What Medical Device Winners Know How to Do: Seven Imperatives to Transform Your Company's Performance

When medical devices companies win, they win big, earning 31x their weaker competitors' returns. So what are they doing that their competitors aren't? This article describes seven practices mastered by the best of the best.

Medical device companies are all the rage on Wall Street. It's easy to see why – if you picked a winner five years ago, you would have received returns of 311%[1], and this doesn't include those entities bought out at lofty valuations. Both small and large cap medical device companies have outperformed the S&P 500 for the past three years, and analysts predict even more growth – 15% top line growth and 17% bottom line over the next 12 months. Successful device companies also remain attractive targets for acquisition by the behemoths of the health care industry, usually at substantial premiums.

However, our research[2] reveals that only 27% of publicly traded emerging medical device companies are Winners. Laggards – one third of the group -- returned a disappointing -1% return over five years (and this only accounts for those firms still in the game).

So what are the Winners doing right? We identified seven practices that device companies need to master to stay on top. Winners typically excel at most of these imperatives, and they continually push their teams to out-execute against all seven.

The primary difference between the Winners and the aspirants is in the quantity and quality of their execution. Winners have mastered at least five out of the seven practices – not just started a program or aimed at an imperative, but *mastered* through relentless drive and focus. Yes they have all made mistakes and faced setbacks, and some are even experiencing challenges at the time of writing. However their mindset of continual

Four Levels of Performance

We looked at 120 publicly traded medical device companies with revenues between $10m and $1b, priced at above $3/share. We evaluated these companies' financial results over a common five-year time period and identified four levels of performance:

- ✓ **Winners**: Strong (over 20%) shareholder returns and at least 15% compound revenue growth
- ✓ **Developers**: Strong (over 20%) shareholder returns but less than 15% revenue growth
- ✓ **Stumblers**: Low (under 20%) or negative returns, but with more than 15% revenue increases
- ✓ **Laggards**: Low or negative shareholder returns and low or negative revenue growth.

To understand the story behind the winners and determine their drivers of success, we looked at patterns in their technology-product strategies, their approaches to sales and marketing, their use of education, alliance partnerships, acquisition activity, patent protection, pricing, and sources of revenues. We examined current and historical financials, including revenues, gross, net, operating margins, return on assets, investment and equity, sales and marketing spending, and stock price movement. Our sources included SEC filings, press releases, conference (earnings) calls, websites and in-depth interviews.

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[1] This compares to returns of 2% for the DJ Composite, 3% for the NASDAQ, -7% for the S&P 500 and –3% for the Russell 3000, in the same time frame.

[2] While these 120 publicly traded companies represent only a fraction of the 800+ medical device companies in the US, we believe these imperatives could also apply to the wider group of privately held entities

innovation and their ability to create risk-taking teams that can morph through rapid transitions allows them to get back up after a stumble.

A word about our Stumblers and Laggards: these are not dog companies – not by a long shot. These companies have survived five turbulent years of changes in health care technology and policy. They have battled intense competition and secured funding despite extraordinary gyrations in the capital markets. In fact, we have identified several companies that promise to be future winners from this group (see sidebar).

Here's what Winners know how to do, and execute with relentless drive and focus:

1. Invest in a focused technology pipeline.

Capital spending of Winners grew 39% over a five-year period, which is 2.6 times higher than the average of the companies studied. At the other end of the spectrum, Laggards' spending fell 12% in the same time period, but interestingly, Stumblers' capital spending was roughly the same as Winners. This reveals that the real key is the combination of adequate investment, focus on a single technology, and a creative approach to managing the pipeline (such as co-developing with partners to reduce time to market). Winners continuously manage their pipelines at every stage, with stringent checklists. That includes monitoring market conditions (such as reimbursement, competitive technologies, and provider/consumer acceptance).

Winners are willing to self-cannibalize their own products, bringing out newer and better devices to maintain a first mover advantage, pre-empt competitive entry, and maintain strong gross margins. Possis, NSDQ: POSS a developer, manufacturer and marketer of medical devices; its primary product is the AngioJet Rheolytic Thrombectomy System, a non-surgical, minimally invasive catheter system designed to rapidly remove blood clots with minimal vascular trauma. Possis has portfolio of three FDA indications for use of its AngioJet® Rheolytic™ Thrombectomy System. Soon after Possis launched Permaseal Graft, an exciting product with promising applications, the company concluded that there were greater opportunities for its other devices with markets that could be accessed more efficiently. Possis, like other Winners made a tough portfolio choice and discontinued the product rather than attempting to change the market's behavior.

Medical device winners (and their investors) are well aware that technology that improves an existing process (making it easier and/or cheaper) will have more rapid market adoption than innovations to create a new process such as creating a new vital sign to monitor. While Aspect's innovative BIS system provides key information that allows clinicians to assess and manage a patient's level of consciousness in the OR or ICU, the hospital markets have been slow to adopt this new vital sign that requires a new process; no wonder it's taken the capital markets 10+ years to reward this new company.

It goes without saying that Winners vigorously protect their patents from all angles throughout the product's lifecycle.

What if you're not a winner?

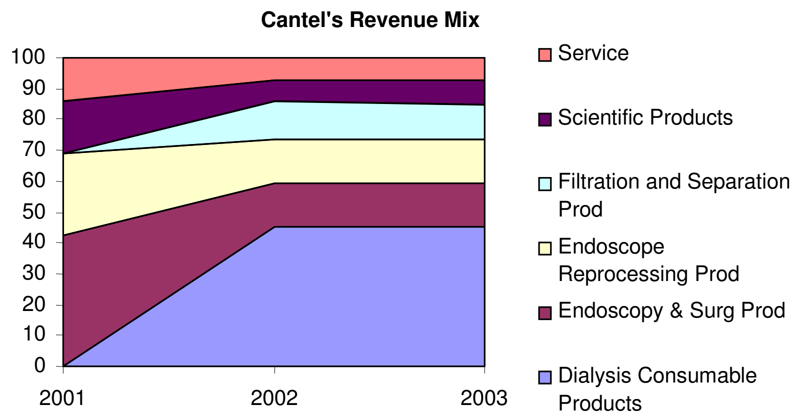
Stumbler – Are you misunderstood? Are you really a winner? Do the investors understand your technology and market potential? Winners know how to communicate with investors in their language to maximize their market valuation. The key points: quantify the market potential, make the business model and revenue streams transparent, explain the drivers of adoption for the technology and why the science behind the solution is superior. Sounds easy. But most Stumblers or Laggards complicate it, yet investors reward Winners who simplify the story.
OR… Have you really stumbled? Is the technology truly superior and sustainable? (Imperative #1) Have you developed a full set of revenue streams? Is your financial house in order? Are you accessing the market creatively with education? Have you created exit options? Is the team aligned and focused? (Consider Imperatives # 2, #4, #6, #7). Stumblers recover by selecting only one or two imperatives and driving results from these activities.

Developer – How do you maintain momentum? Are you focused on innovative channel creation, education to drive adoption, and multiple revenue streams. (Consider Imperatives #2, #5, #6).

Laggard – Is your technology distinctive, do you have multiple revenue streams (Imperatives #1, #2). Was there a reimbursement change? (#3) Do you need to make tough exit choices #7? Can you turn around quickly enough? Is there a natural exit, or can you find one?

2. Create multiple streams of revenue.

Smart device companies capture multiple streams of revenue beyond their devices. 59% of our winners have multiple consumable streams and some 37% have service revenue. Winners get creative in finding ways to diversify their revenue streams. Some do so through strategic acquisitions or geographical expansion, while others have invested heavily in creating their own consumable or service related businesses. Smart Winners find revenue streams that bring in new predictable streams of revenue *and* drive the core device based business.



Cantel, (NSDQ: CMN) a leading provider of infection prevention and control products and services, continuously created multiple revenue streams by five acquisitions/alliances and internal product/process development going from three revenue sources in 2001 to six in 2003. Cantel further extended its revenue stream by proving technical maintenance services for their own products, and competitors' products.

Winners are also well aware that consumers are the fastest source of payment growth for healthcare, so they leverage consumer interest and their ability to pay, to drive market adoption of their devices. In fact, 24% of Winners (versus 13% of Stumblers) derive a considerable portion of their revenues from devices used in consumer-paid procedures. Winning companies with insurer-paid procedures or devices often market their innovations directly to consumers, who then encourage their healthcare providers to use the technology. Align (NSDQ: ALGN) – maker of the invisible braces for malocclusion – is creating a strong consumer franchise that is willing to pay a premium for its product, while still courting the dental insurance payer community to expand its consumer base.

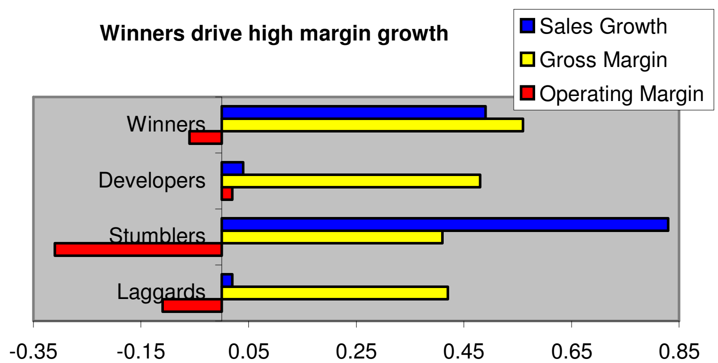
3. Be aware and prepared for those who lose when you win.

It's basic but fundamental to get the economics right for all players -- providers, patients, payers, and regulators. Winners track the money flow, actively helping their constituents navigate the reimbursement labyrinth. Winners know who stands to lose, both in terms of money and influence, as new devices and procedures are adopted. They understand the relative power of each party affected by their technology, and can predict their likely actions and influence.

SonoSite (NSDQ: SONO) created an innovative, cost effective, portable ultrasound unit – arguably a disruptive technology that allowed new health care professionals (such as Emergency Room Physicians) to provide rapid ultrasound exams without a radiology consultation. SonoSite's patented line of compact ultrasound devices was threatened when Medicare began to limit reimbursement for hand-carried devices. SonoSite invested in lobbying efforts to reinforce the reimbursement standards and succeeded by demonstrating the economic value, the standard of patient care and working with all the players. A key factor in this change was getting the support of radiologists, who had previously believed that portable devices would take income away from them. SonoSite focused on enlisting radiologists' support for its technology, which was persuasive for regulators.

4. Drive cost-conscious revenue growth.

Winner's get their economics right and ensure their financial house is in order. Winners ensured their pricing delivered high gross margins, almost 25% greater than their weaker competitors. Winners kept their operations lean, yet continued to invest in their businesses willing to forgo profitability for cost-conscious revenue growth. Stumblers achieved outstanding sales growth of 83% compounded over 5 years; however the markets punished them for their inefficient operations.



Kensey Nash (NSDQ: KNSY) is engaged in cardiovascular medical technology design, development, and manufacturer and processing of absorbable biomaterials. They consistently delivered winning operating results – while revenue growth was nearly 50%, gross profits grew by nearly 60% and operating income increased by 95%; with these trends the Street rewarded this Winner with disproportionate market returns of 225% over five years.

5. Innovate to gain efficient market access.

The absolute number of "feet on the street" is important, but Winners combine this with creative, systematic approaches to increasing the overall sales channel productivity. Winners get more reps in front of more decision makers with better results by using a combination of their own direct sales force, their partners' sales agents and (if appropriate) independent reps. Winners monitor a dashboard of sales productivity metrics, to keep costs in line. They track dollars and margins per rep, per customer, new account generation, repeat sales and other metrics. They use a plethora of tools to improve productivity, including customer and manager feedback, ride-alongs, substantial bonuses for top performers, ROI selling tools and "lead to sale" tracking systems. Winners are not shy about direct comparisons to their competitors, particularly the large device companies with established relationships. Winners profile their best reps and seize the opportunity to replicate these results by hiring top talent in poor economic times and are willing to restructure to keep the sales team effective.

Advanced Neuromodulation Systems, Inc. (NSDQ: ANS) acquired "assets" of its exclusive distributor of pain management products for the NW US, Comedical, Inc. These key "assets" included three of Comedical's direct sales people and three of its commissioned sales agents who joined ANS' sales force, thereby creating a more cost-effective sales and distribution network.

6. Use education to get market traction.

Winners view education as a way to dramatically ramp up market adoption. In fact 67% have active education programs vs. 28% of Stumblers. Their "education mindset" enables them to invest in health care providers and use education to open new channels and new providers. Winners dedicate a full time person who appreciates that adult education is interactive, hands-on, and fast paced. They innovate with rich education offerings, using the web for group or 1-1 interactions, libraries of cases, FAQs, discussion groups, and patient materials. Winners don't view education as a revenue stream, but rather as a way to build market acceptance and usage of their products and services. They maximize efficiency by creating modules for time-pressed health care professionals – such as providing online classes prior to training to maximize in-person learning – and partnering with universities and other educators for lower costs and higher quality programs. Winners also use education to develop a core group of luminaries to be their "connectors" – not academics who write papers (although this is important) but "Connectors" who talk to other providers to develop awareness.

Align Technology, (NSDQ: ALGN) maker of invisible braces – created new channels of distribution by providing innovative education. Orthodontists were their first partners and Align provided free education on the concept and how to fit and adjust the new braces; dentists were the next natural provider, and Align created lower cost courses involving web-based learning, summits for key providers, distance learning options, and hands-on in-person training for dentists and their staff. Programs included continuous workshops around the country for easy access. Align recently announced new training programs for primary care physicians – again extending their channels to reach even more new consumers.

7. Build to exit – from the beginning

Winners respond to the industry dynamic played out with a dozen mega players and a thousand plus small innovators. Most device companies are innovators that create products (and processes) and sell their technological advances to one of the dozen mega players. The real challenge is when to sell. Winners have sold at three main points: development stage when the technology has proven effective yet not manufactured; the single product stage with market traction needing resources to create a product pipeline; the business stage when a company has a stable of products and a profitable entity. Sell too soon or sell between stages and the company does not reap its full value. Winners set up exit options by identifying potential buyers and creating alliances with them (for example, to access markets or leverage R&D). Palomar (NSDQ: PMTI) a designer and distributor of cosmetic laser devices, a Stumbler in our assessment, appears to be evolving into a Winner by establishing a relationship with Gillette – a potential acquirer. Many of these relationships are forged – the investor and the company need to decipher which of these could signal a potential exit option.

Many of our winners implemented these imperatives by creating a risk taking team that can recover from a stumble. Most, if not all Winners have stumbled; innovation – both in technology and market development – requires bold new approaches that accompany "stumbles". Winners ensure that they can continually innovate by creating risk-taking teams that can morph through rapid transitions and get back up after a stumble. These teams have high-performance cultures, meaning that they strive for exceptional results and are able resolve conflicts quickly and effectively (such as technology choices, sales force structure, R&D partnerships). Winners learn to make tough people choices quickly knowing that the creators of technology and markets are not necessarily the builders. A noticeable difference is their ability to manage, in fact encourage the conflict, or productive debate, to ensure the best ideas are brought forward for thoughtful resolution. Many teams interviewed had invested in conflict management skills for its teams.

Winners view their team more broadly than their less successful counterparts. They see the team as a combination of alliance partners (distribution, technology, key customer groups), key customers, investors, and the internal team. By seeing the team more broadly, Winners remind themselves to manage the web of relationships, to develop the technology, extend their distribution, and hear new approaches to tough problems.

Conclusion

While there are Winners, Developers, Stumblers, and Laggards, most companies have occupied all of these spaces at one time or another, and can easily go back from Winner to Stumbler. Once you recognize where you are, and the reasons for your challenges, you can put resources (people, energy, dollars) into solving against your priorities.

About the Author:

Mary Kate Scott is the CEO of Health Technology Ventures, LLC, a privately held healthcare advisory and investment company that provides CEO and Board-level counsel and management consulting services. Mary Kate works with publicly traded companies, start-up ventures, not-for-profit entities and investors of these firms, on strategy, organization, and marketing issues including performance transitions, alliances, acquisitions, technology management, marketing and sales productivity programs. Mary Kate is creating an Entrepreneurship in Life Sciences course, which she will teach at the Marshall School of Business at the University of Southern California in 2004 and 2005. Prior to Health Technology Ventures, Mary Kate was at McKinsey & Company and Procter & Gamble.