Three presentations are provided from the Academy of Human Resource Development (HRD) 2000 Conference Proceedings. "Leadership Development: A Review of the Theory and Literature" (Susan A. Lynham) has four parts that analyze the leadership development process: the present state of the available body of knowledge on leadership development; core knowns in the body of literature; key "voids" or "unknowns" in the literature; and contributions to and possible implications of the insights gained for future HRD research. "Developing Workplace Leaders through Their Emotional Reactions: Creating Committed Change Agents To Build a Learning Organization" (Darren C. Short, Peter Jarvis) explores the concept and design of leadership development at an emotional level (learning through emotional reactions) and describes a program of book readings, group discussions, and reflective writing. Wider implications for HRD are raised. "Investigation of a Leadership Development Program" (Brad D. Lafferty, Christina L. Lafferty) used Sashkin's Visionary Leadership Theory (VLT) to study whether leadership training at a certificated military leadership school affects individual leadership style and characteristics. It offers findings that support VLT and suggests that exposure to the transformational leader has long-term effects that continue beyond the training intervention. The papers contain reference sections. (YLB)
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Leadership Development: A Review of the Theory and Literature

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Leadership development, a component of Human Resource Development (HRD), is becoming an area of increasingly popular practice. It is estimated that billions of dollars per year are invested in some kind of leadership development in US companies. Yet a review of available theoretical and scholarly literature suggests that less may actually be known about this area of human development than is implied by popular practice. With an increasing emphasis on human development and expertise as a source of sustainable competitive advantage it is unlikely that the expenditure on and investment in leadership development will decline in the next few years. Growing expenditure on leadership development suggests an increasing effort to utilize leadership development as a vehicle for performance improvement. It is both timely and appropriate for HRD to become more critically involved in the study of the body of knowledge that supports and informs the practice of leadership development. This involvement will enable HRD to make explicit what really is and is not known about leadership development, and to consider the implications of such reflective study and findings for future research and practice.

Keywords: Leadership, Leadership Development, Leadership Education

There is a deficiency of real, scholarly knowledge about leadership development. Yet there is an increasing drive for and investment in leadership development in organizations (Boyett & Boyett, 1998; Clark & Clark, 1994; McCauley, Moxley, & Van Velsor, 1998). It would appear that the body of knowledge on leadership development has some distinct voids, some troublesome gaps, and that both may be well served by further purposeful and scholarly inquiry and study.

HRD is concerned with "the process of developing and/or unleashing human expertise for the purpose of improving performance" (University of Minnesota, 1994). As such, leadership development falls well within the general focus of concern of HRD. It is time for HRD to begin seriously studying not only the general phenomenon of leadership development, but also the link between leadership development and performance improvement. Both issues of leadership development offer HRD further leverage for strategic influence and action within organizations in the future (Ulrich, 1998; Torraco & Swanson, 1995).

Problem Statement and Theoretical Framework

For purposes of this study leadership will be taken to be a process whereby individuals influence groups of individuals to achieve shared goal or commonly desired outcomes (Northouse, 1997). Leadership development has been described as "as every form of growth or stage of development in the life-cycle that promotes, encourages, and assists the expansion of knowledge and expertise required to optimize one's leadership potential [and performance]" (Brunsgard, 1996, p. 83). In a 1996 article in the Journal of Leadership Studies, Brunsgard provided an excellent scholarly review of leadership development and leadership education research. In this review he focused on "what is known about how leaders are educated, developed and trained" (p. 82). A similar but more expansive work has been more recently published by McCauley, Moxley and Van Velsor (1998) resulting in a Handbook of Leadership Development.

Not withstanding these two pieces of work on leadership development the question of what is really known about developmental processes aimed at growing and developing leadership capabilities and expertise, and the link between leadership development and performance improvement, still remains largely unanswered and certainly warrants a lot more study and attention. This paper explores the following leadership development related questions:

What do we appear to know about leadership development?
What do we appear to not know about leadership development?
What are the implications of the above “knowns” and “unknowns” for future research on and practice in leadership development?

Methodology

The methodology used was a conceptual analysis based on a review of related leadership and leadership development literature. Brungardt's (1996) article provided an important contribution in beginning to answer the above questions and played a fundamental role in the provocation of this study.

It is the purpose of this paper to present the current status of available theory and literature on leadership development. Through review, analysis and synthesis of related scholarly literature and theory a discussion of what is and is not known about leadership development is presented in four parts. The first part presents the current state of the available body of knowledge on leadership development. The second part highlights some of the core knowns in this body of knowledge. The third part presents some key "voids" or "unknowns" in the leadership development literature. And, finally, the fourth part offers some conclusions and possible implications of the insights gained from this paper for future HRD research.

Results

The Present State of the Body of Knowledge

Although there are innumerable authors on the topic of leadership, there are considerably less so on leadership development. Four notable authors who have endeavored to gather up the body of knowledge on leadership are Bass & Stogdill (1990), Gardner (1990), Clark & Clark (1994), and Northouse (1997). In Bass & Stogdill's 1182 page Handbook of Leadership, only one chapter (between 40-50 pages) is devoted to the topic of leadership development. In Gardner's book, two short chapters out of 17 touch on leadership development. And, in both Clark & Clark's work on Choosing to Lead, and Northouse's work on Leadership Theory and Practice, no insights are offered on leadership development itself. Instead these authors tend to focus on examples of leadership development programs (as an example of method) and in a few instances offer some insights on leadership learning and training.

The most noteworthy work on leadership development is a paper by Brungardt (1996) who appears to be the first to try to gather up some of this body of knowledge. He makes a good and noteworthy first stab at this rather complex and large task. Brungardt's work is later followed by that of McCauley, Moxley and Van Velsor (1998) in their Handbook of Leadership Development. McCauley et al's work presents, however, more of a practitioner, how-to perspective on leadership development than a scholarly consideration of leadership development as a body of knowledge.

An initial literature search on the topic of leadership development revealed no papers of purely this topic, but rather 64 items concerning leadership development of two particular kinds, namely, of educational leadership and of military leadership. The literature on leadership development seems to be embedded in executive and management development, a tendency that is also reflected in the AHRD proceeding papers of the past four years.

A thorough review of the literature reveals that the body of knowledge pertaining to leadership development seems to reside in three key areas (Bass & Stogdill, 1990; Boyett & Boyett, 1998; Brungardt, 1996; Gardner, 1990; Jackson, 1993; Northouse, 1997; Schreisheim & Nieder, 1989; Yukl & van Fleet, 1992). The first of these three areas focuses on general approaches to leadership, and can be further divided into five categories, namely: (1) traits theory– emphasizing the personal attributes of leadership; (2) behavioral theory– emphasizing what leaders actually do and the identification of different styles and their effects on group performance; (3) situational theory– emphasizing the different demands different situations place on leadership and therefore leadership style; (4) power-influence theory– which explains leadership in terms of the amount, type and use of power and influence tactics; and (5) transformational theory– emphasizing the leader's role in the creation of culture and revitalization of organizations (Brungardt, 1996). Newer approaches, like the 3Es of Responsible leadership (White-Newman, 1993), Authentic Leadership (Terry, 1993), and Communal Leadership approaches (Bryson & Crosby, 1992; DePree, 1997) have provided frameworks for trying to integrate many leadership approaches – sometimes referred to as contingency approaches to leadership (Northouse, 1997; Terry, 1993; Yukl & van Fleet, 1992). Although these many approaches to and theories of leadership have provided us with different
insights into the nature of leadership it is only recently that the question of how a leader is developed has become addressed by the literature, and somewhat poorly, it would seem, at that.

A second area in which the leadership development body of knowledge seems to reside is in that of leadership development research, most of which fall into four categories, namely, early childhood and adolescent development, the role of formal education, adult and on-the-job experiences, and specialized leadership education. (Bass, 1990; Brungardt, 1996; Clark & Clark, 1994; Hughes, Ginnet, & Curphy, 1993) The third area that contains some of the leadership development body of knowledge is that of leadership education research, which covers leadership development in elementary and secondary education contexts, leadership development in higher education, leadership development training programs, and leadership development among senior citizens. (Bass, 1990; Brungardt, 1996)

In commencing the task of attempting to assess the current state of the body of knowledge on leadership development one would expect to be overwhelmed by the volume of available literature. On the contrary the author was overwhelmed on two unexpected fronts. First by the lack of a specific body of knowledge of leadership development, and second, by the extent to which this literature seems deeply embedded, even hidden, within leadership and other social sciences (notably psychology) literature.

The literature review therefore points to a substantial lack of knowledge about the topic and a general lack of a coordinated, coherent body of knowledge on leadership development (Brungardt, 1996). Having briefly considered the general state of leadership development as a body of knowledge, the next consideration is what this body of knowledge informs us in terms of what we do and do not appear to know about leadership development.

The Core Knowns about Leadership Development

Through a synthesis of the literature the author identified eight core knowns about leadership development. 1) Leadership development occurs in early childhood and adolescent development. 2) Formal education plays a key role in leadership development. 3) On-the-job experiences are important for the development of leadership. 4) Leadership development also occurs through specialized leadership education. 5) Leadership education focuses on three specific areas. 6) There are a number of factors that can act as potential barriers to the effectiveness of leadership development. 7) Leadership development is a lifelong process. And, 8) Leadership development is often confused with management development. Each of these points is expanded upon in the paragraphs below.

1. Leadership Development occurs in Early Childhood and Adolescent Development  Studies on early childhood and adolescent development seem to provide evidence that experiences from early in life impact on adult leadership potential. These studies vary in nature from how personal traits are substantially influenced by childhood and adolescent experiences (Gardner, 1990) and family influences (Cox, 1926; Jennings, 1943), how treatment of parents and parental standards influence the development of leaders (Bishop, 1951; Bass & Stogdill, 1990), how a family life that emphasized a strong work ethic and high education standards and responsibility is directly related to leadership potential and success (Bass, 1960; Day, 1980), to how opportunities in childhood and adolescence allowed young people to practice leadership activity (Bass, 1960; Murphy, 1947), and the influence of mentoring relationships at school become influential in leadership behavior (Clark & Clark, 1994).

2. Formal Education plays a Key Role in Leadership Development  According to Bass (1990) many scholars believe that a liberal arts education is the best for preparing young leaders as it provides a broader educational experience considered essential to leadership (Clark & Clark, 1994; Gardener, 1990; McCauley, Moxley, & Van Velsor, 1998). Brungardt (1996) and Bass (1990) however caution that there is very little research that has been conducted to study the formal role education may play in leadership development. Studies conducted in the British education system provide some evidence to this effect, however this approach to leadership development is centered on a philosophy of classical, conservative education, where leadership is considered education for the elite and that the elite are the best suited to rule (Boyd, 1974; Burns, 1978; Lapping, 1985). Bass (1990) and Brungardt (1996) brought our attention to the fact that there is research available that shows that formal education does positively correlate with achievement of recognized leadership positions, however Brungardt prudently cautions that a positive correlation between education and leadership does not reflect nor support causation.

3. On-the-job Experiences are Important for the Development of Leadership  Many authors in the field have pointed to the importance of challenging job opportunities as a source for learning leadership skills as well as
to learning from the people one works with and from the task one does as two valuable such sources for leadership development (Gardner, 1990; Hughes, Ginnet, & Curphy, 1993; Kouzes & Posner, 1990; McCauley, Moxley, & Van Velsor, 1998; Ulrich, Zenger, & Smallwood, 1999). In research work by McCall, Lombardo & Morrison (1988) researchers were able to identify the lessons learned from challenging assignments and experiences and link these back to leadership development. Other studies have found that learning from mistakes, developmental opportunities, job experiences and on-the-job mentors play an important role in leadership development (Copeman, 1971; Davies & Easterby-Smith, 1984; Lombardo, 1986).

4. Leadership Development also Occurs Through Specialized Leadership Education Evidence of the bearing of specialized leadership education programs and training have also been shown, through numerous research studies, to have a positive impact on leadership development. A meta-analyses, by Burke & Day (1986), of the effectiveness of these programs revealed a positive impact on leadership development, pointing to a conclusion that in most reported cases specially designed educational activities seem to enhance the development of leaders. Studies reviewing the effectiveness of short versus long term leadership training programs or activities have revealed that leadership development as a longer term process does seem to be more effective and deliver more lasting results than those of a shorter (few days to a week) duration (Guetzkow, Forehand, & James, 1962; Luttwak, 1976; McCauley, Moxley & Van Velsor, 1998). However, many of these last studies were conducted on management development training processes and may not be as applicable, if at all, to leadership development processes.

5. Leadership Training Focuses on Three Specific Areas. The purpose and content of leadership training appears to focus on three areas, namely, improving a leader's attitudes, skills and knowledge, training in success and effectiveness as a leader, and training and education on leadership styles (Bass, 1990). Studies on all three groups of training and education have revealed mixed findings and appear to rely heavily on participant self-reporting and perception reports of peers, subordinates and superiors (Brungardt & Crawford, 1996; Cromwell & Caci, 1997; Daugherty & Williams, 1997; Field, 1979; Hand & Slocum, 1970; Rohs & Langone, 1997). However, as pointed out by Bass (1990), the results of these studies cannot be guaranteed. Other specialized leadership education programs include those that focus on management development, the education of science and engineering supervisors, military leaders, executive development, entrepreneurial and achievement motivation, leadership of and by minorities, training leaders for foreign assignments, and training community leaders (Bass, 1990; Brungardt, 1996; Yukl & van Fleet, 1992; Clark & Clark, 1994; Morrison, 1994). Many studies conducted on the effectiveness of training of this nature have again revealed mixed results (Bass, 1990), but with some showing more positive evidence than others, for example, training leaders for foreign assignments (Chemers, Fiedler, Lekhyananda & Stolurow, 1966) and training community leaders (Rohs & Langone, 1997; Williams, 1981).

6. There are a Number of Factors that can Act as Potential Barriers to the Effectiveness of Leadership Development. What does appear to be of importance in determining whether leadership development and education are effective are numerous factors that affect the outcomes of these efforts (McCauley, Moxley, & Van Velsor, 1998). Bass (1990) highlight and discuss studies that substantiate the following as such factors of note:

   - The strengths and effects of the training depends on the criteria employed to assess these effects
   - The composition of the training group
   - The attributes of the trainer
   - The occurrence of follow-up, reinforcing practice and feedback, and
   - The congruence of training and the organizational environment.

7. Leadership Development is a Life-long Process. Leadership development is more a life-long process than a series or collection of short-term developmental events and experiences; that, as pointed out by Brungardt (1996), leadership development includes the components of leadership education and training each of which are different to leadership development and involve a more narrow, specific focus, almost like interventions along the life-line of leadership development. Related research also reveals that research findings reveal mixed and often contradictory results (Latham, 1988; Rice, 1988) resulting in increasing debates over the empirical soundness of the field.

8. Leadership Development is Often Confused with Management Development. In many instances management and leadership are taken to be equivalent and interchangeable phenomena, with many early studies focusing more on skills, knowledge and attributes of management development and then been concluded for issues of leadership. Leadership studies and literature of the 1990s and today increasingly differentiate between these
leadership and management as different and less related phenomena, calling into question the application of studies of one kind to the other (Gardner, 1990; Kotter, 1990; Kouzes & Posner, 1996; Yukl, 1989).

**Voids in the Leadership Development Body of Knowledge**

A number of compelling voids in this body of knowledge have been synthesized from the literature review. These voids must be studied and filled if this area is to mature in credibility of theory and practice. Four compelling such voids are discussed in the paragraphs below.

1. **There is a Lack of Boundaries and Mapping of the Body of Knowledge of Leadership Development.**
   One of these issues concerns the need to gather up studies and understanding of leadership development, and to conduct analyses of the evolution and nature of what is really known in this field. There is no clear and consistent answer to the question of what leadership development is and isn't. Although the works of Gardner (1990), Clark & Clark, 1994, McCauley, Moxley & Van Velsor (1998) and Brungardt (1996) make attempts at answering this question they are not yet adequate in this regard. Until the general aims, ideals and specific purpose of leadership development is consistently mapped out and bounded it is unlikely to mature into a credible field of thought and practice. Indeed the very question of whether leadership development is a field of thought and practice with its own body of knowledge is at stake.

2. **There is No Clarity or Agreement on the Intended Outcome of Leadership Development.**
   A review of related literature on leadership development leaves one with a serious question about what the outcomes of this field are intended to be. Is its dependent variable one of individual growth and development, or is it one of performance?. Indeed, what should it be? The literature highlights outcomes of leadership development as including the likes of improved subordinate and human relationships, improved attitudes, skills and knowledge, improved trainee leadership and group effectiveness, how to use major styles, improved decision-making style, sensitizing trainee to their management role, and developing and sharing personal and organizational vision (from key studies highlighted in Bass, 1990; Clark & Clark, 1994; McCauley, Moxley & Van Velsor; 1998).

   The link between leadership, and leadership development and performance, seems to lie more in belief than in justifiable evidence (Bass, 1990; Meindl & Ehrlich, 1987; Ulrich, Zenger, & Smallwood, 1999). Studies conducted by Meindl & Ehrlich put forward compelling evidence for how the belief that leadership contributes to specifically organizational performance produces a ‘haloing’ bias on related evaluative studies. Definitions of leadership and leadership development do not place performance as an explicit outcome of leadership. Some definitions may include statements of achieving results, but what those results are is left at best only partially clarified and are usually of the nature of essential characteristics, roles and responsibilities, attributes, principles and practices (Bass, 1990; Bennis & Nanus, 1985; Gardner, 1990). Nowhere is there a definition of leadership, and by association, leadership development, that includes for improving performance as a core dependent variable of this field of study and practice. Rather, performance improvement is inferred, implied and assumed as an outcome of leadership and leadership development. Given the increasing investment in leadership development by not only American organizations, but by organizations worldwide, this is a particularly worrying void in the field. This lack of a real, justified link between leadership development and performance links back to clarity of assumptions that govern the thought and practice of leadership development. Until these assumptions are made explicit and the field defined in congruence with these assumptions and beliefs, little progress can be made in building sound knowledge in the field, let alone methods for proper research and inquiry (Ruona & Lynham, 1999). Unless these strides are made the field will likely continue to reflect an empirically inadequate and lacking framework for thought and practice.

3. **Leadership Development Evaluation is Questionable.**
   A third important issue concerning incompleteness in the field relates to the nature of evaluative studies and thus evaluative conclusions based on these studies. The literature review revealed that the majority of evaluative studies on the effectiveness of leadership development (including education and training) rely firstly on self-reports from the participants, and secondly on 360-type feedback instruments (Bass, 1990; Clark & Clark, 1994; Ulrich, Zenger, & Smallwood, 1999). Both these measures of evaluation are highly questionable in terms of validity and reliability (McLean, 1995). 360-degree feedback systems are merely reporting on perceptions of behavior and attitude changes, yet they are sometimes masqueraded as valid and reliable measures of developmental effectiveness.
Largely missing from this field of study are directly observable behavior and attitude/style/performance changes and reports. Surprising, direct observation reporting has been used in research studies to determine what makes for leadership (Kouzes & Posner, 1989, for example, did a good job here). Yet, in studying the effectiveness of leadership development for these characteristics and practices direct observation and actual incident reporting on behavior and other changes is largely absent. Furthermore, many of the evaluative research studies have been judged to be questionable due to poor design and control during the conduct of the research, calling into question the validity of the findings that have resulted from these studies (Bass, 1990).

4. There is a General Lack of Knowledge about the Unique Method and Content of Leadership Development Processes. A final area of concern in the field of leadership development links to the methodology and content of such activities and processes. Most of the research conducted in leadership development type studies are linked to specific models of leadership (for example, trait-theory, behavior-theory, situational-theory), yet leadership development encompasses many of these models and theories. This raises the question of whether research findings on the effectiveness of specific leadership theories will and do hold true when developed in combination with multiple and sometimes contradictory leadership theories. Can it be assumed that because some studies show a positive correlation between transformational leadership theories and group performance that the same positive correlation can be assumed when this theory/model is merely a component of a larger, more comprehensive leadership development process? Dubin (1976) cautioned against a tendency in the social sciences to fail to recognize the boundaries of theoretical models due to assumptions of commonality about human behavior and its universality. He said that this tendency causes us (in the social sciences) to assume that we can safely ignore the boundary conditions surrounding a given theoretical model, and described this tendency as an unfortunate intellectual habit of theorists and practitioners. He further suggested that the more we recognize that human actions may be different in different situations the more realistic we will be of the boundaries of theoretical models that we create. More work needs to be done on contingency theories that combine multiple approaches and perspectives on leadership and leadership development before such conclusions can be made.

Contributions to New Knowledge in HRD

Because HRD is concerned in part with the development and unleashing of human expertise for the purpose of performance improvement it should be concerned with the thought and practice of leadership development. To date most of this literature is embedded in the areas of psychology and management, lending this body of knowledge a predominant focus of either individual development or individual effectiveness, or a combination of both. The HRD profession is struggling to find ways to partner more closely with business and to become more proactively involved in the strategic conversations of the organization (Torraco & Swanson, 1995). At the same time organizational expenditure on leadership development is on the increase with the apparently largely unsubstantiated belief and assumption that this development will lead, either directly or indirectly, to individual, group, and organizational performance improvement. It would appear that much inquiry and study is yet to be done in this area of human development. Because of HRD's expertise in human development and human development technologies, it would appear logical for the profession to take a more active interest and role in the conduct of leadership development related studies and research. And, by so doing an active contribution in the development of this body of knowledge could provide invaluable leverage for further strategic impact by HRD on organizational performance.

Conclusion

The majority of the research in the field of leadership development has focused on the what of leadership, rather than the how of leadership development, resulting in a lack of knowledge and empirical evidence regarding the subject of leadership development (Ulrich, Zenger, & Smallwood, 1999). Brungardt (1996) offers a compelling conclusive summary of leadership development and education, namely, that: (1) although leadership development and education are not new topics scholarship in this area appears to be in its infancy, with literature in its early phases, and with both fields in the process of defining themselves and their research domains; and (2) that not only do leadership development activities lack documentation, but that there is a general lack of understanding of their impact, an understanding that may take years before being adequately supported by sound, and empirical research.
References


Developing Workplace Leaders Through Their Emotional Reactions: Creating Committed Change Agents to Build a Learning Organization

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Changes to organizations are challenging leaders to change their mindsets on their roles and responsibilities. In traditional bureaucratic organizations that means looking for ways to create new structures and to build learning organizations. In such bureaucratic organizations, where will the leaders come from to create and to build? Are traditional leadership development programs, with their emphasis on the cognitive, able to produce these leaders and to change both mindsets and behaviors? This paper explores the concept and design of leadership development at an emotional level (learning through emotional reactions), describing a program of book readings, group discussions, and reflective writing. Wider implications for HRD are raised.

Keywords: Leadership Development, Learning Organizations, Emotion

The program described in this paper resulted from a period of personal reflection on my own experiences of leading, facilitating, and participating in leadership development activities. I had observed too many leaders attend, participate, and learn theories, models, and techniques, but rarely develop a commitment to change their behaviors. Those leaders had learned the need to changing their actions, but rarely moved beyond that cognitive appreciation. Something was missing from the programs; and my view was that passion could have a key role in bridging the gap between cognitive and behavioral change. As Ellinger, Watkins, and Bostrom (1999) pointed out, the curricula of management development programs designed to provide new knowledge and skills are often competency-based and focus on business functions and methods: those programs therefore need to be offered in different delivery formats. A leadership program was developed using such different formats to approach development at an emotional level - not to increase emotional intelligence (Goleman, 1998), but to approach learning through emotions. This paper provides an account of the program design and the pilot run evaluation.

Challenges facing leaders in organizations

Organizations are operating in a new dynamic environment caused by the increasing speed and turbulence of technological change, the influx of knowledge workers, and the move to a global and multicultural workplace (Bennis & Nanus, 1999). The concept of learning organizations has emerged in response to that changing operational environment. These are designed to involve everyone in identifying and solving problems; thus enabling the organization to continuously experiment, improve, and increase its capacity. In learning organizations, leaders emphasize employee empowerment and encourage collaboration across departments and with other organizations (Daft, 1999). That leads to a soft, intuitive model of organization with a horizontal structure, adaptive culture, linked strategy, personal networks, and empowered roles (Hurst, 1995). That links with the concept of boundaryless organizations which encourage free movement across vertical, horizontal, external, and geographical boundaries with the aim of increasing speed, flexibility, integration, and innovation (Ashkenas, Ulrich, Jich, & Herr, 1995).

The changes to a new dynamic environment with boundaryless and learning organizations have generated new challenges for organizational leaders. According to Hickman (1999), “this uncharted territory requires unparalleled innovative leadership that cannot be an extension or revision of the old model” (p. 3). The requirements for leadership in this new environment include (Allen et al., 1999): new systems thinking to design...
processes that increase inclusiveness and diversity in decision making; the design, support, and nurturing of flexible, durable organizations and groups, and systematic understanding needed to respond positively to change events; the understanding or intuiting of many interrelated systems, and the initiating and practicing of a systems perspective; a significant ethical dimension focused on sustainable principles; and increasing the speed at which leaders and others learn, and increasing opportunities for learning. In learning organizations, leaders are increasingly required to be designers, teachers, and stewards, using new skills to build shared visions, to surface and challenge prevailing mental models, and to foster more systemic patterns of thinking (Senge, 1990). In boundaryless organizations, leaders face the challenges of: transforming for tomorrow while doing business today; managing an uncontrollable change process; leading to an unclear destination; dealing with disruption; and confronting the need for personal change (Ashkenas, Ulrich, Jich, & Herr, 1995).

The challenges facing leaders must be viewed within the context that many are used to operating, and were most likely developed to be leaders, in a traditional bureaucratic organization. Learning and boundaryless organizations are both in contrast to traditional bureaucratic organizations characterized by: being highly specialized; completing routine tasks; using formalized procedures; containing a proliferation of rules, regulations, and formalized communication; structured with large-sized units; centralized decision-making; and elaborate administrative structures (Mintzberg, 1983). Organizations that are still predominantly bureaucratic in nature therefore now face the challenge of determining how, if at all, to shift towards more modern models of operation.

The shift to learning organizations requires leaders to consider their frames, perspectives from which leaders view the world (Bolman & Deal, 1991). According to Daft (1999), many leaders are stuck in a limited frame of reference based on their past experience, and it is helpful to broaden their frames to enrich their ability with respect to learning organizations. That reframing can be interpreted through the work of Mezirow (1990, 1991) on transformative learning as requiring leaders to challenge their existing meaning perspectives and to create new ones better suited to their new roles. Meaning perspectives (rule systems, paradigms, or personal frames) consist of structures of assumptions that are used to reason, decide on actions, and make judgments regarding what is important, just, worthwhile, truthful, and authentic (Mezirow, 1991). Leaders develop assumptions about effective leadership from their past experiences and use those to influence their current and future actions, usually to the extent that the assumptions are no-longer questioned. Unfortunately, meaning perspectives can be limited, distorted, and arbitrarily selective (Mezirow, 1991), which in the case of a leadership response to a particular situation can result in distorted perceptions of the situation, a limiting of the response options considered, and possibly to an automatic response without reflection on alternatives.

So, how should leaders develop these new or changed meaning perspectives? Experience is reported as the best teacher for developing leaders (Ready, 1994); however, Conger and Benjamin (1999) also described four main training approaches to leadership development: conceptual awareness, feedback, skill building, and personal growth. Through such approaches, $45 billion was spent on management training by US corporations in 1995, of which an estimated $12 billion was devoted to executive education (Fulmer, 1997). Despite the amount spent on leadership development, Conger (1993) stated that organizations are only just beginning to understand some of the potential tools and experiences that are needed to help managers in more fully realizing their leadership potential, and that educators need to be open to new paradigms and new training approaches. Among the long list of principal learning methods used in leadership training are: case studies, lectures, discussion groups, observed exercises, 'fishbowls,' simulations, and outdoor exercises (Conger and Benjamin, 1999). However, those two authors were critical of the frequent disconnect between adult learning principles and the practice of leadership development, with the exception of action learning programs.

To summarize, in response to changes in the operating environment, organizations are shifting away from bureaucratic models towards a learning orientation and towards boundaryless structures. That shift challenges leaders to change their roles and skills, and also to develop new frames of reference and meaning perspectives. In the face of criticisms of leadership development, organizations need to find new ways of developing their leaders to fit the new requirements. Traditional bureaucratic organizations also face the challenge of beginning and maintaining the building of a learning organization.

Building emotion into a leadership development program

This paper describes a leadership development program designed for a traditional bureaucratic organization in the public sector. That program was designed with two aims: to prepare leaders for the challenges of operating in a...
learning organization; and to prepare a cadre of leaders to act as change agents in shifting the organization towards a learning organization mode of operation. The setting was a British public sector organization employing 3,300 across five sites. The organization had a long-standing leadership development strategy with three main strands: (a) formal training courses and development opportunities for individuals; (b) bespoke training events and consultancy support for work teams and groups of leaders; and (c) self-directed learning opportunities. The formal training courses contained a mix of trainer-led input on models, theories, and best practice, small group exercises, and sharing of experiences and practice.

From attending the existing courses, all leaders in the organization shared a common language on management and leadership as well as a common understanding of models and theories on: team building, leadership styles, communication skills, strategic planning, change management, learning, motivation, coaching, etc. However, the existing courses had been criticized by some leaders as covering management more than leadership, being more knowledge-based rather than encouraging reflection on experiences and attitudes, and delivering theories and models more than encouraging leaders to use experience to create their own.

The new program was designed as an optional module on leadership for those who had been through the existing courses, and was designed to challenge existing meaning perspectives, or frames of reference, with the intention of generating leaders who were committed to developing a learning organization. The program design was influenced by the work of Mezirow (1990, 1991) on transformative learning, but with the view that change was needed beyond the cognitive level addressed by Mezirow. Past research had provided empirical evidence that leaders' meaning perspectives could be transformed, for example, Lamm's (1999) study of the use of Action Reflection Learning™ in a corporate leadership program. This design, however, set out to expose participants to an emotional as well as cognitive experience – the aim being to create a passion for changing the role of leaders in the organization rather just a cognitive understanding of the need to change behavior. The importance of emotions to leaders was described by Goleman (1998), who reported his analysis of outstanding leaders and the finding that emotional competencies (as opposed to technical or cognitive cues) make up 80 to 100 per cent of those seen as crucial for success. However, the program was designed not to develop emotional competence, but to approach learning through emotional responses to learning materials and methodologies.

The program was designed to take between six and twelve leaders in groups who would meet for three hours every three weeks over a six-month period. At the core of the program was a reading list: Mezirow (1991) believed that meaning perspectives could change following a dilemma resulting from being in an eye-opening discussion of a book. Other authors had written about the learning potentials of book reading, such as Greene (1990) on the use of imaginative texts as occasions for gaining critical consciousness, and Shor and Freire (1987) on reading texts with different perspectives from the learners 'as a way of assisting them to read the world.'

The reading list was created with the intention of challenging leaders on an emotional level. The selected books were: Tuesdays with Morrie, by Mitch Albom; Long Walk to Freedom, by Nelson Mandela; To Have or To Be, by Erich Fromm; The Story with my Experiments with Truth, by Mohandas Gandhi; The Art of the Impossible, by Vaclav Havel; I Have a Dream, by Martin Luther King; On Becoming a Leader, by Warren Bennis; and Insights on Leadership, edited by Larry Spears. Those readings contained a combination of material written by world leaders and leadership theorists; a combination of speeches, edited chapters, and books; material on philosophy; and a book (Tuesdays with Morrie) about the mentoring relationship between a dying professor and a former student. Between them, the readings required program participants to reflect on such topics as: the purpose and nature of leadership, the qualities of good leaders, the difference between leadership and management, and the difference between having and being on leadership. The reading list was designed to produce a range of emotional responses (e.g. from reading the last speech of Martin Luther King, the details of Nelson Mandela's imprisonment, and about the death of Morrie Schwartz described by Albom).

To take full advantage of the emotional impact of the reading materials, the decision was taken that the program should avoid traditional didactic delivery methods. Instead, other methods were selected that, from a literature review, were identified as being successful in transformative learning. They included:

• Critical incidents - brief descriptions written by learners of significant events in their lives based on a set of instructions that identifies the kind of incident to be described and asks for details of the time, place, and actors involved in the incident and the reasons why the event was so significant (Brookfield, 1990);

• Journals - their uses include: as an educational tool before learning something new, to aid reflection while learning, and as a means of post-reflection; as a tool to support reflective withdrawal and reentry (Lukinsky, 1990); and as a tool to build a documentary trail of how understanding of a problem has changed and to track influences on this shift in understanding (Marsick, 1990);
• Group discussions. According to Brookfield (1986), groups are considered to: encourage the collaborative exploration of experiences and the collective interpretation of learners' individual realities; provide support, information exchange, a stimulus, and source of relevant resources; and provide a venue for experimenting with ideas, opinions, and alternative interpretations and for testing those out in the company of others engaged in a similar quest. Brookfield and Preskill (1999) outlined many tools and techniques for using group discussions as a way of teaching;

• Distributed learning - the spreading of learning episodes over a period of time. Knox (cited in Brookfield, 1990) found that older adults were able to learn most effectively when learning episodes were distributed according to a rationale dictated by the content, and Mezirow (1990) suggested that ideally learners should meet as a group over an extended period of time to assess action steps taken throughout the process. Conger and Benjamin (1999) reported that distributed learning is rare in individual-based leadership development training, where programs are generally short, ranging from a few days to a few weeks;

• Narratives. Dominice (1990) described the use of educational biographies in an adult education seminar, whereby students presented life histories in the light of the education they had received and then over the following weeks produced new written narratives.

Comparing the designed program to Mezirow's (1991) process for the transformation of meaning perspectives: book readings and group discussion would provide dilemmas to encourage change; readings, discussions, reflection, journaling, and exploring critical incidents would enhance awareness of the context of beliefs and feelings, encourage the critique of underpinning assumptions and premises; reflection and journaling would help identify and assess alternative perspectives; and narratives of commitment and distributed learning would assist in decisions on new perspectives and allow for action to be taken based upon those new perspectives.

The participants

The program was piloted between January and August 1999 at two locations in the UK. All 18 participants were in public sector managerial positions ranging from first-rung managers up to experienced senior managers of large teams. Participants came from work areas dealing with: data collection and analysis; information systems; finance; corporate strategy; methodology; and human resources. Their educational qualifications ranged from the equivalent of a high school diploma though to Master's degree level. Group A consisted of six middle managers responsible for teams of between 3 and 12 people and with between 4 and 24 years of experience. Group B consisted of 12 junior to senior managers responsible for teams of between 5 and 80 people and with between 5 and 25 years of experience. Of the 18 on the pilot, six were women, two left the organization before the program finished, and two others left the program before the mid-point.

Evaluation process

The trial program ran in the first half of 1999. Mid-way through, it was decided that an external evaluation was necessary to provide internal organization stakeholders with an independent perspective on the program design and impact. The second author acted in this capacity. The evaluation model was based on a qualitative case study design within one organization. Yin (1994) suggested the need for multiple sources of evidence in case study data collection so as to address a broader range of historical, attitudinal, and behavioral issues as well as to allow for data triangulation. Data were therefore collected through analysis of: end-of-meeting evaluation forms; participants' written narratives of commitment; a questionnaire sent to participants four weeks after the program; a transcript of one meeting selected at random; and a focus group held three months after the end of the program. The evaluation tools were designed in collaboration with participants.

The authors were keen to also collect data from participants' staff and managers; however, staff changes over the six months of the program and the following three months of post-course evaluation, meant that very few participants retained the same staff or the same manager over the full length of the program. Participants also expressed concern that many of the impacts of the program would become observable over a longer period of time than covered by this initial research. It was therefore decided not to seek data from the few staff and managers who could comment on pre- and post-course behaviors. Participant involvement in the data collection was
voluntary, resulting in less than full response for each data collection method. The findings were subsequently validated by reporting back findings to all participants.
Results

Evaluation results are reported under three headings: impact of the program on participants; behavioral impacts; and reactions to the program design.

Impact of the program on participants. Outputs of post-course questionnaires, post-course focus groups, meeting transcripts, and end-of-meeting evaluation forms were analyzed to identify the three outcomes of changes to meaning perspectives described by Jarvis (1992): transformed perspectives, emancipated cognitive distortions, and new conceptual frames of reference.

Transformed perspectives. Most participants reported that their view of leadership was changed. For some, the change took the form of a broadening: "My view of leadership has broadened and I now appreciate more fully the nature of leadership (and followership) at all levels;" "My view of leadership has grown;" and "I now have a much wider appreciation of what others see as leadership." For some, the change was a realization that they need to challenge their own leadership behaviors: "I now understand the importance of being a good follower, and I'm trying to act that way myself," and "I now see the need to act as a servant leader, asking others how I can help them to achieve their goals."

Emancipated cognitive distortions. Several participants reported that the program had encouraged them to question certain beliefs about leadership they held previously. Those included beliefs on: their suitability for leadership ("My view of leadership has changed greatly. I have gained in confidence, both that I have a leadership role to play and that I have the necessary qualities to fulfill the role well"); their desire for a leadership role ("I now see the difference between being a manager and a leader, and I'm not sure I want to be a leader"); the importance of various aspects of the leaders' role ("I now place more emphasis on vision and the people-side of leadership"); and the process of leadership development ("I gained a realization that techniques get you only part of the way. You can't fake good leadership -- the lack of authenticity would show through.")

New conceptual frames of reference. Participants reported that they gained new conceptual frames of reference as a result of combining readings on leadership with group discussions. Those took the forms of new leadership concepts, new philosophies, new role models, appreciation of other perspectives, and new theories.

Impact on behavior. As Conger and Benjamin (1999) stated, "it is important to see conceptual learning as only a first step in the process of learning about leadership" (p. 46). The extent of changed meaning perspectives should therefore be assessed in part through evidence of behavior changes. This was discussed in post-program focus groups with participants, who felt that it was too soon to expect many observable changes as a result of the program. Specific changes in behavior reported by participants included:

- Greater emphasis on servant-leadership behavior - "I am more open to admitting my lack of expertise, more confident to ask for help; acting more as a servant-leader and asking how I can help staff;"
- Increased risk taking - "The course has given me the confidence to take risks, and if you want to change things then you have to take risks;"
- Greater commitment to being a leader -- "I now appreciate the distinction between having and being on leadership, and I am committed now to being a leader rather than to having a leadership position;"
- Changes to leadership styles - "I have changed my leadership approach. I used to tell people what to do, where-as my approach now is one of facilitation;" "As a leader, I now spend more time trying to understand the concerns of my staff. I am more honest with them about likely changes and my own plans;"
- Encouraging own staff to develop as leaders - "I encourage them to talk more openly about leadership issues;"
- Providing staff with greater level of support - "Greater delegation and empowerment - 'I step back before diving in. I work with others to develop joint solutions. I have started asking my staff what can I do to help?""
- Greater openness on leadership - "I talk more frequently about leadership with my colleagues;"
- Changed leadership role - "I spend more time thinking about strategy and visions;"
- Inviting feedback on leadership performance - "I invite feedback from staff more frequently about myself as a leader and about how the work is done."

Reactions of participants to the program. Participants' reactions to the program took three forms: reactions to the program design, comparisons between the program and traditional leadership development training, and comments on improved reflection skills. Taking each in turn:

Reactions to the program design: Participants reacted positively to many of the methodologies, although no single methodology received universal acclaim. Book readings combined with group discussions based on those books were viewed as having the greatest contributing factor to participants' learning in the program. In post-
course evaluations, all participants agreed that they learned a lot or quite a lot from the readings and only one participant perceived s/he had learned little from group discussions. One participant stated that, "So much of what comes from the course depends on the discussion groups and group dynamics within these. They can help to make sure you do the readings and journal writings." Another commented that, "The readings greatly improved my self-awareness."

There was broad agreement that the group discussions support learning over and above the benefits of reading the books. As participants commented, "The group discussions helped me to understand followership - I didn't get the importance from the readings alone;" "The group discussions helped greatly in translating the readings into the context I could understand - considering how it affected me and how I could apply it in our organization;" and "The group discussions gave me the confidence to apply the reading material - other participants were supportive and encouraging."

Group discussions based on participants' critical incidents and examples of leadership from within the organization were also well received. However, of the various methodologies built into the program, journal writing and narratives of commitment received the least positive reaction, with reactions spread across the spectrum from 'learned nothing' to 'learned lots.' One participant stated that, 'I found journal writing a useful experience - it was very useful to continually record my thoughts and compare them with others in the group, and continually assess the merits of my own views and opinions. The journal has proved useful for future reference.' Another, commenting on narratives of commitment, stated, 'The request to complete narratives was excellent to consolidate all my learning. It provided a means of setting targets, and having a future form of reference. My Narrative is dynamic and will change in the future.'

In addition to those aspects of the program already mentioned, participants' reacted positively to negotiated agendas ('I benefitted from a different method of learning, including the liberating experience of not being confined to learning from a set agenda or syllabus'), distributed learning ('The format and structure was much better than an intensive one week course.'), and discussions controlled by the group rather than the trainer. Where groups invited guest speakers into the program, evaluation forms also showed a positive reaction.

Comparisons between the program and traditional leadership development training. It was interesting to explore participants' reactions to the program given its difference from the previous management and leadership training courses they had attended. Most agreed that the new program was a useful supplement to those traditional courses, adding an extra dimension to their development. As one stated, "Past courses were useful introductions to new models, and made me open to the thought of learning more about leadership. The new program gave me some ideas for taking things a bit further and made it clearer what was leadership and what was management." A second participant stated that, "Reflections on Leadership enabled me to learn more about my attitudes and my own style whereas past courses were about tools and techniques, and they didn't turn me into a leader."

Reflections on results

The experiences of the pilot program have provided some initial evidence to support the claim that emotions can be used in workplace programs to develop leaders beyond the cognitive level - to move them into action after they understand the need to change and understand the theories, models, and techniques. That evidence was reflected in participants' comments of how the program developed them beyond their experiences of previous leadership programs, and was also reflected in self-reported accounts of behavior change. Participants' comments during the program, and in subsequent evaluations, provided evidence of an increased commitment to change behaviors and to change the organization. The evaluation findings also provided preliminary evidence that carefully selected reading material, facilitated discussions, and reflective writing exercises can combine to encourage an emotional response as part of learning. Some specific issues were also raised by the program design and evaluation, and these are discussed briefly in the following paragraphs.

Although the evaluation evidence supports the view that the reflective and emotional approach of the program produced changed meaning perspectives in participants, there remains the concern that the participants' passion for change will be quashed by the remainder of employees in the workplace (an issue of learning transfer). Conger and Benjamin (1999) described this concern as the failure to build the critical mass, which often comes from, among other factors, a shared language and a set of stories about what is valued. To minimize the effects of small participant numbers, support structures have now been set up, and others are planned: with program alumni.
still meeting on a regular basis, sharing their experiences via an electronic database, inviting leaders to address them as a group, and exploring options for mentoring with leaders internal and external to the organization.

The program operated as a pilot in 1999, mainly because it was viewed by the HRD function as so different from traditional programs run in the organization. For example, no other program or course used book readings, or distributed learning to the same extent, or such techniques as journal writing or formal critical incident techniques. There was therefore some concern as to how the program would be received by key stakeholders in the organization. Introducing it through the back-door, as an optional module of a long-standing leadership development strategy, allowed the HRD function to collect evidence on the impact of the program design for use in arguing for an expansion of the program in later years.

The evaluation results also raise some interesting issues for HRD teams inside organizations. On an operation level, they emphasize the need to continue to explore different delivery mechanisms for the development of leaders, including the use of reading circles, study groups, and action learning sets. They also raise the need for HRD teams to reflect on whether their existing leadership development programs go far enough in challenging participants emotionally. The program described in this paper produced a degree of passion for change that past leadership programs had failed to achieve, in part because of the cognitive focus of those programs on models, theories, and techniques. In those programs, leaders were not sufficiently challenged to explore their passions, their commitments as a leader, the pains and glories of their past experiences, and the emotions of learning closely with a group of fellow leaders over an extended period.

At a strategic level, the program raises questions about how HRD teams can best assist organizations in the shift away from bureaucratic models — and how best to prepare for that shift when the HRD function is already several steps ahead of the organization's thinking. Radical development programs are unlikely to be sanctioned widely in bureaucratic organizations before significant commitment is given by senior leaders to building a learning organization. How then can the HRD function be ready for rapid responses to those commitments when they are eventually made, and is such back-door development (as described in this paper) an appropriate route for advance experimentation? This raises questions about the role of the HRD function in creating momentum towards a learning organization with or without the agreement of key organizational stakeholders - should the HRD function, for example, be developing change agent leaders and planting them around the organization as a means of shifting the organizational culture, even when the senior leaders are not as yet committed to the need for such a change?

Contribution to new knowledge and limitations

The purpose of this paper was three-fold: to raise the issue of developing leaders at an emotional level; to describe a pilot program for such an approach; and to describe the preliminary evaluation of that pilot program. The empirical part of the paper suffers several major limitations: there has been only one run of the program so far and in only one organization; the sample size was very small (18); participants were self-selected and were biased towards white, male, and middle class; and there was a potential bias from non-response to post-program questionnaires and requests for written narratives and involvement in post-program focus groups.

However, the evaluation results have shown that, in the particular organization, the eighteen leaders benefited from the new program design. The conceptual arguments for leadership development through emotions, when combined with the evaluation results, suggest that HRD practitioners designing leadership development strategies should consider the potential benefits of including a more reflective component in their programs (based on critical incident techniques, journaling, book readings, groups discussions, and narratives of commitment).

In response to the need for further research, the program will be adapted based on the evaluation results, run for a further 40 participants in 2000, and re-evaluated in twelve months' time, allowing for the submission of an updated paper to the 2001 AHRD conference. Further research is needed to assess the generalizability of the findings to leaders of all types in other organizations using a considerably larger sample. Further papers will also explore other implications of emotional approaches to leadership development.

References


Investigation of a Leadership Development Program

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The George Washington University

This study used Sashkin's Visionary Leadership Theory (VLT) to investigate whether leadership training at a certificated military leadership school affects individual leadership style and characteristics. A quasi-experimental recurrent institutional cycle research design was used to examine leadership scores over a three-year period, measuring effects immediately after the training intervention and one and two years later. Findings support VLT and suggest that exposure to the transformational leader has long-term effects that continue beyond the training intervention.

Keywords: Leadership, Military, Training

Air University, located at Maxwell Air Force Base, Alabama, is the institution central to Air Force leadership development. Air Command and Staff College (ACSC) is designed to prepare mid-grade officers for greater command responsibility; most future Air Force leaders will come from this select cadre. The college has attempted to implement a curriculum that is based on and incorporates concepts of transformational leadership (Sashkin, 1992; 1996a). One of the goals of this transformational approach is to foster the transference of transformational leadership from the leaders to the students (followers).

The theory of transformational and transactional leadership originated in the late 1970s (Burns, 1978). Some, (e.g., Sashkin, 1998) equate transactional leadership with management. That is, there is an exchange involved, a quid pro quo that provides the follower with something in exchange for performing as the leader directs. The "something" may be material, such as money, or nontangible, as in praise or affiliation. Transformational leadership, on the other hand, denotes revolutionary change that necessitates exploration of fundamental values and beliefs (Koerner & Bunker, 1992). The goal is to develop a shared vision and a unity of purpose among leaders and followers (Farley, 1992), and to develop followers who can themselves take on leadership roles when necessary (Burns, 1978; Sashkin, 1998). Visionary Leadership Theory (Sashkin, 1998; Sashkin & Rosenbach, 1998) takes the concept of transformational leadership to its logical conclusion. It integrates behavior, personal characteristics, and organizational culture into a systems approach to leadership.

In the fall of 1995 a longitudinal, quasi-experimental study began at ACSC to determine if a relationship existed between attending the school and changes in the students' transformational and transactional leadership characteristics. The study design included the concepts of change developed by Golembiewski, Billingsley and Yeager (1976), Golembiewski and Billingsley (1980) and elaborated by Thompson and Hunt (1996). Sashkin's (1996b) TLP, an extensively-researched assessment tool, was used to determine whether any changes observed in students' leadership behavior and characteristics were examples of alpha, beta, or gamma change, as defined by Golembiewski, et al. (1976). The Organizational Culture Assessment Questionnaire (OCAQ) (Sashkin, 1990) was used to provide a test for equivalence required by the institutional cycle design.

The central purpose of this initial descriptive study was to determine whether any changes in follower leadership style following attendance and completion of ACSC were of the nature of alpha change - simple improvements, beta change - changes in students' perceptions of the measurement scales, or gamma change - change in the fundamental dimensional structure of perceptions. Psychometric characteristics of The Leadership Profile (TLP) (Rosenbach, Sashkin, & Harburg, 1996) were also examined. The desired change forecast by the ACSC program is that the experience of operating in a transformational environment will result in a significant increase in transformational leadership behavior and characteristics, from the time the followers enter the...
environment to the time the followers conclude their time in the environment, a period of 10 months. The following specific hypotheses were investigated.

- H1 - Participants in the same year group, as measured by TLP scores before and after attending ACSC, will show an increase in both transactional and transformational scores.
- H2 - Participants in the same year group will show a continuing increase in both transactional and transformational TLP scores one year after the intervention compared to their scores taken immediately after the training intervention (H2A) and between one and two years after the intervention (H2B).
- H3 - The improvement in TLP scores post-intervention will be equivalent for all classes. All should improve. There should not be dramatic differences because both classes are selected the same way and go through the same program.

Sample Selection and Data Collection

The sample consisted of United States military field grade officers (major/lieutenant commander and lieutenant colonel/commander) and equivalent federal service civilians enrolled in the 1995-96, 1996-97, and 1997-1998 ACSC class. The total sample population was U.S. military officers attending ACSC in academic years 1995 (N=590), 1996 (N=587), and 1997 (N=592).

The recurrent institutional cycle design (Campbell & Stanley, 1963) was used to examine changes in leadership scores in the TLP for different groups obtained at the same and at different points in time. Data was collected from ACSC Classes 1994-1995, 1995-96, and 1996-97 as shown in Figure 1.

Figure 1. Overview of the Collection Design using the ACSC Leadership Database

Demographic Analysis

Demographic crosstabulation analyses were conducted to determine if any significant relationships existed between the ACSC classes' TLP scores in each of the three leadership categories. Demographic variables analyzed were: (1) Rank, (2) Service, (3) Source of Commission, (4) Aeronautical Rating, (5) Gender, (6) Race, (7) Marital Status, (8) Military Spouse, (9) Number of Children, and (10) Highest Level of Education. In reviewing all possible relationships, only four were statistically significant, and were so small as to be practically of trivial importance.
Results

Hypothesis One

Hypothesis One posited that TLP scores for trainees in the same class would increase following the training intervention. The hypothesis was tested using two samples: a comparison of the ACSC Class 95-96 before and after the intervention and a comparison of ACSC Class 96-97 before and after the intervention.

Comparison of Classes

To assure initial comparability of the two classes, independent t-tests between Class 95-96 pre-intervention and Class 96-97 pre-intervention scores were performed for each of the three leadership categories of the TLP. Results showed no significant difference between the two classes' transactional behavior scores ($p = .521$) (Table 1) or transformational behavior scores ($p = .118$) (Table 2). However, the Class 95-96 pre-intervention transformational characteristics score was significantly higher than that of Class 96-97 (Table 3). This result may reflect changes in the overall Air Force culture between two points in time. Or, it may reflect perceived differences in ACSC culture as manifested in the OCAQ analysis discussed later in the Synthesis section. In any case, further analyses of data within each group and between the two groups showed effects that could not reasonably be attributed to the confounding effect of the initial difference in TLP transformational characteristics scores.

ACSC Class 95-96 Pre-intervention Compared with Post-intervention

Hypothesis One proposed that there would be significant increases in TLP scores after the training intervention. Paired t-tests of Class 95-96 showed significant increases in all three TLP categories. Further, each of the ten TLP scales, showed a significant increase except for Scale 8 (Follower-Centered Leadership) (Table 4).

Table 1
Class 95-96 Pre-intervention to Class 96-97 Pre-intervention, Transactional Behavior

<table>
<thead>
<tr>
<th>Group</th>
<th>N</th>
<th>Mean</th>
<th>Standard Deviation</th>
</tr>
</thead>
<tbody>
<tr>
<td>ACSC Class 95-96 Pre-intervention</td>
<td>433</td>
<td>40.670</td>
<td>4.827</td>
</tr>
<tr>
<td>ACSC Class 96-97 Pre-intervention</td>
<td>277</td>
<td>40.336</td>
<td>7.747</td>
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<table>
<thead>
<tr>
<th>Variance</th>
<th>t</th>
<th>df</th>
<th>p</th>
<th>Difference in Means</th>
<th>95% CI</th>
</tr>
</thead>
<tbody>
<tr>
<td>Separate</td>
<td>0.642</td>
<td>413.8</td>
<td>0.521</td>
<td>0.334</td>
<td>-0.688 to 1.356</td>
</tr>
<tr>
<td>Pooled</td>
<td>0.708</td>
<td>708</td>
<td>0.479</td>
<td>0.334</td>
<td>-0.592 to 1.260</td>
</tr>
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</table>

Table 2
Class 95-96 Pre-intervention to Class 96-97 Pre-intervention, Transformational Behavior

<table>
<thead>
<tr>
<th>Group</th>
<th>N</th>
<th>Mean</th>
<th>Standard Deviation</th>
</tr>
</thead>
<tbody>
<tr>
<td>ACSC Class 95-96 Pre-intervention</td>
<td>433</td>
<td>82.938</td>
<td>8.003</td>
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<tr>
<td>ACSC Class 96-97 Pre-intervention</td>
<td>275</td>
<td>81.804</td>
<td>10.189</td>
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<th>Variance</th>
<th>t</th>
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<th>Difference in Means</th>
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<tr>
<td>Separate</td>
<td>1.564</td>
<td>483.7</td>
<td>0.118</td>
<td>1.134</td>
<td>-0.290 to 2.558</td>
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<tr>
<td>Pooled</td>
<td>1.650</td>
<td>706</td>
<td>0.099</td>
<td>1.134</td>
<td>-0.216 to 2.484</td>
</tr>
</tbody>
</table>

Table 3
Class 95-96 Pre-intervention to Class 96-97 Pre-intervention, Transformational Characteristics

<table>
<thead>
<tr>
<th>Group</th>
<th>N</th>
<th>Mean</th>
<th>Standard Deviation</th>
</tr>
</thead>
<tbody>
<tr>
<td>ACSC Class 95-96 Pre-intervention</td>
<td>433</td>
<td>75.388</td>
<td>7.201</td>
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<td>ACSC Class 96-97 Pre-intervention</td>
<td>275</td>
<td>74.004</td>
<td>7.267</td>
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<th>Variance</th>
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<th>df</th>
<th>p</th>
<th>Difference in Means</th>
<th>95% CI</th>
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<tbody>
<tr>
<td>Separate</td>
<td>2.479</td>
<td>579.3</td>
<td>0.013**</td>
<td>1.384</td>
<td>0.288 to 2.481</td>
</tr>
<tr>
<td>Pooled</td>
<td>2.484</td>
<td>706</td>
<td>0.013**</td>
<td>1.384</td>
<td>0.290 to 2.478</td>
</tr>
</tbody>
</table>

* Significant at the .01 level  ** Significant at the .05 level
Table 4
Pre-intervention and Post-intervention TLP Scores for Class 95-96

<table>
<thead>
<tr>
<th>Scale</th>
<th>N</th>
<th>Mean Pre</th>
<th>Mean Post</th>
<th>Mean Diff</th>
<th>SD Diff</th>
<th>df</th>
<th>t</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td>1: Capable Management</td>
<td>282</td>
<td>20.223</td>
<td>20.652</td>
<td>-0.429</td>
<td>2.658</td>
<td>281</td>
<td>-2.711</td>
<td>0.007*</td>
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<tr>
<td>2: Reward Equity</td>
<td>282</td>
<td>20.206</td>
<td>20.645</td>
<td>-0.440</td>
<td>2.545</td>
<td>281</td>
<td>-2.902</td>
<td>0.004*</td>
</tr>
<tr>
<td>3: Communication Leadership</td>
<td>282</td>
<td>19.390</td>
<td>19.745</td>
<td>-0.355</td>
<td>2.674</td>
<td>281</td>
<td>-2.227</td>
<td>0.027*</td>
</tr>
<tr>
<td>4: Credible Leadership</td>
<td>282</td>
<td>22.656</td>
<td>22.926</td>
<td>-0.270</td>
<td>2.295</td>
<td>281</td>
<td>-1.972</td>
<td>0.05**</td>
</tr>
<tr>
<td>5: Caring Leadership</td>
<td>282</td>
<td>20.727</td>
<td>21.025</td>
<td>-0.298</td>
<td>2.510</td>
<td>281</td>
<td>-1.993</td>
<td>0.047**</td>
</tr>
<tr>
<td>6: Creative Leadership</td>
<td>282</td>
<td>19.638</td>
<td>20.043</td>
<td>-0.401</td>
<td>2.692</td>
<td>281</td>
<td>-2.522</td>
<td>0.012**</td>
</tr>
<tr>
<td>7: Confident Leadership</td>
<td>282</td>
<td>20.259</td>
<td>20.564</td>
<td>-0.305</td>
<td>2.549</td>
<td>281</td>
<td>-2.009</td>
<td>0.045**</td>
</tr>
<tr>
<td>8: Follower-Centered Leadership</td>
<td>282</td>
<td>17.780</td>
<td>17.794</td>
<td>-0.014</td>
<td>2.634</td>
<td>281</td>
<td>-0.090</td>
<td>0.928</td>
</tr>
<tr>
<td>9: Visionary Leadership</td>
<td>282</td>
<td>17.429</td>
<td>18.053</td>
<td>-0.624</td>
<td>2.615</td>
<td>281</td>
<td>-4.007</td>
<td>0.000*</td>
</tr>
<tr>
<td>10: Principle-Centered Leadership</td>
<td>282</td>
<td>19.365</td>
<td>19.915</td>
<td>-0.550</td>
<td>2.634</td>
<td>281</td>
<td>-3.504</td>
<td>0.001*</td>
</tr>
<tr>
<td>Transactional Behavior</td>
<td>282</td>
<td>40.429</td>
<td>41.298</td>
<td>-0.869</td>
<td>4.668</td>
<td>281</td>
<td>-3.126</td>
<td>0.002*</td>
</tr>
<tr>
<td>Transformational Behavior</td>
<td>282</td>
<td>82.411</td>
<td>83.738</td>
<td>-1.326</td>
<td>8.111</td>
<td>281</td>
<td>-2.746</td>
<td>0.006*</td>
</tr>
<tr>
<td>Transformational Characteristics</td>
<td>282</td>
<td>74.833</td>
<td>76.326</td>
<td>-1.493</td>
<td>7.412</td>
<td>281</td>
<td>-3.382</td>
<td>0.001*</td>
</tr>
<tr>
<td>All Scales Combined</td>
<td>282</td>
<td>197.67</td>
<td>201.36</td>
<td>-3.688</td>
<td>18.115</td>
<td>281</td>
<td>-3.419</td>
<td>0.001*</td>
</tr>
</tbody>
</table>

* Significant at the .01 level  ** Significant at the .05 level

**Hypothesis Two**

Hypothesis Two predicted continuing significant increases in TLP scores in ACSC classes once the participants returned to the mainstream Air Force environment. It was tested using two comparisons: (1) a comparison of ACSC Class 94-95 one year after the intervention with ACSC Class 94-95 two years after the intervention, and (2) a comparison of ACSC Class 95-96 post-intervention compared with ACSC Class 95-96 one year after the intervention. The first comparison partially supported this hypothesis, while the second did not. ACSC Class 94-95 showed a significant increase in both transactional and transformational behavior scores but no significant difference in transformational characteristics (Table 5). ACSC Class 96-97 showed no significant increase in any category (Table 6). In fact, there was a significant decrease in transaction scores when their pre- and post-intervention transactional scores were compared.

ACSC Class 94-95 One Year Post-intervention Compared with ACSC Class 94-95 Two Years Post-intervention

Paired t-tests showed an increase in transactional behavior, but this change was not statistically significant (p=0.053). There was, however, a significant increase in transformational behavior (p<0.001). Transformational leadership characteristics did not change significantly (p=0.143). The transactional and transformational behavior increases are consistent with the increase delineated the discussion of Hypothesis One above, in which Class 96-97 also showed a significant increase in these categories during the same calendar period.
Table 5
One Year Post-intervention and Two Years Post-intervention TLP Scores for ACSC Class 94-95

<table>
<thead>
<tr>
<th>Scale</th>
<th>N</th>
<th>Mean 1Yr Post</th>
<th>Mean 2Yr Post</th>
<th>Mean Diff.</th>
<th>SD Dif</th>
<th>df</th>
<th>t</th>
<th>p&lt;</th>
</tr>
</thead>
<tbody>
<tr>
<td>1: Capable Management</td>
<td>155</td>
<td>20.187</td>
<td>20.369</td>
<td>-0.252</td>
<td>2.615</td>
<td>154</td>
<td>-1.198</td>
<td>0.233</td>
</tr>
<tr>
<td>2: Reward Equity</td>
<td>155</td>
<td>19.690</td>
<td>20.716</td>
<td>-0.503</td>
<td>2.707</td>
<td>154</td>
<td>-2.314</td>
<td>0.022**</td>
</tr>
<tr>
<td>3: Communication Leadership</td>
<td>155</td>
<td>19.265</td>
<td>22.716</td>
<td>-3.452</td>
<td>3.570</td>
<td>154</td>
<td>-12.038</td>
<td>0.000*</td>
</tr>
<tr>
<td>4: Credible Leadership</td>
<td>155</td>
<td>22.806</td>
<td>22.716</td>
<td>0.090</td>
<td>3.379</td>
<td>154</td>
<td>0.333</td>
<td>0.740</td>
</tr>
<tr>
<td>5: Caring Leadership</td>
<td>155</td>
<td>20.981</td>
<td>21.239</td>
<td>-0.290</td>
<td>2.916</td>
<td>154</td>
<td>-1.102</td>
<td>0.272</td>
</tr>
<tr>
<td>6: Creative Leadership</td>
<td>155</td>
<td>20.013</td>
<td>20.303</td>
<td>-0.290</td>
<td>2.805</td>
<td>154</td>
<td>-1.288</td>
<td>0.200</td>
</tr>
<tr>
<td>7: Confident Leadership</td>
<td>155</td>
<td>20.187</td>
<td>20.458</td>
<td>-0.271</td>
<td>2.818</td>
<td>154</td>
<td>-1.197</td>
<td>0.233</td>
</tr>
<tr>
<td>8: Follower-Centered Leadership</td>
<td>155</td>
<td>17.748</td>
<td>18.135</td>
<td>-0.387</td>
<td>2.686</td>
<td>154</td>
<td>-1.794</td>
<td>0.075</td>
</tr>
<tr>
<td>9: Visionary Leadership</td>
<td>155</td>
<td>17.381</td>
<td>17.710</td>
<td>-0.129</td>
<td>2.583</td>
<td>154</td>
<td>-0.622</td>
<td>0.535</td>
</tr>
<tr>
<td>10: Principle-Centered Leadership</td>
<td>155</td>
<td>19.832</td>
<td>19.981</td>
<td>-0.148</td>
<td>2.588</td>
<td>154</td>
<td>-0.714</td>
<td>0.476</td>
</tr>
<tr>
<td>Transactional Behavior</td>
<td>155</td>
<td>39.877</td>
<td>40.632</td>
<td>-0.755</td>
<td>4.817</td>
<td>154</td>
<td>-1.951</td>
<td>0.053</td>
</tr>
<tr>
<td>Transformational Behavior</td>
<td>155</td>
<td>83.065</td>
<td>87.168</td>
<td>-4.103</td>
<td>8.495</td>
<td>154</td>
<td>-6.013</td>
<td>0.000*</td>
</tr>
<tr>
<td>Characteristics</td>
<td>155</td>
<td>75.348</td>
<td>76.284</td>
<td>-0.935</td>
<td>7.913</td>
<td>154</td>
<td>-1.472</td>
<td>0.143</td>
</tr>
<tr>
<td>All Scales Combined</td>
<td>155</td>
<td>198.290</td>
<td>204.084</td>
<td>-5.794</td>
<td>19.175</td>
<td>154</td>
<td>-3.762</td>
<td>0.000*</td>
</tr>
</tbody>
</table>

* Significant at the .01 level  ** Significant at the .05 level

ACSC Class 95-96 Post-intervention compared with ACSC Class 95-96 One-Year Post-intervention
Paired t-tests for these classes show no significant difference in transactional behavior, transformational behavior, or transformational characteristics scores at training's end compared with scores obtained one year after.

Table 6
Post-intervention and One Year Post-intervention TLP Scores for ACSC Class 95-96

<table>
<thead>
<tr>
<th>Scale</th>
<th>N</th>
<th>Mean 1Yr Post</th>
<th>Mean 2Yr Post</th>
<th>Mean Diff.</th>
<th>SD Dif</th>
<th>df</th>
<th>t</th>
<th>p&lt;</th>
</tr>
</thead>
<tbody>
<tr>
<td>1: Capable Management</td>
<td>116</td>
<td>20.509</td>
<td>20.995</td>
<td>0.414</td>
<td>3.268</td>
<td>115</td>
<td>1.364</td>
<td>0.175</td>
</tr>
<tr>
<td>2: Reward Equity</td>
<td>116</td>
<td>20.448</td>
<td>19.940</td>
<td>0.509</td>
<td>2.824</td>
<td>115</td>
<td>1.940</td>
<td>0.055</td>
</tr>
<tr>
<td>3: Communication Leadership</td>
<td>116</td>
<td>19.672</td>
<td>20.724</td>
<td>-1.052</td>
<td>10.038</td>
<td>115</td>
<td>-1.128</td>
<td>0.261</td>
</tr>
<tr>
<td>4: Credible Leadership</td>
<td>116</td>
<td>23.043</td>
<td>22.914</td>
<td>0.129</td>
<td>2.390</td>
<td>115</td>
<td>0.583</td>
<td>0.561</td>
</tr>
<tr>
<td>5: Caring Leadership</td>
<td>116</td>
<td>20.871</td>
<td>20.741</td>
<td>0.129</td>
<td>2.839</td>
<td>115</td>
<td>0.491</td>
<td>0.625</td>
</tr>
<tr>
<td>6: Creative Leadership</td>
<td>116</td>
<td>19.750</td>
<td>20.060</td>
<td>-0.310</td>
<td>2.774</td>
<td>115</td>
<td>-1.205</td>
<td>0.231</td>
</tr>
<tr>
<td>7: Confident Leadership</td>
<td>116</td>
<td>20.661</td>
<td>26.543</td>
<td>0.147</td>
<td>2.687</td>
<td>115</td>
<td>0.587</td>
<td>0.558</td>
</tr>
<tr>
<td>8: Follower-Centered Leadership</td>
<td>116</td>
<td>18.009</td>
<td>18.207</td>
<td>-0.198</td>
<td>2.231</td>
<td>115</td>
<td>-0.957</td>
<td>0.340</td>
</tr>
</tbody>
</table>
Very little can be said about this class with respect to Hypothesis Two beyond the fact that Class 95-96 showed absolutely no change in group means or paired results of TLP scores between ACSC completion and one year out. Thus, attending ACSC had no long-term impact on these respondents.

**Hypothesis Three**

Hypothesis Three testing required comparing TLP scores between classes after training, under the assumption that the training would produce equivalent post-training changes. It was predicted that the improvement in post-intervention TLP scores would be the same for all classes. While all should improve, there should not be dramatic differences because both classes were selected the same way and went through the same program.

**ACSC Class 94-95 One-Year Post-intervention Compared with ACSC Class 95-96 One-Year Post-intervention**

This two-sample comparison supported the hypothesis. No significant differences appeared in comparing one class to another one year following the intervention. Therefore the results indicate equivalence between these two classes (Tables 7-9).

**Table 7**

Class 94-95 One Year Post-intervention to Class 95-96 One Year Post-intervention, Transactional Behavior

<table>
<thead>
<tr>
<th>Group</th>
<th>N</th>
<th>Mean</th>
<th>Standard Deviation</th>
</tr>
</thead>
<tbody>
<tr>
<td>Class 94-95 One Year Post-intervention</td>
<td>187</td>
<td>40.059</td>
<td>4.398</td>
</tr>
<tr>
<td>Class 95-96 One Year Post-intervention</td>
<td>154</td>
<td>40.442</td>
<td>5.136</td>
</tr>
<tr>
<td>Variance</td>
<td></td>
<td></td>
<td>Difference in Means</td>
</tr>
<tr>
<td>Separate</td>
<td>-0.730</td>
<td>302.8</td>
<td>-0.383</td>
</tr>
<tr>
<td>Pooled</td>
<td>0.741</td>
<td>339</td>
<td>-0.383</td>
</tr>
</tbody>
</table>

**Table 8**

Class 94-95 One Year Post-intervention to Class 95-96 One Year Post-intervention, Transformational Behavior

<table>
<thead>
<tr>
<th>Group</th>
<th>N</th>
<th>Mean</th>
<th>Standard Deviation</th>
</tr>
</thead>
<tbody>
<tr>
<td>Class 94-95 One Year Post-intervention</td>
<td>187</td>
<td>83.273</td>
<td>7.658</td>
</tr>
<tr>
<td>Class 95-96 One Year Post-intervention</td>
<td>154</td>
<td>84.468</td>
<td>11.677</td>
</tr>
<tr>
<td>Variance</td>
<td></td>
<td></td>
<td>Difference in Means</td>
</tr>
<tr>
<td>Separate</td>
<td>-1.091</td>
<td>254.3</td>
<td>-1.195</td>
</tr>
<tr>
<td>Pooled</td>
<td>-1.134</td>
<td>339</td>
<td>-1.195</td>
</tr>
</tbody>
</table>

**Table 9**

Class 94-95 One Year Post-intervention to Class 95-96 One Year Post-intervention, Transformational Characteristics

<table>
<thead>
<tr>
<th>Group</th>
<th>N</th>
<th>Mean</th>
<th>Standard Deviation</th>
</tr>
</thead>
</table>
ACSC Class 95-96 Post-intervention Compared with ACSC Class 96-97 Post-intervention

Comparisons of these two classes fully supported the hypothesis. There was no significant difference between the classes' transformational behavior, transformational behavior, and transformational characteristics group mean scores. It is reasonable to conclude that the two classes are equivalent (Tables 10-12).

Table 10

Class 95-96 Post-intervention to Class 96-97 Post-intervention, Transactional Behavior

<table>
<thead>
<tr>
<th>Group</th>
<th>N</th>
<th>Mean</th>
<th>Standard Deviation</th>
</tr>
</thead>
<tbody>
<tr>
<td>Class 95-96 Post-intervention</td>
<td>282</td>
<td>41.298</td>
<td>5.034</td>
</tr>
<tr>
<td>Class 96-97 Post-intervention</td>
<td>419</td>
<td>41.852</td>
<td>4.350</td>
</tr>
<tr>
<td>Variance</td>
<td>t</td>
<td>df</td>
<td>p&lt;</td>
</tr>
<tr>
<td>Separate</td>
<td>-1.508</td>
<td>542.4</td>
<td>0.132</td>
</tr>
<tr>
<td>Pooled</td>
<td>-1.551</td>
<td>699</td>
<td>0.121</td>
</tr>
</tbody>
</table>

Table 11

Class 95-96 Post-intervention to Class 96-97 Post-intervention, Transformational Behavior

<table>
<thead>
<tr>
<th>Group</th>
<th>N</th>
<th>Mean</th>
<th>Standard Deviation</th>
</tr>
</thead>
<tbody>
<tr>
<td>Class 95-96 Post-intervention</td>
<td>282</td>
<td>83.738</td>
<td>8.730</td>
</tr>
<tr>
<td>Class 96-97 Post-intervention</td>
<td>419</td>
<td>84.279</td>
<td>9.249</td>
</tr>
<tr>
<td>Variance</td>
<td>t</td>
<td>df</td>
<td>p&lt;</td>
</tr>
<tr>
<td>Separate</td>
<td>-0.786</td>
<td>625.8</td>
<td>0.432</td>
</tr>
<tr>
<td>Pooled</td>
<td>-0.778</td>
<td>699</td>
<td>0.437</td>
</tr>
</tbody>
</table>

Table 12

Class 95-96 Post-intervention to Class 96-97 Post-intervention, Transformational Characteristics

<table>
<thead>
<tr>
<th>Group</th>
<th>N</th>
<th>Mean</th>
<th>Standard Deviation</th>
</tr>
</thead>
<tbody>
<tr>
<td>Class 95-96 Post-intervention</td>
<td>282</td>
<td>76.326</td>
<td>7.870</td>
</tr>
<tr>
<td>Class 96-97 Post-intervention</td>
<td>420</td>
<td>76.643</td>
<td>13.244</td>
</tr>
<tr>
<td>Variance</td>
<td>t</td>
<td>df</td>
<td>p&lt;</td>
</tr>
<tr>
<td>Separate</td>
<td>-0.397</td>
<td>690.7</td>
<td>0.692</td>
</tr>
<tr>
<td>Pooled</td>
<td>-0.361</td>
<td>700</td>
<td>0.718</td>
</tr>
</tbody>
</table>

* Significant at the .01 level  ** Significant at the .05 level

Synthesis Discussion

- Hypothesis One was supported. ACSC Class 95-96 pre-intervention compared with post-intervention as well as ACSC Class 96-97 pre-intervention compared with post-intervention showed an increase in both transactional and transformational TLP scores. Simple alpha change was evident in that both classes were responding to the curriculum.
- Hypothesis Two was partially supported. ACSC Class 94-95 one-year post-intervention compared with two years post-intervention showed a significant increase for transformational behavior scores but not for
transactional behavior or transformational characteristics scores. ACSC Class 95-96 post-intervention compared with one year post-intervention showed no increase in scores. ACSC Class 94-95 possibly showed beta change while ACSC Class 95-96 showed simple alpha change. These findings are consistent with Sashkin’s assertion (1995, 1996a, 1996d, 1996e, 1996f) that transformational leaders build cultures that effect change in the participants over time. Further, exposure to both the transformational leader and curriculum results in continued individual improvement after the intervention, while exposure to the transformational curriculum alone may not.

- Hypothesis Three was fully supported. There was no significant difference between ACSC Class 94-95 one-year post-intervention and Class 95-96 one-year post-intervention or between ACSC Class 95-96 post-intervention and Class 96-97 post-intervention. One-fourth of the Class 94-95 respondents made unsolicited comments reflecting positively on their experience and leadership learning. This supports the suggestion in Hypothesis Two, that exposure to both the transformational leader and curriculum resulted in continued individual improvement after the intervention, while exposure to the curriculum alone did not.

- The Control test for equivalence was not supported. ACSC Class 95-96 OCAQ scores were significantly different from ACSC Class 96-97; however, demographic analysis showed no significant difference between samples. Findings are congruent with speculation that a shift in commandants over the period of the study had an impact on the respondents’ view of their environment. Findings support Hypotheses Two and Three conclusions that transformational leaders build cultures that enable followers to continue their development as leaders even after followers are no longer exposed to the transformational leader. Thus, exposure to both the transformational leader and the training curriculum resulted in continued improvement after the intervention, while those exposed to the curriculum alone showed no such subsequent improvement.

Conclusion

This study explored the question “Does training make a difference?” using Sashkin’s Visionary Leadership Theory as applied to a certificated military leadership school, Air Command and Staff College. Using a recurrent institutional cycle design, we examined three classes over a three-year period to determine the effect of a transformational educational intervention immediately after the intervention and one and two years later. While it was not within the parameters of this study to determine whether group changes were caused by the original architect and transformational leader of the program, findings of this longitudinal study provide some support to Sashkin’s Visionary Leadership Theory. That is, the results show that a leadership development curriculum based on transformational leadership can, in all likelihood, result in significant increases in leadership assessment scores after the training intervention. Moreover, these findings suggest that exposure to the transformational leader as well as to an organizational culture and a training curriculum supportive of and focused on transformational leadership results in continued increases in assessed leadership scores, measured one and two years after the intervention, while exposure to the transformational curriculum and culture alone do not appear to produce such continuing effects.

The study has two main limitations: self-report data and generalizability. The former is in large degree counterbalanced by the longitudinal design, and future research may answer for the latter. Of greater importance is the value of these findings to HRD. The study provides support for Sashkin’s Visionary Leadership Theory by linking it to a training intervention. It strengthens Sashkin’s position that the presence and participation of the visionary leader is important by showing what happens to respondents when the visionary leader is absent but the intervention (i.e. curriculum) is the same. Finally it provides support for the use of Golembiewski, et. al., (1976) alpha, beta, gamma change evaluation model in a leadership training program. One of the fundamental tenets of HRD is to generate training that produces positive change. This study clearly demonstrates that it is possible to produce such change in a significant area of interest to HRD: namely leadership.

References


Leadership Development: A Review of the Theory and Literature

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<tr>
<th>Contact person</th>
<th>Darren Short</th>
</tr>
</thead>
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| Key word 3 | Meaning perspectives |

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