CASE STUDY

CUSTOMER SUCCESS STORY

MARKETING MIX ANALYSIS FOR A SPECIALTY GI DRUG
CONTRIBUTED SIGNIFICANT TOP-LINE GROWTH FOR
A TOP 10 PHARMA COMPANY

INTRODUCTION

Marketing Mix (MMx) analysis is a process that helps companies define their marketing strategies and achieve their business objectives. It allows companies to examine the individual return on investment (ROI) for each tactic and channel, then devise simulated models that inform the creation of alternative marketing investment plans. It is essential for pharmaceutical companies to develop an MMx model that successfully navigates their highly regulated and competitive market.

BUSINESS SCENARIO

A leading pharmaceutical drug manufacturer's specialty business unit wanted to enhance its multi-channel MMx analytics and optimize its ability to generate impactful insights aligned with its brand objectives. The product, a blockbuster drug belonging to the gastrointestinal (GI) therapeutic class, was promoted by more than 15 channels. These channels were classified under four verticals: sales force (SF), healthcare provider (HCP), consumer, and patient services or patient hubs.

CLIENT OBJECTIVES

The client, a top 10 pharmaceutical company in the US, wanted to do a MMx analysis on its blockbuster GI drug semi-annually. Through this analysis, the client wanted to answer the following questions:

- How do various promotions impact new patients who start treatment, and how do they impact their adherence to therapy?
- How do different channels interact with each other?
- What are the impacts and ROI of various channels, and how do they compare to industry benchmarks?
- Does market access impact channel performance?
- Where should the brand spend the next $10M or $20M to maximize the revenue?

AXTRIA

INGENIOUS INSIGHTS

AXTRIA'S APPROACH TO THE SOLUTION

To answer the client's questions and present the best possible ROI analysis, Axtria chose a patient-centric approach for this engagement. Axtria built individual models for two scenarios:

1. new to brand prescriptions (NBRx), which are an indicator of new patient starts

2. treatment repeat prescriptions (RRx), which are an indicator of therapy adherence

These scenarios revealed how successful the promotion was on getting new patients, and how successful it was on getting the patient to remain on therapy. We then combined the two models to derive the total impact of promotion on brand revenue.

Figure 1: Promotional Impact on NBRx and RRx

Hub Services have a disproportionately higher impact on Patient Initiations

	Brand Equity	Carryover	Sales Force Impact	TV	Patient Programs	Speaker Programs	Samples	Digital	Channel Interaction-1	Channel Interaction-2
Model 1: NBRx	Intercept	+ fn (Previous Total prescriptions (TRx))	+ fn (Sales Force)	+ fn (TV)	+ fn (Patient Programs)	+ fn (Speaker Programs)	+ fn (Samples)	+ fn (Digital)	+ fn (Sales Force, Sample)	+ fn (Channel 1, Channel 2) …
Model 2: RRx	Intercept	+ fn (Previous TRx)	+ fn (Sales Force)	+ fn (TV)	+ fn (Patient Programs)	+ fn (Speaker Programs)	+ fn (Samples)	+ fn (Digital)	+ fn (Sales Force, Sample)	+ fn (Channel 1, Channel 2) …
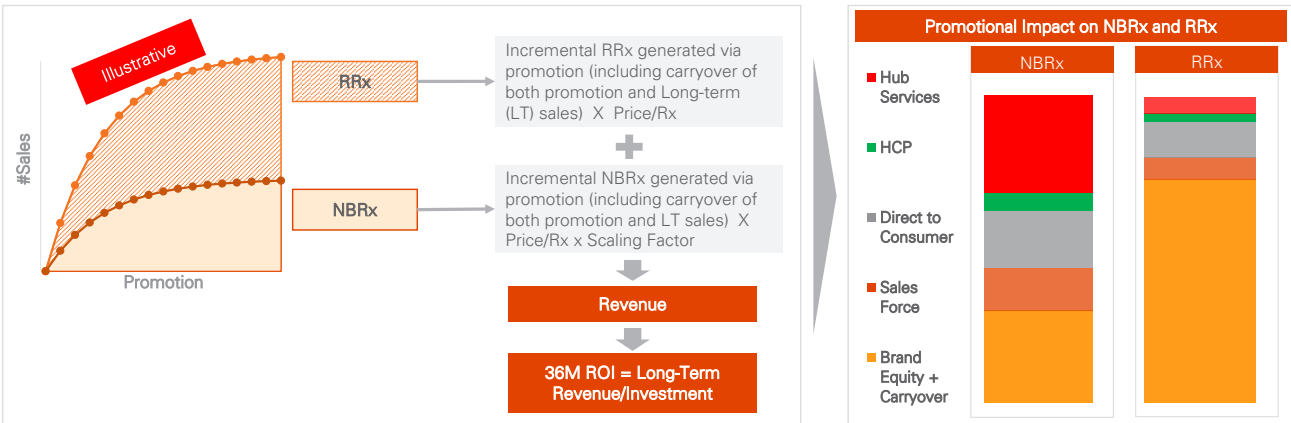
Source: Axtria Inc.

One of the key recommendations from the analysis was to significantly change the spend mix across channels within the consumer vertical, resulting in a net increase in the overall consumer vertical spend. The client proceeded with our recommendation for its promotion plan, and the channel analysis was repeated during the subsequent refresh. The result was a net increase in impact and ROI for the consumer tactics, even at a higher spend level, resulting in additional revenue for the drug.

Figure 2 : Spend Comparison Across Revenue Scenarios, in Millions USD
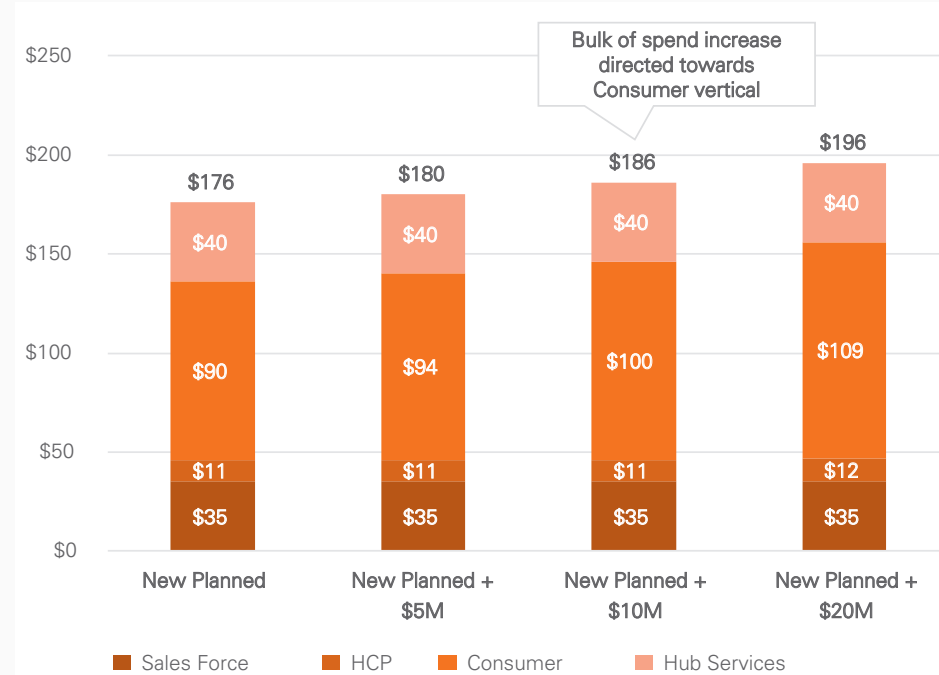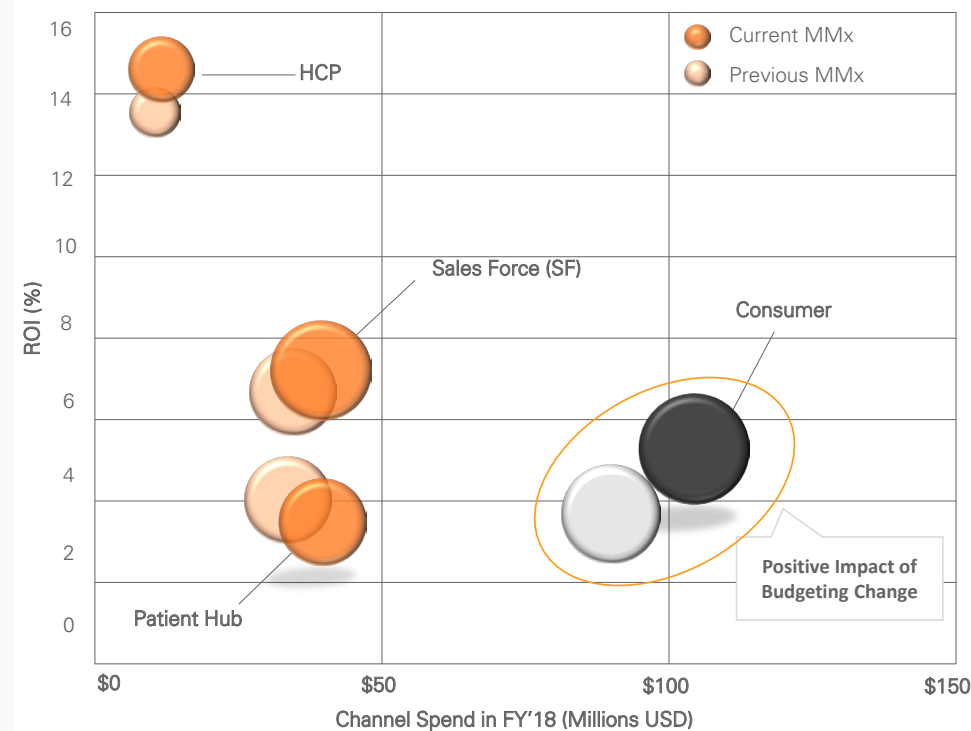

Bulk of spend increase directed towards Consumer vertical

Legend: Sales Force · HCP · Consumer · Hub Services

Source: Axtria Inc.

Figure 3: Spend, Revenue, and ROI Summary Across Channels

Current MMx
Previous MMx

HCP

Sales Force (SF)

Consumer

Patient Hub

Positive Impact of Budgeting Change

ROI (%)

Channel Spend in FY'18 (Millions USD)

• Size of the bubble represents impacted revenue
• Darker bubble: current MMx, Lighter bubble – previous MMx

Source: Axtria Inc.

As seen in the above figure, SF and HCP channels also progressed in a similar direction, though their impact on revenue was relatively lower. Patient support services, comprised mainly of copay cards, the patient hub, and nurse support, moved in the opposite direction. The key reason was a significant increase in patient volume, leading to higher copay card utilization. Copay cards are one channel where brand teams have limited control over spend, so they are often removed or constrained when optimizing budgets.

Additional insights drawn from this MMx analysis:

- Axtria observed that new patient starts were significantly more sensitive to promotion than repeat prescriptions.
- While patient support programs are perceived to play a critical role in therapy adherence, the model suggested that patient support services also impact therapy initiation significantly.

Interaction across channels:

A pathway analysis was then done to determine what share of a tactic's overall impact applied to each channel. Axtria performed this analysis to interpret which channels worked well together, as well as to appropriately reward best-performing channels. For example, an MMx model may suggest that a website significantly impacts new patient starts, while a display program has negligible or no impact. However, the interaction model may establish that half of the patients who visited the website were via display ads. Hence, ramping down the display tactic will negatively impact website performance also. Introducing the interaction model at this point can help rectify the issue. In the figure below, the SF appears to interact significantly with copay cards, HCP emails, speaker programs, nurse training, and dinner meetings.

**Figure 4: Illustrative Pathway Analysis to Determine Channel Interaction**

Note: Orange boxes denote HCP tactics
Red boxes denote patient tactics
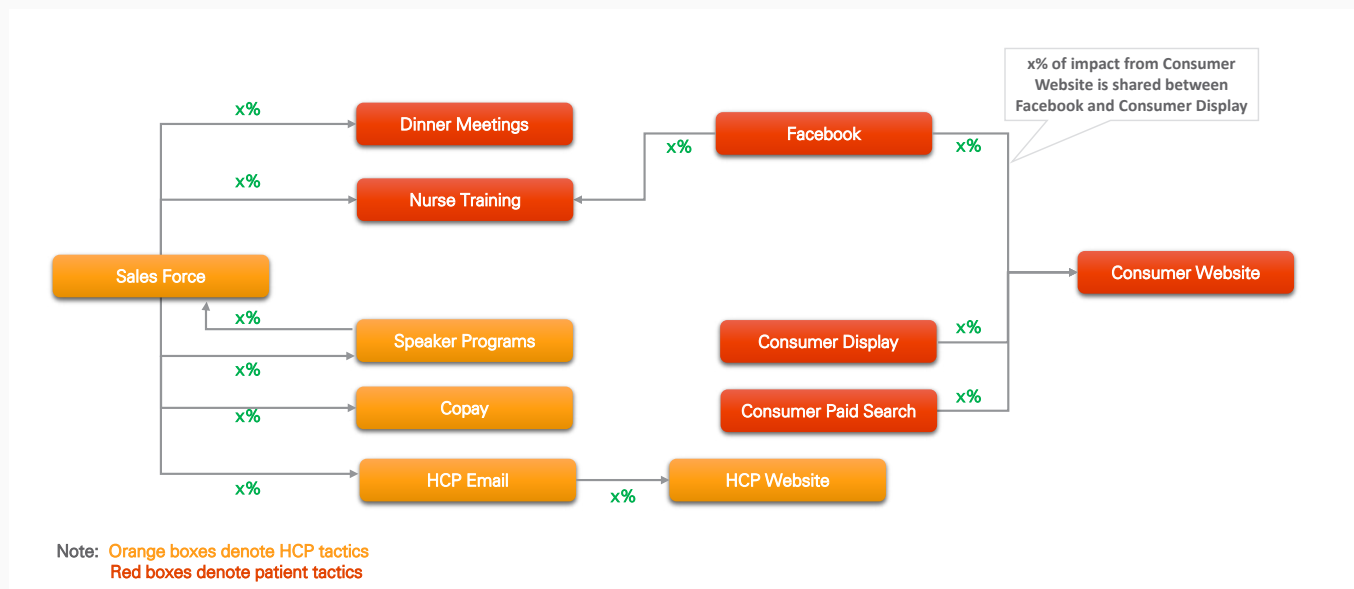
Source: Axtria Inc.

Long-term revenue impact and ROI for each of the individual promotion channels:

The results of the MMx analysis showed that while television (TV) and SF were the biggest promotion channels in terms of spend and impacted revenue, ROI was highest for some of the consumer programs. Speaker programs showed an ROI that matched with the maximum likelihood estimation (MLE) whereas copay claims and point of care were between the lower normal and MLE. While SF had the maximum impact, digital channels provided the highest ROI.
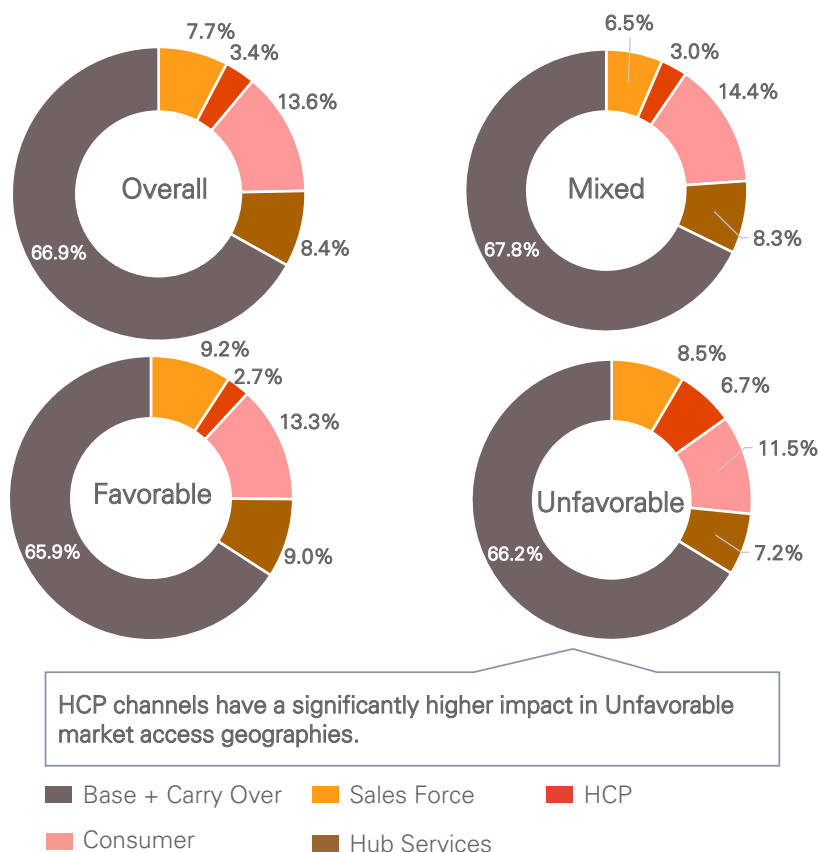
Figure 5: ROI Across Channels
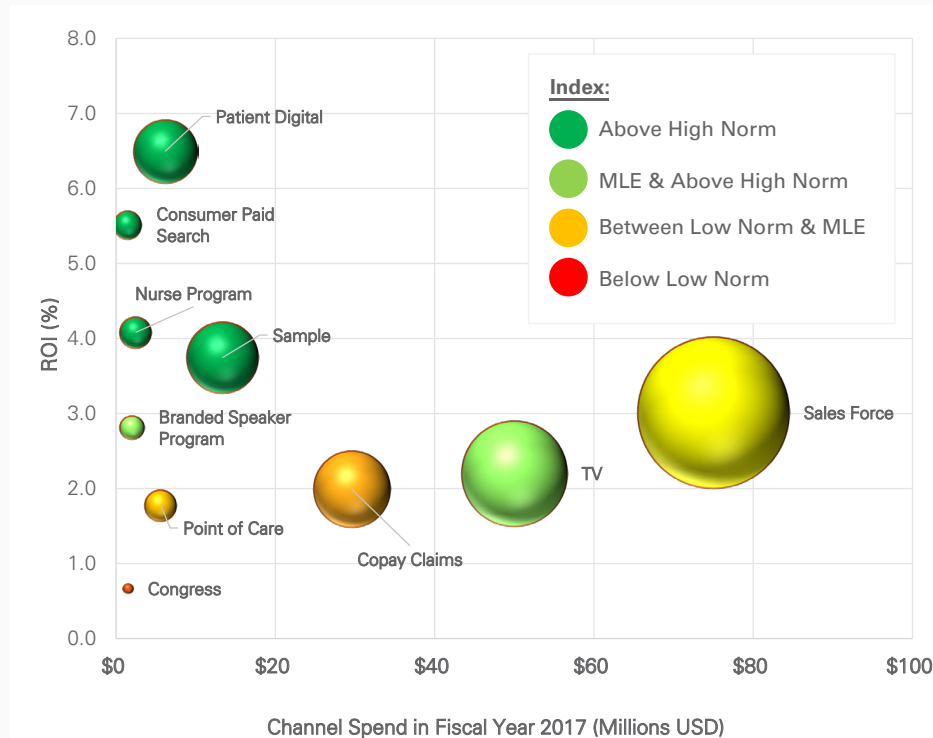
Source: Axtria Inc.

Impact of market access to promotion:

Our client wanted to understand the impact of market access on various promotional activities. To determine that, Axtria introduced market access geographies in the segmentation schema to reveal how individual promotion channels performed in favorable access geographies compared to mixed and unfavorable access geographies.

Figure 6: Impactable Sales Distribution by Market Access Segments

Overall: 7.7% / 3.4% / 13.6% / 8.4% / 66.9%
Mixed: 6.5% / 3.0% / 14.4% / 8.3% / 67.8%
Favorable: 9.2% / 2.7% / 13.3% / 9.0% / 65.9%
Unfavorable: 8.5% / 6.7% / 11.5% / 7.2% / 66.2%

HCP channels have a significantly higher impact in Unfavorable market access geographies.

Legend:
- Base + Carry Over
- Sales Force
- HCP
- Consumer
- Hub Services

Source: Axtria Inc.

The key findings of this analysis were that in unfavorable geographies, HCP-specific promotion channels like speaker programs produced higher impactable sales (that is, sales that can be attributed to a current promotional effort, as opposed to those tied to previous efforts). Consumer programs had the highest impactable sales in mixed access geographies, whereas SF promotion worked best in favorable access geographies.

Benchmarking against industry standards:

Axtria conducted a benchmarking exercise based on hundreds of successful MMx engagements done in the past. The team collected data from various sources, including the clients' internal systems and industry reports. A detailed report was prepared summarizing the findings of the benchmarking exercise. It included the benchmarking metrics, the client's channel performance against industry standards, root causes of the performance gaps, and the recommendations to address them. This analysis helped the client understand whether or not the channels were performing on par with industry standards. In the figure below, the comparison between consumer-centric channels and HCP-centric channels is shown.

Figure 7: Channel Performance Benchmarking
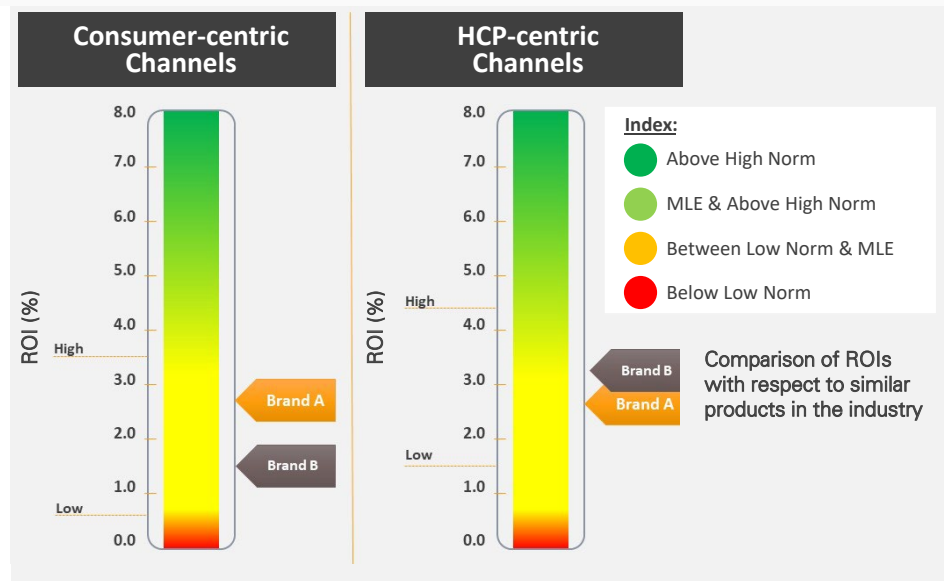
Source: Axtria Inc.

CONCLUSION

Axtria's MMx modeling strategy gave the client insights into the performance of promotion channels and the ROI they delivered. The study provided recommendations that resulted in revenue growth for the client while optimizing the overall promotional spend. The client was also able to compare the channels' ROI with respect to similar products in the industry. The MMx analysis solutions leveraged machine learning techniques and advanced algorithms to quantify the impact of promotional channels for the GI drug. The algorithms use advanced statistical techniques to identify patterns and correlations in the data and to develop predictive models that can be used to optimize marketing spend. By optimizing marketing spend, the client improved its ROI and gained a competitive edge in the marketplace. Through this analysis, Axtria contributed significantly to the client's top-line growth.

Learn more about Axtria's Strategy Consulting services in Marketing Mix Analysis