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Achieving High Performance

**Reinventing Medical Technology
for a Dramatically Different Future**

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Introduction

After years of strong and steady growth, the medical technology industry is facing a wave of pressure that is forcing companies in the industry to reexamine the fundamentals of how they compete. The traditional medical technology model that is purely focused on product innovation will not be a passport to success in the future. Instead, high performance in the medical technology industry will stem from the ability to develop cost-effective solutions—driven by the change in buyers—that deliver demonstrable improvements in health outcomes.

The changes medical technology companies make will be accompanied undoubtedly by growing pains; medical

technology companies will need to transform their business models to meet the changing demands of health care systems globally. They must carefully choose where to focus their energies—both in terms of product and markets. Medical technology companies then must align the right capabilities, innovation models and partnerships that will unlock future growth in these market areas.

For the majority, these steps will require becoming more strategic in their merger and acquisition targets and more effective in their post-merger integration. In addition, many will need to institute more discipline in how they manage their fixed asset base

and trade working capital position and focus their R&D and partnering efforts to advance health outcomes amid a regulatory environment that demands sharp new navigational skills. The result will be a boon for patients, with new cost-conscious and service-rich solutions to meet a broader range of patients' needs.

This report, based on Accenture research, discusses what it will take for medical technology companies to develop the market focus, distinctive capabilities and performance anatomy that will lead to future high performance.



Invasive Pressures

Zero
ALL

NIBP

Cancel

Recorder

Record
Wave

Stop

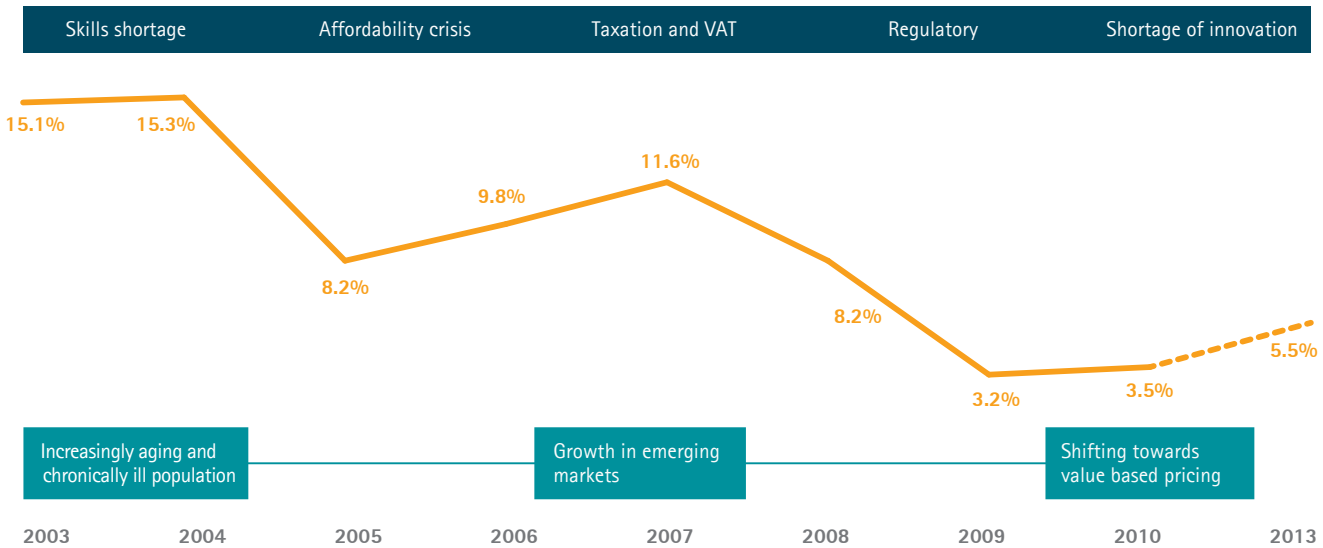
Normal
Screen

Invasive
Pressures

Others

The Rapidly Changing Dynamics of the Medical Technology Industry

Figure 1. The medical technology industry's slowing growth rate



Source: Accenture research, 2011

The medical technology industry, while growing overall, has experienced a dramatic slowdown in the rate of growth over the past several years. Accenture research shows a reduction of approximately 15 percent in annual growth about six years ago, to just 3.5 percent a year ago (see figure 1).

And while the overall picture for the medical technology industry is rosier than for many other industries still reeling from the recession, it's simply not as good as it used to be. Accenture research reveals that across the industry, enterprise value dropped in 2010 to 17 percent below the prerecession peak of 2007 and, for the first time, future value for the industry became negative (see figure 2).

Moreover, our research forecasts a recovery to growth (driven largely by emerging rather than developed markets) at roughly half the levels prior to the economic crisis, as shown in figure 2. It's a dramatically different

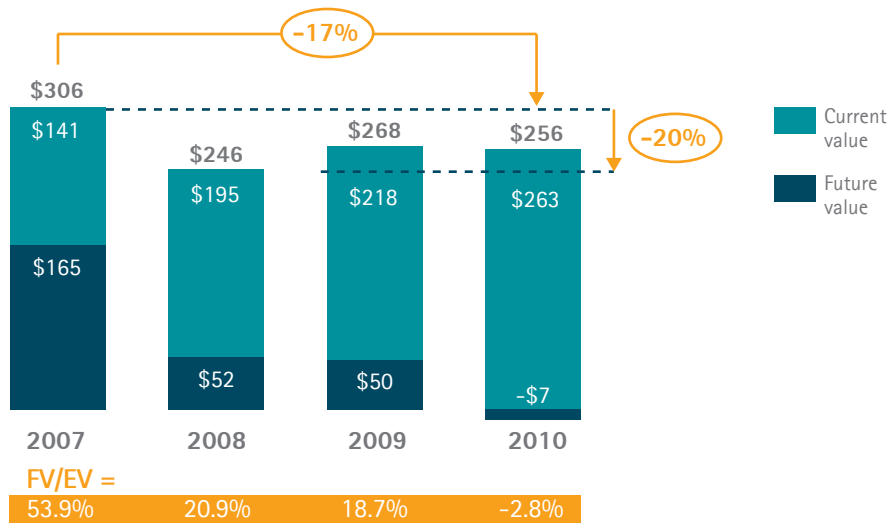
world out there, and medical technology companies need focus in a way they never have before.

While accelerated by the recession, many of the trends we are seeing actually stem from the plain fact that industry dynamics are fundamentally changing. The medical technology industry is maturing and, as such, is experiencing growing pains. The forces at work are enormous, and include:

- United States health care reform:** Health care reform in the United States has already begun shifting the established rules for an industry that traditionally relied on being United States-centric to drive growth and profitability from innovation. Among these, an industry tax on United States sales will affect margins (and rewards) for innovation, and other changes in regulation will result in a heavier burden of proof and a longer and more costly innovation cycle.

- Skills shortage:** The medical technology industry faces a multi-faceted problem. For example, fewer people are pursuing engineering-focused education in the mature markets and, subsequently, medical technology as a career. Individuals who have specialized rarely make the jump to a different medical technology therapy area, which leaves some market segments with particularly restricted talent pools. Many companies now face the challenges attendant with moving to emerging markets—which may offer large and low-cost labor pools but potentially less of the specific skills needed.
- Shifting customer landscape:** The traditional customer and stakeholder landscape is shifting from the medical practitioner to include economic decision makers who are gaining increasing influence.

Figure 2. Future value of the medical technology industry turned negative in 2010



Source: Accenture research, 2011

- Cost containment and a shift to improved health solutions and outcomes:** In developed countries, slowing GDP growth and pressure on public finances means health systems cannot sustain historic spending growth rates. Payer models have begun shifting from an individual drug, procedure and service model to an outcome-based approach. For medical technology companies, the emphasis is no longer solely on the medical practitioner, but rather the broader health care stakeholder group that will consider patient outcomes and health economics.
- Higher regulatory barriers:** In both the United States and Europe, governments are reassessing their regulatory processes to make them more all encompassing and more valuable to payers, by demanding more rigorous proof of performance, safety and efficacy. For example, the United States is reviewing United States Food and Drug Administration

(FDA) 510k regulations, and considering greater comparator efficacy and clinical testing requirements, as well as tightening controls over promotional activities.

- Pressure on venture capital funding:** Concerns over regulatory reform and future returns on innovation are already having a dampening effect on venture capital funds directed at small innovative start-ups.

For the medical technology market players, what has worked in the past will not necessarily work in the future; future dominance will depend on the ability to adapt to the new dynamics of a medical technology industry that continues to change rapidly.

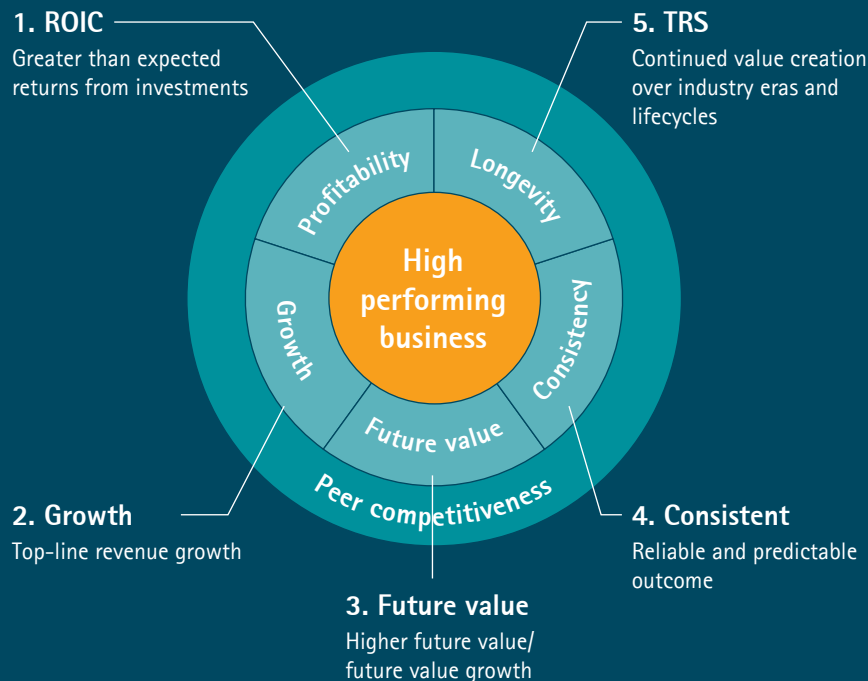
But who will come out on top? We conducted industry research against Accenture's rigorous High Performance Business methodology to take the pulse of industry performance now, and to identify characteristics of high performers in the future (see sidebar, The Research).

We found that winners of the future will need to shift the way they operate. High performing medical technology companies must focus on a limited number of profitable market areas, optimize the amount of revenue they generate from their existing asset base, and manage mergers and acquisitions to drive product dominance. These operational changes will strengthen their ability to broaden their models of innovation to offer new services and pricing for a changing customer base—to transform their cultures to adapt to new market dynamics and to develop the true health care partnerships needed to generate outcome-focused solutions.



The Research

Figure 3. The Accenture high performance business framework



Source: Accenture

Accenture began an extensive research program into what defines high performance in 2003. Since then, we have studied thousands of companies, including more than 500 we identified as high performers.

We have learned that high performance is definable, quantifiable and achievable. High-performance businesses effectively balance current needs and future opportunities. They consistently outperform peers in revenue growth, profitability and total return to shareholders. And they sustain their superiority across time, business cycles, industry disruptions and changes in leadership (see figure 3).

They do so through a combination of a clear market focus and position, mastery of a set of distinctive capabilities and a performance

anatomy that can deliver both. These elements combine into a framework that gives the organization growth, profitability, longevity, consistency and positioning for the future.

To understand who is performing well in the medical technology industry and why, we applied Accenture's High Performance Business (HPB) framework to 18 of the largest "pure play"¹ global medical technology competitors over a seven-year timeframe (2003-2010). These companies all fall into one of four distinct sectors: medical equipment (such as imaging and accompanying software and services); medical devices (such as high-value electromechanical devices, single-use implantable devices and on-body devices such as pacemakers or orthopedics); diagnostics (such as analyzers and reagents); and consumables (disposable items and other low-cost/high-volume items).

Among our group of 18, only one pure play emerged as a high performer from our research, Varian. Coloplast, St. Jude, Stryker, Getinge, Smith & Nephew and Synthes all surpassed average performance, but the majority of the companies we researched (62 percent) performed at an average or below-average level.

This research initiative focused on the medical technology industry has given us a view into what will drive high performance in this industry in the future. We found that the industry is maturing and, as such, going through some significant growing pains. Medical technology companies' current general lackluster performance is the unintended legacy of the industry's past surefootedness. Over-reliance on past formulas for success will only exacerbate the difficulties a number of companies now face.

Market Focus and Position

Among the three building blocks of high performance, market focus and position is a critical yet often overlooked feature of many medical technology companies' corporate strategies (see figure 4). To date, the industry has grown quickly—concentrated more on top-line rather than bottom-line growth. Its growth has had the flavor of opportunism as well. Smaller start-ups have launched innovations with the explicit goal of being acquired by larger companies hungry to replace revenue from maturing products, and the industry saw an extended period of

frenzied acquisitions. With the industry maturing, the coming years likely will see further consolidation and mergers and acquisitions (M&A) activity.

As a result, many of the larger medical technology companies have found themselves engaging in a multitude of market areas. In fact, Accenture research shows that medical technology companies today may organize around as many as 20 or more discrete therapy areas, based on the customer and end use of products. The result has been a serious dilution in focus.

What these companies need now is an adjustment for future high performance. Our research suggests that adjustment begins with gaining differentiation in a changing market environment through a laser focus on a limited number of attractive targeted portfolio areas. High performers will develop a focus on:

- Portfolios—not a diverse set of products
- Emerging markets that directly align with the company's focused portfolio

Figure 4. Creating the focused medical technology company of the future: The building blocks for high performance

<p>Market Focus and Position</p>	<p>Strategic Market Domination Product portfolio focused on a limited number of areas where differentiation and market dominance are achievable. Discipline to invest in core focus areas and divest the rest. Emerging markets focus is aligned with the focused portfolio where local differentiation can be achieved.</p>			
<p>Distinctive Capabilities</p>	<p>Financial Discipline Rigorous financial and operations management driving growth and ROIC. Delivering cost savings from transformations and fully implemented and stabilized acquisitions</p> <ul style="list-style-type: none"> • Execute M&A effectively • Optimize fixed asset base • Optimize trade working capital 	<p>Innovate Beyond Product Develop broader innovation models that set sights beyond traditional breakthrough and incremental innovation. Derive value from service and price innovation.</p>	<p>Deliver on Improved Health Outcomes Evolve R&D and Commercial models to meet changing market dynamics, whether through new service models to drive improved health outcomes or localized product development to meet local needs.</p>	<p>Ability to Navigate the Regulators Develop expertise needed to effectively navigate the changing regulations affecting R&D, such as clinical studies, comparator effectiveness, global manufacturing compliance and promotional activity audits.</p>
<p>Performance Anatomy</p>	<p>Culture of Enhancing Patient Care Create an agile business model that has the ability to upend the established business ways in order to respond rapidly to the changing industry dynamics. Cultivate a culture that embraces health care stakeholders and forges partnerships aimed at improving patient outcomes.</p>			



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Focus on portfolios—not a diverse set of products

Exactly how many therapy areas medical technology companies choose to focus on is a matter of delicate balance. On the one hand, should the company spread itself across too many focus areas, it will find itself severely challenged to dominate in any. On the other hand, should the company concentrate on just one area, it will find itself vulnerable to “disruptive” technologies that may come along and change the market in unexpected ways.

While our research indicates there is no optimum number of therapy areas for focus and operation, we do find that higher performers tend to be both more focused (fewer areas of therapies) and, as a result, more dominant in their focus areas.

For example, Stryker, St. Jude, Getinge and Varian—all high or near-high performers in our research—each focus on only two or three market segments. Within these limited numbers of therapy areas, they have built positions of dominance and demonstrated faster growth. In fact, these organizations demonstrate the value that having a focused portfolio mix can bring, as they are able to build greater experience faster and be more agile to market conditions. In contrast, our research finds the more diversified companies can dominate in only a few of the many areas in which they operate.

What’s particularly striking about the high and near-high performers is that while therapy areas do vary in size and growth rates, our research indicates no singular therapy area on its own translates to success. All therapy areas offer

the potential for success, however, the high performers of the future will likely focus on a select few areas that present the best opportunities for profitable growth and develop the required distinctive capabilities outlined later in this paper to outperform the market.

Synthes provides an excellent example of these principles in action. One of the near-high performers in our research, Synthes organizes around three related product areas: market instruments, implants and biomaterials. These product areas are related to the surgical fixation, correction and regeneration of the skeleton and its soft tissues. Synthes’ focused strategy has translated into top performance in terms of company growth—a five-year compound annual growth rate of 13.8 percent.²

We see evidence of other companies making moves in this direction as well, shedding products that no longer are a strategic fit. For example, Johnson & Johnson announced in June 2011 that its subsidiary, Cordis Corporation, would exit the drug-eluting stent business—a market it helped pioneer in the early 2000s, and one that still delivers profits for the company. In announcing its decision, the company cited evolving market dynamics and plans to pursue “greater opportunities to benefit patients and grow our business in other areas of the cardiovascular device market.”³ And, as widely publicized, Johnson & Johnson is in the process of acquiring Synthes bringing these focused companies together to create a comprehensive orthopedics business.

A focus on emerging markets that directly align with the company's focused portfolio

Until very recently, the medical technology industry has focused its R&D efforts on products for the United States (and to a somewhat lesser extent, other developed markets) because historically, the rewards have come from there. Now, the source of rewards is shifting into emerging markets and so too is the innovation focus.

Across many industries, investing in emerging markets today is acknowledged as a key factor of future growth. However, as an industry, medical technology has arrived late on the emerging market scene. In fact, medical technology companies have only relatively recently begun significant investment in emerging markets, as previously described pressures have forced them to explore new options. With their margins and growth in developed markets under pressure (thanks to health care reforms and the middling economic outlook), emerging-

market countries look exceedingly attractive, offering prospects of double-digit growth as their per capita income rises and they invest in building a health infrastructure.

Our research shows that high performers are out in front of the pack, building strategic plans that prioritize emerging market opportunities according to their fit with their focused portfolios. In fact, our research shows that analysts' future growth predictions and sentiment correlate strongly with a company's current strategy in emerging markets. For example, in June of 2011, Deutsche Bank's analysis of Becton Dickinson (BD) included the comment, “With 21 percent of its sales in emerging markets, BD has one of the largest exposures to EMs [emerging markets] within the MedTech [medical technology] space, which should bode well for future sales growth.”⁴

What makes high performers successful in their emerging market strategies when contrasted with their peers? The fact is they are not indiscriminately picking markets and simply transplanting existing products there.

Smart medical technology companies prioritize which emerging markets they will enter and with what product. They evaluate the prospects from multiple angles:

- What is the market size and what is the competitive landscape?
- What is the influence of government on the ability to conduct business?
- What differences in clinical practices, health insurance policies, addressable market size and local infrastructure affect how products must be modified?

The high and near-high performers adopt rigorous questioning to make sure their choices fit in with their portfolio, and understand that each market has unique operating dynamics that require individual attention.

For example, Smith & Nephew's emerging markets strategy (dated from late 2009) focuses on five priority market groups. Among these, China has been targeted as most attractive, with a projected ongoing boom in the medical technology market fueled by a large and aging population with growing wealth. Accordingly, in results from its third quarter of 2010, Smith & Nephew discussed plans to triple its workforce in China and add two new manufacturing facilities. The company moreover stresses “local teams run by local talent” in its emerging market strategy.⁵

Where appropriate a number of medical technology companies are investing in local innovation to develop products specific to the needs of the target market—rather than blindly assuming a developed market product can automatically be mapped onto new markets. Medtronic recently moved its international headquarters from Switzerland to Singapore primarily to be close to and align with future demand and growth in Asia.⁶ However, the company also was attracted by the country's rich pool of young and well-educated talent, and how the available workforce fits with a number of planned Asia-specific innovation projects.

As they build market-specific capabilities and grow, high performance medical technology companies will evolve as organizations—balancing the needs of traditional developed markets and new emerging markets. Smith & Nephew's emerging market strategy, for example, also includes mechanisms for deploying “reverse innovation” back to mature Western markets to widen the impact of its investments.⁵ In this way, the work they do within emerging markets benefits their key developed markets as well.

Distinctive Capabilities



Higher performers spot the most attractive growth segments or niches, where they can focus and build a dominant position. But they also fully understand the very different dynamics specific to each market segment, and the unique capabilities required to succeed in them.

Our research identified a small group of distinctive capabilities that are critical to achieving high performance in the future and have enabled the high performers to outperform their peers. These distinctive capabilities hit at a fundamental level of business operations. Regardless of their chosen focus, high-performing medical technology companies will need to master them (in addition to those capabilities specific to their market area) to become focused businesses and reinvigorate investor confidence.

Ability to execute large mergers and acquisitions effectively

Historically, most medical technology companies have grown through acquisitions, rather than organically. The industry saw more than US\$152 billion in funding committed to complete medical technology mergers and acquisitions during the five-year period from 2006 to 2010.⁷ Yet, despite the heavy M&A experience in the industry, medical technology companies as a whole have struggled with large-scale M&A integration.

The number of M&A deals any individual company executes appears to have little bearing on company performance. Instead, it's the size of the deals that seems to matter. In fact, our research shows that deal size tends to correlate inversely with performance. Large acquisitions (relative to the amount of revenue of the company) have generally translated into lower performance, as a result of accumulated intangibles and

the impact on return on invested capital. The highest performing companies in our research, in fact, tend to make acquisitions of a value less than 10 percent of their size.

For example, while Varian is relatively small at US\$2.2 billion in revenues, our research shows it has made seven deals between 2004 and 2010, at an average of 1 percent of the company's current scale. In contrast, some of Varian's similarly sized peers have grown rapidly though individual deals approaching half their annual revenue. Yet while Varian emerged as the only high performer in our research, a number of these competitors have enjoyed only modest performance (particularly on the margins) and lukewarm analyst ratings.

One exception from our research to these M&A trends is Getinge, which has grown quickly through large acquisitions, but has driven performance through effective M&A integration and strategy. For example, Getinge's acquisition of Huntleigh was based on clearly defined synergies in terms of geography, products and sales channels, and the company moved quickly to integrate post-acquisition. After the acquisition, Getinge's Extended Care business area established a dominant market position providing integrated solutions for care of patients with reduced mobility.⁸

The ability to manage large M&A deals seems likely to grow in importance, as trends indicate they are fast becoming the dominant type of deal in the industry. Our research finds that after several years of decline, 2010 saw a marked uptick in the value of M&A deals in the medical technology industry, driven almost exclusively by a return in large deals valued at over US\$1 billion. Likewise, during the first five months of 2011, the value of M&A deals executed was more than 10 times the level over the same period in 2010 (US\$38.5 billion versus

US\$3.8 billion), owing to three mega deals (including the largest deal ever announced—the merger of Johnson & Johnson and Synthes). When we exclude large deals from our analysis, M&A activity in 2010 and 2011 is virtually flat.⁹

Ability to optimize the fixed asset base

Despite differences in how capital intensive their respective product groups are, the higher performers in our research (regardless of product category) share an ability to extract significantly more revenue as a percentage of their fixed asset base through greater efficiency at managing property, plant and equipment.

As they adjust their strategies for future high performance, the lower performers should seek to maximize their fixed asset base, and look to the high performers for models of how to drive higher utilization of capital. The highest performing medical technology companies in our research generated 50 to 100 percent more revenue per each dollar invested in property, plant and equipment than the average and low performers during the seven-year period between 2003 and 2009.

High performers drive aggressive utilization by pursuing portfolio expansions that complement their existing production capabilities. They also make more extensive use of outsourcing and off-shoring to optimize their processes and improve their asset turnover. For example, while Varian's primary manufacturing facilities reside in Palo Alto, California, the company is now offshoring a significant portion of its manufacturing footprint. (Varian's manufacturing facility in Beijing was the company's first linear accelerator manufacturing facility outside North America.)¹⁰

Ability to optimize trade working capital position

Our research revealed that all of the medical technology companies we surveyed could stand to free significant cash flow by optimizing their trade working capital position (TWCAP). We found that as an industry, medical technology companies are operating with more than three months revenue trapped on their balance sheets—amounting to billions of dollars.

Despite operating in a sector where TWCAP levels tend to be higher, we find medical technology companies still have significant scope to improve their TWCAP positions. For example, in 2009, our research found the biopharmaceutical industry was operating on average with a TWCAP position 19 days better than that of the medical technology industry (92 days versus 111 days).¹¹ This statistic varies for medical technology companies based on the therapy areas each company focuses on; however, the strides that many pharmaceutical companies have made in this area over the last three years show that it is possible to improve and deliver value.

While we found no direct correlation between TWCAP position and a company's current performance, analysts are increasingly looking at TWCAP as an indicator of strength. Optimizing TWCAP through more effective financial and operations management (for example, through efficient invoicing) is a capability that will only grow in importance as health system reforms unfold and public health care cost containment initiatives add pressure.

Broader models of innovation that deliver not just breakthrough innovations, but service and price innovations as well

Certainly, breakthrough innovation remains the largest determinant of success in the medical technology industry, typically leading to marked jumps in share price. For example, when Boston Scientific launched its Taxus drug-eluting stent in 2004, the company gained approximately 70 percent market share within the first few weeks post-FDA approval—and sold one million units in the first year alone.¹² Among our higher performers in the research, St. Jude launched the Promote Quadra, the first cardiac resynchronization therapy system in the market to feature quadripolar-pacing technology (which helps physicians better manage common challenges associated with the changing pacing needs of patients with heart failure). When analysts pronounced it as potentially the most important heart-pacing device in a decade, St. Jude's stock price jumped about 7 percent.¹³

While these examples are compelling, our research also supports the premise that medical technology companies can be very successful even without having breakthrough innovation (for example, by being a fast follower or focusing on consumer-based innovation, excellence in services or providing lowest-cost solutions). Breakthrough technologies are coming fewer and farther between, in large part due to the heightening regulations and shrinking in venture capital funding described previously.

High performance will require continued focus on building strong R&D that addresses changed market dynamics—in particular, growing demand for service and price innovations—as well

as the regulatory expertise for effective navigation of changing regulatory requirements. The next section explores both of these concepts in more detail.

Building cost-effective R&D that measurably improves health outcomes

Perhaps not surprisingly, our research found that R&D spend level was heavily influenced by the product areas in which the companies compete. For example, companies in our research with a cardio focus (such as Boston Scientific, Medtronic and St. Jude) spend upwards of 10 percent on R&D, while those with an ortho focus (such as Zimmer, Smith & Nephew and Stryker) spend about half that amount.

Overall, we found no correlation between R&D spend level and high performance. Rather, the connection to high performance lies in the company's ability to adapt R&D models to market dynamics, including the cost-sensitivity of consumers and payers in emerging markets (and increasingly so in developed markets, too), and a shift in focus in the health care industry as a whole to more patient-centered outcomes. These dynamics will impact the types of products a changing customer base will buy and lead to new innovations in service and price offerings.

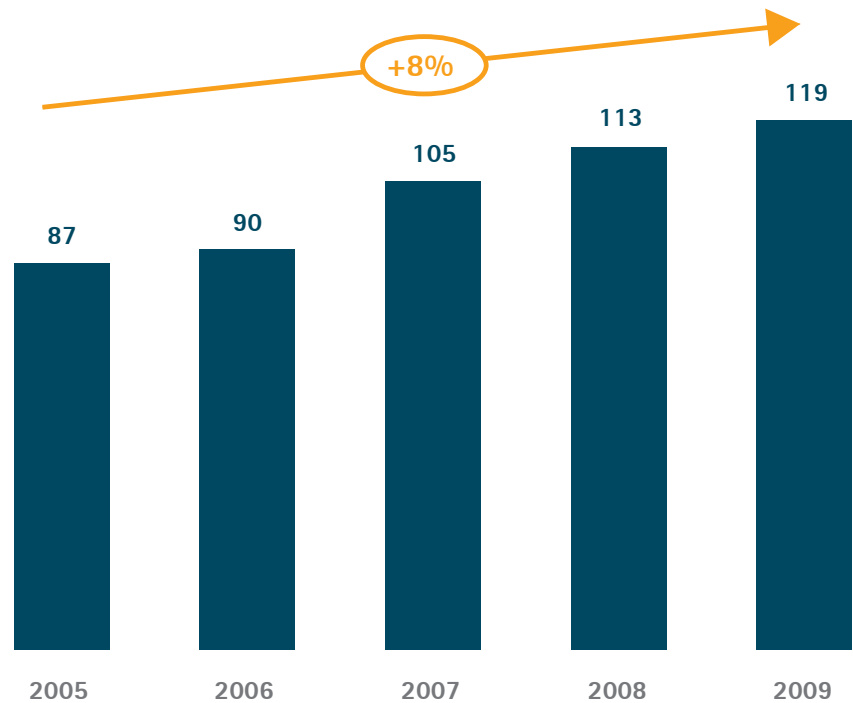
For example, Accenture has seen some imaging companies providing equipment (and in some cases the personnel) to run the imaging service on behalf of the customer on a charge-per-scan basis. This model is similar to what would be known in the IT world as "utility computing" or a "pay by the drink" model. It is a good example of a solution-based, rather than a technology-based, innovation that lowers costs and brings greater simplicity to the customer.

Although not a pure-play medical technology, Bayer provides another good example of the new types of patient-oriented innovation that will characterize the medical technology industry going forward. In 2009, Bayer launched its Contour Diabetes Blood Glucose monitor—the first monitor with the ability to connect to a home PC. The Contour's USB stick records monitoring results and can be brought to the doctor's office to enrich a patient's interactions with his or her physician. The Didget (based on the Contour) features compatibility with gaming consoles. Consistent testing provides "reward points" that children can use in games—an ingenious way to engage younger diabetic patients in their own care.¹⁴

Within emerging markets, R&D will need special focus on low-cost products, tailoring their approach to the realities of their customer base and not building up the cost side with new incremental functionalities. A fine example of this principle in action is GE Healthcare, which created an ultrasound machine that is portable for use in China, where the rural population lacks easy access to large, fully equipped medical centers.¹⁵

Finally, within emerging markets there is also a clear element to R&D that looks to see what feature sets can be reduced by the medical technology company to allow the products to be priced for the local market. The high performers then take this concept and stretch the benefit—bringing much smaller, simpler products developed for use in emerging markets back to developed markets in similar form as alternatives to their higher end models. The GE portable ultrasound machine, described in the previous paragraph, "Today, the portable machine is the growth engine of GE's ultrasound business in China...Even more important, portable ultrasounds have created new markets in the United States. They have been put into use in non-traditional applications, sometimes in entirely unexpected ways."¹⁵

Figure 5. Increase in average 510K approval time (2005–2009)



Source: Accenture research, based on United States Food and Drug Administration (FDA) data

The ability to navigate a changing regulatory landscape

Our research found evidence that regulators are raising the hurdle to launch a product. It's taking longer, and fewer new products are being approved—both of which will impact the rate of innovation. We found a 37 percent increase in the time it takes to get regulatory approval for new products, across the industry over the past five years (see figure 5).

Moreover, our research shows new product approvals overall decreased by 2 percent from 2001 to 2009. While that percentage appears small at first read, when extrapolated across industry growth, it amounts to a significant reduction.

The upshot of these trends is that venture capitalists see the regulatory environment becoming an increasing concern, which is contributing to reduced venture capital investment in

early stage products and companies. For example, in the United States, the period between 2007 and 2010 is marked by a steep, 64 percent decline in funds invested for the first time in early stage medical technology companies. Moreover, a comparison between investment in the first five months of the year, has seen a 50 percent decrease between 2010 and 2011.¹⁶

High performers recognize these realities and have begun taking steps to develop the expertise needed to effectively navigate the changing regulations' effect in R&D. These advances seem to be in their infancy and happening on a small scale, but include such techniques as building comparative effectiveness and clinical research capability, demonstrating differentiated outcomes at the patient level, and harmonizing best clinical practices across countries of operation.

Performance Anatomy



The external pressures that the medical technology industry faces require business models to be transformed. A medical technology company can position itself for high growth through its sharp market focus. It can arm itself with distinctive capabilities—both optimized business and financial fundamentals and those allied to specific positioning. However, to sustain long-term performance, it needs a performance anatomy that allows it to make the operational changes that will orient it toward developing new innovations to serve customers' needs and to improve health outcomes.

Companies in the medical technology industry appear to struggle with the performance anatomy element of high performance. It's not surprising—Accenture experience and high-performance business research repeatedly has borne out that performance

anatomy is perhaps the most elusive characteristic of all great companies. However, the new world of medical technology will require new approaches: among these, developing cultures that foster true health care partnerships will become of central importance.

Cultures of health care partnerships forged to improve patient outcomes

Becoming truly patient centered implies creating a culture that embraces other health care stakeholders to build the partnerships that support the provision of new cost models and new services and to collectively deliver improved health outcomes; no one provider can do it all on its own.

Put simplistically, the most successful of these long-term partnerships will focus on the question, "How can we improve health care together?" rather than "How can we sell more products?" Although, as of yet, none of the companies we researched have mastered these outcome-focused health care partnerships central to their DNA, we do see much activity towards it.

For example, Varian and GE have established a partnership in rural India that is providing "see & treat" centers to act as one-stop facilities for cancer, cardiac and neurological care. This partnership looks to provide a suite of integrated imaging, information management and treatment solutions that will reduce health care costs and increase accessibility for patients.¹⁷



Separately, with its "Healthymagination" program GE has also created a US\$6 billion fund for health care innovations that bring low cost but powerful technology innovations with simple operation and application.¹⁸

Accenture also expects to see an increase in health care partnerships supported by "innovation hubs," which will help centralize and amplify corporate R&D efforts. Indeed, our research shows a number of these innovation hubs developing already for the medical technology industry. Often, these hubs are naturally springing up in places where individual companies have had a history of R&D investment and where these investments now form the basis of new partnerships with neighboring universities.

For example, in Ireland, Covidien announced a €1.8 million investment into medical technologies research and development that will involve three Irish academic institutions.¹⁹ The Irish government views the program as a vital piece in the country's strategy to establish itself as a European hub for innovation. Varian Medical Systems heavily depends on the advances in IT systems and the natural pool of talent that comes from Silicon Valley (its headquarters for R&D)²⁰ as well as from its close proximity to academic powerhouses (including Stanford, Berkeley and Santa Cruz).

Conclusion

For years, the medical technology industry enjoyed solid and substantial growth: flush with venture-capital funding and traveling down a well-worn path of acquisitions and device-focused, incremental innovation. While medical technology has ridden out the global downturn far better than many other industries, the industry is facing down an entirely new scenario—one in which regulation is tightening, markets are shifting, customer landscapes are changing and customer demands are generating entirely new product pressures.

To achieve high performance in the future, medical technology companies will need to develop new portfolio strategies and significantly improved capabilities in acquisitions, fixed asset management, partnering and innovation. They will need to orient themselves to deliver patient-centered, outcomes-focused solutions within a few crisply defined target market segments. Then, they must make the smart acquisitions and develop the true health care partnerships that will enable them to develop market-relevant offerings that set them apart—not just through breakthrough innovations, but also through new service and pricing innovations as well.

Those that can establish and maintain their focus will set themselves on a new path to high performance—in an industry that has undergone considerable and lasting change.



Notes and references

- 1 "Pure plays" are companies only focused on medical technology, as opposed to companies operating a medical technology division as just one of several large business areas.
- 2 As of publication date, Synthes and Johnson & Johnson announced that they have entered into a definitive agreement whereby Johnson & Johnson will acquire Synthes.
- 3 Johnson & Johnson, "Cordis announces discontinuation of Nevo™ Sirolimus-eluting coronary stent," News Release, June 15, 2011.
- 4 Deutsche Bank Medical Supplies and Devices Medtech Investor Prep Book, June 2, 2011.
- 5 Smith & Nephew Emerging Markets Investor Presentation, November 19-20, 2009.
- 6 ChannelNewsAsia.com, "Medtronic invests \$80m in Singapore plant," October 8, 2009.
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