

Elevating customer insights with data enrichment in pharmaceuticals

Business objective

Commercial Performance

Sector

Pharma

Context & objectives

A **large pharmaceutical company's** lower quality database prevented them from performing an accurate segmentation of General Practitioners and other specialists in Belgium.

Obtaining more precise customer insight was crucial for the company to effectively allocate acquisition and retention resources. Therefore, we set out to gather publically available, open data on potential clients and build customer knowledge.

This data enrichment project aimed to inform better commercial targeting in the future (i.e., improving personalized messages and communication channels).

Approach

We worked together with the marketing and operation departments to maximize the relevance of the outcomes. First, we assessed the scraping potential of the different sources, selecting the most relevant ones. Next, we deployed web scraping techniques and collected open data on doctors from various public websites (e.g., INAMI, Google search, LinkedIn, and appointment platforms like Doctena). We used a Search Engine Results Page (SERP) API to obtain filtered results from a Google search and PhantomBuster for LinkedIn.

We did the web scraping and the consolidation with the Python programming language. The process is replicable for any future internal development at the pharmaceutical company or data refresh at any time.

Finally, we incorporated the data obtained in an Excel file.

Results

At the end of the project, we delivered a model and other resources allowing the client to eventually **use the data to create segments that inform future marketing campaigns**, including:

- The consolidated database, enriched with all scraped data
- A data dictionary – detailing each database’s column, thus giving information on each feature.
- The documentation of the methodology and code. We developed scripts to build the dataset.
- We developed the entire code in Python for future replicability and internal development.
- A report detailing the approach.

The database began with 15,000 doctors and 13 features on these doctors. After the web scraping project and leveraging seven sources in total, this number is now 40 new features, thus giving a richer picture of each profile.

And, because we made sure that the code for scraping data is replicable, the client can perform a future data refresh and internal development.

Thanks to the data analysis, the client has **improved customer knowledge and can make smarter decisions** around coordinating commercialization efforts. After completing the project in 3 weeks, the client quickly understood the necessary subsequent actions to **increase customer retention and commercial potential**.

About Agilytic

Since 2015, Agilytic helps innovative leaders solve their biggest challenges through the smarter use of data. With over 150 successful projects to date, we have perfected a pragmatic approach to putting data at the service of business goals, be they commercial, operational, financial, or human. Reach out today for a quick introduction, we'd love to hear from you.