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Understanding Procurement Methods in Practice:
An Alternative Perspective

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Abstract: The aim of this paper is to propose an agency-structure perspective on understanding how procurement methods are enacted in practice. It is argued that procurement methods manifest within a complex web of interconnections between various actors and the industrial structure. As an example, this paper focuses on the interrelations between the quangos’ promotions of procurement initiatives and construction firms’ responses to these initiatives. An understanding of such interrelations is achieved by integrating three sources of data regarding procurement developments. First, an analysis of the industry is considered as structural forces which influence procurement developments. This knowledge will be obtained through a literature review of the industry, including the overall economic conditions, the state of the industry itself, and the nature of construction demands. Second, the business path development of construction firms is regarded as responses to procurement initiatives. The method of case study will be applied to understand how construction firms’ business path is related to procurement initiatives of time. Finally, a review of quango construction reports will be undertaken. Each report’s key recommendations and impacts related to procurement initiatives will be identified. The three sources of data will then be plotted onto a timeline graph in order to form a more in-depth analysis. An assessment of the three sources of data at a chosen point/s for interconnections and causal relationships would then be undertaken. It is concluded that considering the interrelations between the three sources of data will offer a greater understanding of procurement methods in practice.

Keywords: Agency structure, Business path, Construction industry, Construction reports, Procurement initiatives

1. Introduction

There are a number of industrial forces and actors, each with their own agendas, all trying to influence and shape the construction industry into what they think it should look like. At the same time there are a number of other issues to be considered, such as companies, gurus, economic issues, competition, and government policy. This research contends that procurement research is fragmented, being polarized by numerous industry constituents such as quangos, practitioners and industry commentators. Data types have already been identified as relevant in analysing types of procurement (Gruneberg and Hughes 2004). McDermott (1999) provides a coherent review of the different theoretical foundations associated with procurement whilst also arguing it is a social science. Furthermore, it is argued that only by considering the interaction between numerous constituents can we hope to inform the debate. This is done by using procurement as a lens through which to present an alternative research method for developing work.
From this introduction, this paper moves to provide some reasoning for the chosen data sources of interest; historical observations/industry commentators, past construction futures reports and case studies of practicing firms. With the relevance of these established, the paper goes on to outline a research design, embracing the data sources mentioned. From there the paper presents an example of how the future research may unfold before drawing initial conclusions.

2. An Alternative Perspective

The positions from which to view and understand procurement are numerous, ranging from ‘history, sociology, economics, psychology, law and politics’ (McDermott 1999). Green (1994) related procurement research towards a positivist orientation, thus tending to accord with a structural, rather than an agency perspective. When combined with the diversity of methodological approaches this means the available research findings lack cohesion. This lack of cohesion is compounded by research focussing upon different constituents within the industry, such as professional institutions (Winch 2000). The purpose of this paper is to present an argument for looking across data traditionally embedded within different perspectives to bring a greater degree of cohesion. Traditional approaches, related to competitiveness and procurement, have focused solely upon either agency or structure related to competitiveness and procurement.

Theories empathising with the structural dimension recognise the ‘exogenous structural constraints’ of particular contexts ‘in which actors were seen as subordinate to the social system’ (Whittington 1988). Theories within this dimension differ in the importance placed upon structural influences. However, they all share fundamental beliefs such as ‘there are external rules and regulations governing the external world’; that reality has a ‘continuing order and pattern’ and they thereby seek ‘to provide an explanation of what is’ (Burrell and Morgan 1994). Theories empathising with the agency dimension ‘celebrate agency but belittle structure’. They further embrace the notion of an ‘actor’s capacity for independently motivated action’ (Whittington 1988). Research that emphasises the importance of agency also offers numerous different theoretical positions. However, a common aspiration ‘is to understand the subjective experience of individuals’; using theories ‘constructed from the standpoint of the individual actor as opposed to the observer’, with ‘an attempt to get inside and to understand from within’ whilst viewing ‘social reality as an emergent process’ (Burrell and Morgan 1994).

There has of course been much debate within the construction management (CM) literature of the validity of differing research approaches, thereby echoing the ‘paradigm wars’ of other disciplines. Seymour et al. (1997) did much to initiate a debate regarding the relevance of the interpretive paradigm in CM research. In response, Runeson (1997) mobilised a robust defence of the ‘scientific method’. Raftery et al. (1997) advocated a multi-methodology approach whereas Wing et al. (1998) focused on the need to match different approaches to different research questions. Irrespective of the relative merits of these arguments, the search for less polarized and more inclusive approaches continues to gain relevance. The previous section briefly outlined literature associated with competitiveness and procurement, which traditionally empathizes with either agency or structure whilst not fully appreciating their interconnectivity. It is proposed that taking a cross-sectional view across a number of different data sources may well offer an improved understanding.
There is evidence of research recognising and empathising with integrative thinking in CM literature. Loosemore (1998) combined the traditionally separate techniques of social network analysis and content analysis in order to help understand crisis management. Others have gone further, for example, Fernie (2005) utilized Gidden’s (1979) structuration theory to argue that supply chain management ‘does not make sense in the construction sector’. Larsen (2005) used a multi-methodology approach to generating a framework synthesizing innovation diffusion concepts traditionally embedded in different paradigms. Other recent works, which sought to empathise with an integrative perspective, include Green and May (2005) who sought to understand the ‘micro arenas’ and ‘macro structures’ related to lean construction. Harty (2005) added support to the middle ground through a socio-technical systems perspective in order to understand how innovations manifest themselves differently within different contexts during the diffusion process. Finally, Bresnen et al. (2005) has also exploited the structuration theory, although the focus of the work was on understanding changes in project-based organisations. It follows that a research orientation that appreciates the role of agency and structure, and their interconnectivity, potentially offers a richer understanding of the interrelationship between competitiveness and procurement than previously seen within the CM literature.

As such, the research is clearly comfortable at embracing data sources from different backgrounds, thus providing a subtle salute to the terms multi-methodology and triangulation. However, the theoretical position to be adopted for this research finds empathy with the realist school of social science. As such, we are equally as comfortable with the notion of objectively knowable entities, yet at the same time appreciate that individuals may interpret things very differently because of their own belief systems. This encourages quantitative data, derived from the assumption that social practices can be codified, calculated and consequently measured. Similarly, it accepts that actors can interpret the reality they encounter in very different ways and the reality is often reflected through discourse.

3. Procurement Enacted in Practice

Building upon the notion of agency-structure, it is clear that procurement is influenced, yet also influences many elements within and beyond the UK construction industry. In order to clarify this, a hypothetical example is presented below (See Figure 1). This demonstrates the structural forces present within the industry (the outer bubble), the many numerous actors (each potentially with their own agenda), the interaction between them and the potential influence this may have upon procurement.

Clearly, how procurement is enacted may also influence the various actors and even the broader structural forces within the industry over time. In this paper we begin solely by building a case for looking across the structural forces (industry commentators), the firms and the quango initiatives (construction reports).
4. Three Sources of Data regarding Procurement Developments

4.1 Review of Construction Reports – Procurement Initiatives

Numerous reports on construction have been published by governments in the past in order to try and exhort the industry to perform better. For example, Langford and Murray (2002) have reviewed the reports published between 1944-1998 (e.g. The Simon Report in 1944, The Latham Report in 1994, and The Egan Report in 1998) to help understand how successive governments have sought to shape and improve the performance of the construction industry.

These construction reports have attempted to steer possible future developments of the industry, and also tried to form an agenda for the industry and clients to follow. Procurement methods were often regarded as one of key areas for improvement. A number of procurement initiatives, such as prime contracting and partnering arrangements, have been promoted through the form of these construction reports in different periods of time. To a certain extent, these construction reports have influenced and shaped public sector procurement policies or strategies over time. A temporal overview of past construction reports will provide an understanding of what procurement initiatives have been suggested in the last few years. This review of past construction reports is considered as a set of knowledge regarding the development of procurement initiatives.
4.2. Analysis of the Industry – Changes in the Industry and Procurement Developments

From an agency-structure perspective, the industry itself is considered as an exogenous influence on shaping procurement methods in practice. The analyses of the industry offer the set of knowledge for understanding the environment in which procurement methods are developed and enacted. Such industrial analyses include the overall economic conditions (e.g. fiscal issues, interest rates, etc.), the state of the industry itself (e.g. output, number and size of firms, professional institutions), and the nature of construction demands (e.g. public housing, infrastructure orders). This set of knowledge will be sought through the review of relevant literature, such as Bon (1997), Bowley (1966), Hillebrandt (1995), and Ive and Gruneberg (2000) for example. In general, it is argued that an in-depth understanding of procurement developments cannot be achieved without having an over-arching understanding of developments within the industry. The interrelation between industry changes and procurement developments is the main consideration.

4.3. Business Path Developments of Construction Firms – Firms’ Responses to Procurement Initiatives

As a service provider, a construction firm plays a crucial role in how procurement is enacted in practice. It is proposed that firms operate, in relation to procurement, somewhere upon a sliding scale. At one end of that hypothetical scale firms would be completely passive, accepting developments in procurement as they occur. However, at the other end of the scale firms would take a proactive role in shaping and developing future procurement methods with their clients and others. This is a simplistic example, as numerous additional factors have currency here; however, the point being made is that firms are involved in the shaping of procurement, albeit to differing extents. It is this involvement, perception and enacted that will, together with the other knowledge sources, better inform the procurement debate.

In order to understand this better, it is proposed that a number of case studies are conducted. These will potentially reveal a variety of approaches within each firm suited to their individual context. It is initially proposed that regional contractors be the choice of focus for these case studies as they form the majority of the industry and their voice often goes comparatively unheard within research.

5. Integrating Tree Sources of Data: a Timeline Graph

The research aims to combine these three sources of data together by initially presenting them graphically on a timeline (See Figure 2). From the initial research findings it is possible to present here a sample of how the data may look as the research unfolds. This will help clarify the complex interconnectivities between the bodies of knowledge, which impact upon how procurement is enacted in practice.
Fig. 2. A cross-section analysis: three sources of data regarding procurement developments

6. Discussion

As stated earlier the notion of looking across different bases of knowledge in order to improve understanding is not new. It is however greatly underrepresented within existing CM literature. Whilst the key arguments here focus upon three bases of knowledge, it is accepted that there are many potential actors which influence how procurement is enacted, as demonstrated in Figure 1. However, for the purposes of this research, it is proposed that three of the most relevant are used simply as a starting point.

Once the data is collected, individually understood and plotted in relation to time, a cross-sectional analysis can be conducted. This will potentially be done by choosing a specific point of time, and then looking across the three bodies of knowledge. It is suggested that by looking for possible causal interconnections, linkages and influences a rich understanding of how procurement is enacted can be offered. An example of this may include a case study firm describing how it moved to a particular procurement method in partnership with their main client. Such a claim may find resonance with the industry commentators or the construction futures reports. Conversely, the storyline may be absent from the other knowledge sources, potentially indicating that the case study firm has a unique story in shaping their own strategy through procurement methods and client relationships. Such a firm would not have been overtly influenced by the rhetoric of recent construction reports or by other developments within the industry.

Furthermore, it is proposed that the developing research may embrace more themes associated with competitiveness and strategy than just procurement. Potential themes emerging from the literature include IT, skills and training (having the right people suited to the firm and the client), and prefabrication and standardisation. The ongoing work is now focussed upon the empirical data collection and literature reviews in order to begin plotting the data and identifying the causal relationships and interconnectivities.
7. Conclusion

The aim of this paper was to raise awareness of the interconnectivities between attributes influencing our understanding surrounding how procurement is enacted in practice. It has been argued that by drawing upon what can be described as different data sets we may be able to improve our understanding of procurement now and for the future. This would draw upon construction futures reports, historical analysis of the industry and case study data drawn from firms currently practicing within the industry. A timeline is suggested in order to highlight the potential interconnectivities between these traditionally separate data sets. From there, it is argued that by identifying the potential causal linkages an additional understanding may be achieved which will help inform the debate surrounding procurement.

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References


