

celect

Bringing Science to the Art of Retail

Predictive Analytics and Machine Learning for the Retail Industry

PROJECT | **m5**ac
YEARS

Opportunity for 10% Increase in Revenue

SAKS
FIFTH
AVENUE

Neiman Marcus

free people

ALDO

 zipcar.

UR
BN
URBAN OUTFITTERS INC.

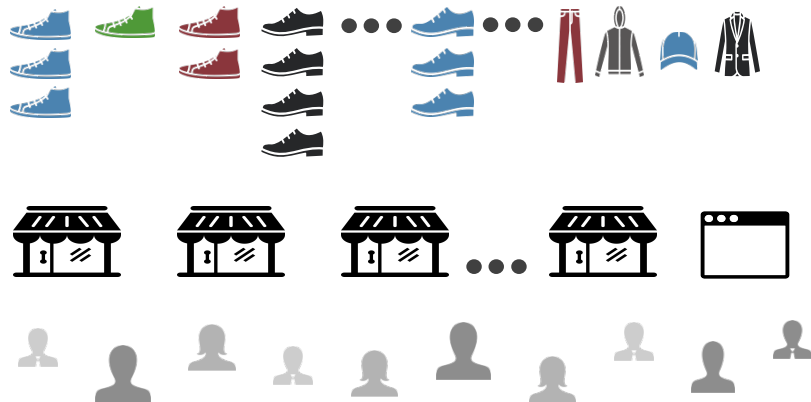
ANTHROPOLOGIE

LUXOTICA

A 'Simple' Example of Portfolio Optimization in Retail

Buying Shoes at Saks 5th Avenue

- **\$600M** spent annually on Shoes
- 90K Shoe 'types' or SKUs (style/color/size)
- 42 Stores (with room for 5K Shoe SKUs)
- 5M unique customers

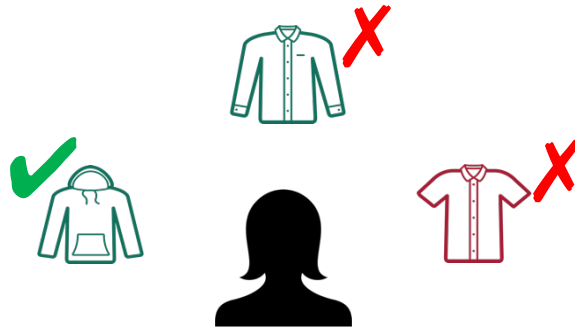


Goal: Avoid Stock-outs and Markdowns

Solution: True Demand Prediction

Understand True Demand

Today, you understand what your customer bought



TLOG



INVENTORY



PRODUCTS



LOCATIONS



BROWSE



TIER

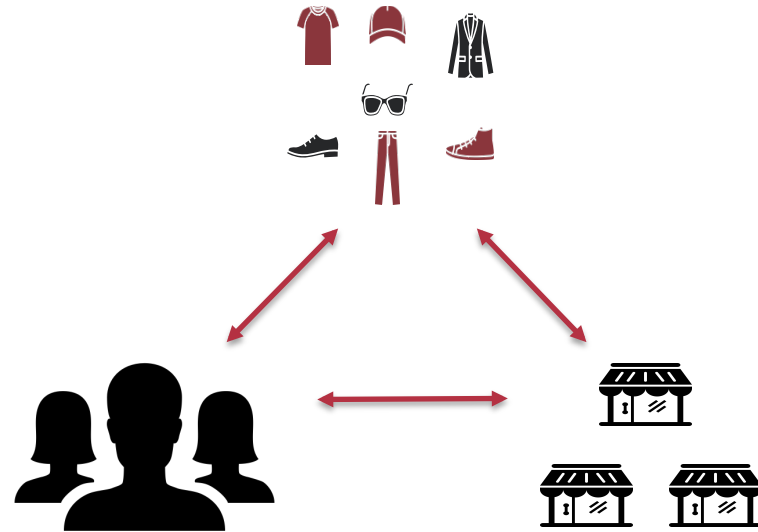


SOCIAL

A Choice Model tells you what a customer would **prefer** to buy when given the choice.

Celect Solution: Groundbreaking Advances in ML

- Accurate Demand Prediction is Hard
 - Data of interest is sparse
 - The model is complex
 - Real-world constraints abound
- The Solution – A Prediction Database:
 - Customer Choice Modeling which leverages the power of context
 - Tensor completion across sparse, heterogeneous data
 - High-scale, interactive optimization



Predictive Analytics Solutions for Retail

Assortment
Optimization



Fulfillment
Optimization



Markdown
Optimization



Predictive
Personalization



CELECT OPTIMIZATION PLATFORM

Our Ask:

Engage in a Celect Opportunity Assessment

Thank You!