Judging Interpretive, Critical and Realist Approaches in IS Case Research

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Abstract
This article presents a case vignette involving the renaming of an organizational change process from BPR to outsourcing. The paper discusses how different research approaches provide fundamentally different ways of looking at the name change. It demonstrates how theory can provide useful yet markedly different interpretations of such organizational events. Critical theory and interpretive theory operate from within what can be termed the transitive epistemological dimension, whereas critical realism tends to emphasize the importance of ontological issues. Each has important things to say about the situation and improves our understanding overall. The paper argues that, for the particular case under examination, critical realism provides the most useful tool from the employee point of view.

Keywords
Critical realism, outsourcing, interpretivism, critical theory, judgemental relativism

INTRODUCTION
A case vignette will be presented presenting a public organization moving towards the outsourcing of their IT Department. It then examines how the research may be developed from a critical, interpretivist and a realist perspective.

Orlikowski and Baroudi (1991) classify IS research traditions as basically following three major philosophical approaches – positivist, interpretive and critical, the interpretive and the critical responding to shortcomings in the positivist. In its neglect of contemporary realist approaches such a division reflects a commonly held view equating realism with positivism. This article calls for a recognition that modern realist approaches can also address many of the criticisms of positivism.

THE CASE VIGNETTE
When I joined the planning group in the mid 1990’s the organization had recently completed the first draft of the new Information Business Plan. The plan was largely formulated along the same lines as the other internal business plans (covering money, assets, and people, respectively) and formed a part of a detailed planning process that involved planning across corporate, business, and branch levels.

At the time the organization could be characterized as traditionally an engineering-focused organization with little time for the information systems department, IT was seen as a cost centre with a primarily non-core role. The development of the first Information Business Plan was a major coup for the IT Department in that it placed the importance of IT at the same level as the other organizational businesses of money, assets, and people. This enthusiasm was, however, short-lived, as soon after the completion of the Information Business Plan the organization began to move toward the outsourcing of deemed non-core activities.

Prior to the decision to outsource, the organization saw the IT department as providing a service function:

_The organisation in those days saw IT as a necessary evil. They were focused on one of two things, engineering or financial considerations and IT was something they had to have, but they didn't really want to spend any money on it and all the money they had spent, was too much - 'where was the return on the investment?' - that was the continual question._

(Interview - IT Planning Manager post outsourcing)

The development of the first Information Business Plan was a major achievement in an engineering focussed organization, yet there was a degree of opposition to this idea as an employee later pointed out:

_The prevailing view of executives at the time was that it was completely inappropriate to describe the information thing as a business. That caused quite a bit of grief and controversy - it is merely a process. No way is it a core business, it is just a support process or function._
In order to properly complete the Information Business Plan there was an initial need to examine the information requirements of the various business processes - the IS Manager led this modelling exercise. Over the period 1993-1995 the IS Manager developed the Information Business Plan and continued work on process modelling and investigations into outsourcing of non-core processes:

On the practical side of delivering a service we were starting to shine, we were winning TQM awards, the quality of our service was very good, and we were getting accolades in the press, the cost of our service was benchmarked internationally in the top six in the world. So things were going very, very well. (IS Manager).

This observation was confirmed in later interview with the then Managing Director. He indicated that the IT Department benchmarked very well being one of the leaders internationally within the industry sector as well as being towards the top in other similar industries.

The IT Manager originally felt that the investigation into outsourcing was simply an exercise with no real plan to move ahead with outsourcing:

In fact I went to a board meeting where the question was raised “Why the hell are we looking at outsourcing IT, when we've just had IT successfully benchmarked internationally; we know we run efficiently, effectively - we've just given these guys the first TQM award in the organisation because they're working so well. So why the hell do we even bother looking at it?” And what came back was it's a government directive that we look at it. So we really told the staff don't worry, it's an exercise that the government wants to go through and that we know that the results and figures will show there's no way people can come and run it any cheaper than we do. And that wasn't true, the exercise was "this gets outsourced, whether it was economic or not". It took a while for me - I believed, and my director believed that this was a paper exercise and we were looking at outsourcing of many areas. It was an agenda simply to force IT out whether it was economic or not. (IS Manager)

IT came to be considered as non-core and was one of the first areas to be targeted for outsourcing. In the mid-1990s the outsourcing project was initially termed a business process reengineering (BPR) project. Staff initially accepted this BPR tag but over time they came to reject the term, as they felt that it did not reflect what was actually happening—they felt that the study was basically an investigation into the feasibility of outsourcing, not BPR. This dissatisfaction emanated from the planning manager and other staff and prompted a change in the title of the project to corporate repositioning and then again, at a later date, to outsourcing. According to the IS Manager at the time, the term BPR annoyed staff:

Well, the staff simply refused to call it that “Let’s call a spade a spade—Bugger this, we won’t call it BPR any more,” they said—“It’s a false term. Let’s not pretend.” After a while it became obvious what the agenda was and some of the directors who pushed BPR objected themselves to hiding outsourcing under the term BPR.

THE RESEARCH QUESTION

Critical Theory

Critical theory has lofty aims in that the purpose of critical theory is seen as enabling members of a society to alter their lives for the better by fostering in them important self-knowledge and understanding of the social conditions under which they operate, such knowledge then providing a basis for emancipatory change.

Alvesson and Willmott (1992) argue that “central to critical theory is the emancipatory potential of reason [-] to reflect critically on how the reality of the social world, including the construction of the self, is socially produced and, therefore, is open to transformation. The task of critical theory is to combine philosophy with social science to facilitate the development of change in an emancipatory direction.” Flood and Jackson (1991, p. 49) see emancipation as an interest in freeing “individuals from constraints imposed by power relations and in learning, through a process of genuine participatory democracy, involving discursive will-formation, to control their own destiny.” The individual’s power to reason and consequent self-emancipation plays a major role in critical theory.

Habermas (1984) highlights the important role that language and communication play within critical theory when he suggests that people can follow two fundamental postures in a social situation—achieving success or communication. Actions directed toward achieving success (purposive rational) can be either instrumental or strategic. Instrumental action treats participants as inanimate constraints who can be manipulated to serve the self-interests of the main actor. In contrast, strategic action treats participants as intelligent, involved players with their own self-interests and aims—thus requiring a strategic approach to properly achieve the main actor’s self-interest.
The second fundamental posture that actors may represent is that of communication - the primary desire is to achieve a consensus and understanding. Hirschheim and Klein (1994) argue that a communicative orientation is directed toward sense making - an emergent process that involves mutual understanding and shared appreciation of situations based on common shared background assumptions and beliefs. Where such a common base does not exist, discursive action may ensue. Discursive action may result when participants have some doubts as to the clarity, truthfulness, correctness, or appropriateness of any communicated message. Instrumental and strategic action fundamentally emphasizes control, whereas communicative and discursive action emphasizes sense making and argumentation.

For the case example critical theory could emphasize the role that language plays in social situations. The name change from BPR to outsourcing could be presented as an example of the important role that language plays in social situations and how language can implicitly construct a particular reality. Critical theory emphasizes the importance of identifying inequitable structures – such identification providing the opportunity for understanding and consequent self-emancipation. This emphasis on understanding and description suggests the research would be directed towards an examination of the role that language plays in the corporate change process and the possible emancipatory opportunity provided by changing the name of the change process. There would not be a single research question on which to base the research but an emphasis on identification and understanding.

The original naming of the process as BPR can be seen from a critical perspective to reflect instrumental action on the part of management in that their aim can be seen to force the change process through. BPR at the time was very faddish and the tag would have been useful as a means to internally and externally justify and support the severe change that was intended to follow. The change in name to outsourcing represented a mellowing of this approach and can be seen to reflect the important acceptance by management that personnel concerned were intelligent involved players with their own self-interests and aims that needed to be recognized. The employee appreciation of the falsity of the BPR tag can be seen to be emancipatory from their perspective. The identification of this language structure being used by management allowed employees to push for greater honesty on the part of management. For the employee targeted for outsourcing severance terms and conditions needed to be defined and the change in name to “outsourcing” provided an important basis for this concentration.

**Interpretive Theory**

Orlikowski and Baroudi (1991 p. 13) present interpretivism as emphasising the social nature of reality:

> Interpretivism asserts that reality, as well as our knowledge thereof, are social products and hence incapable of being understood independent of the social actors (including the researchers) that construct and make sense of that reality

Klein and Myers (1999, p. 69) describe interpretive research from a practical, methods based focus:

> IS research can be classified as interpretive if it is assumed that our knowledge of reality is gained only through social constructions such a language, consciousness, shared meanings, documents, tools, and other artifacts.

They suggest a number of principles for good interpretive practice and specifically argue that a major problem with many interpretive projects is their failure to clearly define the emergent nature of research - “we are [often] given little understanding of how the researchers’ analysis developed over the course of the project. As it stands, we are presented with a finished piece of interpretive research with few indications of its emergent nature” (p. 84).

Walsham (1993, p. 4) suggests that interpretive methods of research focus on understanding the context in which the information system is placed and how the information system influences and is influenced by that context. He states:

> Interpretive methods of research start from the position that our knowledge of reality, including the domain of human action, is a social construction by human actors and this applies equally to researchers. Thus there is no objective reality which can be discovered by researchers and replicated by others... Interpretivism is thus an epistemological position, concerned with approaches to the understanding of reality and asserting that all that knowledge is necessarily a social construction and thus subjective (p. 5)

Subtle differences between the three definitions of interpretivism emphasize the divergent nature of research approaches within this paradigm. Walsham/ Klein and Meyers present a weaker constructivist argument than Orlikowski and Baroudi who suggest that reality itself is socially constructed. A somewhat weaker constructivist
position is presented by Walsham/ Klein and Meyers when they suggest that interpretivism presents our knowledge of reality as socially constructed rather than the reality itself.

Orlikowski and Baroudi (1991, p.18) summarise the weaknesses of the purely interpretive approach (based on Fay 1987):

First, the interpretive perspective does not examine the conditions, often external, which give rise to certain meanings and experiences. Second, research in this perspective omits to explain the unintended consequences of action, which by definition cannot be explained by reference to the intentions of the humans concerned... Third, the interpretive perspective does not address structural conflicts within society and organisations and ignores contradictions which may be endemic in social systems... Finally, the interpretive perspective neglects to explain historical change; that is, how a particular social order came to be what it is, and how it is likely to vary over time.

Orlikowski and Baroudi’s specified weaknesses are largely addressed within Klein and Meyers (1999) set of principles for good interpretive practice. They argue that any interpretive approach should incorporate a recognition of the following important principles:

1. The Fundamental Principle of the Hermeneutic
2. The Principle of Contextualization
3. The Principle of Interaction between the Researchers and Subjects
4. The Principle of Abstraction and Generalization – the revelations from the data need to be related to general theory
5. The Principle of Dialogical Reasoning – requires sensitivity to the possibility of contradictions between the theoretical pre-conceptions guiding the research and the story emerging from the data.
6. The Principle of Multiple Interpretations
7. The Principle of Suspicion

Klein and Meyers incorporate critical aspects within their underlying principles and perhaps suggest a critical interpretive approach in their demand for suspicion and contextualization. The principles they suggest help to address the shortcomings identified within Orlikowski and Baroudi’s article.

For the case example an interpretive approach would attempt to critically describe and understand the happenings from the perspective of the organizational players. Such examination may well reflect on the low level of morale over the time of outsourcing examination and the anger of the lower level management as they come to realize the dishonesty of naming the change process a BPR process. Perhaps the researcher may have an important role in initiating this process through their questioning of the reasons behind the BPR tag.

The research question may well be vague at the outset of the project in that the research is largely emergent from interaction and subsequent reflection. Multiple perspectives need to be appreciated and included – such variance helping to negate the criticism that interpretivism tends to ignore external structures and their effects. Often the more junior levels of management may not have sufficient knowledge to be able to fully describe impacting influences. The neglect of senior management levels is not however an immediate failure for the interpretive researcher in that the target is to appreciate the situation from the perspective of those interviewed – as long as the limitations of the knowledge derived are made clear such description can still be valid. Similarly the concept of the hermeneutic circle can help to obviate this neglect of external influences (or macro-level impositions) through reflection based around the continual movement from the whole to the parts and back again.

Clearly for the interpretive researcher there are two major stories – that for the researcher and that for the researched – each story needs to be told. Reflective examination of the extent to which each are impacted by the other also needs to be included and continually examined.

Critical Realist Theory

Many recent articles from within the Information Systems arena present an old-fashioned view of realism. For example, Iivari, Hirschheim and Klein (1998) see classical realism as seeing “data as describing objective facts, information systems as consisting of technological structures (“hardware”), human beings as subject to causal laws (determinism), and organizations as relatively stable structures” (p. 172). Wilson (1998) sees the realist perspective as relying on “the availability of a set of formal constraints which have the characteristics of abstractness, generality, invariance across contexts”.

Fitzgerald and Howcroft (1998) present a realist ontology as one of the foundational elements of positivism in discussing the polarity between hard and soft approaches in IS. Realism is placed alongside positivist,
objectivist, etic epistemologies and quantitative, confirmatory, deductive, laboratory focussed and nomothetic methodologies. Such a traditional view of realism is perhaps justified within the IS arena as it reflects the historical focus of its use, however, there now needs to be a greater recognition of the newer forms of realism – forms of realism that specifically address all of the positivist leanings emphasised by Fitzgerald and Howcroft (1998).

Critical, or transcendental, realism as envisaged by Bhaskar (1978, 1979, 1986) argues that there exists a reality totally independent of our representations of it; the reality and the "representation of reality" operating in different domains, roughly a transitive epistemological dimension and an intransitive ontological dimension. Such a proposal is common to many realist approaches and is referred to by Searle (1995) as external realism.

Critical realism does not, however, rest solely on this presumption. As Lawson (1997) argues transcendental (or critical) realism as originally proposed by Bhaskar (1978) is developed around a scientific realist position which asserts that “the ultimate objects of scientific investigation exist for the most part quite independent of, or at least prior to, their investigation” (p. 15). This common external realist position is however extended under critical realism in that it also presents a philosophical argument for the nature, constitution and structure of the underlying objects of enquiry. As Sayer (2000, p. 19) contends “Compared to positivism and interpretivism, critical realism endorses or is compatible with a relatively wide range of research methods, but it implies that the particular choices should depend on the nature of the object of study and what one wants to learn about it”.

Such a proposal is heavily concerned with ontology or metaphysics, that is, the nature of being and existence. Bhaskar (1978) develops his realist philosophy of science founded on the question “under what conditions is science possible?”. This philosophical questioning concludes a, so-called, depth realism that proposes that “the world is composed not only of events and our experience or impression of them, but also of (irreducible) structures and mechanisms, powers and tendencies, etc. that, although not directly observable, nevertheless underlie actual events that we experience and govern or produce them” (Lawson, 1997, p. 8).

Such arguments are extended to the social arena in a similar fashion through considering the associated question “under what conditions is social science possible?”, again the conclusion being that social “science” is only possible if similarly real (relatively) enduring structures exist within the social arena. Having concluded the existence of such objects of social enquiry Bhaskar and others have developed a line of enquiry consistent with these presumed underlying social objects. Such required consistency between ontological and epistemological matters has lead to the critical realist observation that many of the things that traditionally have been done in the social arena are actually inconsistent with the underlying nature of the social objects proposed (see for example Lawson (1998) who presents some of the inconsistencies evident in the traditional use of economic theory in the social arena).

A particular example of this inconsistency is Bhaskar (1979) who presents fundamental problems with the way that prediction and falsification have been used in the open systems evident within the social arena. Prediction is often tied in with inductive reasoning which moves from the particular to the general. For example the particular observation that numerous ravens are black moves to the general claim that “all ravens are black”. Inductive reasoning is important in the experimental testing of theory in that induction consists in starting from a theory, deducing from it predictions of phenomena, and observing those phenomena in order to see how nearly they agree with the theory. For the critical realist a major issue with social investigation is the inability to create closure - the aim of "experiment" in the natural sciences. Bhaskar argues that this inability implies that theory cannot be used in a predictive manner and can only play an explanatory role in social investigations since:

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\text{in the absence of spontaneously occurring, and given the impossibility of artificially creating, closed systems, the human sciences must confront the problem of the direct scientific study of phenomena that only manifest themselves in open systems -- for which orthodox philosophy of science, with its tacit presupposition of closure, is literally useless. In particular it follows from this condition that criteria for the rational appraisal and development of theories in the social sciences, which are denied (in principle) decisive test situations, cannot be predictive and so must be exclusively explanatory. (Bhaskar, 1979, p. 27)}
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Bhaskar argues that the primary measure of the “goodness” of a theory is in its explanatory power. From Bhaskar’s perspective, predictive use of theory is not possible in open social systems and therefore cannot be a measure of goodness. From this point of view theory can only be used as an explanatory tool – explaining events in hindsight.

Critical realism questions the usefulness of deductive or inductive reasoning in the open systems of the social arena and proposes that retroductive (“what if” type) reasoning is more appropriate. Such a perspective is consistent with a depth realism where explanation is not about prediction but about the steady unearthing of deeper levels of structures and mechanisms. The philosophical argument provided by the critical realist largely defines the type of questions the researcher can ask and the way that the research may progress.
For example, in the described case, the initial research question may well be propositional in nature – “under what conditions can a seemingly successful IT Department be outsourced?”. Such questioning may well lead to the proposal of external structures (social and physical) that impact the situation. Once these structures have been proposed the question then moves towards identifying possible mechanisms by which the structures may impact the situation. If mechanisms by which structures impact the situation cannot be found, one may question the explanatory power of the proposed pre-conditions. In the case example, a social structure termed governmental influence may be proposed. This would not provide sufficient explanatory power in itself as one would need to then define the means by which the structure could have affected the outsourcing event. If the researcher can propose an associated mechanism by which the structure impacts the situation, the researcher can then propose this particular confluence of structures and mechanisms as one of many explanatory possibilities. Judgement as to which of the explanatory possibilities is “best” depends on how well the explanation matches the observed happenings (the explanatory power).

A major focus within such realist research would be the identification of the mechanisms by which a governmental structure could impose itself. It may well be that the ability of the government to hire and fire Managing Directors is one such mechanism that would help to explain the observed happenings. Subsequent research activity would then target the examination of this possibility.

CONCLUSION:

Clearly this article is realist in focus. It suggest that critical theory, interpretive theory and modern realist approaches can provide useful insights into a research situation but the conclusions generated are largely dependent on the particular approach selected. As Archer (1995) suggests:

The nature of what exists cannot be unrelated to how it is studied . . . the social ontology endorsed does play a powerful regulatory role vis-`a-vis the explanatory methodology for the basic reason that it conceptualizes social reality in certain terms, thus identifying what there is to be explained and also ruling out explanations in terms of entities or properties which are deemed nonexistent (p. 16–17).

Craib (1992) suggests there are two fundamental purposes for social research – explanation or description. He argues for the importance of explanation in comparison to description and notes the increasing emphasis on description. He sees this concentration on description rather than explanation growing out of “a general scepticism about the possibility of explanations, of a totalising theory, and this in turn has led to theory concerning itself with description” (p. 26). Interpretivist and critical approaches can be seen to emphasise description rather than explanation. For the realist the critical and interpretive emphasis on the knowledge based dimension suggests that identification and description tend to be the major focus of such approaches. A modern realist approach such as critical realism also seeks to unearth impacting objects, but its greater emphasis on ontological matters directs its focus towards explanation and a deeper level of analysis.

Whether it is possible to say one approach is better than another is a classic relativist argument. The realist would suggest that the object and purpose of the research can lead to a judgement as to which is better. For example, in the case example, if the purpose is to provide possibilities for real emancipatory action by the concerned organizational players, identification of impacting structures and mechanisms is necessary. The ability of the government to hire and fire Managing Directors would be an important mechanism by which the governmental structure imposes the outsourcing requirement. From the employee’s perspective, this understanding of associated mechanisms is essential if meaningful action is to take place to block the outsourcing. In contrast to this realist understanding interpretive and critical approaches are particularly useful for identifying possible structures, but, the social ontology they endorse does not encourage a deep examination of such structures nor the mechanisms by which they impact the research situation.

Wilson (1999) comments on the remarkable resilience and resourcefulness of realist argument in the face of the “rise of relativism” and suggests that it may be too soon to say that realist argument “lies in ruins” (p. 163). This paper supports this proposal by suggesting that a suitable subjectively aware realist approach still has much to offer.

REFERENCES:


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