

Pengembangan teknik prompting untuk memicu dialog proaktif pada Large Language Models = Development of prompting techniques to trigger proactive dialogues in Large Language Models

Manurung, Cecilia Inez Reva, author

Deskripsi Lengkap: <https://lib.ui.ac.id/detail?id=9999920570655&lokasi=lokal>

Abstrak

Dalam lanskap pendidikan modern yang semakin terintegrasi dengan teknologi AI, kebutuhan akan interaksi yang lebih dinamis dan adaptif antara mahasiswa dan sistem AI menjadi krusial, misalnya dalam simulasi ujian lisan. Oleh karena itu, penelitian ini memanfaatkan berbagai skema prompting seperti Proactive Chain-of-Thought (PCoT), Standard Prompting, Demonstration-based Prompting, Instruction-based Prompting, serta pendekatan Zero-Shot dan Few-Shot untuk meningkatkan proaktivitas LLM. Hasilnya, ProCoT Zero-Shot terbukti efektif dalam identifikasi kebutuhan Clari cation Need Prediction (CNP) dengan F1 Score 0.99. Untuk Clari cation Question Generation (CQG), ProCoT Few-Shot menunjukkan keunggulan signifikan dengan BLEU-1 41.8. Sementara itu, dalam target-guided dialogue, metode Proactive (baik Zero-Shot maupun Few-Shot) menunjukkan kinerja superior dalam kualitas respons generatif untuk pemanduan dialog menuju target dialog. Penelitian ini menyimpulkan bahwa efektivitas prompting sangat spesifik terhadap tugas dan memerlukan pemilihan strategi untuk mencapai interaksi AI yang lebih efektif dan adaptif.

.....In the rapidly evolving landscape of modern education, increasingly integrated with AI technology, the need for more dynamic and adaptive interactions between students and AI systems has become crucial. This research analyzes and optimizes various prompting techniques to enhance the proactivity of Large Language Models (LLMs), specially in clari cation scenarios (Clari cation Need Prediction/ CNP and Clari cation Question Generation/ CQG) and target-guided dialogues. Various prompting schemes, including Proactive Chain-of-Thought (PCoT), Standard Prompting, Demonstration-based Prompting, Instruction-based Prompting, as well as Zero-Shot and Few-Shot approaches, were utilized. The results show that ProCoT Zero-Shot proved highly effective in Clari cation Need Prediction (CNP), achieving an F1 Score of 0.99. For Clari cation Question Generation (CQG), Pro- CoT Few-Shot demonstrated significant superiority with a BLEU-1 score of 41.8. Meanwhile, in target-guided dialogues, the Proactive method (both Zero-Shot and Few-Shot) showed superior performance in generative response quality for guiding dialogues towards a target. This research concludes that prompting effectiveness is highly task-specific and necessitates a nuanced strategy selection to achieve more effective and adaptive AI interactions.