

Human Resource Management in Action

Leadership Development at GE's Crotonville

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INTRODUCTION

In order to develop more effective global leaders, GE's Management Development Institute, referred to as Crotonville, has fundamentally revamped its four week executive program, the Business Management Course (BMC). The aim is to provide managers with a high impact, multifunctional, global business team experience.

GE leaders are increasingly called upon to operate in global businesses, develop them in non-hierarchical settings, communicate, and problem solve across business and cultural boundaries while solving difficult strategic business problems. It was felt that traditional learning modes were not sufficiently intense and impactful for developing these contemporary GE executives. Thus the BMC is built around a more experiential mode of development—one with real problems, real team building challenges, and real risk. The impact of this developmental experience can impact business results, people's careers, and professional lives.

The core concept is not new; it is termed "action learning"; a form of business experiential learning. The BMC design refocuses and redefines it.

Action learning works by temporarily taking managers out of their traditional environments, teaming them with peers, and challenging the groups to solve some of the most vexing problems facing GE businesses. Nationally recognized business educators help the BMC managers prepare for the project and evaluate the results; however, during the time they focus on real GE issues, they're largely on their own.

Participants end the four weeks feeling: "It wasn't a game. Six groups of us—total strangers—were assigned real company issues to tackle. We went to the businesses, interviewed the key players, developed real solutions, presented them to appropriate Company officers, and got their honest feedback. And along the way, our groups became teams."

The benefits to GE go beyond the lessons learned in teamwork, business strategy, and leadership. In the example cited above, one group found the potential for \$200 million in additional annual sales. Obviously, one of the biggest dividends is to the business; managers return with an enhanced leadership capacity.

To succeed in its effort to refocus strategy and restructure, the organization is undergoing a cultural transformation. The GE Management Development Institute in Croton-on-Hudson, NY—an institution founded 34 years ago—has been assigned a critical role in bringing about the cultural changes needed to take General Electric into the 1990s and beyond.

CROTONVILLE'S ROLE IN GE'S TRANSFORMATION

In order to understand the BMC "action learning" design, it must be seen as part of the larger fabric of change underway at GE and the leadership of its driving CEO, Jack Welch, who started dramatically transforming GE in 1981. He immediately began charting a new course for one of the nation's oldest, most diversified manufacturers. His basic premise: American industry—with GE included—was ill-prepared for a coming era of global competition. His goal: make GE number one or two in every business in which it competed.

Unlike Chrysler, GE was not facing economic catastrophe in the early 1980s. The company was a steady, profitable performer, tracking the GNP every year, regularly setting new records for sales and profits. So there was considerable surprise both in and out of GE at how quickly Welch put his ideas into action. Businesses that did not fit his new criteria were to be "fixed, sold or closed."

While continuing to invest heavily in the most promising of GE's traditional core manufacturing businesses, the company began shifting its portfolio to technology and service businesses. Shortly after Welch became chairman, half the company's profits came from those core businesses. Five years later, they only accounted for 25 percent, while GE's total profits had climbed more than 60 percent to \$5 billion.

The refocused strategy thrust GE into a new competitive environment, one that demanded a whole new kind of culture. The company had to become more flexible, more innovative, more entrepreneurial. And that meant bringing about fundamental changes in a work force

of about 300,000 people. With the leaders for the future in short supply, development became one of Welch's top priorities.

A New Vehicle for Change

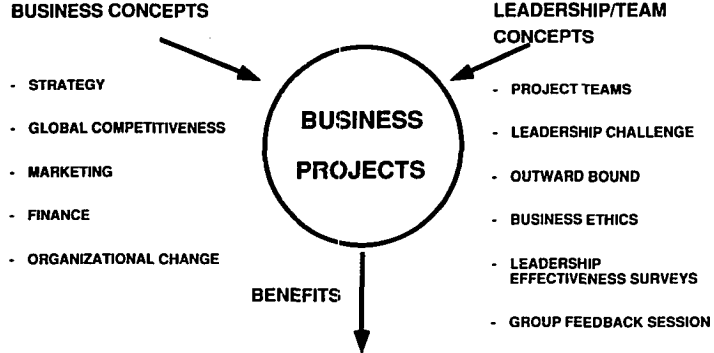
To help transform his vision for a new GE into reality, Jack Welch enlisted the company's Management Development Institute. Located 25 miles north of New York City, the center is known as "Crotonville," taking its name from the small Westchester County community where it is located. Crotonville is one of the oldest corporate residential education centers in the nation. For years, it relied heavily on traditional lectures and case studies. But to bring about the quantum changes Welch wanted, Crotonville management realized it needed to revise its development methodology.

First, Crotonville could no longer rely solely on lectures, the case study method, and discussions as the developmental methodology. Crotonville had to search for a higher impact behavioral method. The emphasis needed to be a blend of cutting edge business skills as well as leadership and team skills. Fast-moving competitive arenas demand people with top-rate leadership skills—skills rarely attained in traditional classroom settings. Thus action learning was born. It answered the first need by introducing into the Crotonville curriculum the study of actual GE business problems and their potential solutions. And it met the second requirement by putting that activity into a team context—widely recognized as one of the best methods of leadership development.

The core of the BMC action learning is that real multifunctional business issues and team development are combined. Furthermore, unlike business games and simulations, the situation is real; thus, the behavior is closer to people's real life behavior. Transfer of learning back to the participant's work setting is higher and the company can capture the considerable brain power invested in solving some of its real issues, rather than a historical case, simulation, or business game.

Testing the Concept

BMC had long been a staple of the curriculum. The four week course was designed for high-potential, upper-level middle managers—an ideal group to develop into disciples of change. Under action learning, the BMC course is focused on "developing market-driven business strategies" and "building leadership and team skills." GE views these strategies and skills as essential to making managers "effective members of multifunctional business teams in a competitive global economy."



PARTICIPANTS - ACTIVE PARTNERS IN LEARNING PROCESS
BUSINESS - GAIN FROM RECOMMENDATIONS OF PARTICIPANTS

Figure 1. BMC action learning

The Business Management Course now has four objectives, each reflecting the influence of action learning:

- To enable participants to learn, apply, and receive feedback on business concepts and skills applied to real GE business issues.
- To provide help on important issues to GE businesses.
- To help participants develop leadership and team skills essential to leading and working in high-performing, multifunctional business teams.
- To assist participants in developing personal action plans for applying new business and leadership skills in their work settings.

The first two weeks lay the foundation for the action learning projects. Faculty from leading business schools provide state-of-the-art concepts on areas ranging from strategic marketing and financial planning to competitive analysis and organizational change. Late in the second week, the program begins to focus on utilizing this new knowledge and the collective experience of the team to tackle real GE strategic problems. Participants are divided into six teams, each with five or six members. There are three projects, and each project has two teams assigned to it. While these two teams are given the same problem, they are asked to work independently. This provides the business with two sets of recommendations and provides an element of competition between the teams. Figure 1 presents the BMC action learning model and Figure 2 is a course overview.

WEEK	M	T	W	TH	F
1	Leadership & Team Building	Business Strategy	Global Competitiveness	Financial Analysis	
2	Leadership & Team Building	Marketing Strategy	Leadership & Organizational Change	Corporate & Individual Ethics	Group Preparation for Business Projects
				Introduction to Business Projects	
3	BUSINESS PROJECTS ON SITE				
4	Draft Presentations	Presentations to Business Heads and Feedback	Team Feedback Sessions & Return of Leadership Effectiveness Survey	Visioning Exercise & Preparation of Individual Action Agenda	Sharing of Individual Action Agendas (in groups)
6 - 8 months later		Feedback from Business on Status of Team Recommendations	Follow up Discussions on Status of Individual Action Plans		

Figure 2. BMC course overview.

The Pay-Off for GE Businesses

The businesses themselves contribute the issues, though hardly in the name of charity. They're seeking valuable ideas in return—a fresh look at some of the biggest problems of their businesses as seen by these teams of accomplished GE managers. The majority of issues have involved strategic marketing questions.

Table I provides a brief description of each of the action learning projects since the fall of 1986. Several of the descriptions are purposely general so as not to reveal competitive data.

Table I. BMC Action learning projects.

Transportation Systems	Evaluation of Transportation Systems market strategy to enter the locomotive lease/maintenance business.
Major Appliance	Evaluation of Major Appliances options to increase top line growth by sourcing a new household product for sale under the GE brand name.
Industry Sales & Services Division	Development of a National Accounts marketing plan for Industrial Sales & Services Division to increase top line growth.
Mobile Communications	Evaluation of Mobile Communications Go-to-Market strategy for re-entering the Public Service Trunking Market.
Corporate Research & Development and GE Financial Services	Analysis of how to transition artificial intelligence (AI) technology from the research lab to GE Financial Services opportunities.
Construction Equipment	Recommendations on how to make a successful alliance between Construction Equipment and a potential joint venture partner.
GE Information Services	Evaluation of artificial intelligence applications for GE Information Services that will produce the most impact and implementation strategies for those applications.
Medical Systems	Recommendations on how to best leverage the new centralized marketing function.
Aircraft Engine	Analysis of Aircraft Engine's service shops' competitiveness and recommendations for their charter within the Aircraft Engines organization.
Industrial Sales & Services	Development of a plan to integrate Turbine Parts organization's efforts with Industrial Sales & Services' efforts to avoid further market erosion.
Lighting	Recommendation on whether Lighting should enter a new market segment in a mature business.
Plastics	Development of a market strategy for a new resin and continuous press process to regain the number one market share position in copper clad laminates.
NBC	Recommendation on alternative sources of growth in a mature business.

Crotonville's staff works closely with the heads of GE businesses to select projects. GE's Corporate Marketing Consulting Services then prepares extensive briefing materials, including carefully crafted

problem statements, issue identification, background data, and a set of deliverables by the GE business heads.

Seeking the Solutions

After spending a couple of days reading briefing materials, developing a project plan, interview questions, etc., the teams take to the road, traveling to the headquarters offices of their assigned businesses. There they spend the third week working on the business' problem, carrying out a variety of diagnostic activities.

Team members have access to all key management, including the head of the business. They're free to see all essential financial and marketing data and go into the field and talk to customers.

The teams return to Crotonville with drafts of their findings and recommendations. These are reviewed first by outside consultants, who add to the product and the development process by helping the teams identify any gaps in their analyses. And because one goal is to have the businesses actually implement the recommendations, one consultant works with the teams to make sure they plan a strategy for overcoming any resistance they're likely to encounter during their presentation.

The climax of the course comes on Tuesday of the fourth week. Each team has 90 minutes to present its recommendations to a top-level group of executives from the business concerned, including the Senior Vice President who heads the operation. Very quickly, participants find themselves in a tough, open exchange defending their recommendations. To date, about half of the GE businesses challenging the Business Management Course with issues have implemented the recommendations they received. Most of the others have used at least some of the suggestions.

The experiences of one team assigned to explore the use of Artificial Intelligence in GE Information Services' commercial ventures reflects the action learning process. Team members came from the Aircraft Engine Business, Corporate Marketing, Information Technology, Factory Automation, and Environmental Health and Safety.

The team's approach was to "divide and conquer," as one team member put it, with each member of the team focusing on that segment of the problem in which he had most expertise, and then to confer and reach a consensus. "The study presented some real challenges for our team," he explains. "First we had to understand the business—its organizational structure; its technical, political, and cultural environment—and we had to understand Expert Systems."

"The project study we did for GE Information Services was a real-time, meaningful exploration of a carefully defined issue," relates another team member. "The company had not reached a

decision about Artificial Intelligence. We were dealing with something brand new that could affect future directions and profitability.”

“They asked tough questions,” according to the Manager of Business Development and New Ventures. “They talked to a wide spectrum of people from the president of the company to finance personnel, engineers, and customers. It was clear that they had done their homework.”

After a week of fact finding and analysis, the team made their presentation to the President of GE Information Services. The team concluded that in the Managed Network Services arena, the inclusion of Artificial Intelligence in Managed Network Services solutions is essential to GE Information Services being competitive in this market.

“We gave the team high marks for the thoroughness of their study and the quality of their presentation,” reports the Vice President of Technical Development. “They convincingly defended their findings. It was a very valid and valuable report that has planted a seed for future competitive advantage.”

Because participants are dealing with issues on a “real” time basis, not everything goes as predictably as with the classroom discussion of a case study. Minutes before one team was to make its presentation to the head of a business, a member of GE’s CEO office who had an intense interest in the issue joined the session. Midway through the presentation, the senior officer stopped the presentation to get the team’s response to a question that fundamentally challenged the direction the business had taken. He then quickly departed, leaving the team to continue its presentation to the visibly upset business head. While unusual, this incident reflects how the real world blends with the development process and is one of the reasons action learning is so potent. In a real life laboratory, participants see how issues unfold and how key players react. Participants have the opportunity to participate in trying to solve a complex business problem for a GE business.

Team-Building from the Start

Undoubtedly, one reason for the BMC’s success rate is the quality of the teams that are formed. In fact, most participants say that the team-building experiences are the most valuable part of the program.

Participants are introduced to their teams on the first day of the course, through a series of outdoor team building activities. These focus on issues such as trust, communicating, decision making, and leadership. The most dramatic of the activities is “The Wall,” a 14 foot high barrier that all team members must get over.

Challenged to build "a high performing team," the participants grunt and groan their way through the day. After each of these assignments the groups discuss the experience with a facilitator who has observed their actions. Together, the team explores the factors and dynamics that contributed to their success or failure. Issues that frequently arise are how different leaders emerge in different situations, how followers behave, and how people learn to trust each other to accomplish common tasks.

At the conclusion of the first day, a dirty, tired team begins to emerge where just hours before there had been five or six strangers. Building the teams is crucial to the projects because the issues are complicated, the time limited, and the participants do not know one another beforehand. Added to this is the fact that the team members are all at approximately the same level within the Company. Consequently, there is the need to work out the internal group dynamics before beginning the projects.

During the first weekend of the course, the teams face a more difficult challenge. They build rafts and then use them to cross a mile-wide stretch of the Hudson River from Cold Spring, New York to the U.S. Military Academy at West Point. Participants receive adequate construction materials and are escorted by power boats as a safety precaution, but they are not otherwise aided in any way.

Failure in this activity, as measured by the sinking of a raft in the rather cool October water, can serve as a real impetus to reexamine the way the team works together. One team, after its raft sank, spent two hours determining why the group had failed and set an agenda as to how they wanted their team to function throughout the rest of the course. At the conclusion of their action learning project, this team attributed their ability to work together so successfully to their rafting failure and the lessons they had learned from the experience.

Personal Agendas for Change

Another segment of the Business Management Course gives participants better understanding into their individual team-building and leadership abilities. Everyone fills out a questionnaire designed specifically for GE to use in helping employees gauge their leadership strengths and weaknesses. The same questionnaire is also filled out by each participant's direct reports and peers. Participants get to review this feedback confidentially during the course, and they receive counseling to improve their effectiveness as leaders.

Following the business presentations, the participants provide in-depth feedback on each other's team behavior over the last month. Feedback is candid, direct, and constructive. Many participants have

commented that this session is one of the few times in their careers when they have such useful feedback presented in a supportive environment.

The BMC experience has also been designed to overcome one of the main limitations to most corporate education programs—the difficulty of participants being able to apply what they've learned to the challenges of their own business. During the experience, each participant is asked to develop his or her personal agenda for change and to share it with the rest of the group. Team members then discuss each other's plans, identifying potential pitfalls and suggesting possible improvements. (Not surprisingly, many of these new converts to the power of participatory management state intentions to increase teamwork back at their workplaces.)

Six to eight months after the end of the Business Management Course, all members come back for a two-and-a-half-day follow-up session. Representatives of the businesses for whom they conducted their projects return, reporting on the status of the issues confronting them and what actions have been taken on their teams' recommendations. But probably the most valuable part of the session is the opportunity it gives participants to discuss their successes and frustrations in implementing their personal action plans. Over the four weeks of the course, participants form close relationships. When they return, they act much like a physician's consulting team, a peer group of professionals who come together to review difficult cases, share insights, and receive mutual support.

CONCLUSION

The action learning model continues to evolve at GE, and the concept has been extended to other Crotonville courses. In one twist on the idea, participants come to Crotonville in pre-established teams, bringing problems from their own businesses. In the Advanced Financial Management Course, the first week of course work is separated from the second week by a month. During this time period participants do a competitive analysis of a key competitor or a supplier.

Meanwhile, the corporate education process has taken on greater significance. Jack Welch takes an active role in the Crotonville process, meeting with participants in all the Executive Education and Advanced Marketing Management courses—an annual commitment of 10-12 days. The sessions are informal, based upon a question and answer format that allows Welch to lay out his vision for GE and to get candid discussion around the challenges facing the Company, such as the shift away from a manufacturing economy and the difficult issues surrounding Company loyalty in an environment characterized by downsizing and career uncertainties.

The other three members of the Chief Executive Office and other senior officers also make frequent appearances before Crotonville classes. Approximately 60 percent of the top GE management participate in Crotonville courses each year, serving as teachers, discussion leaders, and role models. Along with Welch, the Company officers view these appearances as an opportunity to articulate the corporate agenda and receive employee feedback from across the Company on such topics as GE's continually evolving "statement of values."

American companies are changing. Global competition, deregulation, and accelerating technological change has created the need for a new type of leader, one who can envision a future for the organization and inspire colleagues to join him/her in building the future.

The challenge to corporate education is to create new models for learning—models for developing new leaders, new organizational cultures, and new business skills necessary for competing in a global economy. Action learning is a direct outgrowth of such a bias toward action, and of using corporate education to change the organization. Appendix A provides a glimpse of future action learning projects. Teams went off to Europe in the Summer of 1988 to add a new dimension of globalization. The goal is always to develop leaders who know that their most important job is to transform the way their organization does business.

APPENDIX A

Global Action Learning Projects

Challenged by the need to develop business leaders capable of winning in global markets, the Summer 1988 BMC was presented in Europe. The first week of the course was spent in Crotonville, providing an opportunity for all four members of the Chief Executive Office, including Jack Welch, to meet with the class. Team-building exercises were conducted at Crotonville, as well as modules on global business strategy and international finance.

Week Two was conducted in Europe by members of INSEAD (European Institute of Business Administration) faculty at their campus in Fontainebleau, France outside of Paris. This provided the 41 participants, most of whom were Americans, with the opportunity to receive a European perspective on marketing, business alliances, working in a cross-cultural environment, and the current European political and economic scene. Visits were made to the GE Plastics Business in Bergen-op-Zoom, Netherlands, to CGR, a newly acquired medical imaging business located in Paris, and to SNECMA, the French aircraft engine manufacturer that is a joint venture partner of the GE Aircraft Engine Business.

The intent was to fully immerse participants in the European business environment so that they could “see, feel and smell,” what it means to work in a global environment. Fundamental to this immersion were the action-learning projects during the third and fourth weeks. The action-learning projects required the participants to confront a variety of business, language, and cultural problems associated with working in an overseas environment. Action-learning projects came from CGR, GE Plastics, and GE Information Services (GEIS), a worldwide supplier of network-based services that integrates computers software, and communication systems.

THE PROJECTS

Plastics

GE Plastics-Europe has a very strong market position in the sale of high value engineered thermoplastics to the European automotive industry. Applications are currently in bumpers and related grill and tail panels. A major extension of the automotive plastics market is the application of the thermoplastics to other external body panels. This is the market that GE Plastics has targeted for future growth and the BMC teams were asked to:

- Evaluate GE Plastics’ current body panel strategy and marketing plan, and
- Recommend alternative approaches and/or ideas to shorten the time needed to gain acceptance for all plastic cars.

CGR

CGR gave the two BMC teams a difficult marketing issue related to the sale of one of its medical imaging products. European customers have a tendency to purchase this imaging product piece-meal fashion over a period of years, upgrading each piece until the entire room has been replaced. On the one hand, this upgrade approach creates a competitive advantage for the manufacturers who installed the original system, since most manufacturers will not “marry” equipment from other competitors. However, this method of purchase can become very costly for the manufacturer to support on an ongoing basis. This is especially true if there are wide variations of systems in the installed base to support.

To help CGR plan its strategy to address this partial-room upgrade issue, the two BMC teams were asked to deliver the following:

- Assess the current environment facing CGR in providing partial-room upgrades vs. complete systems by
 - Identifying the occurrence of partial-room upgrade in the five main European markets (West Germany, Spain, UK, Italy, and France).
 - Determining the average margins for each type of sale in each market.
 - Identifying the costs of supporting the current partial room upgrade strategy (e.g., engineering redesign, manufacturing, parts, inventories, sales, time, etc.)
 - Evaluating the competitor's offerings and assess the impact their marketing strategy has on this situation.
- Recommend a strategy for CGR to follow based upon team evaluations and conclusions from the analysis.

GE Information Services

It is anticipated that the elimination of most trade barriers within the EEC by 1992 will have a strong impact on GEIS' operation. GEIS asked the two BMC teams to evaluate the ramifications of these changes and to suggest opportunities created by the unification of the European economy.

Specifically, the BMC teams were asked to address the following:

- Analyze the current marketing strategy being proposed to address the next five years in Europe:
 - Are the market segments GEIS is planning on pursuing appropriate?
 - Can the current organizational structure cope with the planned marketing strategy?
 - Has GEIS put the right personnel in place in Europe with adequate resources to capitalize on these new opportunities?
 - Should GEIS specifically set up now a small organization (a couple of individuals) to participate with the various European organizations who will put in place the standards and the changes that are going to occur in 1992?
- Recommend specific actions GEIS should take to prepare itself for the impact of the unification of the European economy:
 - Identify two specific market segments which will be most

impacted by the 1992 changes and indicate how GEIS should pursue them.

- Describe how and where software should be developed and how applications should be transported from one country to the other.
- For the two market segments you have selected, describe what you think the ideal organizational structure and associated resources should be so that GEIS marketing gets the best input from the European marketplace and the field with the highest productivity and vice versa, so that the European field receives the best possible support.

RESULTS—THE PARTICIPANTS

The Plastics teams went on-site to Bergen op Zoom, The Netherlands, while the CGR and GEIS teams went to Paris. From these “home bases” participants fanned out over Europe, visiting key players in the field and, in some instances, customers. The immersion was complete as participants struggled with a host of problems ranging from language differences to differences in accounting practices.

The impact of the course on participants is derived from this real-time involvement, which requires participants to apply the business concepts they have learned in the classroom. Responses taken from participants at the end of the course serve as a gauge on the value of the action-learning projects—“. . . we were totally immersed in the business and environment of Plastics.” Another participant said, “The projects forced dealing with people in different cultures and different backgrounds. We had to overcome language barriers in travel, hotels, etc. The project gave some real insight into the European business climate and connected lecturers with the ‘real’ world.”

RESULTS—THE BUSINESSES

But there were two winners in this process. The second winners were the GE businesses supplying the team projects. The final team reports not only confirmed some of the perceptions the businesses had about their problem, but also offered fresh insights and creative new approaches to these problems.

Paolo Fresco, Senior Vice President, International Operations, stated at the conclusion of the business presentations that he was “delighted at the benefits the businesses were getting from the BMC action learning process.” Tony Craig, President of GEIS, commented to the class, “I just spent \$1 million dollars on a Booz Allen study.

The time and effort you put in this last week was worth \$1 million dollars.” Nani Beccalli, Director of Marketing for GE Plastics Europe said, “you gave us something to think about . . . it was good to see our business from a different perspective. It could lead to something new and different.”

To gauge the long term impact of the team recommendations, each of the participating businesses will be invited to attend the follow-on session eight months after the conclusion of the projects. This will enable team members to discuss with business representatives which of their ideas are being implemented and which ideas were rejected.

Paolo Fresco, after listening to the six team presentations, stated that he was “sincerely impressed by the rapidity of the learning, by how quickly the teams put their arms around complex issues and by their ability to present coherent reviews.” He concluded his comments to the class by saying, “I will share responsibility in promoting this educational effort in the future.”

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