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Imagination and Strategy: Are They Compatible?

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ABSTRACT
This case describes the founding, development, and near demise of a manufacturing company whose products were highly regarded in the marketplace. Begun by immigrants, and based on their individual skills, the company grew from a small, privately held operation doing business only in the United States, to a publicly held company with operations in several foreign countries. The case illustrates the problems that can develop quickly when an organization does not have defined goals, effective management, and supporting information systems.

PROLOGUE
Back in the "old country" Antonio Caravelli was known as a tinkerer. He would spend hours taking apart any machine that he could get his hands on, and because of all the equipment that had been abandoned after the war by the armies, there was lots of things for him to examine. In 1946 when Antonio was fifteen, he and his family migrated to the United States, settling in the "Little Italy" section of New York. Jobs were hard to come by for his father, and even harder for him to keep. The family was, to say the least, very poor. Ultimately, Antonio quit school and went to work in a machine shop.

Seamus McGuire grew up on a small farm in County Galway. Life was hard, and the family was barely able to grow enough food, after selling enough at market to pay the "land fee," to feed the family of eight. Seamus' uncle, Timothy McGuire, emigrated to the United States during the war where he worked in a factory in Queens, New York, that manufactured radios and various communications devices used by the military. After the war the company converted to manufacturing for the commercial market, and Timothy advanced through the ranks to become superintendent of the company's factory in Jersey City, New Jersey, the largest of the three factories the company operated.

Timothy often had written his brother to join him in America. Now, with his new position he could guarantee his brother a job in his adopted country. Tired of the harsh life, Seamus' father decided to accept his brother's offer and in 1948 the family emigrated to the United States. After completing high school, Seamus took a job in the factory where his father and uncle worked.

As the years passed both Antonio Caravelli and Seamus McGuire became master mechanics. They enjoyed working with their hands, and would spend hours trying to improve whatever type of mechanical device that held their attention at the moment. In 1982 the two tinkerers met at a trade show when they were on the same panel. To both men it became apparent that neither one was content working for others. They had their own ideas regarding new product development, and each was interested in running his own company. Perhaps it was their individual entrepreneurial spirit, or that they both were immigrants and "challenges" that brings with it), but by the time the trade show ended they had agreed to join forces, with each contributing equally to what they determined to be the necessary capital for start-up.

A COMPANY IS BORN
Within a year Caraveli and McGuire, Inc. was formed. Drawing on Antonio's skills in machine shop technology and Seamus' knowledge of the communications industry, they decided to concentrate on manufacturing and distributing communications devices, including handset radios, walkie-talkies, scanners, sonar and switches. As time went by, virtually all their products were variances or extensions of these devices.

Antonio was in charge of production activities; Seamus, whose past experiences included product management, took on the responsibilities of overseeing the marketing activities. His son, Patrick, having graduated from college where he majored in Marketing, was brought into the company in what would become the sales department. The company employed 10 production, two clerical, and four sales personnel.

Getting Started
Antonio and Seamus, having spent their business life in manufacturing and distribution, quickly realized that they needed someone trained in accounting to oversee the non-production activities of the company. They agreed that Antonio's daughter, Regina, who had a degree in Accounting and had been employed with a public accounting firm, should be hired as Controller.

The company's "information system" consisted of the two founders' intimate knowledge of the production and marketing activities. They believed that they acquired adequate detailed information through their direct involvement with all of the company's manufacturing and product distribution operations.

When the company was founded Antonio and Seamus agreed that as partners they would be co-managers, sharing decision-making responsibilities. They also agreed on several business goals: to manufacture quality products, to be a good neighbor in the local business community, to inspire loyalty among their employees, and to treat them fairly. They did not quantify these goals and, therefore, did not have clear objectives against which the company's activities and results could be measured. As long as things were "going right" they were satisfied.

A basic problem with the partners' management style was that they never really understood what "going right" meant. They knew they could meet their payroll, products were being manufactured, and orders were being received, but they didn't have any real comprehension of the planning necessary to sustain the company's growth and profitability.

The company's products were well received in the marketplace, and the demand for them increased significantly. The company became one of the leading suppliers of two-way communication devices for the commercial market, and held a competitive position for its sonar equipment. Seamus and Antonio firmly believed that this all reflected the company's reputation for high quality.

The Personal Touch
The partners always considered Caravalli & McGuire, Inc., to be a small company. They maintained personal relationships with their employees, remembering such things as birthdays and spouse and children's names. However, the increasing demand for its products required the company to increase its personnel. By 1988 there were seventy-seven production workers, an accounting staff that numbered fifteen, and a sales staff of 12. The partners' ability to maintain that personal relationship with their employees, something important to them, began to slip away.

Conditions within the company were changing; the old ways of running the business were becoming increasingly archaic. The newer employees, reflecting a more prevalent attitude regarding working conditions, and without understanding the history of the company, began discussions among themselves about several employment issues, including the potential advantages of unionization.

Time to Grow Up

In order to meet the increasing demand for it's products, the company required expansion capital. After consultation with members of the financial community, business associates, and friends, the partners decided to take the company public. The Initial Public Offering, issued in the spring of 1994, was well received, and the company immediately began expanding. About forty percent of the authorized stock was held by the public; the remainder was held in equal amounts by the partners. Antonio and Seamus gave a portion of their stock, in differing amounts, to the two children, Regina and Patrick, who worked for the company.

As a publicly held company, Caravalli & McGuire, Inc., was required to provide information to its stockholders, regulatory agencies and auditors. The existing systems, operating on low level computing equipment, had been developed to meet internal needs only. Regina Caravalli soon realized that outside requirements could not be met with the current accounting system. She hired an experienced accountant from the firm serving as the company's external auditors to take care of the reporting requirements. The accountant developed financial accounting procedures that would provide reports that met the company's legal requirements.

The Lure of Expansion

In an attempt to capitalize on the marketability of Caravalli & McGuire's product lines, Seamus decided to expand into Central and South American markets where the company's equipment was being used by subsidiaries of U.S. companies. He thought the company could expand its markets, and significantly increase its profits, by selling directly to companies in those countries. Although Antonio had serious doubts about the expansion plan he agreed to it.

As business continued to expand, additional employees were hired in virtually all areas of the company. The two partners realized that they could not continue to operate as they had for so many years, managing the company with their "hands on" approach. Therefore, they appointed Regina as vice president/chief financial officer, Patrick as vice president for marketing, and a long-time employee, Samuel Anderson, as vice president for production. The *partners* (as Antonio and Seamus continued to consider themselves) and the newly named vice presidents collectively set a series of goals: increase the rate of return on investment, improve control over operating costs, increase sales volume, improve the percentage return on sales, increase production efficiency, and improve the effective use of production facilities.

Regina, Patrick and Samuel immediately set out to determine exactly what information they would need in order to meet the goals given to them. Since the goals were not quantified, each vice president set her/his own. All three vice presidents decided that the information they needed was available from within the company. To meet their informational needs in the short-term, each vice president developed variations of the central systems that they implemented in their own division.

None of the vice presidents had any experience in the international marketplace. Their approach to determining their world-wide information requirements was based primarily on the assumption that what worked for the domestic operations would be appropriate for the foreign operations.

Based on her prior experiences the accountant recommended to the vice presidents of finance and of marketing that the company revise the financial accounting system to provide more meaningful information, and upgrade the computer equipment to maintain the system. Regina and Patrick expressed differing opinions as to what constituted "meaningful information." They also expressed concerns over the apparent complexities and costs of expanding the company's computer-based information systems.

AN INFORMATION VACUUM

The vice presidents became increasingly aware that they did not have the information they needed for effective planning and control within their departments. They began to complain that the systems in the company could not provide them with adequate operational information. Since those systems were under the administrative control of the chief financial officer, Regina came under increasing criticism from the other vice presidents. Antonio, naturally enough, defended his daughter; Seamus, who held, perhaps unconsciously harboring the old-world belief that women really shouldn't be involved in business matters, was not overly sympathetic to Regina's problems.

The vice president of marketing realized that much of the information he did receive did not reflect the results of the foreign operations. The vice president of production could not get information for assessing operating efficiencies, optimizing production schedules and inventory levels, and the distribution operations of the company's product lines, including shipments of equipment to foreign customers. Believing that their requests would always take second place behind the information needs of the chief financial officer, the vice presidents decided to develop their own *information* system.

Creating separate information systems, and installing computer work stations purchased with their individual department's budgets, was rationalized by vice presidents as being necessary to provide essential *specialized* information. They did not see their developing separate systems as being either a serious policy issue, or an operational problem. They argued that the systems did not duplicate each other, and that each system was designed to meet the particular needs of different functional areas. However, they were obtaining their basic data, and some operating information, from the same source, the accounting system.

Antonio and Seamus began to feel that the information they were getting from the two vice presidents, information that was derived from their separate systems, was either incomplete or unreliable. They were puzzled that although production costs had been lowered and sales had increased, profits also were lower. They became concerned that the company might be selling in unprofitable markets. They wondered what impact the foreign markets had on the company's costs and income. And, Seamus was concerned that the information being prepared by the chief financial officer, not wanting to provide her father with unfavorable information, might mot be totally accurate.

It became increasingly obvious to Seamus, and reluctantly to Antonio, that the accounting system, although accurately reporting results for financial purposes, was not providing adequate information for operational decisions. The concept of control, and effective feedback on decisions that they made, were not functional components of the systems. And, following discussions with their financial advisors, the partners realized that the accounting system was not designed to deal with some of the issues, such as currency exchange rates, that are important to the efficient operation of companies doing business in foreign countries.

More Doesn't Mean Better

Caravalli & McGuire, Inc., had multiple information systems, those designed for the specific information requirements of a particular constituency, and those designed for the overall corporate (principally accounting) needs of a *national* company. Consequently, costs were rising due to duplication of, or variations in, information as each system processed the same data to suit a particular manager's needs, and because of incomplete information about several areas of its business activities.

Fundamentally identical information was distorted by different interpretations, causing breakdowns in communicating information throughout the company. The decision-making process was complicated by the continual demand on managers throughout the company to evaluate conflicting information supplied by different sources. Nobody really understood the complexities of being a "multinational" company.

Concluding that the information systems were inefficient and inadequate, the vice presidents of marketing and of production adjusted their organization's structure, expanding their own computer systems to provide for their perceived information needs. Neither one took into account that dealing in multinational markets might have a significant impact on their information requirements. Meanwhile, the vice president/chief financial officer felt that her control over the company was being eroded by the actions of the two other vice presidents. Even though one was her cousin, she questioned their concerns for the company's welfare, and took her concerns to her father.

Identifying Information Needs

The production division, requiring more accurate estimates of sales demand, organized a planning department. The marketing division, charged with the responsibility of moving the inventories generated by the production activities, established an inventory control department. And, since that division also was responsible for improving the return on sales, it set up a department to support selective selling decisions with detailed cost-of-sales studies based on product quality.

The existing multiple systems were not able to meet the information requirements necessary for effective decision-making. The partners began to sense that they could no longer accept information without doubting its validity, and without sending a series of follow-up questions to the vice presidents. Therefore, they authorized the vice president/ chief financial officer to hire an analyst whose primary function was to work with the accounting department in identifying company-wide information needs, and in revising the current systems to meet those needs. As may have been predicted, because of the workload in the accounting department the analyst became totally absorbed in the internal operations of that department.

The partners also hired a manager for international operations, Jeff Cobey. He quickly determined that none of the computer-based systems were designed to provide the type of information that he needed to carry out his responsibilities - being the "overseer" of Caravalli & McGuire, Inc.'s global activities. He assumed that the systems being maintained by the two operational vice presidents could be modified to produce that information. He further assumed that since both vice presidents were responsible for activities that certainly were "international," they would be amenable to his requests for information and would adjust their systems appropriately.

The vice president for marketing stated very bluntly that he was not interested in the manager of international operation's problems. The vice president for production took a similar attitude. Both never recognized the importance of the international business to their activities.

Neither vice president could determine by any quantified measure the impact that the company's international operations had on his division's activities. But, whenever there were questions regarding the performance of their divisions the vice presidents separately indicated that the international operations, and the manager in charge of those operations, were somehow responsible for causing any negative business activities and financial results. Together they made a case to the partners that the manager of international operations should be replaced. And, as circumstances would have it, there was what seemed to them a logical replacement available.

Patrick's son, Kevin, who had graduated from college with an undergraduate degree in management, earned a graduate degree in international relations, and worked in the international division of a major manufacturing concern, was very interested in joining the "family" business. The partners, who had frequently discussed taking the company private (and back to that "family" business), decided to bring Kevin into the company as the assistant manager for international operations. Understandably, Jeff Cobey was not enamored by having the son of one of the vice presidents and grandson one of the partners, as his assistant. And, as the discussions about taking the company private became known, Jeff Cobey became convinced that his future within the company would be limited by family relationships.

A Step in Some Direction

In an attempt to improve the systems for which she was responsible, and probably to protect herself from increasing criticism from the other vice presidents, Regina hired a systems analyst and a computer specialist. Their hiring was justified to the partners on the basis of accounting needs; the intention was that they would improve the accounting operations that, in turn, would provide better information to the operating units throughout the company. The systems analyst directed her attention to streamlining accounting routines, and redesigning forms and reports. As this was being done the computer processes were revised accordingly. An increased level of accuracy in accounting information was achieved, and the computer equipment was upgraded (and used also for some analyses of various operations within the company), but the partners soon became concerned whether the benefits were commensurate with the costs.

Some modest attempts were made to develop a corporate business plan against which actual performance could be measured. Comprehensive budgeting procedures were developed, but these potentially useful control tools were weakened significantly by their being "fitted into" the existing accounting information system.

What of the Future

By this time there was an abundance of operational reports available throughout the company. Five or six separate and independent information systems were in operation. An inordinate amount of time and energy of the partners, the vice presidents and managers throughout the company was directed at deciding on the *relative accuracy* of the information provided by each system - separating the wheat from the chaff as it were. Obtaining information that was *useful* in supporting the decision-making process received very little attention. And, too often in staff meetings the company's experiences to this point were minimized as being nothing more than the growing pains expected of a company evolving from a small to large, and domestic to international, enterprise.

Antonio Caravalli and Seamus McGuire, both of whom were in their sixties, were rapidly tiring of dealing with the increasingly complex business problems with which they were being confronted. They still wanted to take the company private, and then retire with the company given over to their children and grandchildren. And, the company may have had the financial resources to buy back the outstanding stock. But before doing so they wanted to "straighten out" the company's operating problems. On the advice of their long-time legal counsel, the partners hired a planning director, although the duties of that position were not defined.

EPILOGUE

Caravalli & McGuire, Inc., is an international company that enjoys strong market demand for its products. However, the company consistently has been managed as if it was still the entrepreneurship of its origins. The two founders and partners, Antonio Caravalli and Seamus McGuire, have made decisions, and taken actions that, by themselves, may have been worthwhile, and undoubtedly were well intended. However, the fact is that the company's internal operations, including planning and decision-making, is deteriorating. Clearly, the company needs to change its method of operations, institute effective short- and long-range planning, and bring its multiple information systems under control. The question is: does management have the will to control effectively and appropriately its operations, and if so, what steps need to be taken, and how?

Author's Comment: This case study relates to an actual company, although its name and those of individuals have been changed. It was developed for use in courses in information analysis and systems design and, with some expanded materials, a graduate course in global information systems. It also can be used in courses in strategic management.