# Data Science Enhances Shopping Experience on Kroger.com with "Complements"

84.51°

Have you ever shopped on Kroger.com, looked at a product and thought, "I wonder what other products would go well with, or *complement*, this item?"

84.51°'s Data Science team is helping to answer that question for you with its "You Might Also Like" carousel – providing recommendations for items that complement each other, or merely are frequently purchased together.
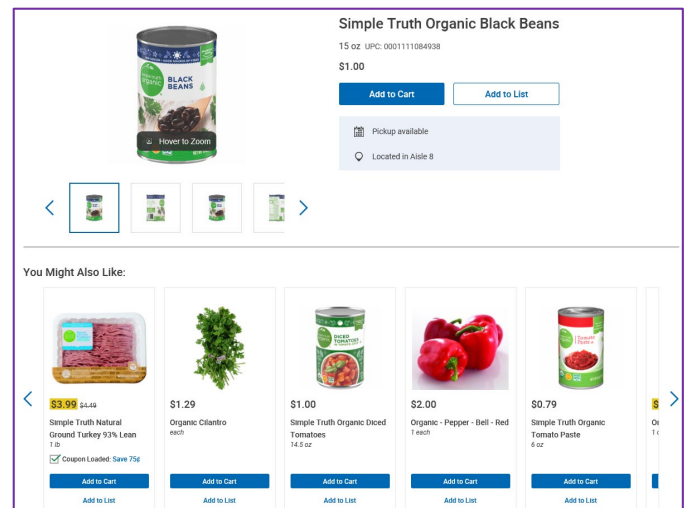
WHAT IS COMPLEMENTS SCIENCE?

Complements Science delivers relevant recommendations to customers, on individual product pages, based on items that pair well with products being displayed. These show up in a "You Might Also Like" carousel.

This science meets the needs of customers who are building a basket or seeking inspiration throughout the shopping journey that enhances the 'discovery' customers feel in-store.

We utilize Collaborative Filtering machine learning to determine which items are commonly purchased together.

MACHINE LEARNING AND NATURAL LANGUAGE PROCESSING PLAY A MAJOR PART IN OUR PERSONALIZATION SCIENCE

- 84.51°'s data science team uses machine learning algorithms and Natural Language Processing (NLP) to create a variety of sciences used to personalize the digital experience
- Machine learning involves the use of advanced mathematical techniques to develop models that can be used to automate at scale a wide variety of tasks, e.g. identify which of the 50,000 unique products that each of 20MM customers are most likely to purchase
- NLP is the combination of computational methods and language that allows us to accomplish scaled tasks when using text or speech data, e.g. identifying all UPCs that match a specific recipe ingredient.