

Top Managers' Generational Membership and Strategic Decision-Making

Chris Papenhausen

University of Massachusetts, Dartmouth

Generational theory asserts that people sort themselves into different generations because of their differing reactions to major events in history. This paper argues that generational theory could aid strategic decision-making research and should find a use in such research. The paper also offers propositions on how the generational membership of firms' top managers influences strategic decision-making.

When faced with complex and ambiguous strategic decisions, managers make these decisions behaviorally rather than optimally (Cyert & March, 1963; March & Simon, 1958). Their choices will be influenced by cognitive limitations and biases that can vary from strategist to strategist, which often arise as a result of top managers' individual experiences and psychological characteristics (Finkelstein & Hambrick, 1996). The focus of this paper is on one such set of experiences: those that vary from individual to individual due to managers experiencing particular events during different phases of life. These experiences form a generational peer personality that will influence an individual's actions throughout the remainder of his or her life (Strauss & Howe, 1991). This paper argues that membership in a generation (sharing a location in a range of birth years) is an important element of top managers' orientation and therefore will substantially influence their firms' strategic decisions.

In their seminal paper, Hambrick and Mason (1984) initiated an "upper echelons perspective," proposing that the cognitions of top executives influence firms' strategic choices. Since this paper's publication two decades ago, top management teams and their influence on corporate behavior and performance have been the subject of many studies that define top management teams as the group of the three to ten executives

(including the Chief Executive Officer) at the top of the organization (Finkelstein & Hambrick, 1996). These studies consistently find that top management teams either reflect some important processes within the firm or influence important corporate behaviors and outcomes. Finkelstein and Hambrick (1996) further assert that a top manager's orientation falls into two major classes: (1) psychological properties, such as values, cognitive models and other elements of personality and (2) observable dimensions of experience, including age, functional background, company tenure and formal education. The current paper introduces the concept of top managers' generational membership, which could be considered both an observable dimension and a personality characteristic.

Literature Review

The Influence of Personality Characteristics on Strategic Decision-Making

Psychological properties such as personality traits have been previously shown to influence strategic decisions and firm performance. A trait or disposition is the tendency of an individual to behave in a consistent manner in many different situations (Brody & Erlichman, 1998), while personality is the constellation of stable but unique traits that characterizes a person independently of the situation (Weiten, 1998). Finkelstein and Hambrick (1996, p. 45) assert that psychological properties, for example, personality traits, "provide a basis on which the executive filters and interprets stimuli, and they dispose the executive toward certain choices." These personality traits should be especially influential on strategic decision-making. Mintzberg, Raisinghani and Theoret (1976, p. 250) describe strategic decision processes as characterized by "novelty, complexity, and open-endedness, by the fact that the organization usually begins with little understanding of the decision situation it faces or the route to its solution, and only a vague idea of what that solution might be and how it will be evaluated when it is developed." Such decisions give few signposts to behavior and the resulting ambiguity leads to a search for more environmental cues. As House, Shane and Herold (1996, p. 344) argue, "When the situation no longer provides the clarity of cues to guide behavior, information-seeking, or sense-making activities, will increase. Who will seek what, from whom, how they will process the information, and how they will react to the uncertainty will be subject to the operation of individual differences. Greater uncertainty and ambiguity in situations will increase attempts at sense making, which are influenced by individual differences."

Only a handful of published studies have examined managerial personality characteristics and their influence on strategic decision-making. For example, Miller, Kets de Vries, and Toulouse (1982) find that firms led by CEOs with internal loci of control undertook more product-market innovation and greater risks. In addition, Gupta and Govindarajan (1984) studied the effects of strategic business unit (SBU) general managers' willingness to take risks and tolerance for ambiguity. The authors discovered that these personality characteristics contribute to effectiveness in "build" SBUs but reduced it in "harvest" SBUs. Hayward and Hambrick (1997) find that CEO hubris is positively associated with overpaying for large acquisitions. Papenhausen

(2006) presents evidence that top managers' dispositional optimism has a positive influence on problem recognition and problem solving actions but negatively influences firm performance. Miller and Droge (1986) show that CEOs' need for achievement is related to organizational structure, especially in samples of small and young firms, while Wally and Baum (1994) determine that CEOs' tolerance for risk is positively associated with speedy organizational decisions. Malmendier and Tate (2005) find that the investment decisions of overconfident CEOs are more responsive to available cash flow. Finally, Simon and Houghton (2003) present evidence that overconfidence in executives predicts the extent to which product launches were pioneering (risky).

The Influence of Observable Dimensions on Strategic Decision-Making

At the same time, the observable dimensions of an individual's experiences, (age, functional background, company tenure, and formal education), also have important effects on managerial behavior and firm strategic decision-making (Finkelstein & Hambrick, 1996). A large number of studies focus on top management team demographics (Finkelstein & Hambrick, 1996; Norburn & Birley, 1988; Wiersema & Bantel, 1992). While these studies show that demographic variables influence strategic decision-making, Finkelstein and Hambrick (1996) argue that the actual operative mechanisms behind these observable dimensions and robust, interesting relationships remain a "black box." On the other hand, researchers often prefer demographic variables to psychological constructs because they are easier to obtain and measure (Pfeffer, 1983). In addition, top managers' experiences often strongly affect the strategic decisions they make. For example, Cyert and March (1963) and Dearborn and Simon (1958) identify managerial individual differences, such as functional background, as influencing firm decision-making and performance. These two studies illustrate Finkelstein and Hambrick's (1996) argument that demographic or background factors, reflective of an executive's experiences, will be associated with strategic choices; therefore, both classes of top managers' orientation should continue to be valuable to researchers.

The Influence of Generational Membership

The current paper concerns the effects of one specific observable characteristic: generational membership. The effects of top managers' generational membership have not been studied; however, a related construct, age, has received some attention from strategy scholars. To date, the primary finding in this line of research suggests that the higher the age of top managers, the greater the resistance to change or innovation. Bantel and Jackson (1989) found that age of top managers and firm innovation were negatively related. Similarly, Hitt and Tyler (1991) reported that top managers' age was positively related to conservatism in firm decisions. Wiersema and Bantel (1992) also showed that the average age of a top management team was negatively related to corporate strategic change. The current paper argues that age as a marker of generational membership is a distinct construct from age itself.

Psychology researchers are now beginning to examine an important aspect of generational personality: birth cohort personality. Prior research has established that

personality characteristics are determined by both genetics and environment. For example, several studies (c.f., Bouchard & Loehlin, 2001; Jang, Livesly, & Vernon, 1996; Loehlin & Nichols, 1976) demonstrate that approximately 50 percent of the variance in personality is determined by genetic factors, with approximately 50 percent due to non-genetic factors. The source of these non-genetic factors is unclear. Most studies on environmental effects have focused on the shared family environment, showing that this environment accounts for surprisingly little of the variance in personality (Twenge, 2000). Researchers have generally ignored the potential effects of environmental influences outside the family, including the larger socio-cultural environment on personality. Even though several studies indicate differences in personality across countries and regions, few researchers have explored how personality is affected by environmental changes over time (Twenge, 2000). As Twenge (2000, p.1008) notes, more work in this area might resolve a paradox in personality research: “Longitudinal studies have often found remarkable consistency in personality traits as people age, whereas cross-sectional studies purporting to measure age difference have often found large effects”. She finds in her study of trait anxiety that Americans have shifted toward higher levels of anxiety and neuroticism during the last four decades. Twenge (2000, p. 1007) concludes “birth cohort, as a proxy for broad social trends, may be an important influence on personality development, especially during childhood”.

Despite widespread use in the popular culture particularly by marketing and polling experts, the concept of generations has been largely ignored by academics. Further, as Strauss and Howe (1991) argue, those few academic authors who discussed generations, e.g. Comte (1838) and Mannheim (1928), have not addressed key explanatory questions: how generations arise, why they change personality at any particular cohort boundary, and why they have a particular length.

Very little extant research has been done on the generational effects on managers and organizations. The primary sources of generational theory, such as Strauss and Howe (1991), do not focus on management of organizations. In the only study published in an academic journal that directly tests Strauss and Howe's theory, Krein (2003) finds evidence for generational voting patterns in the 19th century British House of Commons. Interestingly, several books in the popular press describe differences between the generational styles of employees in the workplace and the appropriate managing techniques for each. Management academic literature, on the other hand, lacks studies explicitly testing generational theory. The few studies found in the literature have tested variants of generational theory with mixed results. Halliman (1998) found that organizations with Baby Boomer CEOs had no differences in performance from organizations with CEOs from other generations. Jurkiewicz (2000) and Jurkiewicz and Bradley (2002) found more similarity than differences in values between employees from different generations, but they did not test using Strauss and Howe's generational boundaries or their generational peer personality characteristics. Two studies that do incorporate some portions of Strauss and Howe's theories are Jeffries and Hunte's (2003) development of a model of motivation based, in part, on generational differences, and Egri and Ralston's (2004) finding of an age-related pattern to the value orientations of managers and professionals of U.S.

generations. They have also been able to extend this pattern to Chinese generations and their value orientations, which may mean that generational memberships cross geographical, cultural, and language borders. We can clearly see that research has only begun to explore generational effects.

The remainder of the paper consists of three sections. In the next section, the basic tenets of generational theory are described. Several propositions arising from an application of generational theory to strategic decision-making are then laid out. Finally, the paper concludes with a rationale for undertaking a research program into a generational theory of strategic decision-making.

Generational Theory

As Strauss and Howe (1991) note, at the beginning of recorded history the generation was the standard measure of cosmic time in nearly all Indo-European cultures. The meaning of generations historically is ambiguous and frequently incorporates the concept of family generation: i.e., the set of all children “brought into being” by a father or mother (Strauss & Howe, 1991). The definition of generation used in this paper, in contrast, refers to a more specific concept: the cohort generation, a cohort-group that shares an age location in history and therefore a common peer personality (Strauss & Howe, 1991). The cohort generation “has no direct connection with genealogy or lineage. It is defined, instead, as everyone who is ‘brought into being’ at the same historical moment” (Strauss & Howe, 1991, p.436). Throughout this paper the term generation is used to mean “a cohort-group whose length approximates the span of a phase of life and whose boundaries are fixed by peer personality” (Strauss & Howe, 1991, p.34). It should be noted that generation is used as a group construct and not an individual construct like age.

Strauss and Howe (1991) offer the first comprehensive theory to explain generations, relying on a cyclical theory of history and generations to develop their theory. The authors make two assumptions: generational cohorts’ social behavior is governed by a well-defined, relatively unchanging lifecycle; and the lifecycle includes four basic life phases, each based on a multiple of the span between birth and coming of age:

- Elders (age 66-87). Central role: stewardship (supervising, mentoring, channeling endowments, passing on values).
- Midlife Adults (age 44-65). Central role: leadership (parenting, teaching, directing institutions, using values).
- Rising Adults (age 22-43). Central role: activity (working, starting families and livelihoods, serving institutions, testing values).
- Youth (age 0-21). Central role: dependence (growing, learning, accepting protection and nurture, avoiding harm, acquiring values).

Next, the authors imagine a sudden shock or what they term a “social moment”—for example, a major war or revolution. Here they make a third assumption: Any social moment affects an individual’s personality differently according to his or her

current phase of life. An example of this might be a war where youths attempt to keep out of the way, while rising adults arm to meet the challenge, mid-lifers organize the troops, and elders establish the purpose of the war. As Strauss and Howe (1991, p. 441) explain, “The stress of responding to the social moment leaves a different emotional imprint and memory with each group according to the role it is called upon to play. These differences, furthermore, are reinforced by the social interaction with each group....[W]ith this social moment, four adjacent cohort-groups separately coalesce into generations, each with a distinct peer personality....[T]he length of these generations depends on the length of the phases of life, assumed here to be twenty-two years.”

Until now Strauss and Howe (1991) have explained how generations form but not their cyclical nature. To do that, they make two additional assumptions. The first alleges that “A social moment not only shapes personality according to current phase-of-life roles, but also forges an enduring bond of identity between each cohort-group and its role—an acquired style that redefines both how each group will later regard itself and how it will later be regarded by others.” The second notes “A central role acquired during a social moment can extend into the next life phase—but not into the life phase after that” (Strauss & Howe, 1991, p. 444).

To carry this a step farther, the generation in the rising adulthood phase during a social moment carries with it a dominant social role into midlife. However, once this dominant generation reaches adulthood, a new generation in rising adulthood triggers a new social moment and wrests dominance away from the earlier generation. To this end, history creates generations and generations create history, thus creating a two-stroke rhythm. Strauss and Howe (1991, p. 447) claim four generational archetypes repeat sequentially and here they make one final assumption: “During a new social moment, each generation will redefine the central role of the phase of life it is entering in a direction that reverses the perceived excesses of that role since the last social moment.”

The result is a recurring generational fixed order:

1. A dominant, inner-fixated IDEALIST GENERATION grows up as increasingly indulged youths after a secular crisis; comes of age inspiring a spiritual awakening; fragments into narcissistic rising adults; cultivates principle as moralistic mid-lifers; and emerges as visionary elders guiding the next secular crisis.
2. A recessive REACTIVE GENERATION grows up as under-protected, criticized youths during a spiritual awakening; matures into risk-taking, alienated rising adults; mellows into pragmatic midlife leaders during a secular crisis; and maintains respect (but less influence) as reclusive elders.
3. A dominant, outer-fixated CIVIC GENERATION grows up as increasingly protected youths after a spiritual awakening; comes of age overcoming a secular crisis; unites into a heroic and achieving cadre of rising adults; sustains that image while building institutions as powerful mid-lifers; and emerges as busy elders attacked by the next spiritual awakening.
4. A recessive ADAPTIVE GENERATION grows up as overprotected, suffocated youths during a secular crisis; matures into risk-averse, conformist rising adults; produces indecisive midlife arbitrator-leaders during a spiritual awakening; and

maintains influence (but less respect) as sensitive elders.

In today's generational constellation we find the following:

1. Baby Boomers (born 1943-1960) as IDEALISTS
2. Generation X (born 1961-1981) as REACTIVES
3. GIs (born 1901-1924) as CIVICS
4. Silent Generation (born 1925-1942) as ADAPTIVES

The theory does have limitations. First, the generational peer personality does not apply to each member of a generation. There exists what Strauss and Howe call "suppressed" members of each generation who do not share the primary peer personality of a generation. The authors surmise that their theory describes personality only to the extent that it applies to an entire generational cohort and not to any individual specifically. In addition, cusps appear around the borders of each generation often manifesting characteristics of both generations, making each fuzzy.

Theory And Propositions

Materialism vs. Idealism

Strauss and Howe (1991) identify the Boomer generation as relatively idealistic, and GI and Xer generations as more materialistic, reflecting the cyclical nature of the material/idealistic dimension identified as a key feature in their descriptions of generations. GIs view progress as the improvement of the material well being of society. Boomers, on the other hand, see inner beliefs and values as paramount. In society today, we see Boomers driving the emphasis on values and culture, as opposed to their GI parents, who elevated material projects and building institutions over inner-driven beliefs. We observe this in business as well, seeing Boomer managers emphasize values, corporate cultures, ethics, morals, principles and standards in their communications.

Other examples of Boomers' emphases are the increasing use of terms such as corporate ethics, strong corporate cultures, and the moral basis of corporations. The emphasis on these terms by Boomers does not equate to agreement on what these terms mean among this group (or imply that any one generation necessarily acts more ethically than another), but instead points to the importance of the topics themselves.

This idealistic emphasis shows most clearly in strategic decision-making as Boomers focus on vision statements, guiding principles and core values' statements, and radical changes in products and services. They also largely drove the radical revolution in information and communications technologies of the 1980s and 1990s. Xers also participated, but their involvement was more opportunistic and less determined by vision and idealism.

In contrast, GIs place more emphasis on building institutions and accomplishing great material projects. By designing and building the interstate highway system during the 1950s and 1960s or launching the War on Poverty during the 1960s, GIs transformed corporate aims towards civic progress. They take great pride in their ability to solve problems on a large scale through civic-oriented material progress. GIs were largely responsible for the deployment of the mass market economy of the 1950s and 1960s that provided middle class access to automobiles, household appliances, and comfortable housing. GIs were more likely to use long-term strategic planning as

a tool, as opposed to Boomers who focused on the principle of “creative destruction” and the accompanying radical shifts in technologies and processes. This leads to the first proposition:

Proposition 1: Boomer top managers are more idealistic and less materialistic than either GI or Xer top managers.

Process-orientation vs. Results-orientation

A second difference between generations is the contrasting emphases on process and results. The Silent generation is the most process-oriented, needing to ensure that order is kept through a fair, sensitive, but strict process. Xers, on the other hand, see outcomes as more important. At the same time, they value creative, sometimes unconventional, methods to secure those outcomes. Silents emphasize hierarchy, proper channels of reporting, standard operating procedures, and routines. These processes are often inclusive and fair, but they can also be rigidly enforced. Xers, in contrast, see the process as less important than desired outcomes. They focus more on goals and objectives and, when necessary, use non-standard methods to obtain these outcomes. Since Xers often see formal regulations as barriers to accomplishing tasks, they can be impatient with traditional roles for managers. For example, outcome-based philosophies such as Management by Objectives and The Balanced Scorecard Approach (Kaplan and Norton, 1996) may be more attractive to Xer managers, while Silent managers prefer to develop and use formal channels of decision-making. These arguments lead to the second proposition:

Proposition 2: Top managers from the Silent generation are the most process-oriented, while top managers from the Xer generation are the most outcome-oriented.

Risk/Entrepreneurialism vs. Risk Aversion

The Xer generation, especially during their young adult years, tend to exhibit greater risk-taking in organizations than does the Silent generation. In consequence, the Xer generation is apt to be more entrepreneurial, while Silents find it easier to adapt to traditional organizational roles. We can see that such differences are often a result of their situations when generations come of age. Silents conform to society's roles, believing that credentialing and professionalization are the paths to success. They put a great deal of emphasis on expertise and are more likely to become technocrats who tinker around the edges rather than radically transforming their roles and organizations. Xers came of age in a more fragmented society and have little trouble seeing opportunities in the innovative and novel. They adapt well to their role as survivors and will do what it takes to survive even if the assignment requires great risk. Many of today's high tech entrepreneurs, Michael Dell, for instance, exemplify the lottery-type mentality of Generation X. This leads to the third proposition:

Proposition 3: Top managers from the Xer generation will be more risk-taking than top managers from the Silent generation.

Rationality vs. Nonrationality

As strategic thinkers, GI top managers rely more on rationality than do Boomer top managers. GIs rationalize systems, procedures, structures and roles, while Boomers prefer to rely on intuition, feelings, and other inner beliefs. We might say that Boomers tend to tear down rational systems, bureaucracy, structures and institutions, while GIs build them up. The de-layering and restructuring of organization structures during the past two decades is a phenomenon that is often associated with Boomer leadership. This leads to the fourth and final proposition:

Proposition 4: GI top managers make decisions and build organizational systems more rationally than do Boomer top managers.

Discussion and Implications

The previous section proposed several relationships between top managers' generational membership and strategic decision-making. The propositions put forth by this paper do not exhaust the possibilities for generational membership's effect on strategic decision-making, however. These four propositions were selected as prototypical of each generational trait. Many more behaviors can be predicted from generational membership than have been identified in this paper. Nevertheless, these four propositions represent the influence of top managers' experiences and characteristics on strategic decision-making.

Generational membership is a distinct construct in the strategic decision-making literature. Generational theory asserts that characteristics of a specific generation are constant throughout that generation's life (although they do interact with phase of life) and yet different from other generations. This is contrasted with age, which is assumed to influence each generation in a similar manner. Even though generational characteristics affect managerial behaviors and decisions, generational theory will not replace or contradict other constructs but can contribute an additional perspective to strategic decision-making.

Further study might include setting up a research program to identify which behaviors are influenced by generational membership. Further research may also determine how much generational membership will relate to the degree of discretion or job demands of top managers (Hambrick, Finkelstein, & Mooney, 2005). The impact of top managers' generational membership on firm performance should also be studied, including examining the moderating effects of such factors as environmental dynamism (Henderson, Miller, & Hambrick, 2006).

Generational theory is also linked with another subject of research: long-term cycles in managerial logics. Abrahamson's (1997) finding that employee management rhetorics are associated with long wave economic cycles, and Wyld's (1996) argument that there is a generational cycle in management thought are two of the most relevant papers in this area. In general, however, management research has only indirectly applied the concept of long cycles (e.g., Schumpeter's (1939) notion of innovation cycles). The paucity of research in this area may be related to methodological concerns with the replication in long-term cycles. Nevertheless, identification of long-

term cycles and their influence on strategic decision-making is a potentially rich research area.

The primary implication for managers is an understanding of the influences of generational membership on a firm's strategic decision-making. In addition, history tells us that the next generation will differ from the previous generation in a way that is, in part, predictable. By examining the interest of the popular press in the behaviors of generations, we can easily conclude that managers would welcome academic research into generational theory.

Generational theory as an academic topic is still in its infancy, but given the large amount of evidence that personal characteristics are critical to firm behavior and success, researchers and managers may reap substantial benefits by introducing generational theory into the strategic management field.

References

- Abrahamson, E. (1997). The emergence and prevalence of employee management rhetorics: The effects of long waves, labor unions, and turnover, 1875 to 1992. *Academy of Management Journal*, 40(3): 491-533.
- Bantel, K. & Jackson, S. (1989). Top management and innovations in banking: Does the composition of the top team make a difference? *Strategic Management Journal*, 10: 107-124.
- Bouchard, T. J. & Loehlin, J. C. (2001). Genes, evolution, and personality. *Behavior Genetics*, 31: 243-273.
- Brody, N. & Erlichman, H. (1998). *Personality psychology*. Harlow: Prentice Hall.
- Comte, A. (1838). *Cours de philosophie positive*. Paris: Bachelier.
- Cyert, R. & March, J. (1963). *A behavioral theory of the firm*. Englewood Cliffs, NJ: Prentice-Hall.
- Dearborn, D. & Simon, H. (1958). Selective perceptions: A note on the departmental identification of executives. *Sociometry*, 21: 140-144.
- Egri, C. P. & Ralston, D.A. (2004). Generation cohorts and personal values: A comparison of China and the U.S. *Organization Science*, 15:210-220.
- Finkelstein, S. & Hambrick, D. (1996). *Strategic leadership: Top executives and their effects on organizations*. St. Paul, MN: West Publishing.
- Gupta, A. & Govindarajan, V. (1984). Business unit strategy, managerial characteristics and business unit effectiveness at strategy implementation. *Academy of Management Journal*, 27(1): 25-41.
- Halliman, R. (1998). A coming of age: A comparison of organizational performance of baby boom CEOs to CEOs born prior to the baby boom era. *Journal of Management History*, 4(1): 68-77.
- Hambrick, D., Finkelstein, S., & Mooney, A. (2005). Executive job demands: New insights for explaining strategic decisions and leader behaviors. *Academy of Management Review*, 30(3): 472-491.
- Hambrick, D. & Mason, P. (1984). Upper echelons: The organization as a reflection of its top managers. *Academy of Management Review*, 9: 193-206.
- Hayward, M. & Hambrick, D. (1997). Exploring the premium paid for large acquisitions:

- Evidence of CEO hubris. *Administrative Science Quarterly*, 42(1): 103-27.
- Henderson, A., Miller, D., & Hambrick, D. (2006). How quickly do CEOs become obsolete? Industry dynamism, CEO tenure, and company performance. *Strategic Management Journal*, 27(5): 447-460.
- Hitt, M. & Tyler, B. (1991). Strategic decision models: Integrating different perspectives. *Strategic Management Journal*, 12:327-352.
- House, R., Shane, S., & Herold, D. (1996). Rumors of the death of dispositional research are vastly exaggerated. *Academy of Management Review*, (14)3: 385-400.
- Jang, K. J., Livesly, W. J., & Vernon, P. A. (1996). Heritability of the big five personality dimensions and their facets: A twin study. *Journal of Personality*, 64:577-591.
- Jeffries, F & Hunte, T. (2003). Generations and motivation: A connection worth making. *Journal of Behavioral and Applied Management*, 6(1): 37-70.
- Jurkiewicz, C. (2000). Generation X and the public employee. *Public Personnel Management*, 29(1): 55-74.
- Jurkiewicz, C. & Bradley, D. (2002). Generational ethics: Age cohort and healthcare executives' values. *HEC Forum*, 14(2): 148-171.
- Kaplan, R. S. & Norton, D. P. (1996). *The balanced scorecard*. Boston: The Harvard Business School Press.
- Krein, D. (2003). Birth dates matter: Generational voting in the British House of 1841-1859. *The Journal of the Historical Society*, III: 3-4, 373-402.
- Loehlin, J. C. & Nichols, R. C. (1976). *Heredity, environment and personality: A study of 850 sets of twins*. Austin, TX: University of Texas Press.
- Malmendier, U. & Tate, G. (2005). CEO overconfidence and corporate investment. *Journal of Finance*, 60(6): 2661-2700.
- Mannheim, K. (1928). *Essays on the sociology of knowledge*. Routledge and Kegan Paul: London.
- March, J. & Simon, H. (1958). *Organizations*. New York: Wiley.
- Miller, D. & Droge, C. (1986). Psychological and traditional determinants of structure. *Administrative Science Quarterly*, 31(4): 539-60.
- Miller, D., Kets de Vries, M. F., & Toulouse, J-M. (1982). Top executive locus of control and its relationship to strategy-making, structure and environment. *Academy of Management Journal*, 25(2): 237-253.
- Mintzberg, H., Raisinghani, D., & Theoret, A. (1976). The structure of "unstructured" decision processes. *Administrative Science Quarterly*, 21: 246-275.
- Norburn, D. & Birley, S. (1988). The top management team and corporate performance. *Strategic Management Journal*, 9(3): 225-237.
- Papenhausen, C. (2006). Half full or half empty: the effects of top managers' dispositional optimism on strategic decision-making and firm performance. *Journal of Behavioral and Applied Management*, 7(2): 103-115.
- Pfeffer, J. (1983). Organizational demography. *Research in Organizational Behavior*, 5: 299-357.
- Schumpeter, J. A. (1939). *Business cycles: A theoretical, historical and statistical analysis of the capitalist process*. New York: McGraw-Hill.
- Simon, M. & Houghton, S. (2003). The relationship between overconfidence and the introduction of risky products: Evidence from a field study. *Academy of Management*

Journal, 46(2): 139-150.

Strauss, W. & Howe, N. (1991). *Generations*, William Morrow and Co.

Twenge, J. (2000). The age of anxiety? Birth cohort change in anxiety and neuroticism, 1952-1993. *Journal of Personality and Social Psychology*, 79(6): 1007-1021.

Wally, S., & Baum, J. (1994). Personal and structural determinants of the pace of strategic decision making. *Academy of Management Journal*, 37(4): 932-956.

Weiten, W. (1998). *Psychology: Themes and variations* (4th ed.). Pacific Grove CA: Brooks/Cole Publishing.

Wiersema, M. & Bantel, K. (1992). Top management team demography and corporate strategic change. *Academy of Management Journal*, 35: 91-121.

Wyld, D. (1996). The rhythm of the saints: A generational perspective on management history. *Management Research News*, 19(7): 37-60.