8-5-2011

On the Diffusion of Administrative Innovation: Performance, Fashion, or Legitimacy

Quang "Neo" Bui
Bentley University, bui_quan@bentley.edu

On the Diffusion of Administrative Innovation: Performance, Fashion, or Legitimacy[1]

Quang "Neo" Bui
Bentley University
bui_quan@bentley.edu

ABSTRACT

IT-enabled administrative innovation has been increasingly important to managers, both in the private and public sectors, as it is considered the "silver bullet" to revive organizations out of poor performance or turbulent times. This review article examines four alternative diffusion theories of administrative innovation, namely, the performance-and-then-legitimacy-driven theory, the diminishing-mimetic-isomorphism theory, the fashion-and-then-abandon-by-performance theory, and the performance-fashion-legitimacy theory. The conclusion is that each theory appears likely to hold only in certain conditions, and none of them comes out as the absolute explanation for the diffusion process. The possibility of multiple adoption pathways or conditional diffusion trajectories is suggested, and future theoretical development as well as empirical research is needed to understand the diffusion process.

Keywords

Diffusion theories, adoption patterns, diffusion trajectory, administrative innovation, performance, fashion, legitimacy

INTRODUCTION

The adoption and diffusion of innovations have been extensively studied across multiple disciplines (Davis, 1989; Fichman, 2000; Rogers, 2003; Swanson, 1994). Especially, IT-enabled innovations have attracted great attention from scholars (Anderson and Tushman, 1990; Swanson and Ramiller, 1997; Van de Ven, Polley, Garud and Venkataraman, 2008; Wang and Swanson, 2007). Our substantive focus in this paper is on a particular kind of innovations: IT-enabled administrative innovation. It is simply defined as innovation that concerns organizational structure and governance through the means of Information Technology. Examples are the Total Quality Management (TQM) in the 1980s (Deming, 1981) or the Business Process Reengineering (BPR) in the early 1990s (Hammer, 1990). Recently, administrative innovation has become increasingly significant as more managers see it as a "silver bullet" for organizational poor performance (Birkinshaw and Mol, 2006; Currie, 1999; Nickell, Nicolitsas and Patterson, 2001). The question of interest is *how administrative innovation is diffused over time*. The goal of this review paper is to conceptualize the process of diffusing administrative innovation by examining and evaluating alternative diffusion theories generally found in the literature.

Among theories that underlie the decision making process, the economic-rational perspective and the institutional perspective are dominant. According to the economic-rationalist argument, managers justify their adoption decisions based on the perceived financial and economic benefits of the innovation (Rogers, 2003; Stoneman, 1983). On the other hand, institutional theorists posit that managers are under pressure to adopt the innovation in order to gain social legitimacy (DiMaggio and Powell, 1983). Lately, management fashion theory joins in the debate, suggesting that firms follow the fads and fashions to adopt even technical ineffective innovations (Abrahamson, 1991).

While the debate goes on, recent studies and empirical evidence complicate the issue further. From the innovation literature, we identify four diffusion theories that can be applied to the diffusion of administrative innovation. They are the performance-and-then-legitimacy-driven theory (Tolbert and Zucker, 1983), the diminishing-mimetic-isomorphism theory (Tingling and Parent, 2002), the fashion-and-then-abandon-by-performance theory (Strang and Macy, 2001), and the performance-fashion-legitimacy theory (Wang, 2010). These theories propose strikingly different mechanisms, explanations, and overall conceptualization of the diffusion process. We access the four perspectives to understand how each could be applied to the diffusion of administrative innovation. Despite of many similarities, each theory requires certain *conditions* to work, and none of them comes out as the best explanation in all situations. Subsequently, we argue that the adoption patterns of an innovation could take one of many possibilities: a single adoption pattern, multiple adoption pathways, or conditional

[1] This material is based upon work supported by the National Science Foundation under Grant No. SES-0964909, M. Lynne Markus, principal investigator. The author gratefully acknowledge the contributions of our collaborators on the Art of the States project http://blogs.bentley.edu/nsf/

diffusion trajectories. As a result, the study of the diffusion of administrative innovation needs to pay attention to the adopting conditions in order to correctly conceptualize the phenomenon.

The paper will proceed as follows. We first review administrative innovation and its unique characteristics. Then, we present and evaluate the four diffusion theories. We conclude with some suggestions for future theoretical development and empirical research.

WHAT IS ADMINISTRATIVE INNOVATION?

Administrative innovation is studied across multiple disciplines, thus bearing various synonyms. In the economic literature, it is similar to organizational innovation, which is defined as "new organization of any industry" (Schumpeter, 1968)(p. 66). In the management literature, it is similar to management innovation, generally defined as "implementation of new management practices, processes and structures that represent a significant departure from current norms" (Birkinshaw and Mol, 2006)(p. 81). In the administrative management discipline, administrative innovation is defined as "changes in organizational structure or administrative processes" (Damanpour, 1987)(p. 677). They are related to the social system of an organization, which refers to "the relationships among people who interact to accomplish a particular goal or task" (Damanpour and Evan, 1984)(p. 394). In this paper, we define *administrative innovation* simply as innovation that concerns organizational structure and governance. This definition, however, can only draw a theoretical distinction between administrative innovations and other types of innovation. In practice, many technical innovations involve administrative changes, and the division can be blurry and ambiguous between administrative innovations and process innovations. A case in point is Enterprise Resource Planning (ERP) systems. One can argue it is a technical innovation, process innovation, or administrative innovation depending on the context and instance. Therefore, we utilize the classification that Wang (2010) suggested, based on the "IT-ness" or "administrative-ness" of an innovation. According to Wang, administrative innovation will have more "intensive administrative components" than "intensive IT components" (Wang, 2010)(p. 66).

Examples of administrative innovation can be found in both the private and public sectors. Instances in the private sector include the Total Quality Management (TQM) in the 1980s (Deming, 1981) or the Business Process Reengineering (BPR) in the early 1990s (Hammer, 1990). Additionally, examples can also be found in the public sector. Over the course of more than twenty years, public agencies have experienced waves of administrative reforms and innovations, mainly thanks to the New Public Management reform started around the 1980s (Rainey, 2009). Some instances that can be named are the increasing usage of public-private partnerships to carry out traditional public services, and also the usage of performance measurement to increases public management efficiency and accountability (Adcroft and Willis, 2005; Seader, 2002).

Overall, these administrative innovations have some common characteristics. They are 1) IT-enabled, 2) social-technological change, and 3) knowledge intensive. First of all, the role of information technology (IT) is essential for those innovations. For instance, the five recent management innovations and change programs, namely, Total Quality Management (TQM), Just-In-Time production management (JIT), Activity Based Costing (ABC), Business Process Re-engineering (BPR), and Process Innovation all rely extensively on the use of information technologies to carry out changes (Currie, 1999). Both TQM and JIT depend on CAD, CAM, robotics, MRP, MRP II to achieve their goals, and BPR and Process Innovation view IT as an essential enabler for re-engineering efforts. Secondly, changes in administrative practices are socio-technological changes, involving both social systems and technical systems (Damanpour and Evan, 1984). It is the reason why administrative innovation is often viewed as a philosophical change or a cultural change in the literature (Currie, 1999). For example, BPR calls for a complete departure from the corporation norms and routines in order to revolutionize business. Thus, it requires a company-wide approach with the commitment of top managers to deliver the promised improvements.

In addition, administrative innovations are knowledge intensive, requiring know-how and specific skills to adopt and implement. Due to the tacit nature of management practices, prospective adopters are more likely to seek help from outside experts like consultants or professional associations in implementing the innovation (Birkinshaw and Mol, 2006). This is consistent with the institutional perspective which suggests that firms emulate peers to gain legitimacy. In order to do so, they search for best practices from consultants and professional associations to introduce into their business (Mol and Birkinshaw, 2009). In the next section, we discuss alternative theories that could explain the diffusion of administrative innovation.

ALTERNATIVE DIFFUSION THEORIES

In the early years, innovation studies were dominated by the economic-rational view, which suggested that adopters evaluate innovation based on performance and economic benefits (Rogers, 2003). The prospective adopters were assumed to be rational agents, who weigh available information to make an intelligent decision on adoption. The expected outcomes will be profitability and uncertainty reduction (Stoneman, 1983). Students of the economic-rational perspective argue that once

organizations encounter performance problems, they will actively seek innovative solutions to overcome the performance gaps (Rogers, 2003).

On the other hand, this performance-driven mechanism was later challenged by the institutional theory (DiMaggio and Powell, 1983; Meyer and Rowan, 1977). According to the institutional perspective, organizations compete not only for resources and information but also for social legitimacy from the environment. They embrace institutionalized beliefs, norms, and practices, even at a loose level, in order to gain legitimacy to ensure stability as well as survival. Subsequently, institutional researchers contend that managers have little or no choice but to conform to innovations that are institutionalized as taken-for-granted norms. Over time, this results in homogeneity among firms. Prospective adopters are driven by the legitimacy, not so much by performance-related factors (DiMaggio and Powell, 1983).

While the debate between performance-driven and legitimacy-driven adoption still goes on, it is further complicated by the introduction of management fashion theory (Abrahamson, 1991). According to the fashion-driven argument, managers imitate administrative techniques either from within an organizational community or from outside organizations such as consulting firms or business mass media. Yet, recent studies and empirical evidence have pointed to different perspectives on the diffusion of innovation process. In this section, we identify four perspectives that can explain the adoption patterns of an administrative innovation. We call them diffusion theories since they depict adoption behaviors over time. They are the performance-and-then-legitimacy-driven theory (Tolbert and Zucker, 1983), the diminishing-mimetic-isomorphism theory (Tingling and Parent, 2002), the fashion-and-then-abandon-by-performance theory (Strang and Macy, 2001), and the performance-fashion-legitimacy theory (Wang, 2010).

The performance-and-then-legitimacy-driven theory

The performance-and-then-legitimacy-driven theory is found in the work of Tolbert and Zucker (1983). In studying the adoption and diffusion of organizational innovation, Tolbert and Zucker (1983) tried to explain the adoption of civil service procedures, that is, an administrative innovation. They examined adoption patterns from 1880 to 1935 in cities that mandated the civil service procedures and those that did not. The study suggested a stunning conclusion: at the beginning of the diffusion process, organizational factors could predict well the cities' adoptions, but could not predict accurately the adoption once the diffusion process was underway. As more cities started to adopt, the procedure became "progressively institutionalized" (p. 35) and became a social fact. Other cities viewed the innovation as a necessary component for an efficient organization structure and adopted it more quickly. Tolbert and Zucker's findings suggested an important implication: early adopters are more influenced by organizational factors and are more likely to approach the adoption decision with a performance-driven process than later adopters whose decisions are driven by the institutional forces. With this conclusion, the performance-driven perspective and legitimacy-driven perspective are combined into a cohesive theory. It has received empirical support in later studies (Fligstein, 1985; Tolbert, 1985; Westphal, Gulati and Shortell, 1997). Thus, following Wang (2010), we call this the performance-and-then-legitimacy-driven theory, implying a patterns in which early adopters use a performance-driven approach and later adopters utilize a legitimacy-driven approach.

One advantage of this theory is that it was built upon a longitudinal, empirical study. The study examined 74 cities that mandated the reform and 93 cities that did not over the course of 50 years. More importantly, the authors actually identified *two* adoption patterns. For cities that mandated the reform, the adoption rate was rapid and immediate in the early years with a "landslide" effect instead of a diffusion effect, and the rate slowed down in the following years. On the other hand, among the cities that did not mandate the procedure, the adoption rate was gradual with small number of adoption in the early years and a slow increase number in later years. Based on the observations of un-mandated cities, Tolbert and Zucker (1983) drew their conclusion about the performance-and-then-legitimacy-driven pattern. The underlying assumption was that there were *no centralized powerful control organizations* that can impose the innovation upon others. In the presence of central state agencies as the controlling entities in the case of mandated cities, the adoption pattern was significantly different. In other words, the performance-and-then-legitimacy-driven theory is likely hold in situations with no powerful organizations that can dictate adoption. For situations in which influential and powerful peers exist, the diminishing-mimetic-isomorphism theory discussed below appears to be more compelling.

The diminishing-mimetic-isomorphism theory

According to the institutional perspective, isomorphism is a process in which a firm becomes homogenous with others that are under the same environmental conditions (DiMaggio and Powell, 1983). There are three processes: coercive isomorphism, referring to political influence and the problem of legitimacy; mimetic isomorphism, implying imitation of one firm by another in the face of uncertainty; and normative isomorphism, associated with professionalism that homogenizes the behaviors of firms. Under the diminishing-mimetic-isomorphism theory, mimetic isomorphism underpins the adoption decision at a very early stage, but over time, its influence is diminished by coercive and normative isomorphism (Tingling

and Parent, 2002). For early adopters, the adoption choice is a difficult, high-risk, and expensive choice due to the high ambiguity and lack of necessary information. Tingling and Parent (2002) proposed that in the absence of a reference firm, traditional evaluation mechanisms (i.e., economic performance) will be utilized. However, in the presence of a referent, early adopters will imitate others' decisions, even when they are less optimal. This is a mimetic isomorphism mechanism. Over time, as technology diffuses and becomes more accepted, coercive isomorphism transcends mimetic isomorphism; early adopters effectively impose their decision upon dependent firms. Finally, when the technology is widely accepted, education and training centers, conferences, and professional associations help turn the practice into a taken-for-granted norm. Mimetic isomorphism is further reduced, and together with coercive isomorphism regressed into normative isomorphism. Although this theory is highly legitimacy-driven, it is distinct from the other legitimacy-driven approach because it suggests a *diminishing* mechanism of legitimacy in which early adopters follow reference firms under mimetic isomorphism, and late adopters are influenced by coercive and normative forces.

Although theoretically grounded, the diminishing-mimetic-isomorphism theory was built on an experiment of IT product choice at individual level without an interorganizational context. As such, its generalization can be limited. Nevertheless, the idea of institutional pressures from powerful and important organizations upon a firm's adoption decision has received ample empirical support (Green and Hurley, 2005; Teo, Wei and Benbasat, 2003). In studying the influence of isomorphism mechanisms on the intention of adopting financial EDI (FEDI) in Singaporean organizations, Teo et al., (2003) concluded that dominant customers, important suppliers, or parent organizations inflicted normative and coercive pressures upon other firms to adopt FEDI. Furthermore, as the perceived complexity of the technological innovation increased, the organizational decision makers were more likely to rely on mimetic isomorphism mechanism to make their decisions. These observations reaffirm the underlying assumptions of the diminishing-mimetic-isomorphism theory, that when uncertainty is high and reference firms exist, firms are more likely to comply with mimetic isomorphism even at the early stage. And as an innovation gets diffused over time, mimetic isomorphism progressively declines and is replaced by coercive and normative isomorphism.

Nevertheless, one important question remains unanswered: would the isomorphism mechanisms continue to influence the rationale of decision makers, even after the initial adoption? Case studies of EDI adoption revealed that some firms continued to rely on institutional rationales to guide their extension of EDI usage after initial implementation; whereas others shifted their rationale to strategic choice in making their extension decisions (Green and Hurley, 2005). To fully understand the relationship between IT adoption and usage/extension decisions, we turn to the fashion-and-then-abandon-by-performance theory.

The fashion-and-then-abandon-by-performance theory

In an effort to reconcile the issues of performance-driven view and legitimacy-driven views, Strang and Macy (2001) proposed that decision makers are adaptive agents who seek to make decisions from their own experience as well as their peers'. They asserted that economic-rational agents are "overrationalized," being capable of assessing the merits of an innovation from internal calculations. On the other hand, the institutional view (or the contagion view) is "underrationalized," with managers following others blindly without considerations of their own. Both views, they contended, come short in explaining the diffusion cycles. The economic-rational view remains silent in explaining the abandonment of "hot" practices in spite of their "projected" benefits. The institutional perspective also struggles to explain the diffusion cycles. If fashionable innovations are supposed to legitimize their followers, why do firms seek alternatives and abandon the institutionalized innovations? Attempting to synthesize both views and address their shortcomings, Strang and Macy (2001) suggested the *adaptive emulation* model. Firms are viewed as adaptive agents, engaged in problem-driven search. Since managers are not able to access innovations from first principles, they look to success stories for clues of adoption. Those success stories, featured by various discourses, help lower perceived failure and inform managers of potential benefits. Once firms adopt innovative practices, they can evaluate based on not only experience of highly successful peers but also experience of their own. Depending on their direct experience, they can either keep or abandon the innovation. As such, this perspective is different from management fashion theory. Although managers imitate successful firms, they do *evaluate* their performance and make appropriate reactions. Subsequently, it is a performance-driven approach, regardless of a fashion-driven mechanism at the beginning (Strang and Macy, 2001).

Although the original study only relied on a computational model without empirical support, later studies found some evidence supporting the argument (Strang and Still, 2004). In surveying the benchmarking process in a financial organization, Strang and Still (2004) augmented the adaptive emulation model by suggesting that firms indeed conduct a performance-driven external search of prestigious peers for success stories. Once they imitate the practices, they learn from performance outcomes. Subsequently, firms follow a fashion cycle to adopt but adapt to the innovation based on

performance. If the performance holds to expectations, the innovation would continue being used; otherwise, it would be abandoned.

The underlying condition for the fashion-and-then-abandon-by-performance theory is the existence of success stories from leading firms. These success stories are often associated with the fashion cycles, promoted by the consulting firms, by professional associations, or by the business media. However, another question emerges: what would be the decision rationales after the fashion ends? Studying the Total Quality Management (TQM) cycle, David and Strang (2006) concluded that once the fashion fades away, only consulting firms with technique expertise dominate the market. They implied a return to technique-driven rationale (i.e., performance-driven) among decision makers after the hype is over. Whether it is true, we need to look at the performance-fashion-legitimacy theory.

The performance-fashion-legitimacy theory

In reviewing the diffusion literature, Wang (2010) proposed adding management fashion theory (Abrahamson, 1991) into the *performance-and-then-legitimacy-driven* perspective to fully explain the adoption behaviors of not only early and late adopters but also "middle" adopters. While the early adopters rely on performance-driven approach and later adopters utilize a legitimacy-driven approach in adopting innovation, "middle" adopters are motivated to follow IT and administrative practices that are in fashion to first improve performance and secondly, to gain legitimacy. A merit of this theory compared to the performance-and-then-legitimacy-driven theory is that it does not assume innovations will bring positive performance. Innovations can be adopted under performance, fashion, or legitimacy mechanisms, but what organizations gain is still up to scrutiny. Based on the work of Staw and Epstein (2000), Wang (2010) tested the performance outcomes of fashionable IT innovations to middle adopters. The findings confirmed that IT fashions indeed have a positive short-term effect on legitimacy and a long-term effect on performance. This confirmed the importance of fashion to transition the adoption rationale from performance-driven in early phase to legitimacy-driven in later phase of the diffusion process. As a result, we term this pattern the performance-fashion-legitimacy theory.

The core assumption for the performance-fashion-legitimacy theory is that the innovation will follow a trajectory from performance, to fashion, and then to legitimacy. It means the early phase will be followed by a fashion period, and once the hype is over, legitimacy will be the main rationale that drives the adoption behaviors. Although the empirical findings somewhat supported a transition from performance to fashion to legitimacy (Wang, 2010), it left no room for situations in which there is no fashion to influence middle adopters, or performance rationale instead of legitimacy to follow fashion cycle (David and Strang, 2006). Since this is a fairly new perspective, further study will be required to test the theory more thoroughly.

Summary

In this section, we reviewed four diffusion theories: the performance-and-then-legitimacy-driven theory (Tolbert and Zucker, 1983), the diminishing-mimetic-isomorphism theory (Tingling and Parent, 2002), the fashion-and-then-abandon-by-performance theory (Strang and Macy, 2001), and the performance-fashion-legitimacy theory (Wang, 2010). They project the general adoption patterns found in the literature. Table 1 provides a summary of the four theories. In the next section, we discuss what these theories imply for the diffusion of administrative innovations.

DISCUSSION

In answering the question of how administrative innovation diffuses over time, we have identified four distinct diffusion theories that can be applied to administrative innovations. Despite similarities between those theories, each requires certain *conditions* to work. For the performance-and-then-legitimacy-driven theory, there should not be centralized powerful organizations to dictate adoption behaviors. On the other hand, the diminishing-mimetic-isomorphism pattern emerges when there is high uncertainty, coupled with reference firms to guide adoption decisions. If there are success stories, potentially with a fashion trend, one can expect the fashion-and-then-abandon-by-performance pattern too. Lastly, if performance-driven rationales lead the way, followed by the fashion trends, adoption behaviors may have a performance-fashion-legitimacy trajectory.

This divergence among diffusion theories suggests that certain combinations of external as well as internal factors will lead to different adoption behaviors. Scholars have to understand the adoption conditions in order to grasp the patterns of diffusion. After all, a single adoption pattern may not be the answer. *Multiple* adoption pathways or *conditional* diffusion trajectories are possible. In other words, adoption patterns may have multiple separate pathways such as purely performance-driven and legitimacy-driven. Yet, the patterns may have conditional trajectories in which the adoption behaviors change depending on

the context and temporal factors. Therefore, researchers should not simply assume one theoretical explanation, but should be open to other possibilities.

Moreover, the four perspectives suggest several considerations for the study of diffusion of administrative innovations. Some of primary considerations are:

- *Explicitly consider the role of information technologies*. In the business world today, IT has become ubiquitous and vastly integrated in every business process. In recent years, IT has increasingly been viewed as an 'essential enabler' for innovative management practices (Currie, 1999). Out of four diffusion trajectories, only the performance-fashion-legitimacy trajectory explicitly considers the use of IT in their argument.
- *Consider the possibility of a re-invention process after implementation*. Because administrative innovation is knowledge intensive and "sticky" to the context, it is likely to undergo through a re-invention process to adjust to the social context and internal practices in the adopting firm. Among four diffusion trajectories, however, the underlying assumption is that innovation does not change. Only the fashion-and-then-abandon-by performance trajectory considers the cycles of adoption and abandonment of innovation.

CONCLUSIONS

In this paper, we review the concept of administrative innovation and its unique characteristics. In studying the diffusion of administrative innovation, we are able to identify four diffusion theories that can explain the diffusion process. Yet, each one of the theories is hypothetically to work only in certain conditions, and none come out as an absolute solution in all contexts. This suggests a theory of multiple adoption pathways or conditional diffusion trajectories. Our purpose of this paper is only to identify alternative diffusion theories and the underlying mechanisms and conditions for each of them. A sound research agenda, then, will be a topic for the next research paper, as the diffusion of administrative innovations remains an open question.

Diffusion Theory	Performance-and-then-legitimacy-driven	Diminishing-mimetic-isomorphism (Legitimacy-driven)	Fashion-and-then-abandon-by-performance (Performance-driven)	Performance-fashion-legitimacy
Key references	(Tolbert and Zucker, 1983)	(Tingling and Parent, 2002)	(Strang and Macy, 2001)	(Abrahamson, 1991; Wang, 2010)
Conditions	• No centralized powerful organizations to dictate adoption behaviors	• High uncertainty with reference firms to guide adoption decisions	• Existing of success stories (and potentially fashion cycles) to guide adoption behaviors	• Performance-driven rationale followed by fashion, which is transcended by legitimacy at later stage
Assumptions	• Early adopters are rational • Later adopters follow institutionalized logics	• Uncertainty prompts mimetic isomorphism • Mimetic isomorphism is replaced by coercive, then normative isomorphism over time	• Decision makers are adaptive agents • Poor performance triggers innovation abandon	• Innovation can either improve or decrease performance
Predicted behaviors	• Early adopters make adoption decisions based on perceived performance • Late adopters embrace innovation to gain legitimacy	• Adopters follow other firms' decisions to gain legitimacy • Early adopters imitate reference firms, whereas late adopters are under coercive and normative pressures to conform	• Adopters follow success stories to minimize losses • Performance is used in later stage to evaluate the decisions	• Early adopters are motivated by perceived performance • Middle adopters follow fads and fashions • Later adopters are after legitimacy

Table 1. Alternative Diffusion Theories

REFERENCE

1. Abrahamson, E. (1991) Managerial Fads and Fashions: The Diffusion and Rejection of Innovations, *The Academy of Management Review*, 16, 3, pp 586-612.

2. Adcroft, A., and Willis, R. (2005) The (un)Intended Outcome of Public Sector Performance Measurement, *The International Journal of Public Sector Management*, 18, 4, pp 386-400.

3. Anderson, P., and Tushman, M.L. (1990) Technological Discontinuities and Dominant Designs: A Cyclical Model of Technological Change, *Administrative Science Quarterly*, 35, 4, pp 604-633.

4. Birkinshaw, J., and Mol, M.J. (2006) How Management Innovation Happens, *MIT Sloan Management Review*, 47, 4, pp 81-88.

5. Currie, W.L. (1999) Revisiting Management Innovation and Change Programmes: Strategic Vision or Tunnel Vision, *Omega*, 27, pp 647-660.

6. Damanpour, F. (1987) The Adoption of Technological, Administrative, and Ancillary Innovations: Impact of Organizational Factors, *Journal of Management*, 13, 4, pp 675-688.

7. Damanpour, F., and Evan, W.M. (1984) Organizational Innovation and Performance: The Problem of "Organizational Lag", *Administrative Science Quarterly*, 29, 3, pp 392-409.

8. David, R.J., and Strang, D. (2006) When Fashion Is Fleeting: Transitory Collective Beliefs and the Dynamics of TQM Consulting, *Academy of Management Journal*, 49, 2, pp 215-233.

9. Davis, F.D. (1989) Perceived Usefulness, Perceived Ease of Use, and User Acceptance of Information Technology, *MIS Quarterly*, 13, 3, pp 319-340.

10. Deming, W.E. (1981) Improvement of Quality and Productivity through Action by Management, *National Productivity Review*, 1, 1, p 12.

11. DiMaggio, P.J., and Powell, W.W. (1983) The Iron Cage Revisited: Institutional Isomorphism and Collective Rationality in Organizational Fields, *American Sociological Review*, 48, 2, pp 147-160.

12. Fichman, R.G. (2000) The Diffusion and Assimilation of Information Technology Innovations, in R.W. Zmud (ed.) *Framing the Domains of IT Management: Projecting the Future Through the Past,* Pinnaflex Publishing, Cincinnati, Ohio.

13. Fligstein, N. (1985) The Spread of the Multidivisional Form Among Large Firms, 1919-1979, *American Sociological Review*, 50, 3, pp 377-391.

14. Green, C.W., and Hurley, T.A. (2005) Technology Use Rationale and Assimilation in the Implementation of Electronic Data Interchange, *Proceedings of the Eleventh Americas Conference on Information Systems, August 11th-14th*.

15. Hammer, M. (1990) Reengineering Work: Don't Automate, Obliterate, *Havard Business Review*, 90, 4, pp 104-112.

16. Meyer, J.W., and Rowan, B. (1977) Institutionalized Organizations: Formal Structure as Myth and Ceremony, *The American Journal of Sociology*, 83, 2, pp 340-363.

17. Mol, M.J., and Birkinshaw, J. (2009) The Sources of Management Innovation: When Firms Introduce New Management Practices, *Journal of Business Research*, 62, pp 1269-1280.

18. Nickell, S., Nicolitsas, D., and Patterson, M. (2001) Does Doing Badly Encourage Management Innovation?, *Oxford Bulletin of Economics and Statistics*, 63, 1, pp 5-28.

19. Rainey, H.G. (2009) Understanding and Managing Public Organizations, Jossey-Bass Inc., Publishers, San Francisco, CA.

20. Rogers, E.M. (2003) Diffusion of Innovations, (5th ed.), Free Press, New York, NY.

21. Schumpeter, J.A. (1968) The Theory of Economic Development: An Inquiry into Profits, Capital, Credit, Interest, and the Business Cycle, (8th ed.), Harvard University Press, Cambridge, MA.

22. Seader, D.L. (2002) The United States' Experience with Outsourcing, Privatization and Public-Private Partnerships, The National Council for Public-Private Partnerships.

23. Staw, B.M., and Epstein, L.D. (2000) What Bandwagons Bring: Effects of Pupular Management Techniques on Corporate Performance, Reputation, and CEO Pay, *Administrative Science Quarterly*, 45, 3, pp 523-556.

24. Stoneman, P. (1983) The Economic Analysis of Technological Change, Oxford University Press, Oxford.

25. Strang, D., and Macy, M.W. (2001) In Search of Excellence: Fads, Success Stories, and Adaptive Emulation, *The American Journal of Sociology*, 107, 1, pp 147-182.

26. Strang, D., and Still, M.C. (2004) In Search of the Elite: Revising a Model of Adaptive Emulation with Evidence from Benchmarking Teams, *Industrial and Corporate Change*, 13, 2, pp 309-333.

27. Swanson, E.B. (1994) Information Systems Innovation among Organizations, *Management Science*, 40, 9, pp 1069-1092.

28. Swanson, E.B., and Ramiller, N.C. (1997) Organizing Vision in Information Systems Innovation, *Organization Science*, 8, 5, pp 458-474.

29. Teo, H.H., Wei, K.K., and Benbasat, I. (2003) Predicting Intention to Adopt Interorganizational Linkages: An Institutional Perspective, *MIS Quarterly*, 27, 1, pp 19-49.

30. Tingling, P., and Parent, M. (2002) Mimetic Isomorphism and Technology Evaluation: Does Imitation Transcend Judgment?, *Journal of the Association for Information Systems*, 3, pp 113-143.

31. Tolbert, P.S. (1985) Institutional Environments and Resource Dependence: Sources of Administrative Structure in Institutions of Higher Education, *Administrative Science Quarterly*, 30, 1, pp 1-13.

32. Tolbert, P.S., and Zucker, L.G. (1983) Institutional Sources of Change in the Formal Structures of Organizations: The Diffusion of Civil Service Reform, 1880-1935, *Administrative Science Quarterly*, 28, 1, pp 22-39.

33. Van de Ven, A.H., Polley, D.E., Garud, R., and Venkataraman, S. (2008) The Innovation Journey, Oxford University Press, Oxford, UK.

34. Wang, P. (2010) Chasing the Hottest IT: Effects of Information Technology Fashion on Organizations, *MIS Quarterly*, 34, 1, pp 63-85.

35. Wang, P., and Swanson, E.B. (2007) Launching Professional Services Automation: Institutional Entrepreneurship for Information Technology Innovations, *Information and Organization*, 17, 2, pp 58-88.

36. Westphal, J.D., Gulati, R., and Shortell, S.M. (1997) Customization or Conformity? An Institutional and Network Perspective on the Content and Consequences of TQM Adoption, *Administrative Science Quarterly*, 42, 2, pp 366-394.