



INTEGRATING CHATGPT WITH THE CUSTOM-BUILT PRODUCT DATA EXCHANGE (PDE) PLATFORM

ABOUT THE CLIENT

Being a multi-language and multi-brand business, the client approached us with the task to integrate ChatGPT with their PDE system. The purpose of the integration was to automate the generation and translation of product descriptions by using one of the LLMs (Large Language Models). After we completed the project, the client got the opportunity to translate and generate product descriptions in any language and for any product set while not leaving their PDE system.

SCOPE OF THE PROJECT

The client approached us with the request to integrate ChatGPT with their PDE system. The PDE system we've built for the client enables their team to exchange product data across their multiple businesses and brands. While some of their brands are targeted at one country, another part of their businesses is focused on other countries and regions. As they build their cross-selling strategy, they needed an effective solution for the automatic generation and translation of product descriptions. This would streamline their cross-selling efforts and increase sales.



The project's scope was broken down into 2 major phases. The first phase was the integration of ChatGPT with the PDE system to generate product descriptions in any language from scratch. The second phase was the regeneration of the existing descriptions as our client aims to regularly update the descriptions to keep them relevant and catchy. As per the client's request, our team integrated the PDE system with ChatGPT via API. We enabled automated product descriptions based on product properties, categories, brand, series, as well as 6 product identifiers.



As a result, the client got a simple yet effective process for generating automated product descriptions and description translations with ChatGPT. For this, they do not even have to leave their PDE system. The manager's task is to prepare a product list by sorting the products with the help of filters. Then, the manager presses the export button, selects the preferred language, and chooses the option of adding ChatGPT descriptions for the selected products. The interaction of the system with ChatGPT is a multi-threaded process, which helps us increase the speed of response generation.



THEIR CHALLENGES

The client's team needed to enhance their cross-selling process by adding automated product descriptions and description translation to save manager's time and grow their sales.

Prior to the project, the client's team used another implementation method for integrating ChatGPT with their system. The process was single-threaded and very time-consuming.

OUR SOLUTIONS

1

Forbytes integrated the PDE system they use for cross-selling management with ChatGPT, which is now one of the most powerful Large Language Models capable of producing responses to the user's prompts.

2

We made the process of integrating ChatGPT with the PDD system multi-threaded, which helped us boost the speed of response generation. A user is notified about the estimated waiting time for the LLM to generate the product description set.



Our client expected to get access to ChatGPT's capabilities that could be useful for them without leaving their system and have the chance to choose the file format for the product descriptions.

As an owner of multiple ecommerce stores, the client wanted to have the chance to change the details of the ChatGPT's prompt depending on the e-store they choose.

3

The client can use the simple UI in the PDE system to generate product descriptions or translations of the descriptions and export them in any convenient file format (e.g. .json, .jsonl, .csv, .xlsx).

4

While staying in the system, managers can set the tonality and the target audience for each store, which helps ChatGPT better understand user expectations and generate personalized product descriptions.

TECH STACK

Backend

PHP 8.1
Lumen 9

Frontend

Vue.js 2

Database

MongoDB

CI:

Jenkins

Cloud platform

Google Cloud

Search Engine:

Elasticsearch

HOW WE ADD VALUE

01. COST EFFICIENCY

If the client decided to write the product descriptions manually, they would need to hire more employees for this task. Furthermore, product descriptions should be written in several languages, which means that they would need to find employees with a multi-language background. By integrating ChatGPT with their system, the client can automatically generate product descriptions just in a few clicks. There's no need to increase the number of employees to perform this task regularly, which saves them a lot of time, cost, and effort.

02. HIGH-QUALITY RESULTS

The tasks completed manually by humans are prone to human error. In the case of writing product descriptions, this may result in linguistic mistakes, typos, grammatical errors, etc. The descriptions translated from one language to another would require even more careful attention and proofreading. This all would take a lot of time and effort from the client's team as they sell millions of products and run more than 150 brands. By delegating this task to ChatGPT, the client gets plagiarism-free and error-free product descriptions and description translations of as many products as needed.

03. UNIQUE AND CATCHY CONTENT

Writing product descriptions requires a lot of creativity and brainstorming from the content specialist team. It's often hard to make two different descriptions for similar products or translate a description to another language and keep it as engaging as in the original. ChatGPT is one of the best-trained LLMs that can generate unlimited versions of the same message based on the prompt you give it. Our team tested many prompt formats and came to the perfect version that considers the audience's type, tonality, constraints, output type, and target language. The detailed prompt helps AI technology process and understand the task and deliver unique and catchy content per user request.

04. UNLIMITED SCALING OPPORTUNITIES

Our client is one of the biggest ecommerce enterprises in the Nordic region. Altogether, they own more than 150 ecommerce websites and brands. In their system, the client's team manages over 1 million products. So far, the client's needs in the automatic translation are covered with the current ChatGPT version. Even if the client decides to expand their assortment, the capabilities of ChatGPT will also allow them to keep generating product descriptions automatically. For this purpose, we chose the version of ChatGPT that best suits client needs, budget, and expectations.

FUTURE COOPERATION

We've promptly completed the project, and our cooperation continues. Automated product descriptions save a lot of time and effort for the client. Together, we explore other ways of using ChatGPT in ecommerce that would increase efficiency and improve performance. As the client's needs grow, we will be ready to add new features and integrations to the system.

