Lab 4: Summarization and Text Transformation

Objective:

Use ChatGPT to summarize text and transform tone (formal ↔ informal).

Activity 1: Summarizing a News Article

Original Text:

"NASA's Artemis mission is set to return humans to the Moon by 2026. The mission aims to establish a long-term presence on the lunar surface, paving the way for future Mars expeditions. Artemis III will land astronauts near the lunar south pole, an area rich in ice deposits that could be used for fuel and life support."

Prompt Used:

"Summarize this news article in 2 sentences."

Summarized Output:

NASA's Artemis mission will return humans to the Moon by 2026, targeting a landing near the lunar south pole. The mission aims to establish a long-term lunar presence and prepare for future Mars exploration.

Accuracy: High Length: Concise

Clarity: V Clear and informative

Activity 2: Summarizing a Research Abstract

Original Abstract:

"This paper investigates the use of convolutional neural networks (CNNs) for image classification tasks. We trained several CNN architectures on the CIFAR-10 dataset and compared their accuracy, training time, and robustness to noise. Results show that deeper networks generally achieve better accuracy but at the cost of higher computational time."

Prompt Used:

"Summarize the abstract in a single sentence."

Summarized Output:

The study compares CNN architectures for image classification on CIFAR-10, finding deeper models yield higher accuracy but require more computation.

Accuracy: V High

Tone: ✓ Technical and concise Retention of key points: ✓

Activity 3: Tone Transformation – Informal to Formal Email

Original (Informal):

"Hey, just checking in to see if you had time to review the doc I sent last week. Let me know what you think!"

Prompt Used:

"Rewrite this email in a formal tone."

Formal Output:

"Dear [Recipient],

I hope this message finds you well. I wanted to follow up regarding the document I sent last week. Kindly let me know if you've had a chance to review it.

Best regards,

[Your Name]"

Tone Accuracy: V Converted from casual to professional effectively

Activity 4: Tone Transformation – Formal to Informal Email

Original (Formal):

"Dear Team,

Please be reminded that tomorrow's meeting will commence promptly at 10:00 AM in the main conference room. Your timely presence will be appreciated."

Prompt Used:

"Rewrite this message in an informal tone."

Informal Output:

"Hey team,

Just a heads-up—our meeting's tomorrow at 10 AM in the main conference room. Make sure vou're there on time!"

Tone Accuracy: ✓ Natural and casual, still clear

Conclusion:

ChatGPT handles **summarization** and **tone transformation** tasks with high accuracy and clarity. It's especially effective when given precise instructions (e.g., word count, tone type). These capabilities are useful for content editing, academic research, and professional communication.