BETTER NEW BUSINESS DEVELOPMENT AT DuPONT—I

Implementation of a "business initiative process" has enabled the company's business management and project teams to significantly improve their NPD efforts.

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OVERVIEW: *Growth-oriented companies frequently identify attractive business development opportunities that lie in markets new to them and require new product/technology capabilities. Successfully capturing these "new/new" opportunities can be problematic, however, because companies often lack the appropriate experience base to guide them; i.e., "they don't know what they don't know." To improve the success rate of its business development initiatives, DuPont developed a comprehensive framework to help its business leadership and development teams successfully navigate through the new business development (NBD) minefield. This framework—called "Business Initiative Process" (BIP)—brings together an array of best practices for establishing high-performance development teams, creating/managing strategic alliances, structuring leadership decision-making, and organizing detailed project planning. By using this holistic framework, DuPont SBUs have improved the returns on their NBD investments.*

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The ability to rapidly bring to the marketplace valuable new products and services—superior offerings that delight customers—is critical to business success today. Companies that are adept at identifying and exploiting high-payoff opportunities for new offerings are destined to be the long-term winners. As Hamel and Prahalad have pointed out, "competition for the future is competition to create and dominate emerging opportunities" (*1*).

A number of companies—DuPont included—have found that many attractive growth opportunities lie outside both their current product/technology base and those markets/customers they currently serve. These opportunities commonly arise from the emergence of new markets, from the restructuring of power in the value chain, from the development of new business models, or from the discovery/emergence of new technologies. Firms often look at their organizational capabilities and core competencies and conclude they can profitably exploit these non-traditional opportunities. As a result, we see companies moving beyond product innovation to pursue what we term "new business development" (NBD) as a major route to corporate renewal and growth (see Figure 1).

However, NBD is a notoriously risky proposition. The higher level of marketplace uncertainty (often due to a chaotically changing environment), the large number of new tasks and the lack of business familiarity that

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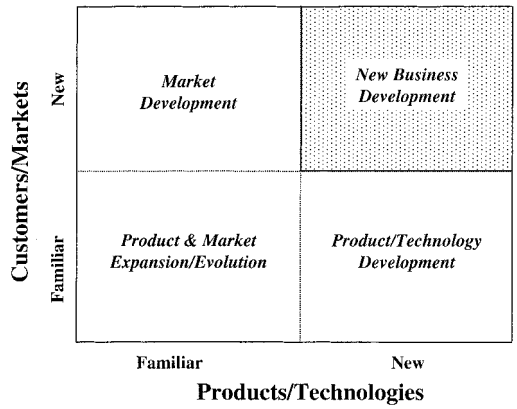

Figure 1.—Identifying the type of development initiative being pursued helps ensure that the right development process and development tools are used.

typically characterize NBD initiatives make it difficult to predict future outcomes. In addition, a variety of project-specific failure modes—from incomplete assessment of competitive response to the inability to deliver key technologies on time to poor project execution—have led to costly NBD failures.

Still, there are companies that have learned to grow profitably through new business development, Hewlett Packard's successful development of a multi-billion-dollar ink jet printer and ink business being one major example. These companies learned how to put the right people in place—both at the home office and on the ground—to guide and execute their business growth. They continuously capitalized on new marketplace insights, committing big resources only when they truly understood what it took to win. In addition, they developed and implemented effective management processes that drove sound decision-making and project management. The challenge to DuPont, and the broader business community, is to learn from these high performers.

DuPont's Response

Like many large companies, DuPont has had mixed results with its NBD efforts; for instance, DuPont's joint venture with Philips to produce optical disks did not meet expectations, but the Corian® bath and kitchen surfacing enterprise is one of DuPont's fastest growing and most profitable businesses. To help business management and project teams significantly improve NBD performance, DuPont has instituted a systematic effort to improve the overall return from its NBD investment by developing and implementing a set of disciplined processes, tools and organizational structures. The objective of this effort is to find or develop benchmarked best practices to support/manage the full range of NBD tasks, from defining a growth strategy and identifying promising growth opportunities to marketplace development/testing of the new business concept to full commercial launch.

An "umbrella" business process that structures/organizes both the NBD decision-making of the business leadership team and the work of development teams driving specific NBD projects is one of the frameworks DuPont has developed and implemented. This process (which we have named Business Initiative Process—BIP) was built on the foundation of DuPont's existing corporate best practice for product/process development: PACE, for *P*roduct *A*nd *C*ycle-time *E*xcellence (*2*). However, BIP expanded on PACE to incorporate a broad array of NBD best practice tools and frameworks. A detailed Guideline Manual for the process was developed and to date more than two dozen NBD teams have used it.

This article provides an overview of the BIP framework and highlights some of the key thinking behind it. We also outline the fundamental elements of the process and describe some of our recent experiences with real NBD projects. In Part 2, to be published in a subsequent issue of *RTM*, we provide a deeper view of the flow of work over time in order to give the reader a more "what-the-team-does" sense of the process.

A Staged Approach

Business Initiative Process is built around a staged framework for funding/resourcing NBD initiatives. The process divides the work of developing and commercializing a new business into the five distinct phases/stages shown in Figure 2, with clear senior management Go/No–Go and resource allocation decisions made at the end of each phase. The work flow in each phase is designed so that the NBD project team develops the specific deliverables—and *only* those deliverables—that are needed for effective decision making at that particular stage of development. For example, a list of potential partners is developed in the "Business Case" stage but the selection of a preferred commercialization partner (if any) is not made until the "Evaluation and Planning" phase, and the preliminary commercialization partnership agreement is not written until the "Detailed Development and Negotiation" stage. The goal is to keep the team focused on the work needed at any specific point in time.

The work of each phase is structured to facilitate rapid learning and rapid modification of the venture business plan based on that learning. As the venture team moves through the various stages, it develops a clearer and more comprehensive view of the requirements for venture success and the likely business payoff (or lack thereof) that would come from venture commercialization. These new insights enable the team to make course corrections

where necessary or even to recommend killing the initiative if appropriate.

The BIP methodology clearly shows its roots in "Stage-Gate"-type new-product development processes with "stages" of development and senior management decision "gates." But it also has a lot in common with the phase funding framework used by venture capitalists in that it limits the investment commitment to the resources required to get to the end of the next phase.

Organizing for Success

As part of a Business Initiative Process implementation, the fundamental five-element structure shown in Figure 3 is put in place in each business using the process. This framework ensures effective decision-making and coordination/management of an NBD effort as it moves through the five stages of the NBD process:

■ *Program Approval Committee* (PAC)—composed of the business leadership responsible for managing the flow and direction of development activities to meet the goals of the business. The PAC consists of those senior managers who control the resources that the NBD team will need to reach full commercialization and who can balance needs across a portfolio of projects. It may include senior managers of internal and external partners as well.

■ *Core Team*—a small (typically 4–9 members) multifunctional team responsible for managing a specific business growth development project, and including appropriate people from internal and external partners. Teams are formed early with the goal of staying together from concept development through full commercialization.

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■ *Structured Business Initiative Process Guideline Manual*—guidelines for new business development teams to follow as they move from concept to commercial operation. The manual offers detailed guidance for teams to manage the nine "venture workstreams" discussed below and provides a framework to apply support tools specifically tailored for new business development.

■ *Phase Reviews*—structured decision-making meetings held at key milestones where the PAC makes Go/No–Go/Redirect and resourcing decisions for development programs. Phase reviews occur at the end of each stage/phase and bring the PAC and core team together face to face.

■ *Business Initiative Process Manager*—resources the process and provides oversight and continuous improvement.

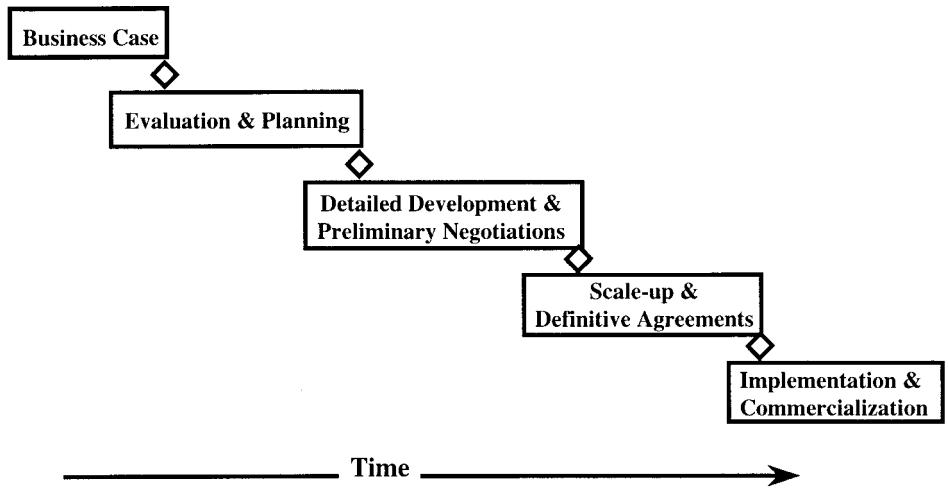

Figure 2.—The DuPont Business Initiative Process divides the development work for a specific initiative/project into five distinct but overlapping stages with clear go/no–go decisions between each stage.

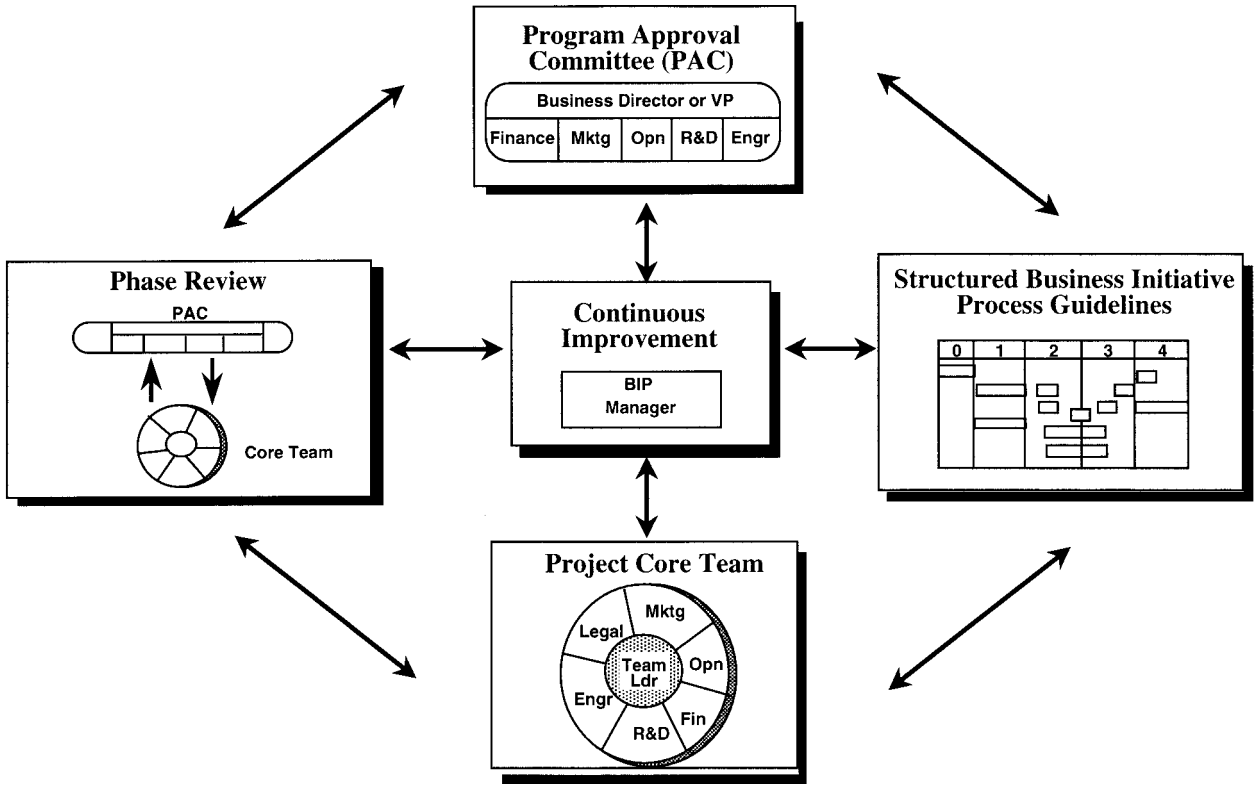

Figure 3.—Five key structuring elements for the DuPont Business Initiative Process ensure that the "right people are making the right decisions at the right time with the right information."

These five structuring elements of BIP are analogous to those found in PACE and, in fact, for a number of DuPont businesses the PAC members are the same for both.

Establishing and Managing Alliances

Of particular concern to DuPont during the late 1980s and early 1990s was the company's capability to manage alliances effectively. Strategic alliances/partnerships—be they mergers, equity joint ventures, customer-supplier contractual relationships, development partnerships, or informal "hand-shake" agreements—had become an almost universal component of the new business development process in DuPont. But during this period, alliances had proved challenging for the company to negotiate successfully and implement profitably, particularly as teams moved up the hierarchy of alliance complexity (see Figure 4). As a response, it implemented a series of best practices (including the DuPont M&A Partnership between DuPont Finance, Legal and Corporate Plans) to provide oversight for and expertise in the company's merger, acquisition and joint venture activities.

JV/Alliance Toolkit

The Business Initiative Process was specifically structured to highlight the critical importance of alliances and to pull in the capabilities and resources embodied in these best practices. The objective was to assemble a full range of tools, templates, working frameworks, and supporting resources to provide comprehensive guidance for DuPont NBD teams involved in alliance negotiation and formation. These tools were intended to cover the complete alliance negotiation and implementation cycle and were explained in the BIP Guideline Manual. Both tools already in place and new capabilities were incorporated including:

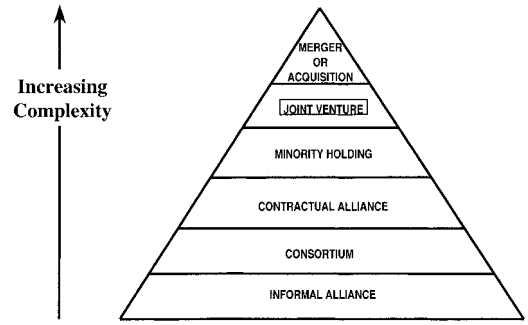

Figure 4.—The full array of potential alliance options—what we call the "alliance landscape"—needs to be explored/assessed before a preferred alternative is selected.

• *DuPont joint venture seminar*—a fully structured working session of 1–5 days to educate both senior business leadership and the development team on the issues and demands of alliance development.

• *Partner evaluation and selection frameworks*—includes strategic due diligence checklists and potential partner assessment worksheets.

• *Negotiating team guidelines*—structured frameworks for staffing/organizing/managing the agreement negotiation process.

• *Due diligence checklists*—detailed guidance for the team covering all aspects of the due diligence effort.

• *Transition planning/implementation processes*—detailed guidance on how to structure the new alliance entity and integrate it with ongoing operations.

These tools and frameworks were designed to leverage the extensive capabilities both within DuPont and in the outside world. The focus was on capturing key learnings and experiences and translating them into specific hands-on "how-to's" for practitioners.

Strategic Gaps Analysis

Probably the most critical task in the alliance process is defining the role a partnership should play for a given NBD initiative. DuPont uses a simple but powerful process ("Strategic Gaps Analysis," see Figure 5) to structure the team approach to this work. This process begins by having the team define what they believe the marketplace "winner" will look like in three key areas:

1. *Market presence.*—How can we create a "compelling story" to tell target customers—i.e., a value proposition that will satisfy their needs better than the competition? How do we access those customers so they can hear our message above the roar from our competitors? How can we insert ourselves into the channels of supply so our target customers can access our products/services when they are ready to buy?

2. *Processes.*—How can we structure an efficient and integrated flow of materials, information and operations for developing/producing/distributing/supporting our products and services that will enable us to deliver superior value to the target customers?

3. *Technology.*—Which technologies should be imbedded in our products, services and processes to provide superior functionality to our target customers and to optimize the performance of our own operations?

After the "winning description" is completed, the team assesses the gaps between DuPont's current position and the winning scenario. Alternative alliance strategies to

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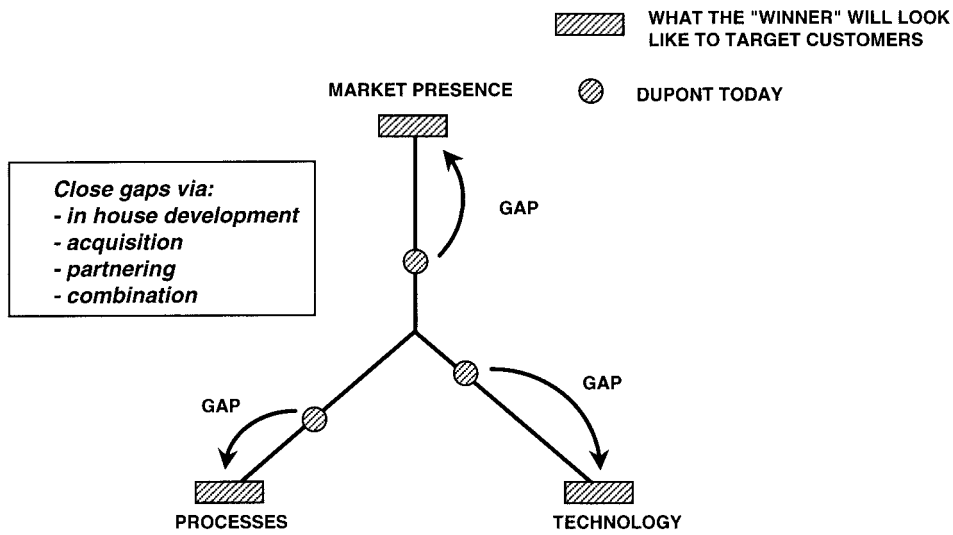

Figure 5.—A "strategic gaps analysis" in three key areas can identify the critical gaps that must be closed to create a winning position with target customers.

fill these gaps are identified, evaluated and ranked, and the preferred alternative (which might in fact be "go it alone") is then selected. Finally, a high-level view of critical success factors and key assumptions is developed around the preferred alternative.

In DuPont, strategic gaps analyses are typically completed in a group setting with the help of an experienced facilitator. The group often includes outside experts who bring a deeper knowledge of the new markets and technologies being considered than may be found currently in the team. A group approach enables a range of perspectives to be explored and invariably greatly strengthens the output.

Managing the Nine Venture Workstreams

One of the major characteristics of new business development projects is the large number of tasks that the project team must handle. Many of the tasks are new to the organization (e.g., the alliance work described earlier). To successfully move through the BIP stages, the venture team must ensure that all of these tasks are effectively coordinated and managed if it desires a "Go" from senior management. To help teams navigate these difficult waters, we began by first disaggregating the venture commercialization work into the nine distinct workstreams listed above. We then systematically identified the generic tasks (and associated deliverables) of each workstream and documented these in the BIP Guideline Manual.

Key Workstreams that the Development Core Team Must Effectively Plan and Execute.

1. Market planning and market development—building the interface with the marketplace.

2. Establishing the product/process technology base.

3. Developing the full range of operational business processes.
- Ensure focus on manufacturing and complete supply chain.
- Develop/install the complete supporting business process infrastructure.

4. Building facilities and designing/installing equipment.

5. Staffing for development and continuing operation.

6. Establishing/building the relationship with your partner(s).

7. Obtaining the "consent to operate"—i.e., the approval workstream.
- Internal, regulatory, host country, local government, community, etc.

8. Resolving legal entity issues.

9. Financing.

The BIP has been successfully applied to a broad range of DuPont initiatives, particularly Asia/Pacific.

This in-depth guidance provides a template for project-specific planning and dramatically reduces the chances of a key item "falling between the cracks." In addition, these guidelines ensure that disparate tasks are aligned in time so that the work in one area does not have to stop and wait for a task in another area to be finished. (More details on the work of the team on a stage-by-stage basis will be given in Part 2 of this article.) And finally, having a formalized breakdown of the work to be accomplished enables the team to identify a team member who will be responsible for overseeing each key task during the entire life of the development effort.

DuPont Experience

The Business Initiative Process has been successfully applied to a broad range of DuPont initiatives with particular emphasis on projects in Asia/Pacific. BIP has been used by multiple DuPont SBUs to systematically evaluate business opportunities, to select the best strategies to pursue those opportunities, and to effectively structure, organize and manage the execution of those strategies. In addition, BIP has provided a disciplined framework for these businesses to learn when and how to say "no" (or "not now") to NBD projects that don't fit the strategic direction of the business or that cannot be resourced effectively.

DuPont–Far Eastern Company

DFC is a 50–50 joint venture between DuPont Nylon and the Taiwanese Far Eastern Textile Co. Ltd. The JV was set up to construct and operate a $100 million nylon fiber plant in Taiwan using new fiber spinning technology from DuPont and engineering and construction from FETL. This venture was targeted at high-growth apparel market segments in Taiwan, providing greater geographic reach for DuPont and product diversification for FETL. The plant was completed on budget and started up in early 1997. Products were successfully rolled out to the marketplace that same year.

DuPont Nylon implemented BIP in Asia/Pacific just as this project was entering the last stage of the development process ("Commercialization," see Figure 2). Nylon Asia/Pacific leadership and DFC management used BIP to manage/coordinate key elements of project implementation and business launch focusing in two key arenas: technology implementation and market introduction.

In the arena of technology implementation, BIP provided a formal structure for communications and planning between two distinct organizations and cultures working 12 time zones apart.

In the arena of market introduction, the introduction of new products to the Taiwanese mill customers was a complex endeavor requiring systematic identification/prioritization of accounts and rapid interaction with them. BIP was used to systematize and plan the interactions with customers, coordinate the production/shipment of large quantities of developmental product from the United States, and manage the flow of customer feedback to the development team as well as managing the transition to locally produced products.

DuPont China Projects

China has been a major focus of new business development activities for DuPont for much of the '90s, with more than 25 initiatives spread across DuPont's SBUs. Business Initiative Process has been used for more than a dozen of these initiatives, ranging from upstream nylon intermediates and specialty chemicals projects to Dacron spinning JV's to tire cord manufacturing projects to nylon consumer product ventures. BIP played a role in managing key pieces of these projects in all phases from start to finish (which meant early project termination in several cases of projects that didn't meet business-based criteria for moving forward). BIP was instrumental in bringing a holistic view to these projects and enabling many of them to move rapidly and successfully to full commercialization.

Semiconductor Packaging

DuPont's Photopolymer and Electronic Materials SBU (P&EM) markets a wide range of films, laminates and photoresist materials to the world-wide electronics industry. P&EM had begun implementation of BIP in 1996 following implementation of product/process development PACE two years earlier. In early 1997, the P&EM PAC (Program Approval Committee, see Figure 3) chartered a core team to explore whether (and how) P&EM should enter the "semiconductor packaging" market—a large and growing market in which DuPont did not participate in a significant way (*3*).

The Semiconductor Packaging Team used BIP over a five-month period to complete the first two stages of the development process (see Figure 2) and evaluate alternative strategies for such an entry. The focus of their efforts was to understand the key dynamics of this market and to use the BIP tools to evaluate a broad array of alliance options (ranging from a major JV to a small-scale acquisition to a "go-it-alone" approach). They also gathered data on the key players in the industry and assessed their viability as partners and/or acquisition candidates.

Based on this in-depth look at the marketplace and a corresponding look at DuPont's internal capabilities, the team recommended that P&EM go forward with a major alliance strategy. In addition, they developed a detailed plan of the work to reach full commercialization and listed the key issues, risks and assumptions associated with their plan.

This full package of information was presented to the P&EM PAC at the "Evaluation and Planning" phase review. Concluding that there was too much uncertainty in the project and too high a demand for key resources at that time, the PAC gave the team a "No–Go." The team was commended for their high-quality assessment of the opportunity and reassigned to other high-priority projects. The information package was put on the shelf to be revisited if/when things changed in the business.

Prior to the advent of BIP, projects in DuPont like this one frequently moved much farther down the road to commercialization before being stopped. The comprehensive picture of the initiative developed by the core team enabled senior management to understand the full impact the project would have on other work of the business well before major dollars were spent or commitments made to potential partners. Consequently, key resources were not diverted.

Summing Up

Business Initiative Process has proven to be a very effective tool to "take the mystery out" of successful new business development. By providing a comprehensive and systematic framework for managing the full venture life-cycle from concept to commercialization, it ensures effective senior management guidance. In addition, it offers senior management a structured process to "get their arms around" each project in the portfolio of NBD projects underway and thereby help them to make those critical portfolio balancing decisions. ◉

References and Notes

1. Gary Hamel and C. K. Prahalad. *Competing for the Future.* Harvard Business School Press, 1994.

2. M. E. McGrath, M. T. Anthony and A. R. Shapiro. *Product Development: Success Through Product And Cycle-time Excellence.* Butterworth-Heinemann, 1992. PACE—Product and Cycle-time Excellence—is a registered service mark of Pittiglio, Rabin, Todd and McGrath.

3. More than 99 percent of semiconductor devices are "packaged" prior to assembly onto a printed circuit board or other interconnect. This packaging redistributes the input/output pads from the semiconductor chip to the interconnects and provides protection from the environment.