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“So What?”: HR Measurement as a Change Catalyst

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"So What?": HR Measurement as a Change Catalyst

There is unprecedented recognition among top managers throughout the world that people make the difference. Reading the professional business press, one would think that the battle for measuring the impact of human resources has already been won. Emerging "flexible organizations" are seen as requiring increased attention to vision, style, cooperation and teamwork (Ghoshal & Mintzberg, 1994; Halal, 1993). Business writers tout the essential role of "world-class training" that values "people skills" and fosters "entrepreneurship" (Dumaine, 1995; Rau, 1994). We even see the latest pair of best-selling authors, Michael Hammer and James Champy chiding managers that "the biggest lie told by most organizations is that 'people are our most important assets'", and calling for dramatically "increased investments in people" (Lancaster, 1995). It is also apparent that some of the most admired managers say managing people as their most important role. Jack Welch, of General Electric Corporation is quoted as saying "Anybody who gets this [CEO] job has got to believe in the gut that people are the key to everything" (Tichy, 1993). There is also growing evidence that organizational success is correlated with the existence of combinations of "high-performance" work designs and "high-performance" human resource practices (MacDuffie, 1995; Arthur, 1994; Huselid, in press).

Yet, managers must consider investments in human resource programs, and such evidence is not much help. The quotes from the CEO provide little guidance in determining whether it makes sense to invest in more expensive selection, training or compensation programs. Evidence at the firm level that the existence of certain human resource practices in combination with certain work designs does not always provide the basis for deciding if a given organization should invest in those practices. In a sense, such evidence works from the "top" downward, by suggesting how broad human resource patterns do affect broad organizational outcomes. In contrast, most HR investment decisions are "bottom-up". That is, they require a decision maker to choose between alternative practices applied to a particular group of employees. The observable results of such programs will occur largely at the employee level, not at the organizational level.

Thus, there remains a need for frameworks and models that can help managers to enhance their ability to identify, communicate and make decisions about the impact of human resources on groups of employees, and to show how those decisions into broader organizational outcomes. Presumably, HR measurement should contribute to the development of those frameworks.

The need to assess the impact of humans on the work place is perennial. Time and motion studies, behavioral accounting, human resource accounting, human resource costing,

ratio analysis, human resource audits, utility analysis and even recent developments such as core competency analysis are all ways to address the fundamental question -- "How can we measure the contribution of people to important organizational goals?" Typically, HR measurement research and practice has focused on developing internally logical measures, simulating measurement procedures that resemble acceptable corporate approaches (such as audits, dollarvalued investment returns, balanced scorecards, or employee value-added). Two underlying premises often underlie these measurement attempts: (1) Measures will lead decision makers to make more rational and productive choices about how people are managed; or (2) Measures will help convince others to support and invest in human resource management programs (Boudreau, 1991). Yet, these premises have gone largely uninvestigated.

Though shamelessly anecdotal, one recurring episode from my experience seems to sum up the dilemma. In my work with organizations, I am sometimes asked to participate in efforts to "develop a way to measure human resources." Initially, the managers usually suggest that they are looking for a measurement system, because they just don't seem to have any good HR measures. However, as we talk, it usually becomes apparent that they are using many HR measures already (e.g., salary costs, separation rates, time to fill vacancies, absenteeism, attitudes, etc.). In fact, many organizations admit that they recently adopted sweeping changes in their measurement systems to address a perceived lack of information. At this point, the question becomes, "If you have all of these measures, why do you think you need more?". The answer is something like, "We're just not getting the support we want from line managers, who think HR is too 'soft,'" or, "We just don't seem to be creating world-class HR systems." Thus, the fundamental question about HR measurement is not "How do we construct the best HR measure?" but "How do we induce changes through HR measurement systems?" Answering that question implies a very different approach to HR measurement research and practice.

The scientific discussion of HR measurement frequently focuses on the logical consistency of assumptions, and the possibility that one estimation approach might produce different results from another (e.g., much of the utility analysis research of the 1980's and 1990's, Boudreau, 1991). Much of the practical discussion has focused on describing new measurement systems, instructing managers how to locate and organize the measures, and demonstrating how the numbers produced resemble well-accepted corporate measures (such as financial accounting measures or ratios). While this literature often suggests the value of such measurement systems for enhancing credibility with "line" managers (e.g., Cascio, 1991; Fitz-Enz, 1984; Flamholtz, 1985), little research has actually tested this suggestion (Latham & Whyte, 1994 provide one laboratory experiment that did address it). In this paper, I will suggest

that we can learn much about how to develop and improve measurement systems by focusing away from the measures, and toward those who are or should be affected by them. Even good communication can have detrimental effects, such as blocked learning (Argyris, 1994).

This requires that we focus on how key constituents conceive of human resource management, how they determine whether human resource activities are worthwhile, and how we can better help them use the available information to improve their decisions. This position is not new. For example, it was a central premise behind the original development of selection utility models (Cronbach & Gleser, 1965). Moreover, well-developed theories are available that speak to the general question of information effectiveness. However, in our rush to develop ever more elaborate and new measurement systems, HR researchers and managers have ignored the possibility of research into measurement effects. At the same time, theories of effects of information have not focused on areas other than HR measurement. This creates a significant opportunity for integration. In this paper, I will describe some selected theories of information effects, and give examples of their implications for future research and application of HR measurement systems. The examples are not meant to be comprehensive, but rather illustrative.

Information Receivers and Information Goals

Information affects people by persuading, affecting decisions, changing attitudes, etc. But, who are the relevant subjects of those effects? Most discussion of HR measurement focuses on HR managers or line managers as subjects, and improved decision quality as the goal. While undoubtedly important, this rational influence model can be extended. Everyone who might receive or transmit HR measurements is a potential subject for analysis. Some receivers are "targets", usually line managers or HR managers. However, this group might also include government officials, financial analysts, and even suppliers or customers. The goals for these receivers are often to directly improve decisions or to persuade them to a certain opinion. Other receivers are "observers," who do not represent primary targets for persuasion or decision support. Nonetheless such groups will observe the HR measurements and for judgments about their significance. Often, the symbolic value of the measurements will be important here, as they signal what the organization values. Persuasion and decision influence are also important here, but the effects are often indirect and frequently not considered by creators of measurement systems. Finally, we could focus on the "senders" of HR measurement information. The HR managers and others who use measurement systems make choices about their tactics that may help us better understand the adoption and effectiveness of those systems.

Thus, we adopt a "choice" model of HR measurement, in which such systems are adopted based on communication goals and probable receiver responses (Shelby, 1988, 1991). Such choices may be informed or uninformed, political or altruistic. The premise is that better understanding why such choices are made, and better understanding the receiver responses to HR measurement systems will lead to more effective choices. Such an approach clearly acknowledges the possibility for unethical or political motivation in such choices, which may create some uneasiness. "Such discomfort is preferable to ignorance, however" (Pfeffer, 1981).

HR Measurement as Decision Support

Perhaps the simplest reason to measure HR management is to improve decisions. This is certainly one of the most widely-proposed reasons for the existence and continued development of measurement models and methods (Boudreau, 1991; Cascio, 1991; Flamholtz, 1984). While much has been made of the ability of improved HR measures to improve decisions, the evidence for such improvements is very sparse. In fact, the one recent study to explicitly examine the effects of utility analysis on decisions found that the more elaborate utility analysis actually had a negative effect on manager's willingness to adopt a particular selection program (Latham & Whyte, 1994). Given the fundamental importance of the premise that improved HR measures improve decisions, one would expect to see far more research devoted to this issue. From a normative perspective, HR measures create value to the extent that they (1) Improve a large number of decisions; and/or (2) Improve important decisions (Boudreau, 1991). To date, no study has examined the effects of different HR measures on the decision processes of managers facing actual organizational choices. Though proposals for HR measurement abound, they are not generally supported by evidence that improved measurement actually improves decisions. Future research could address this issue by examining which organizational decision makers actually receive and use HR information, the effect of that information on their decisions, and the effects of those decisions on organizational outcomes. Anecdotal evidence (e.g., Florin-Thuma & Boudreau, 1987) suggests that HR measurement can induce managers to think differently about the way HR practices affect organizational outcomes, but much better developed theory is needed to guide research and development of systems that will indeed improve decisions.

Decision Theory and Biases

Decades of research have demonstrated that human decision makers fall prey to predictable decision biases (Bazerman, 1990). For example, evidence suggests that when gambles are framed as choices between certain moderate losses versus the possibility of either large loss or no loss, most people tend to choose the risky choice. Exactly the opposite effect

occurs when the choice is "framed" as gains, even when the economic outcomes are the same across all four situations. People also tend to overestimate the probability of events that are very vividly depicted or recalled, compared to events that are less vivid. The list of such biases is extensive, and suggests that decisions may depart from an economically "rational" model even when decision makers have no ulterior motives.

These affects may well influence reactions to HR measurement systems, but we have very little evidence about such effects. Moreover, the possibility of such effects is seldom incorporated into the design of HR measurement systems. For example, if HR measurements emphasize costs and cost reduction, costs become very vivid. Past HR practices that resulted in reduced costs are remembered clearly, while practices that produced enhanced work force value may not be so well recalled. Over time, this may create a bias in favor of programs that can generate cost reductions, while worthy programs that produce "less measurable" value are ignored or rejected. Theories of decision behavior can provide frameworks to guide research and practice to develop measurement systems that better guard against such decision biases.

HR Measurement as Persuasion

Perhaps the most pervasive body of theory and evidence about measurement and its effects emanates from the field of communication, especially persuasion. Though seldom applied to questions of HR measurement, this literature very explicitly addresses information (including measurement) as a decision focused on influencing receivers, usually to the benefit of the sender (Quinn, Hildebrandt, Rogers & Thompson, 1991; Reardon, 1991; Perloff, 1993).

Transmission Characteristics

Some persuasion theories focus on attributes of the information source, message, and channel. Sources exhibiting expertise may be more persuasive, especially for receivers with low involvement in the issue. Trustworthiness may be enhanced by adopting a position at odds with the source's known biases (e.g., Ronald Reagan expressing support for Gorbachev's reform efforts).

Message-related factors include evidence (facts originating from outside sources), which has been shown to be one of the most persuasive factors, with highly-involved receivers being affected by the quality of the evidence, and low-involved receivers responding to the apparent amount of evidence. Factors such as vividness, the use of fear appeals, the use of two-sided messages that acknowledge opposing arguments, and whether one points out the conclusions to be drawn have all been examined.

Channel-related factors include whether messages are presented visually or in writing. Such effects seem to interact with the complexity or difficulty of the message.

Receiver Characteristics

Source, Message and Channel factors reflect the message-sending process. Several theories focus on the activity of message receivers. Perhaps the most widely-cited of these is the "elaboration likelihood model" (Petty & Cacioppo, 1984). This model suggests that individuals may process messages "centrally", which involves a good deal of thought, internal cognition and "elaboration," or they can process messages "peripherally," which involves limited cognitive involvement, and relies on broad cues and images. Whether a receiver uses one route or the other depends on the personal relevance of the issue, their cognitive ability and need, personal knowledge, distractions, message comprehensibility etc. If a receiver uses the "central" processing route, they are more likely to be persuaded by the quality of evidence, less persuaded by peripheral cues (number of arguments, attractiveness of the source, etc.), and more likely to form enduring attitudes.

Organization Characteristics

Dutton & Ashford (1993) draw on the persuasion literature to suggest factors related to middle-manager's success in "selling issues" to top management. The goal of such selling is to gain top management attention to the seller's issue, and to see subsequent action. Their model emphasizes the importance of the organizational context and consequences of measurement. Moreover, it may be particularly important to HR measurement because HR managers are frequently "middle managers" attempting to influence higher-level managers through their HR measures. This framework is particularly valuable in recognizing the effects of the "issue selling" process on peripheral observers. It also provides a framework for analyzing how issues are "framed," to create impressions of partnership, obligation or blame. Pfeffer (1981) has proposed that the selling processes of middle managers are one factor in the way that organizations create "meaning." The issues that top managers choose to attend to create symbolic signals to employees, shareholders, and financial analysts. There is some evidence that HR "reputation" may correlate with changes in share price (Hannon & Milkovich, 1995), though the results were mixed.

Self-Interested Senders

It has been noted that a utilitarian perspective on communication must recognize that senders act in their own self interests (Dutton & Ashford, 1993; Pfeffer, 1981). A vivid examples is provided by Argyris (1994), who describes several examples of "good communication" that blocks learning. He proposes that most communication systems foster direct single-loop responses with specific actions addressing specific problems. However, they tend to stifle "double-loop" learning which requires asking questions about the fundamental premises of the

organization. For example, total quality management efforts may produce suggestions to drastically reduce costs. However, traditional communication about total quality may fail to ask why the cost-reduction opportunities went unrecognized for so long. Managers are often reluctant to engage in double-loop communication because it risks questioning familiar and often personally valuable traditions.

Implications for HR Measurement

Persuasion-based theory presents a rich opportunity for research and practice in HR measurement. Every HR measurement carries persuasive components, whether managers are aware of it or not. For example, highly complex "business case" analyses may presume that those receiving the information are "centrally" involved, and prepared to devote cognitive effort to the message. If, in fact, the audience is only peripherally involved, the appropriate measurement system might better rely on peripheral cues such as the amount and attractiveness of the information, or personal appeals from recognized experts. This theory also draws attention to the importance of considering the impact of HR measures as signals of organizational values and priorities. For example, attitude surveys may serve to signal that the organization values the welfare of its employees, regardless of the value of the information for improving decisions. Presently, we have virtually no information about whether the persuasive characteristics of HR measurement systems affect those who receive the information. We do know that HR measurement systems span the range from highly elaborate and quantitative to simple and qualitative. It would be interesting to determine if the pattern of these differences appears to reflect the influence of factors from persuasion theory, and whether the correspondence of HR measures with persuasion principles is correlated with their persuasive effects.

There is also opportunity for enhanced research and practice by examining the motivations of those designing HR measurement systems, within the framework of "issue selling" and persuasion. We have all encountered managers who resist our suggestions to measure certain outcomes because the results might prove troublesome or disturbing. It would be interesting to explore whether such considerations affect the design of HR measurement systems as well.

HR Measurement As "Fashion Setting" for Innovation

Johns (1993) notes that human resource practices widely viewed as effective by psychological researchers (e.g., performance-based pay, structured selection systems, productivity-based recruitment) are adopted only slowly by organizations, despite research evidence supporting them. He proposes several reasons for slow adoption, including: (1) HR practices portrayed as "technical," using quantitative and rational measurements, when in fact HR practices are "administrative", affecting the social system of the organization, and subject to more political or social interests; (2) HR theory and research often ignores the social context, which makes evidence difficult to apply or generalize; (3) HR practice effects often involve very complicated causal chains, creating uncertainty about their effects; (4) Innovations are often motivated by external threat or exogenous shock; (5) Administrative innovations tend to be adopted first by large organizations and then imitated by others. He suggests that adoption of research-based HR practices would be enhanced if researchers focused on creating external pressures in government, more frequently provided the names of research sites and the context of the research, do research in purer contexts of greenfield sites, and create social networks to enhance visibility.

Abrahamson (1991, 1994) suggests that while many lament the tendency for HR innovators to follow fashions and fads, the proper response by HR professionals and scholars should be to study this fashion-setting process. He suggests that innovations often exhibit popularity behavior similar to fashions such as hemlines not for trivial reasons, but for predictable and logical reasons. "Norms of progress," require that managers appear to solve old problems and create new and innovative ways to address new problems, creating a need to identify what techniques are considered progressive at any time. Abrahamson suggests that this identification process is influenced by a management "fashion-setting industry" including management consultants, business schools and the business press. These fashion-setters invent or discover management techniques and then imitate and diffuse them by discourse about performance gaps and solutions. Some theories of management fashion adoption suggest that fashion followers react to frustration, a need for novelty, or a need for status. Others suggest that consumers of fashion are motivated by more social-technical processes such as economic fluctuations, tensions inherent in organizational structures, and bounded rationality.

HR measurement systems are both influence and are influenced by the dissemination of innovations, and their resemblance to fashion. If HR practices are administrative, then measurement systems that better explicate causal chains, account for context, track external

shocks and pressures, and reflect the practices of large organizations are likely to be most effective in promoting innovation. Such systems might be to include measures of the "innovativeness" of HR practices. Organizations "innovation" as one dimension of its HR measurement system, and tracked the number of times its practices were featured in the business press, the number of inquiries received from other companies, and the number of awards received. To better explicate causal chains, organizations might measure HR practices at several levels. Many organizations consider the "four levels" of evaluation in their measurement (reactions, learning, behaviors, and results , Kirkpatrick, 1994), at least in the design phase. Theories of innovation suggest that a key component of measurement must be to show the links between these levels, to better explain the causal chains between HR effects.

Research is needed because we have virtually no scientific evidence to suggest whether a theory of innovation and fashion-setting describes how HR measures are used and developed. Do key decision makers look for evidence of innovativeness in HR practices, as a key dimension in their adoption? Are they concerned with uncertainty and the complexity of causal chains? Do they *focus* more on the social and political ramifications of HR practices than their "technical" effects on core organizational goals? Answers to these questions may provide important insights into the nature of HR measurement and its effects.

Conclusion

The examples here show that there is much to be learned about the effects of HR measurements on their receivers. Fortunately, there is also much available theory, and some empirical research, to support these investigations. Changing the focus of HR measurement from the measures to their effects uncovers important gaps in our knowledge, and important opportunities for further research and measurement system development. One fundamental fact of future organizations will be an abundance, even a tidal wave, of information. HR measurements will increasingly have to compete with ever greater amounts and types of information. While past work has helped to expand HR measurement techniques, both managers and scholars would be well served by systematic research on how to make those techniques more effective.

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