

CAS CUSTOM SERVICESSM

BOOSTING PURCHASING POWER WITH A CUSTOM FEEDSTOCK INTELLIGENCE PLATFORM

Solution success story

The challenge: Pricing and chemical information for millions of tons of raw materials

While globalization fosters rapid and seamless international trade, it simultaneously introduces inherent uncertainties for complex supply chains due to an unstable global economy, volatile markets, and fierce price negotiations.

To forecast feedstock price fluctuations and empower purchasing teams, a large multinational consumer goods company comprehensively analyzed its raw materials to dissect their composition. This initiative aimed to enhance its ability to predict price changes for fundamental feedstock components and determine the supplier material costs to facilitate negotiations. However, for a large business handling millions of tons of products, retracing the original compounds and every refining step up to the raw material involves months of strategic search and manual verification.

The organization's data scientists successfully identified over 6,000 unique substances that went into more than 4 million tons of purchased raw materials. Lacking dedicated experts and robust data management requirements hindered the team's ability to connect these substances to the raw materials via a synthetic route at a scale that could impact the business.

Left with only a taste of the project's potential value, the organization struggled to predict feedstock price changes and guide its purchasing team. This opportunity pushed the company to seek external expertise from the reliable company and data source it trusted, CAS.



The solution: A comprehensive custom intelligence platform connecting feedstocks to raw materials

The organization partnered with CAS Custom Services to develop a tailored solution that enhances its knowledge of feedstock composition and synthesis from raw materials. It enables its purchasing team to integrate commodity pricing information into their feedstocks. To fulfill this ambitious project, CAS gathered a first-in-class cross-functional team to collaborate on the solution.

By leveraging internal databases, advanced calculations, and protocols, CAS data scientists and developers identified the original components and plausible reactions for each feedstock and its precursors. CAS chemists finalized the recipes by filling in the blanks of each reaction scheme and bringing decades of chemical knowledge to solve the problem. This effort successfully covered 95% of the company's 4.2 million tons of feedstock.

To harness the full potential of this newfound information, the customer integrated the solution directly into a custom platform. As a supporting tool, this digital solution enabled purchasing teams, often not chemists, to closely monitor market development and capitalize on powerful chemical insights during contract negotiations.

Find out how CAS Custom Services can help you transform scientific data into actionable, evidence-based insights that maximize investment and fuel success. Learn more at **cas.org**.

