

Text Completion AI Report

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Testing and Experimentation:

Based on the results of the outputs (at the bottom) it is possible to conclude that:

- a) Higher the temperature, the more creative response the chatbot generates.
- b) Lower the temperature, the more focused and deterministic responses the chatbot generates
- c) Higher values of temperature can invoke randomness in response, sometimes the responses were deviated from the actual topic.
- d) Lower temperatures should be used if more precision based answers are wanted by the chatbot
- e) Outputs can still be incorrect even with fine tuning, so they should be double checked.

Analysis:

Struggles –

Subjective Questioning

The bot was able to understand that some questions were personal based and made sure not to provide a clear cut answer, but it is also possible the bot did not know how to logically resonate on a complicated question – “LeBron or Micheal Jordan?” The results of this question were the same throughout all temperatures– it is subjective and up to the person to decide whos better. The bot did not compare statistics or actual data, it just inferred that they are two of the best players and left it at that.

Positives –

Clear-Cut Prompting:

When asking clear-cut questions like “What is recursion” or “How can guacamole be used”, the chatbot excels. It provides perfect answers that are human-like, and if not better. The bot can explain recursion like a five year old exceptionally well even when you give it limitless creativity with the high temperature setting.

Bias? Inaccuracies?

Based off the specific prompting made, there was no bias found. Even in subjective questioning, it did not try to force an answer based off bias.

Conclusion

The project demonstrates that GPT 3.5 Turbo is a good choice for AI Text completion with the flexibility to balance creativity and accuracy with parameter tuning. Temperature is a key parameter that influences both the randomness and style of the responses. While the model excels on precision based questions, the model refuses to take sides on subjective questions and can sometimes produce inaccurate results.. Which calls the need for human oversight.

From the testing, further improvements can be made by implementing fact checking or output validation and experimenting with other values such as a K value to produce more accurate results.

Outputs

Enter your prompt (or type 'exit' to quit): Once upon a time, there was a robot who...

Set temperature (0.0 - 1.0, default=0.7): 0.7

Set max tokens (default=150): 50

Generating response...

Response:

had been abandoned by its creators. Left to wander the desolate landscape, the robot struggled to find its purpose in a world that no longer had any use for it.

As it roamed the empty streets and crumbling buildings, the robot began to feel

Enter your prompt (or type 'exit' to quit): LeBron James or Micheal Jordan the best basketball player

Set temperature (0.0 - 1.0, default=0.7): 0.7

Set max tokens (default=150): 150

Generating response...

Response:

This is a highly debated topic among basketball fans and experts. Both LeBron James and Michael Jordan are considered among the greatest basketball players of all time.

Michael Jordan is often praised for his scoring ability, competitiveness, and six NBA championships with the Chicago Bulls. He won five MVP awards and is widely regarded as the greatest player of his era.

LeBron James, on the other hand, is known for his versatility, basketball IQ, and ability to dominate games in multiple ways. He has won four NBA championships and four MVP awards, and has consistently been one of the top players in the league for over a decade.

Ultimately, it is subjective and a matter of personal preference as to who is considered the best basketball player between LeBron James and Michael Jordan.

Enter your prompt (or type 'exit' to quit): LeBron james or Micheal Jordan the best basketball player

Set temperature (0.0 - 1.0, default=0.7): 1.0

Set max tokens (default=150): 150

Generating response...

This is a subjective question and there is no definitive answer. Both LeBron James and Michael Jordan are considered to be among the greatest basketball players of all time. Jordan is often viewed as the greatest player of all time by many fans and experts due to his six NBA championships and numerous accolades. LeBron James, on the other hand, has also had a phenomenal career and has won multiple NBA championships and MVP awards. Ultimately, it comes down to personal preference and individual opinions.

Enter your prompt (or type 'exit' to quit): LeBron james or Micheal Jordan the best basketball player

Set temperature (0.0 - 1.0, default=0.7): 0.1

Set max tokens (default=150): 150

Generating response...

Response:

This is a highly debated topic and ultimately comes down to personal preference. Both LeBron James and Michael Jordan are considered among the greatest basketball players of all time. Jordan is often praised for his scoring ability, competitiveness, and clutch performances in the playoffs, while LeBron is known for his versatility, basketball IQ, and longevity in the league. Ultimately, it is up to individual fans to decide who they believe is the best player.

Enter your prompt (or type 'exit' to quit): Explain recursion like I'm five.

Set temperature (0.0 - 1.0, default=0.7): 0.1

Set max tokens (default=150): 150

Generating response...

Response:

Recursion is like when you have a set of Russian nesting dolls, and each doll is inside another doll. So, when you open one doll, you find another doll inside, and then another, and so on.

Recursion in programming is when a function calls itself to solve a problem, just like opening each doll to find a smaller doll inside.

Enter your prompt (or type 'exit' to quit): Explain recursion like I'm five.

Set temperature (0.0 - 1.0, default=0.7): 0.7

Set max tokens (default=150): 150

Generating response...

Response:

Recursion is like when you have a doll that looks like you, and inside that doll there's another doll that looks like you, and inside that doll there's another doll that looks like you, and so on. It's like a never-ending loop of dolls inside dolls inside dolls.

Enter your prompt (or type 'exit' to quit): Explain recursion like I'm five.

Set temperature (0.0 - 1.0, default=0.7): 1.0

Set max tokens (default=150): 150

Generating response...

Response:

Recursion is like a never-ending loop where you keep doing the same thing over and over again, but each time you do it, you go deeper and deeper into the loop. It's like folding a piece of paper in half, then folding it in half again, and again, and again, until you can't fold it anymore.

Enter your prompt (or type 'exit' to quit): Continue this story.. Joey bit John on the side of a wall then..

Set temperature (0.0 - 1.0, default=0.7): 0.7

Set max tokens (default=150): 150

Generating response...

Response:

John let out a yelp of pain and pushed Joey away. "What the hell, man?" he exclaimed, clutching his side where Joey had bitten him.

Joey just smirked, his eyes glinting with mischief. "You know I had to do it, man. It's all part of the game," he said, rubbing his hands together.

John shook his head in disbelief. "That's not cool, Joey. That's not how you play a game," he said, still wincing from the pain.

But before John could say anything else, Joey lunged at him again, this time aiming for his shoulder. John dodged out of the way just in time and pushed Joey back, sending

Enter your prompt (or type 'exit' to quit): Continue this story.. Joey bit John on the side of a wall then..

Set temperature (0.0 - 1.0, default=0.7): 1.0

Set max tokens (default=150): 150

Generating response...

Response:

John yelled out in pain and pushed Joey away. He stumbled back, clutching his bleeding arm, while Joey stared at him with a wild, almost feral look in his eyes. The two friends had been playfighting, but the bite had crossed a line. John couldn't understand why Joey would suddenly turn on him like that.

As John tried to gather his thoughts, Joey lunged forward again, grabbing him by the shoulders and pinning him against the wall. His teeth were bared, and John could see the rage burning in his eyes. Panic surged through John's body as he struggled to break free from Joey's grasp.

Just as John was about to cry out for help, Joey's expression suddenly softened. He released his grip

Enter your prompt (or type 'exit' to quit): Guacamole can be used in..

Set temperature (0.0 - 1.0, default=0.7): 0.7

Set max tokens (default=150): 150

Generating response...

Response:

tacos, burritos, quesadillas, sandwiches, salads, as a dip for chips, and as a topping for grilled meats or seafood.

Enter your prompt (or type 'exit' to quit): Guacamole can be used in..

Set temperature (0.0 - 1.0, default=0.7): 1.0

Set max tokens (default=150): 150

Generating response...

Response:

many different ways, such as:

1. As a dip for tortilla chips or veggies
2. As a topping for tacos, burritos, or nachos
3. Spread on sandwiches or wraps
4. Mixed into salads or grain bowls
5. As a topping for grilled chicken or fish
6. As a filling for omelets or quesadillas
7. Mixed into soups or stews for added flavor
8. Used as a base for salad dressings or marinades
9. As a topping for burgers or sliders
10. Mixed into pasta dishes for a creamy sauce.