Magma-8B Multi-Technique Analysis Report

Generated: 2025-06-11 08:48:36 **Model:** Microsoft Magma-8B

Task/Prompt: From the entrance, go towards the green sofa

Input Image



Analysis Results

STANDARD Technique

Direct prompting without additional reasoning steps

Response:

the camera wearer goes up the stairs

COT Technique

Chain-of-Thought: Step-by-step reasoning before final answer

Response:

The green sofa is located in the bottom right corner of the image, near the center of the room. To get there, walk straight ahead from the entrance, passing by the bookshelves on your left and the TV on your right. Continue moving forward until you reach the green sofa.

COD Technique

Chain-of-Draft: Draft thoughts followed by refined response

Response:

1. Please proceed to the green sofa. 2. You will find a comfortable seating area there. 3. Enjoy your time in this space. 4. If you need anything, feel free to ask. 5. Have a pleasant day!

COT_CONSISTENCY Technique

Self-Consistency: Multiple reasoning paths with majority voting

Majority Vote Result:

The green sofa is located in the lower right corner of the image. It appears to be a comfortable seating area within the office space. To get there, follow the direction indicated by the purple circle on the floor plan.

All Samples:

Sample 1: The green sofa is located in the lower right corner of the image. It appears to be a comfortable seating area within the office space. To get there, follow the direction indicated by the purple circle on the floor plan.

Sample 2: the first thing you should do when entering this office space is to look for the green sofa located near the corner of the room. It's a comfortable place to sit and relax during short breaks. Sample 3: the green sofa is on the right side of the room.

Sample 4: As you enter the office space, you see a variety of furniture and objects arranged in a modern and functional layout. The first thing that catches your eye is the green sofa situated on the right side of the room. This comfortable piece of furniture adds a touch of color to the otherwise neutral palette of the space. In addition to the sofa, there are several chairs scattered throughout the room, providing ample seating options for employees. A bookshelf stands tall on the left side of the room, housing an array of books and other items, suggesting a space that values knowledge and learning. On the right side of the room, there's a kitchenette equipped with essential appliances, including a sink, a stove, and a refrigerator. This suggests that the office also serves as a place where employees can prepare meals or snacks during their breaks. The floor beneath these pieces of furniture is made of white tiles, which reflect natural light streaming in from the large windows on the left side of the room. These windows not only provide ample sunlight but also offer views of the city, adding an urban touch to the workspace. Overall, this image presents an office space that is both functional and aesthetically pleasing, designed to promote productivity and comfort for its occupants.

Sample 5: the green sofa is located in the living room area.

Analysis Summary

This report compares four different prompting techniques applied to the Magma-8B vision-language model. Each technique has different strengths:

- Standard: Fast and direct, good for simple tasks
- CoT: Better reasoning for complex tasks requiring step-by-step thinking
- CoD: Iterative refinement for improved response quality
- CoT-Consistency: Most robust but computationally expensive, reduces hallucinations