth, insightful analysis that covers all key points with exceptional relevance and clarity.
Clarity & Organization	/ 5	Speech is disorganized, difficult to follow, and frequently interrupted by hesitations or unclear transitions.	Some structure is evident, but the flow is somewhat disjointed or uneven; occasional clarity issues occur.	Generally clear, logically organized, and well-paced; minor issues in fluency or transitions.	Exceptionally fluent, logically structured, and well-paced; ideas are delivered with clarity and ease throughout the speech.
Visual Aids Integration	/ 5	If used, visual aids are poorly integrated, distracting, or not relevant to the spoken content.	Visual aids are used but in a limited or awkward manner; they add some value but are not well integrated.		Visual aids are seamlessly integrated, significantly enhancing the presentation and aiding audience comprehension.
Engagement	/ 5	Lacks audience engagement; the speaker's tone is monotone, with minimal or no audience interaction.	Some engagement is evident, but the delivery may be inconsistent; audience interaction is limited.	appropriate tone and some effective audience interaction; minor	Highly engaging delivery with dynamic tone, excellent audience interaction, and a strong connection with the listeners.

Total Speaking Points: ____ / 20

Happy analyzing and presenting!

How to Use This Rubric:

1. For Each Criterion:

You'll be assigned points based on your performance level (Poor, Average, Good, Excellent). For example, in "Content & Accuracy" for Writing (3 points):

- o If the work is poor, score between 0 and 1.
- o If it's average, score between 1 and 2.
- o If it's good, score between 2 and 3.
- o For excellent work, award the full 3 points.

2. Final Mark Calculation:

Scores from the Writing (10 points total) and Speaking (20 points total) sections will be added to get a combined score out of 30, which represents 30% of the final course mark.

This detailed rubric clearly distinguishes performance levels and provides constructive feedback, helping you understand specific areas for improvement.

Additional Tips for Success:

- 1. **Research Thoroughly:** Utilize online data repositories and academic journals for up-to-date statistics.
- 2. **Practice Delivery:** Rehearse your presentation multiple times, preferably with peer feedback.
- 3. **Emphasize Clarity:** Both your written and spoken components should be clear, concise, and accessible.
- 4. **Be Creative:** Use multimedia tools like Canva or PowerPoint to enhance your visual aids and storytelling.
- 5. Stay Formal: Maintain an academic tone and structure, avoiding overly casual language in both writing and speaking.