



Mastering the Marketing Mix

**Tying marketing's performance
to business impact and measures**

By Niren Sirohi and Andy Pierce

Chief executives and their CFOs want every penny invested to go toward growth—and so they should. As global competition intensifies, they are far less tolerant of spending that is difficult to quantify. At the top of their checklists are marketing investment decisions, which critics charge are based more on feelings than on facts.

Leading companies are beginning to see what they're getting for their marketing dollars. They are applying an approach whose three quantitative

techniques make sense of previously inscrutable marketing choices: to spend more on word-of-mouth campaigns rather than national advertising, for example, or to select one direct mail approach over another. The approach allows marketers to invest more effectively—and it makes them more accountable in terms of returns on investment (ROI).

We discuss the issues and share case profiles that show how.

Mastering the Marketing Mix



Tying marketing's performance to business impact and measures

With eyes fixed firmly on growth, chief executives are now acutely aware that their marketing investments are perhaps the last significant elements on the financial statements that lack clear links to revenues and profits. Their CFOs are in lockstep with them, calling for results from the last few quarters' investments, and crimping future spending if they don't like what they see. In fact, most C-suite executives view marketing as a sinkhole of investments with undocumented returns.

Marketers are in little position to argue. Global competitive pressures are increasingly intense. Profit margins remain vulnerable. And they are consistently being asked to do more with less: from supporting faster and more frequent new product introductions to developing and executing integrated strategies and tactics to simultaneously drive business growth and build the brand, to finding ways to expand their influence over customer-facing turfs where they haven't tread before. Yet, their hands are effectively tied because they lack the ROI data to make a compelling case for suitable budgets—and because, these days, the corporate marketing department no longer wields the influence it once enjoyed.

“Financial pressures, a shift in channel power, and marketing's inability to document its contribution to business results have combined to force reductions in marketing spending and influence, and to accelerate a transfer of funds and responsibilities to the field sales organization,” notes Dartmouth's Tuck School of Business Professor Frederick Webster Jr. in a recent article in *MIT Sloan Management Review*. Webster and his co-authors point out the dangers in the disintegration of the marketing function: a short-term focus that hurts product innovation, weakens brands (undercutting the price premium benefit of a strong brand), and impairs the ability to identify and reach future customers and markets.

It's an uphill battle for marketers, and not getting any easier. Recent surveys underscore the extent of the struggle: Only

one in five marketers uses marketing ROI, net present value, or another profitability measure for at least some of their marketing work, according to the 2005 Marketing ROI and Measurement Benchmark Study from consultancy Lenskold Group and MarketingProfs.com. And more than half admit that their ability to measure financial returns is “a long way from where it should be.”

If any industry group has made headway with establishing marketing ROI, it is the consumer packaged goods (CPG) sector. CPG companies have spearheaded the use of growing volumes of point-of-sale (POS) scanner data and applied techniques such as historical time series analysis

The Marketing ROI Conundrum

Why it has been difficult to quantify marketing ROI:

Few broadly recognized standards for how to measure marketing ROI

Historically, little pressure to prove measurable returns on marketing expenditures

Marketing spending is often dispersed across the company—particularly at the product level

Proliferation of customer touchpoints that impact customer decisions but are beyond marketing's control

Why marketing ROI is so important now:

Less tolerance for investments that cannot be fully accounted for

Development of new techniques for gauging marketing ROI

Decentralization and outsourcing of more marketing functions threatens corporate brand-building and weakens long-term product innovation

What to do today:

Understand brand value growth opportunities and potential areas for protection

Inventory all marketing spending across the company—from corporate branding campaigns to local direct-mail outreach

Examine the “marketing ROI” framework now being used by leading companies

Identify the technique or techniques that can bring the greatest improvement most quickly

to spot patterns in purchasing trends. They have also done a fairly good job of looking across company functions to see where marketing money is being spent, building up in-house skills in marketing ROI in the process. As a rule, they regard their analyses of purchasing data as an ongoing investment allocation process—not just a “one-off” annual budget exercise.

But even the CPG leaders tend to be limited by what’s available from their scanner data. And their focus remains on traditional tactics like product pricing, coupons, promotions, and flyers, on the whole failing to tap into the potential represented by the evolving media landscape and the abundance of new media opportunities that are emerging.

What’s Barring Achievement of Marketing ROI

A variety of complexities entangle the issue of marketing ROI. First is the puzzle over which ROI numbers to use. One poll found that marketers have 27 ways to define leads, for example. And there are few company-wide standards, let alone industry standards. It is unlikely that any single metric marketing may use will sync with the CEO’s agenda. At the same time, a proliferation of customer “touchpoints” creates many more data elements to monitor. In turn, the more data that is collected, the greater are management’s expectations of being able to derive value from it. Also getting in the way is the tendency to track data only by this or that product line or across a function—not across several functions in the company. And there is the perennial mismatch between short-term management objectives like annual performance targets to satisfy investor expectations, and long-term marketing goals like sustainable gains in brand value (which translates into

longer-term benefits like shareholder value and the ability to command price premiums on products).

It’s also worth mentioning the “low-hanging fruit” problem. It is very typical for the marketing programs whose returns are more easily quantified to set up a vicious cycle of greater funding for those programs, regardless of their business impact. Recently, though, some companies are starting to use ways to isolate and quantify the factors that influence customer behavior. They are deploying new “marketing science” techniques to yield fact-based analyses that make it easier for managers to decide where to invest.

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The techniques fit into a hierarchical framework whose top levels focus

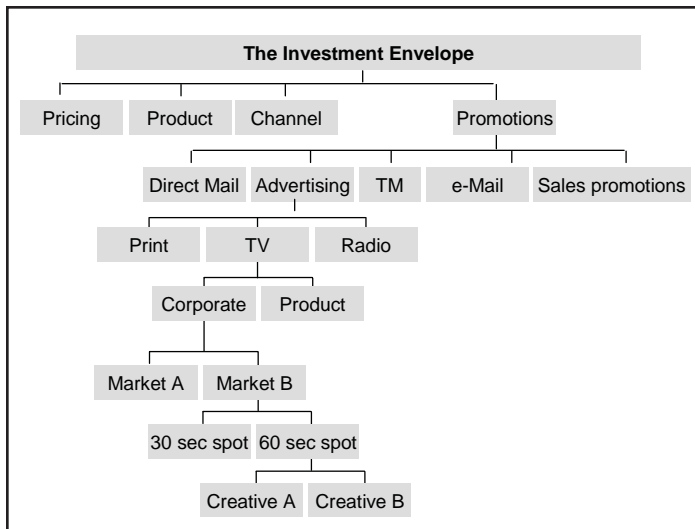
on how well marketing investments stack up against other business investments. At the next level down, the framework allows marketers to gauge one marketing investment against another within well defined categories: the ROI of direct mail versus telemarketing, for example, or a corporate brand-building campaign compared to several regional product ads. At the levels below, the framework enables crisp decisions around specific program trade-offs:

a 20-second ad spot on local radio versus a 30-second one, for instance. (See “The marketing ROI hierarchy.”)

“There is the puzzle over which ROI numbers to use. One recent poll found that marketers have 27 ways to define leads, for example.”

This paper describes three related techniques that correspond to the levels of the hierarchical framework. It speaks to the advantages and limitations of each technique and gives three examples of where they are used in practice to deliver significant benefits. Drawn from

econometric analysis, the techniques are now being used increasingly in business. Used separately—each for its own applications—they can provide significant gains. Used together, they offer marketers a powerful advantage.



The marketing ROI hierarchy

Following are the three techniques:

I. Structural Equation Modeling

The cross-sectional statistical modeling technique is used more for confirmation than for exploration. *Structural equation modeling is a technique with roots in sociology that utilizes the co-variance data matrix to estimate the structural and measurement relationships implied by the hypothesized models.* It usually includes detailed market research with key constituencies to measure perceptions and impact on choice. Combined with historical analyses, structural equation modeling can tie activities such as marketing expenditures to a customer's perceptions and spot trends between the customer's likely behavior and actual behavior, along with the financial outcomes of that behavior. It helps answer such questions as "Is return on one investment higher or lower than return on another?" and "Why is ROI low or high?" However, it cannot definitively say *what* the ROI is; it is ideal, rather, for "first blush" prioritization of several different investments. It is usually done at one point in time and uses cross-sectional variation (variations across researched respondents) to yield conclusions. The technique is most readily applicable at the top level of the hierarchical framework, where the goal is to understand the ROI of marketing relative to other business investments

and to prioritize different categories of marketing investments.

2. Historical Analyses

This technique uses a company's existing data records and the natural variance in historical data to develop statistical models that begin to gauge the effectiveness of each measured medium and provide an initial understanding of what ROI is. They can directly estimate the link between company marketing activities and financial outcomes, helping to answer the "what" questions more precisely but often without giving much insight into the "why." They are increasingly valuable because of the wealth of data that the typical organization has built up.

Historical analyses can include data across many customers over time and hence make use of both cross-sectional and time-series variation. By their nature, they provide a way to keep track of ROI long-term. They are most useful at middle levels of the hierarchical framework, where historical data is more readily available. They are limited because, due to their nature, they are backward-looking. Additionally, there may be a long lag between when the marketing activity was conducted and when returns can be established. Moreover, historical analysis depends on historical variance: If marketing activities and expenditures have been steady and unchanging, the approach cannot reveal anything—no variance, no learning.

3. In-Market Experiments

Historical analyses can only address the returns on investments already made. With untested ideas or investments, in-market experiments are best for learning how ROI can be improved going forward. They use experimental design techniques that allow for testing of several variables at once. The analyses of data gathered from a few test "cells" are used to extrapolate learnings to untested information cells, and the optimal cells are then chosen from thousands of combinations. Experiments can help pinpoint what improves ROI and provide a means for determining *continuous* improvements in ROI. Experiments can be applied at all levels of the marketing hierarchy. For

example, at the higher levels it may involve testing the introduction of a new medium that has not been used before, testing the weight levels across media, testing depth

of price cuts in combination with media configurations. At the lower levels, it may involve testing the optimal duration of a print ad or the spot length for a TV ad position, or

Profiling the Techniques

Structural Equation Modeling

When should it be used?

When objective is to understand how marketing investments stack up against other business investments in terms of driving customer consideration and other relevant business outcomes

When actual data on investments and outcomes are not easy to get either because they are not tracked consistently or because they reside in many different parts of the organization

When objective is to quickly get a relative rank ordering of ROI as opposed to a precise ROI number

What questions does it answer?

Is the marginal return on investing in customer service at the call center likely to be more or less than the return on investing in email marketing?

What are the potential areas for investment in the call center that would improve the return disproportionately?

Historical Analyses

When should it be used?

When rich historical data exists on investments made over time within a well defined category (e.g. advertising) and corresponding business outcomes

When objective is to build a business case for investment decisions in certain categories or guide investment reallocation across different categories and a precise ROI number is desired

When objective is skewed towards a determination of "what ROI is within a certain category" as opposed to "how ROI can be improved within a category"

What questions does it answer?

What is the return if I invest an incremental dollar in TV advertising as opposed to call-to-action advertising?

How much can I improve the overall return on my marketing investments if I shifted 20% of my TV advertising dollars to magazine advertising?

Do investments that I have made in direct mail meet a certain hurdle rate of return?

In-Market Experiments

When should it be used?

When the objective is to improve ROI within a certain category and several competing ideas to do so exist

When objective is to quickly and efficiently prioritize several different ROI improvement tactics that have never been tested before

When precise ROI numbers are desired for different potential tactics in order to build a compelling business case before a plan of action can be chosen

What questions does it answer?

In our telemarketing scripts, are we better off opening with a benefit statement as opposed to a product promotion? Are we better off going for an aggressive close or giving the customer time to decide? Are we better off training our reps to engage the customer in small talk or in getting straight to the point? And so on...

What is the potential improvement in response rates over business-as-usual of adopting one tactic over the other?

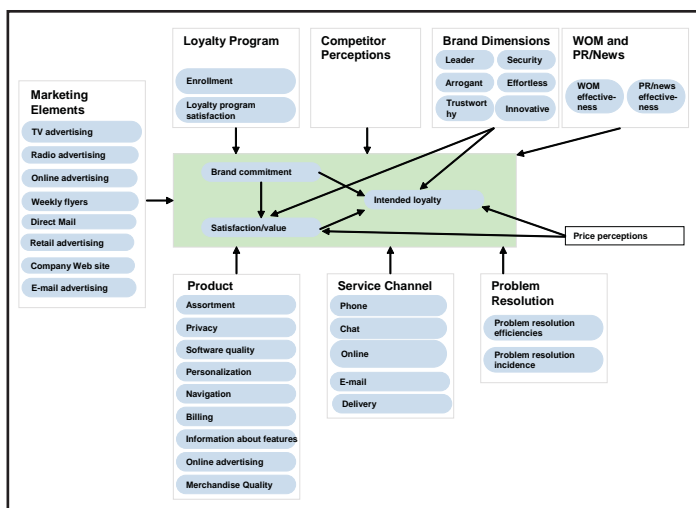
How do we put a process in place for testing thousands of ideas quickly, efficiently with minimum resources and picking the ideas that have the potential for maximum improvement in business performance?

testing the design elements of a direct mail piece. Following are three cloaked case studies that examine each technique in practical use.

The Power of Structural Equation Modeling

Shop-a-Pod, Inc., a leading online grocery provider, had focused mainly on corporate branding that communicated an “ease-of-use” message. Although distinctive when the category was new, that message had become undifferentiated as the category had grown. Yet Shop-a-Pod’s ad spend has tripled from the late 1990s, with almost three-quarters of that spend dedicated to television.

The company’s marketing, customer service, and product management operations had all grown up separately; the factors that influenced customers’ selection of Shop-a-Pod were not clear to any group. Aware that the “ease-of-use” message was losing effectiveness but unable to pinpoint why, the grocer’s marketing team launched a major research program to help define an overall portfolio of spending and to reveal the best trade-offs among different business spending elements (marketing versus service or product experience, for instance) as well as the trade-offs among different *marketing* investments (word of mouth vs. television vs. direct mail vs. email, for example).



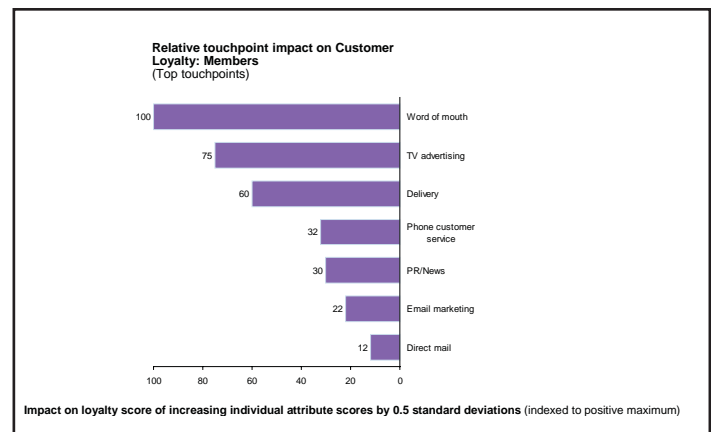
The many influences on Shop-a-Pod’s customers’ loyalty

Shop-a-Pod’s marketers first used structural equation modeling to map all the influences on the loyalty of their customers and on the likelihood that prospects would sign up with the company. Then they kicked off an extensive research effort, polling 3,500 customers and prospects and interviewing others in depth.

Analyzing the findings, the company was surprised to learn just how important word-of-mouth was to how customers and prospects viewed Shop-a-Pod’s support for them. In fact, television — Shop-a-Pod’s traditional vehicle for delivering its message — came in a very distant second. The return on a dollar spent on word-of-mouth activities was likely to be at least two-and-a-half times more effective than if that dollar was spent on TV advertising. And it was worrying to find that the company lagged its competitors in terms of positive word-of-mouth with customers, and also had very little positive reputation with non-customers.

The realization that such influence factors were not part of marketing’s traditional responsibilities allowed Shop-a-Pod management to see the value of a “whole-company” approach to customer loyalty — the first time they’d viewed it that way. In addition, the research revealed that although television advertising was still seen as cool and exciting, it was not necessarily perceived as relevant since the market had outgrown the “ease of use” messaging.

The research work has convinced the company to take



New news for Shop-a-Pod: Word of mouth is big

word-of-mouth seriously. Shop-a-Pod has now shifted significant marketing resources to develop specific “buzz-creating” programs to leverage its strong positive word-of-mouth reputation and to reduce negative word-of-mouth among prospects. For the first time, it is aiming public-relations efforts at consumers because PR ranked higher than expected as an influence factor. Moreover, rather than abandoning television advertising, the company modified its television messaging to make it more relevant to customers, focusing more on communicating specific benefits than on conveying ease of use of online grocery services. The new television messages have played out well in the marketplace, and have increased by nearly one third the number of prospects who view the company favorably.

The Value of Deep Historical Analysis

Astoria Laboratories, Inc., a leading maker of computer accessories, was spending about \$300 million a year on advertising. It had three major advertising goals—and significant challenges to each:

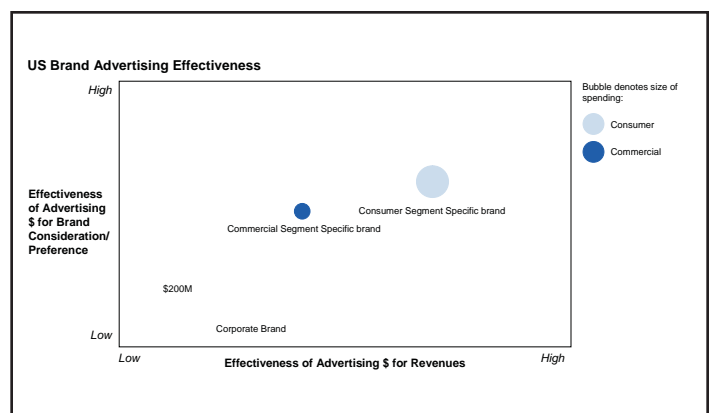
1. **Corporate-wide brand advertising.** The objective was to communicate the identity of the “new” company following a controversial merger. Astoria’s core challenge was twofold: to determine how long to continue corporate-wide brand advertising and to gauge the ROI on those expenditures.
2. **Segment-specific brand advertising.** Astoria needed to re-establish its brand with several categories of consumer and commercial customers worldwide. But the company was unsure how many campaigns it could run given a more constrained ad budget and stronger competition for marketing dollars overall. And Astoria’s marketers could not estimate the ROI for their segment-specific campaigns.
3. **Segment-specific “call to action” advertising.** At the same time, Astoria was running several hundred product-specific ads designed to spark immediate consumer purchase decisions. The promotional ads did generate demand, but the resulting sales spikes meant that marketing staff then tended to favor “more of the

same” —without understanding the promotional ads’ aggregate ROI or the opportunity costs of not running more corporate brand advertising, for instance. Although marketing managers suspected that its siloed approach was inefficient, they could not say with certainty which campaigns worked and which didn’t.

That wasn’t all. Astoria also needed to understand and quantify the direct role of advertising in both brand building and consumer purchase decisions. It was important to be able to optimize the spend allocation across different media (TV, radio, newspapers, online, magazines, etc.). The company’s marketing challenges also had a strategic dimension: What role should advertising play as Astoria worked to establish its “new” image with large corporate customers?

Up to that point, there had been no significant efforts to identify ROI for any level of the company’s advertising. So Astoria’s chief marketing officer, its director of brand strategy, and the finance chief for marketing set out to model the short-term and long-term impact of the incremental dollar spend in each area. They put together a team that amassed several years’ worth of data on different types of advertising expenditures, on brand perceptions, and on financial outcomes across all units of the company—the first time such data had been aggregated.

The team used sophisticated time-series techniques such as distributed lag modeling to understand the impact of ad

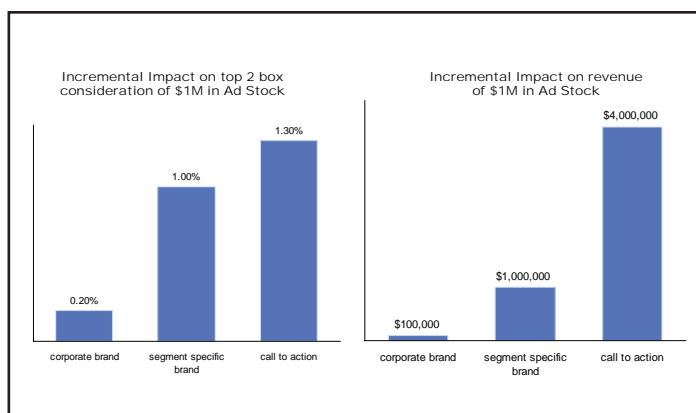


Analysis showed clear benefits of segment-specific brand advertising

expenditures on both financial outcomes as well as brand perceptions. It quickly became apparent that the segment-specific brand advertising that Astoria used with particular customer segments was more effective than its corporate-wide brand advertising. Indeed, the revenue impact of the segment-specific ads was almost five times that of the corporate-wide advertising (see “Analysis showed clear benefits of segment-specific brand advertising”). The findings did not imply that Astoria should discontinue its corporate brand campaign; they showed that it was a necessary foundation for the segment advertising programs. The corporate campaign has now been scaled back in favor of more segment-specific ads.

The team’s analysis also found that the brand advertising did have a positive return on investment—1.4 times the cost—but the returns from the promotional “call to action” advertising was more than triple the expenditure (see “Advertising impact on brand consideration and short-term revenues”). For the first time, Astoria could quantify the role of “call-to-action” advertising relative to brand advertising—a significant step toward making informed allocation decisions at budget time by ensuring that the appropriate tradeoffs between brand building and short term revenues could be considered and aligned with business strategy.

The historical analyses have sparked significant changes in Astoria’s relevant business processes. The corporate and divisional marketing teams have collaborated to consolidate



Advertising impact on brand consideration and short-term revenues

ad agencies and built processes that make it easier to collect and collate “call to action” advertising data. (The agencies are now required to take a more disciplined, systematic approach to gathering and collating the data.) Now, Astoria has a central activity for bringing together financial, advertising, and tracking data and for developing ongoing ROI models. An ongoing ad budget allocation system has been added on top of the yearly budgeting process. Typically, the segment and call-to-action campaigns had been the province of specific product marketing operations.

The company has also changed how it buys media. Its marketers no longer make big campaign decisions just a few weeks before launch. By releasing funds early and reducing the number of unplanned changes to ad vehicles, they estimate the company is saving as much as \$5 million a month.

The Value of In-Market Experiments

FixYourHome Corp., a leading regional provider of home-maintenance products, has made good use of in-market experiments. Although the company was spending more than \$200 million a year on marketing efforts in its consumer group, it was not using any sophisticated testing approaches to determine and improve ROI. In fact, FixYourHome lacked both the resources for testing and a disciplined testing methodology that was efficient and scalable.

As a result, good ideas were going untested. And marketing strategies were put into play based on individual opinions or anecdotal evidence rather than hard facts. As regional markets became even more competitive and marketing budgets were whittled down, FixYourHome marketing leaders welcomed any approaches that could improve ROI.

The marketing team turned to two specific sets of experiments:

1. **Determining what makes a great sales call.** For one new product category, FixYourHome launched tests for what its telemarketers should say and when they

should say it. The experiment involved testing almost 600 potential telemarketing scripts by launching 16 test cells in the live in-market experiment. Among the “what to say” elements, the marketers tested sales rep and customer greetings, the offer positioning and pricing messages, message order, call closing, and caller ID display.

The test results quickly indicated a 15 percent to 25 percent lift by optimizing the “what to say” message and a 9 percent to 14 percent gain by improving the “when to say” factor, resulting in more than a 24 percent rise in sales rates. Translated: as much as a \$4 million improvement in incremental annual revenues with more than \$10 million in incremental customer lifetime revenues. FixYourHome subsequently made all of its call center scripts more direct: customers would know immediately who was calling them because the company’s name would be displayed on caller ID. At the same time, the company clamped down on inefficiencies such as excessive small talk and trained the sales reps to close aggressively.

2. Identifying the best direct mail package.

FixYourHome’s marketers tested the envelope format, the presence of a teaser, the presence of their logo on the envelope, the number of offers, the letter format, and more. Their goal: to increase inbound call center volume and ultimately sales. The results indicated a 100 percent difference in the inbound call volume between the best and worst direct mail packages, indicating significant potential for improvements. Nearly 3,000 potential direct mail packages were tested by launching 24 test cells in the live in-market experiment.

The two sets of experiments have provided FixYourHome with a framework for experimentally designed testing—and with real hands-on testing experience. The company’s marketing leaders are now rolling out similar tests across different products and channels to improve the return on their current marketing investments.

A Phased Approach to Marketing Spending

Leading practitioners look at marketing spending from a “whole company” viewpoint. They apply a multi-phase process to managing the spending by:

1. **Assessing overall marketing spend and determining how investments are allocated.** (For many businesses, it may be the first time that marketing data has been fully aggregated across the company.) Those steps help to clarify the current allocation process; they also highlight investments for which ROI can be confidently calculated as well as the investments that require additional information.
2. **Building a roadmap for optimization and determination of ROI.** This calls for identifying the investment “cells” (for example, the combinations of products and channels) that require further analysis, either to determine ROI or to improve it. The managers will pinpoint the most effective techniques for the situation—historical analyses or structural equation modeling or in-market experiments—and specify the cells to which early learnings can be extrapolated.
3. **Conducting the analyses and incorporating the results into a decision tool for optimizing spend allocation decisions.** Now managers can start to see how to make trade-off decisions: whether more should be spent on direct mail and less on print advertising, for example.
4. **Using the analytical results to help set new marketing budget targets for the coming year.** The outcome will depend on the company’s business strategy, its brand strategy, and the results of the optimization exercise.
5. **Establishing the factors that can encourage ongoing updates of ROI—the necessary processes, skillsets, and organization models.** Those factors will also acknowledge that the marketing mix changes over time as the business strategy shifts and consumer responses change.

Conclusion

Marketers now have an unprecedented opportunity to demonstrate the value of their initiatives. The analytical ROI framework helps them make sense of complex and seemingly chaotic marketing investment patterns and allows them to quickly reach compelling conclusions about future marketing commitments. It provides the impetus necessary to break away from “always done it this way” inertia and the fact base to push back against outside agencies—particularly advertising firms—that can be reluctant to accept quantitative measures of effectiveness.

“Some companies are starting to use ways to isolate and quantify the factors that influence customer behavior. They are deploying new “marketing science” techniques to yield fact-based analyses that make it easier for managers to decide where to invest.”

With new ROI techniques in hand, marketing leaders can confidently take a portfolio approach to their investments—an approach that spans relevant spending beyond their traditional span of control, in functions such as customer service and product development. The new framework encourages rather than confounds collaboration across business functions.

Perhaps most satisfying of all: marketers now have the wherewithal to silence critics who have long griped about marketing’s “squishy” decisions.

If anything, the pressure to rein in “non-growth” costs will only increase. There will always be barriers to gauging returns on marketing investments. But there are fewer and fewer excuses for not doing so. Leading companies are gaining a competitive edge by applying the new marketing ROI approaches. They are gaining experience with them, fine-tuning them, gathering more valuable data with them. Competitors that don’t take a keen interest in what those leaders are doing may not be effective competitors a few years from now.

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Prophet (www.prophet.com) helps senior marketers more effectively use brand and marketing to drive profitable growth. Our services range from accelerated growth strategies, to effective global brand management approaches, to more efficient allocation of brand-building resources. Prophet has offices in Chicago, London, New York, San Francisco, Tokyo, and Zurich.