ABSTRACT

Empowerment, and its resultant improvements in both personal and organizational outcomes, has generally been researched and applied in large firms. This study assessed the impact of empowerment in four small manufacturing companies. Results after one year indicate that improvements were realized in productivity, scrap loss, absenteeism, and gross profit. Employees were generally very satisfied with the culture of empowerment within the businesses. Implications for owner/managers of small firms are discussed.

INTRODUCTION

Small firms are starting to be recognized as environments from which empowerment, participative management, open-book management, etc. can make a significant difference in firm performance. Most research on these topics has occurred in large firms. The reasons for this have been that large firms have felt increased pressure to be globally competitive thus they have adopted many of these techniques more quickly than smaller firms (Caudron, 1998; Hasek, 1998), large firms have had management teams monitoring and seeking best practices (Hasek, 1998; Heaton, 1998), and large firms have exhibited the willingness to be laboratories in which new management approaches can be tested (Dawson, 1998).

However, several authors contend that small firms are better suited for the application of a process such as empowerment than large organizations (Nathan, 1993; Kinni, 1994; Argyris, 1998). Smaller firms have the ability and flexibility to establish and refine various systems and processes more effortlessly than larger firms, and thus it is much easier to share knowledge within a culture of empowerment (Benson, 1991; Nathan, 1993; Hasek, 1998; Martinez, 1998). In a small business, employees often have the opportunity to perform a larger variety of tasks than in larger ones. This can certainly provide the environment for empowerment and a better understanding of the work process. Empowerment in the small business environment may enable employees and management to learn and implement new ways of working, thus improving business operations for increased profits and productivity (Chandler, 1997). Yet research on empowerment has consistently focused on larger manufacturing firms (Argyris, 1998).
The purpose of this paper is to examine a sample of small manufacturing firms and evaluate if empowerment would improve worker commitment and firm performance. Implications for the practical application of this construct and further research are also presented.

BACKGROUND

Empowerment defined. Conger and Kanugo’s (1988) paper is credited with forging a major step in recognizing and legitimizing the concept of empowerment in management theory. Viewing empowerment as a motivational construct, Conger and Kanugo proposed that fulfillment of people’s power needs is based on their belief that they can successfully deal with the events, situations and/or people they confront. They suggest that management’s role is to identify “conditions that foster powerlessness” and remove them through formal organizational policies and informal accurate communication.

From another vantagepoint, Peter Kizilos (1990) defined empowerment from the workers’ perspectives as “the process of coming to feel and behave as if one has power (in the sense of autonomy or authority or control) over significant aspects of one’s life or work.” Two important implicit aspects of this definition are that (1) power is perceived from within the individual or group — not from outside, and (2) the individual or group makes the determination of what is or is not “significant.” Bell (1991) emphasized the first point in an article aptly titled “Empowerment Is Not A Gift” in which he said, “Because personal power is already present within the individual, empowerment is not a gift one gives another. Rather one can release power by removing the barriers that prevent its expression.” Another argument for this perspective was forwarded by Cherniss who offered that, “You can’t ‘give’ power to someone else. If you’re giving them power, it implies that you have the power and they don’t — and if you can give it, you can take it away” (Kizilos, 1990). Kizilos’ second part of the definition concerns the importance of managerial issues to workers. Employees who are empowered make decisions about some issues that have been traditionally reserved for management (Heaton, 1998). Thus, the very essence of empowerment resides in having those who know the work best take ownership of the work process (Benson, 1991), and make decisions about key aspects of the process amidst the support and protection of management (McKenna, 1990).

Empowerment Operationalized. Employee empowerment opportunities will, therefore, be defined as situations or forums designed by managers to encourage employees to join in negotiation and decision-making processes and experience actions and policy changes based on their deliberations. The criteria for identifying empowerment are partially housed in this definition. One criterion for considering an activity or series of activities as an empowerment opportunity rather than simply employee involvement is the engagement in negotiation and decision-making processes. This criterion fulfills Byham’s distinction between participative management and empowerment in which the former is “asking for people’s help” and the latter is “getting them to help themselves” (Kizilos, 1990). Thomas and Velthouse (1990), Spreitzer (1995) and Sheridan (1996) have further underscored the importance of this issue. Another criterion is that policy changes occur as a result of that activity. This means that as a result of empowerment, individuals realize that their work and efforts have an impact (Thomas and Velthouse, 1990), move the organization toward greater effectiveness (Spreitzer, 1995), and lead to improved organizational learning (Heaton, 1998). The third is derived from Bandura’s (1977) contention that the internal perspective of self-efficacy, that is, of being empowered is critical to viewing a situation as empowering. A sense of individual self-efficacy leads to heightened feelings of competence, and the related sense of autonomy or choice (independence and discretion) regarding one’s work (Kirkman & Rosen, 1999). Methods for identifying employee empowerment relate to fulfilling these three criteria.
Thus, while empowerment is strongly influenced by the immediate work environment and the organization's culture, its expression ultimately resides within the individual. Building upon the work of Thomas and Velthouse (1990), Spreitzer (1995) has defined individual empowerment as increased intrinsic task motivation generated by meaning — the value of a work goal or purpose as judged in relation to an individual's own ideals or standards; competence — an individual's belief in his or her capability to perform activities with skill; self-determination — an individual's sense of having choice in initiating and regulating actions, and; impact — the degree to which an individual can influence how a job is done and its outcomes.

Focus of the Study. This study proposes to assess the impact of psychological empowerment for the individual worker and its corresponding affect upon the outcomes for the organization. The larger issue is: through the use of empowerment, can small firms leverage their competitive strengths and prosper? To date, no investigations of this application within small firms have been identified and seemingly very little work has been done with Spreitzer's (1995) multi-dimensional measure of these four concepts.

METHODOLOGY

Sample. Four small manufacturing firms were involved in the study (S.I.C. codes: 3524, 3535, 3556). All four produce durable goods, such as vending machines, that involve multi-step production processes. These firms were chosen because of the complex nature of their production process, thus lending credibility to the perceived application of empowerment. All four firms were non-union, though ample evidence exists (Benson, 1991; Juravich, 1996; Caudron, 1998; Heaton, 1998) that empowerment can be successfully implemented in unionized environments.

Firm size ranged from 24 to 47 employees. While no effort was made to control for the effects of age or experience, for purposes of this study it should be noted that workers had from 6 to 22 year's tenure within these firms. Gender was fairly evenly distributed across firms with an average of 62% males and 38% females.

Research Design. Prior to any intervention or training within the respective work environments, various measures of both employee perceptions and company performance (described below) were taken. Employees and their supervisors and managers were then provided with a training/orientation program. This program, also described below, was designed to improve the employees' readiness and abilities to exercise empowerment within the work environment. Several studies (McKenna, 1990; Sheridan, 1996; Dawson, 1998; Heaton, 1998) have documented both the necessity for such training as well as the residual effects upon empowered behavior. The evolution and evidence of an empowered workforce has been found to range from three to six months after an initial training program (Benson, 1991; Sternberg, 1992; Flanagan, 1994; Hasek, 1998). Thus, the study was designed to assess improvements, if any, that are found in performance and employee perception as attributable to empowerment.

Measures. The employees were given a copy of Spreitzer's (1995) 12-item questionnaire that focused upon elements of individual empowerment prior to their training. These 12 items are replicated in Table 1. The survey was administered on company time, on premises, at the end of the workday. The twelve items were randomly arranged on the instrument so as to reduce response bias. Spreitzer (1995) reported reliability estimates of .72 and .62 (Cronbach's alpha) for different samples of the original implementation of the scale. Various measures of company performance were also gathered prior to the training. These focused upon waste or scrap loss (excess material from the production process that cannot be reclaimed or retooled...
into useable components), absenteeism (number of employees who do not report for work on a given shift and who are not excused due to bereavement or jury duty), productivity (acceptable units produced per hour), and gross profit. Regardless of the particular company orientation to these factors, all four companies provided data based upon these definitions. For each of these measures, data was averaged for the month preceding the survey administration within each of the firms.

Training. The employees were provided with 16 weeks of training, on company time and premises, concerning tools and techniques for: a) problem-identification; b) problem solving; c) decision-making; d) communication; e) conflict resolution; f) negotiation; g) teamwork; and h) organization specific training to improve their skills. Supervisors were also provided additional training in coaching, counseling (mentoring), and facilitation. Each training session lasted approximately 90 minutes and was administered twice weekly.

Implementation of Empowerment. After training, employees and supervisors were encouraged to embark upon the empowerment process. It was a slow, gradual learning experience, punctuated with uncertainty and mistakes, challenges and victories. Recognizing that empowerment is a process, not a program, their efforts to improve and learn are ongoing.

The criteria used in determining employee empowerment opportunities were: (1) participants are engaged in negotiation and decision-making processes; (2) decisions from the aforementioned engagement are implemented; and (3) employees perceive themselves as having been empowered from the perspective of their own self-efficacy and from fulfillment of outcome expectations.

For example, workers in Company A were involved in a project to design a company-wide training needs assessment and negotiated with each other for the inclusion of items and made decisions on all aspects of the survey. Members of another company engaged in months of negotiation and decision-making with managers to devise some apprenticeship programs. In a third organization, individual employees were encouraged to focus on creating new and better ways to provide customer service including everything from order processing to packaging and shipping. In all instances, aside from specific issues such as those cited above, employees and managers were expected to learn how to behave in an empowered environment and work toward changing the culture, reward system, and management style. Above all, employees were expected to accept and apply the challenges of individual empowerment in all matters related to their tasks.

Re-test. Approximately one year from the time of launch, the survey was administered once again. Employees completed the instrument at work on company time. Given that some workers had left their employer during the year (n=5) and other workers were new hires (n=8), the reported sample (N=138) consisted of only those employees who were employed throughout the entire intervention. However, so as not to introduce bias into the respective company cultures, all employees were surveyed at the time of the re-test.

The results, comparing the differences in the two administrations, are discussed in the following section. Also presented are selected comparative data concerning the issues of productivity, scrap loss, absenteeism and gross profit that were benchmarked one year earlier. Again, data were averaged for the month preceding the re-test for each firm.

FINDINGS

Survey Results. For the data analysis, the results of the first administration were paired with the corresponding result of the second administration (e.g., 1a, 1b; 2a, 2b; etc.). The “a” item
results were from the first survey and the “b” item results from the second administration. The degree of improvement, if any, in feelings toward and satisfaction with empowerment was calculated by subtracting “a” from “b” (b minus a).

Table 1 summarizes the arithmetic means of the twelve items between the first and second administration (b minus a). The test-retest reliability had an overall coefficient alpha of .82, with the four components of the scale ranging from .63 (impact) to .78 (meaning). Following Spreitzer’s (1995) suggestion that the high correlations between the components do not provide sufficient evidence for discriminant validity, later supported by Kirkman and Rosen (1999), a composite measure of empowerment using the twelve items was employed.

Table 1
COMPARISON OF MEAN DIFFERENCES FOR ALL RESPONDENTS BETWEEN FIRST AND SECOND ADMINISTRATION (b – a)

<table>
<thead>
<tr>
<th>Individual Empowerment Scale Items</th>
<th>Difference Score</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. The work I do is meaningful to me.</td>
<td>1.7704 **</td>
</tr>
<tr>
<td>2. I have mastered the skill necessary for my job.</td>
<td>1.9074 **</td>
</tr>
<tr>
<td>3. I have a great deal of control over what happens in my department or work area.</td>
<td>1.8215 **</td>
</tr>
<tr>
<td>4. I can decide on my own how to go about doing my work.</td>
<td>1.6239 *</td>
</tr>
<tr>
<td>5. The work I do is very important to me.</td>
<td>1.9167 **</td>
</tr>
<tr>
<td>6. My impact on what happens in my department or work area is large.</td>
<td>1.4233 *</td>
</tr>
<tr>
<td>7. I am confident about my ability to do my job.</td>
<td>1.5161 *</td>
</tr>
<tr>
<td>8. I have significant autonomy in determining how I do my job.</td>
<td>1.7011 *</td>
</tr>
<tr>
<td>9. I have significant influence over what happens in my department or work area.</td>
<td>1.7944 **</td>
</tr>
<tr>
<td>10. My job activities are personally meaningful to me.</td>
<td>1.5926 *</td>
</tr>
<tr>
<td>11. I have considerable opportunity for independence and freedom in how I do my job.</td>
<td>1.6815 *</td>
</tr>
<tr>
<td>12. I am self-assured about my capabilities to perform my work activities.</td>
<td>1.4444 *</td>
</tr>
</tbody>
</table>

N = 138 * p < 0.05 ** p < 0.01
Combining all results and subjecting them to a t-test indicates that empowerment practices had a positive effect on these twelve dimensions of the work-role relationship. All difference scores were significant at the 0.05 level while 5 were significant at 0.01.

To insure that the results were not unduly influenced by company size, (i.e. scores from the smaller firms), a second t-test was performed. These results, assessing differences in average scores across companies, are presented as Table 2.

**Table 2**

ONE-TAIL PROBABILITY OF DIFFERENCES BETWEEN COMPANIES FOR MEAN SCORES ON EMPOWERMENT SCALE

<table>
<thead>
<tr>
<th>Company/Company</th>
<th>A</th>
<th>B</th>
<th>C</th>
<th>D</th>
</tr>
</thead>
<tbody>
<tr>
<td>A</td>
<td>---</td>
<td>.165</td>
<td>.123</td>
<td>.128</td>
</tr>
<tr>
<td>B</td>
<td>.165</td>
<td>---</td>
<td>.152</td>
<td>.108</td>
</tr>
<tr>
<td>C</td>
<td>.123</td>
<td>.152</td>
<td>---</td>
<td>.144</td>
</tr>
<tr>
<td>D</td>
<td>.128</td>
<td>.108</td>
<td>.144</td>
<td>---</td>
</tr>
</tbody>
</table>

P<0.05

As may be noted, there are no significant differences across companies regarding the employee responses. This suggests that all employees, regardless of company, were experiencing positive reactions to the empowerment process.

Company data. The last set of data was derived by comparing archival information from the respective companies. Gross data were made available to the researcher that permitted within company comparisons of the effects of empowerment. Table 3 summarizes the secondary data by company.

**Table 3**

COMPARISONS OF COMPANY – WIDE DATA BEFORE AND AFTER EMPOWERMENT

<table>
<thead>
<tr>
<th>Company</th>
<th>Productivity</th>
<th>Waste/Scrap</th>
<th>Absenteeism</th>
<th>Gross Profit</th>
</tr>
</thead>
<tbody>
<tr>
<td>A</td>
<td>Up 23%</td>
<td>Down 15%</td>
<td>Down 6%</td>
<td>Up 11%</td>
</tr>
<tr>
<td>B</td>
<td>Up 35%</td>
<td>Down 19%</td>
<td>Down 8%</td>
<td>Up 12%</td>
</tr>
<tr>
<td>C</td>
<td>Up 26%</td>
<td>Down 18%</td>
<td>Down 11%</td>
<td>Up 10%</td>
</tr>
<tr>
<td>D</td>
<td>Up 21%</td>
<td>Down 22%</td>
<td>Down 9%</td>
<td>Up 11%</td>
</tr>
</tbody>
</table>
Results of the comparative analysis indicate significant or noteworthy improvement in all four areas by all companies. Percentage improvements are the result of calculating the differences between these dimensions as reported by the companies prior to the implementation of empowerment and after one year. Among workplace issues such as these, empowerment as a business strategy appears to be benefiting both employees and company owners/managers.

DISCUSSION

Recognizing that through empowerment, workers obtain a higher level of commitment to their tasks (Sheridan, 1991; Argyris, 1998; Caudron, 1998), greater feelings of competence and impact (Gandz, 1990; Thomas & Velthouse, 1990), and greater understanding of what needs to be done to perform effectively (Riggs, 1995; Sheridan, 1996), one is left wondering why more organizations are not embracing this process.

The answer lies within the concept of trust. Management needs to reflect its respect for the individual in a supportive culture that is open to questioning from below and tolerant of failure (Hasek, 1998). Learning to trust one another is essential (Mountford, 1997) and the lack of managerial trust of workers is the major stumbling block to an empowered workforce (Sternberg, 1992; Sheridan, 1996). In order to develop trust, one has to be trustworthy, thus the issue of developing trust within the workplace requires the effort of everyone. Trust must exist on the part of management (that overall the decisions made will be good for the company) and on the part of employees (that their actions will be supported by management) (Foxman & Polsky, 1991). Overcoming this challenge may be easier in a smaller firm where the potential for more personal contact and individualized relationships tend to exist.

The results appear to support the contention that empowerment can lead to improvements in employee involvement, commitment and job performance/satisfaction. The training program implemented within each firm was designed to not only provide the necessary skills, but reinforce the belief that the company was indeed entering a new era. With the advantage of being a small enterprise, the necessary communication, decision-making and resulting action were readily observed. Employees, at various levels of buy-in and commitment, were able to have a clear picture of the impact of empowerment on both their activities as well company goals and objectives. The company-wide data suggests that performance was positively affected through the empowerment process. Results are all in desirable directions for all firms. Indeed, based upon the author’s experience, small manufacturing firms are ideal settings for the application of empowerment.

Smaller firms have traditionally been owner-managed. These owners have frequently acted either as a patriarch or autocrat because: (a) it is their business; or (b) they believed that their employees enjoy a lot of freedom and responsibility since the firm is small. Accepting the fact that this researcher addressed cultural change, managerial style, and reward systems with the owners (and still is), the results of the surveys and company provided data unquestionably indicate positive results through empowerment.

Certainly, empowerment is not appropriate for every organization. Anyone seeking to implement the process must clearly understand what their objectives are and how they intend to attain them. Creating an empowered work environment requires major shifts in both managerial and worker attitudes and responsibilities. First and foremost is the issue of trust. Everyone will need to accept empowerment as a major cultural change. Managers must become much more tolerant of employee initiative, risk taking, and error. Not only must risk-taking be encouraged, but the penalties for failure must be eliminated (Story, 1993). Workers must accept the challenge of learning from mistakes, demonstrate responsible freedom, seek genuine ownership of their work processes and be committed to the continuous improvement
of the outcomes of their work. The sharing of power is, therefore, something that must evolve over time, reinforced by the words and deeds of everyone involved.

As a part of the orientation, training, and culture shift that were addressed within each firm, the author stressed the following trust building dynamics. For empowerment to succeed, managers must:

- establish a company vision to focus everyone’s energies
- openly share relevant information about company goals and objectives (use of a Business Plan is helpful)
- refine the information system to support workers’ needs for information (cycle time, waste, etc.) through the use of meetings, newsletters, bulletin boards, etc.
- communicate with an open mind and listen
- lead, don’t just manage
- remove all impediments that hamper a worker’s ability to perform
- encourage open and honest dialogue – commitment is a function of involvement
- refine the reward systems in terms of pay (and non-monetary rewards) and the performance appraisal criteria; make use of some form of gain-sharing, skill-based compensation, or profit-sharing as it is essential to link rewards to the behavior management wants to foster.
- invest in lifelong learning – training that addresses everything from basic math and English to problem-solving and conflict resolution is essential for everyone
- communicate, coach and mentor; management’s role undergoes a major shift
- be committed to empowerment for its own sake.

Workers can learn to trust in an empowerment culture, and become trustworthy, by:

- wanting to be empowered and seeking to understand what it means
- acting with responsible freedom – understand how to do what needs to be done rather than simply doing what they are told
- accepting the parameters of operational power, realizing they will not share in every managerial decision
- seeking opportunities for growth through problem-solving, decision-making and creating solutions
- demonstrating self-discipline while they learn, think, analyze, evaluate, and improve
- accepting responsibility for learning
- developing skills in communication and interpersonal relations
- feeling a sense of ownership in everything they do.

The above is intended to introduce the shared responsibility that is required of everyone in an empowered organization. Specific implementation strategies are described in several of the references (e.g. Foxman & Polsky, 1991; Caudron, 1995) and were not part of the purpose of this article. However, the implications of the study for small firms are significant. In order to improve quality and profitability, developing an empowered workforce that can expeditiously solve problems and enhance customer service (Cook, Chaganti, & Haksever, 1998) provides the small firm with a competitive advantage. The training that is necessary represents an investment and does contribute to future profitability (Cook, et.al., 1998). Other studies support the significance of empowerment for productivity (Sheridan, 1996; Kirkman & Rosen, 1999), a greater sense of ownership for the work (Hasek, 1998; Heaton, 1998), and job
satisfaction (Thomas & Tymon, 1994; Spreitzer, Kizilos, & Nason, 1997). These are outcomes that any business owner would significantly value.

**IMPLICATIONS AND CONCLUSION**

Empowerment is becoming a demonstrated way for an organization to address the goal of getting or staying ahead. In order for small firms to be competitive they will need to demonstrate continuous improvement. Having workers wanting to participate in this process will only happen if the employees develop an internal commitment (Argyris, 1998) to the organization. Argyris (1998) maintains that internal commitment is closely aligned with empowerment – having people take ownership of their work. They do so based upon their own reasons or motivations – it’s the difference between “having to” and “wanting to”. A sense of internal personal responsibility is the result. Empowerment, then, is the process that provides the motivation and skill to achieve that goal. Empowerment enables people to feel and behave as if they have power (or autonomy or control) over significant aspects of their work.

The small business owner is in an excellent position to take advantage of this concept. Because the owner is often on-site and can collaborate more closely with all employees (workers, supervisors), he or she can create a culture of permission where guidelines are not treated as law. This culture provides a vision of what the organization is trying to accomplish and supports the development of skills so that people are equipped to do what needs to be done. The more personalized or individualized environment can help support that culture, both emotionally and materially, so that people will want to “go the extra mile”.

In order for employees to feel safe and secure in going the extra mile, they must believe management will protect them should they detour from the traditional route. Workers must come to know and understand that management will support responsible risk-taking behavior. Management, therefore, needs to learn how to release the expression of personal power within each of their employees. This change will not occur on any given day – we are not looking to signal a “new program”. Rather, management’s commitment to changing the organization’s culture needs to occur “through a series of moments” (Block, 1987).

To effectively implement a sincere and meaningful shift toward empowerment, here are some guidelines to assist the reader in framing the challenges that lie ahead:

1) **Realize that not everyone will want to be empowered.** Some will not seek to be held personally accountable, thus there will be various levels of commitment. The extent of participation to organizational goals will vary with each employee’s wishes and intentions (Argyris, 1998).

2) **It will take time, hard work, lots of communication, listening, and trust-building to develop a sense of internal responsibility and personal (individual) empowerment.**

3) **People will have problems and ask management for help** (Argyris, 1998), but their managers cannot simply tell them what to do. This is where the skill and understanding of what it means to coach and mentor is most valuable.

4) **Realize the limits of empowerment.** Do not introduce it needlessly. Non-routine or complex tasks, requiring decisions as defined earlier in this paper, are necessary to introduce internal commitment opportunities.

5) **Work with managers and supervisors to understand and master their new, emerging roles.** Sharing the power requires removing many previous barriers to success. Coaching employees toward accepting more responsibility, for example, requires that managers actively listen to their workers.
6) Remember what empowerment is designed to achieve. Sharing the power increases authority and builds ownership for the company’s priorities (Foxman & Polsky, 1991). In order to achieve goals and effective performance, companies can’t afford to slip up in managing their priorities.

7) With employees having the power to make decisions about relevant aspects of their work, their motivation to achieve company goals and profitability will be a function of genuine shared responsibility. Managers must insure that policies and controls that inhibit the employees from undertaking action based on their decisions are removed.

8) Insure that the information systems of the company are capable of providing readily available data. Communication that is useful, relevant and goal directed will be significantly affected by the quality of these systems.

It is apparent that successful implementation, however, depends in part upon achieving individual empowerment and some authors (e.g. Dawson, 1998; Argyris, 1998) have suggested that individual empowerment must occur prior to team empowerment. The author is presently conducting further research involving the transition from individual to team-based empowerment in some of these firms. Other writers (Nathan, 1993; Kinni, 1994; McClenahen, 1995; Argyris, 1998) are calling for studies of team empowerment in small firms since the literature appears robust with team applications in only large firms.

Because the organizations in this study are small manufacturing firms, they can only survive and effectively compete on the basis of providing better quality, reliability and durability than their larger and better-financed rivals provide. The pursuit of high quality through empowerment as a workplace strategy is a journey – a never-ending process that can apply to any small business.

REFERENCES


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