

THE APPLICATION OF STAKEHOLDER THEORY TO UK PPP STAKEHOLDERS

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Recruiting the constructs of legitimacy, power and interest, together with a social network analysis approach, this research identifies the key stakeholders in Public-Private Partnerships (PPP) infrastructure projects and delineates their involvement in United Kingdom (UK) infrastructure provision. PPP is a provision mechanism capable of delivering more and better infrastructure, nevertheless, it continues to be associated with problems. Defined as a collaboration between the public and private sectors, there is consensus that inherent relationships are a primary source of poor project performance. Literature shows that successful partnerships nurture stakeholder collaboration, yet an absence of defined systems and mechanisms to identify stakeholders has manifested in little agreement as to who ought to be involved in these arrangements. This research fills this knowledge gap. Through the application of Stakeholder Theory, this research determines and profiles the key stakeholders in PPP infrastructure projects. Contingent on their contractual relationship, the findings of this investigation ascertain the key stakeholders to be the private sector Special Purpose Vehicle (SPV) and its constituent members; financiers, construction contractors, facilities management contractors, and the public sector Authority. From an examination of these stakeholders and the PPP 'environment', two relationship dynamics are identified. These relationships transition at financial close, at construction completion and at refinancing. This research adds to knowledge by not only contributing a framework to identify and understand PPP stakeholders, but also by imparting the fundamentals of these key stakeholders, enhancing their understanding, thereby providing the foundations on which to construct improved partnering arrangements.

Keywords: public-private partnerships, infrastructure provision, stakeholder identification

INTRODUCTION

Attributable to its fundamental role in socioeconomic development, internationally, future infrastructure provision is being prioritised and estimated to equate to almost \$80 trillion between 2014 and 2030 (Inderst and Stewart, 2014). Equally, in the UK, there are pertinent signposts indicating a necessity to counter historical under-investment and upgrade much needed services and facilities (NAO, 2015). A failure to keep investment pace with other nations has meant that UK infrastructure now ranks 24th internationally and has subsequently fallen behind many of its competitors (WEF, 2016). HM Treasury (2011) states "Britain will not be able to compete in the modern world unless we improve our infrastructure". To alleviate these deficiencies, under the auspices of the UK government, public and private sector funding will be

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channelled into both economic and social infrastructure through strategised schemes including the National Infrastructure Plan (NIP) and the Priority School Building Programme (PSBP). A model earmarked to play a role in this recovery is Public-Private Partnerships (PPP).

PPP are regarded as being situated somewhere between traditional procurement and full privatisation and are characterised by a whole life-cycle approach. Both public and private sectors are involved not only in the asset construction but also during the operations of the service (Raganelli and Fidone, 2007). The private sector, over a range of contractual mechanisms and performance regimes is typically responsible for design, construction, financing, management and operations of a service. A revenue is accordingly paid to the private sector for the services provided. PPP can thus be defined as a fixed 25 to 35 year arrangement between the public and private sectors; sharing risks, resources and rewards, to deliver infrastructure projects whereby financing comes from the private sector for the provision of public sector services.

In the UK, PPP, and in particular the Private Finance Initiative (PFI) have been previously operationalised across 722 projects with a total capital value of £57.7 billion for the provision of schools, hospitals, roads and prisons (HM Treasury, 2016). Nevertheless, despite having accounted for some 10-14% of capital budgets annually, in more recent years, appetite for this procurement model has lessened. UK PPP models repeatedly have been associated with problems. Conflicting objectives, undefined roles and responsibilities, as well as an absence of trust, are just some factors which have detracted from partnering arrangements. Subsequently, literature signposts stakeholder relationships are a primary source of poor project performance (Roehrich *et al.*, 2014).

In spite of this prominence however, within this body of literature, there is discord as to who overtly should be considered a PPP stakeholder and thus involved in these arrangements; across literature, 15 stakeholders have been proposed. Against this backdrop, it is argued, before these relationships can be improved, there is firstly a forthcoming necessity to address this disparity. To do this, this research adopts the rudiments of stakeholder theory to determine the attributes of stakeholders and the mechanisms by which to understand them. Following this, this will be contextualised to PPP, critically providing the essential building blocks on which to nurture improved stakeholder relationships. This research thus has three objectives: the first is to conceptualise stakeholder theory within the context of PPP, secondly, to identify PPP stakeholders, and finally to determine PPP stakeholder relationships.

STAKEHOLDER THEORY

The origination of stakeholders in literature can be recorded back to the Stanford Research Institute in 1963, appearing in an international memorandum, however Freeman (1984) is often credited with the introduction of stakeholder theory into the management arena with his landmark publication “Strategic Management: A Stakeholder Approach” (Donaldson and Preston, 1995). Stakeholder theory evolved out of corporate social responsibility, organisation theory, systems theory and corporate planning giving consideration to ethical, social and economic concerns. Freeman (1984) claimed stakeholder theory is centred on “the principle of who or what really counts”, offering approaches for organisational management to consider the interests of other parties. Donaldson and Preston (1995) demonstrated that stakeholder theory though essentially normative, can be divided into three theoretical taxonomies: 'descriptive' explains the behaviour and characteristics of the firm, and its

perception of others, 'instrumental' seeks to verify the linkage between organisations, whereas 'normative' describes the role of moral guidelines for operation and management of corporations. Within this paradigm, to understand stakeholders, stakeholder theory has commonly recruited the attributes of power and interest. Power is defined as the ability of an organisation to impose its will to bring about the outcomes which they desire (Salancik and Pfeffer, 1974) while interest pertains to levels of attention or involvement (OED, 2016). Equally, just as some have endeavoured to understand stakeholders, others have tendered several approaches to stakeholder identification. Though approaches remain somewhat disputed, the construct of legitimacy is commonly central to these systems. Freeman (1984) suggested that anyone with a stake who can affect the organisation should be regarded as being legitimate and subsequently is deserving of attention, regardless of the nature of their claims. Differently, Donaldson and Preston (1995) were of the opinion that legitimacy seeks to differentiate between those who can influence and those who have a moral claim. On the other hand, Phillips (2003) argued that by possessing influence regardless of a moral claim, these parties, in line with the very notion of stake holding, cannot be excluded. Rather than discount these actors, he proposed a nomenclature of stakeholders consisting of normative, derivative and non-stakeholders. Normative stakeholders 'are those whom the organisation has a moral obligation', derivative are 'those whose actions and claims must be accounted for by managers due to their potential effects upon the organisation and its normative stakeholders', and non-stakeholders are those who possess neither influence nor a moral claim and can be excluded. Yet, just as this approach accounts for those with influence and those with claims, Phillips (2003) noted it may be difficult to distinguish between normative and derivative stakeholders.

Application of stakeholder theory to Public-Private Partnerships

To contextualise stakeholder theory to PPP, the fundamentals of this paradigm must be restructured. In stakeholder theory, its descriptive stance dictates the 'firm', i.e. the client, is the central organisation and thus their perception of others determines the involvement and management of these bodies. However, PPP differs from conventional provision models. Defined as an arrangement for the collaborative provision of a public service between the public and private sectors, organisations inherent to each sector share roles, responsibilities and financing. In turn, this blurs the conventional position of the client as the focal organisation (De Schepper *et al.*, 2014). A PPP project can better be described as an 'environment' with multiple stakeholders and multiple relationships. As such, a social network analysis approach is more appropriate vis-à-vis the traditional stakeholder theory dyadic perspective. A social network analysis approach surpasses the limitations of the conventional focal organisation or its associated boundaries. Rather, it looks to the wider environment to understand connections between stakeholders, the nature of the linkages, and, the role that each stakeholder performs (Smyth and Pryke, 2008). Still, before these connections can be examined, from within these two broad bodies it must firstly be determined who PPP stakeholders are.

Returning to Phillips' (2003) notion of legitimacy, De Schepper *et al.*, (2014) deemed the contractual relationship and relationships of the perception of norms, values and beliefs to be determinant in distinguishing normative and derivative Belgian PPP stakeholders. This research, similarly utilising Phillips' (2003) taxonomy, conversely argues that, relationships of norms, values and beliefs are subjective on the assertion these perceptions will differ predicated on your sectoral position. The private sector,

traditionally, is motivated by returns and profit and therefore holds different perceptions to that possessed by the public sector; who typically pursue improved social well-being. As a result, the only tangible measure can be the contract and an organisation's relationship with it.

Contingent on this understanding of legitimacy, this research identifies PPP normative stakeholders as the Authority and the Special Purpose Vehicle, and its constituent members. By contrast, all other stakeholders can be defined as derivative. However, it is noteworthy to consider Donaldson and Prestons' (1995) proffering, namely, stakeholder theory is fundamentally normative. It is therefore reasoned the key stakeholders are the Authority and the SPV, and its constituent members.

Authority

In PPP, unlike other procurement models, the Authority is the public sector organisation directly involved in the delivery of the infrastructure asset. It is traditionally driven by Value for Money (VfM), cost savings, improved services provision, and social and public benefits (Zou *et al.*, 2013). In a change from the traditional transaction structure of PFI, PF2s initial operation in the PSBP will see the central government acts as the Authority, the Education Funding Agency (EFA). Through defining objectives and outcomes, the Authority can ensure the requirements of the project are achieved and thus safeguard the interests of the wider public. The Authority will, as Grimsey and Lewis (2004) describe, 'wear many "hats"' meaning they will fulfil a number of roles, including: defining the business case, determining output and performance requirements, planning and executing the procurement process, govern the contract, liaise with the community and co-operate with the SPV to overcome changes in the project. Notably, despite being directly involved in the project delivery, the Authority is ultimately accountable to central governmental departments and, essentially, parliament (Shaoul *et al.*, 2012).

Special Purpose Vehicle

The private sector supplier is a consortium of organisations which collectively operate through a project company often referred to as a Special Purpose Vehicle (SPV) or project company. This is a commercial entity formed specifically by the cohort for the purpose of undertaking the project and is responsible for producing, funding and delivering the infrastructure asset (Grimsey and Lewis, 2004). The SPV negotiates and enters into a contractual agreement for the financing, designing, building, management and operating of the facility with the Authority. Its members enter into a contract between themselves and the SPV, rather than being directly contracted with the purchaser. In doing so, this allows the supplier to bundle together solutions and specific skillsets needed across differing phases of the project (Roehrich and Caldwell, 2012). This facilitates the achievement of economies of scale, innovation and risk sharing among other benefits. This consortium is traditionally commercially pursuant seeking; profitability and increased revenue (Zou *et al.*, 2013) and comprises financiers and contractors.

Debt holders

Debt holders are commonly sourced from financing institutions such as banks, infrastructure funds or institutional investors, and their interests are centred on consistent returns, however, more recently the balance of these institutions has shifted. With the decline of the debt market resonant of the Global Financial Crisis (GFC), the introduction of new banking regulations and the decline of the monoline insurance market has made it increasingly difficult to raise debt financing. As such, the notion

of attracting alternative sources of finance is currently prevalent with HM Treasury (2012) encouraging increased earlier involvement, particularly from institutional investors such as pension schemes and insurance funds. The number of lenders in an already limited market has lessened, affecting both debt provision and lending to equity investors.

Equity holders

These are commonly constituted from SPV members for legal and accounting purposes appointed with the responsibilities of the development, construction, and operation of the facility, contracted with the SPV. Additionally, third party equity investors may also directly invest in the project. Post construction, it is not uncommon for equity and debt holders to sell off shares to secondary markets or refinance their investments at lower interest rates (Demirag *et al.*, 2015). Furthermore, PF2 will now see the inclusion of a central public sector equity stakeholder positioned within the SPV.

Contractors

These typically include design and build (D&B) contractors, facilities management (FM) contractors and often other specialist contractors (Grimsey and Lewis, 2004). Though many of these contractors may be equity holders, their remits lay in the provision and delivery of the asset. D&B contractors work to an output specification and are granted the freedom to design innovative solutions. Typically, their roles and responsibilities include collaborating with the Authority and other SPV stakeholders to design and construct the facility. These contractors usually have short term objectives: seeking to maximise profits and the flexibility to move onto other projects post construction (Demirag *et al.*, 2015). Different to traditional procurement, PPP holds greater importance for operational contractors. The facilities management (FM) contractor's roles involve inputting into the design and liaising with the D&B contractors, collaborating with the Authority, and ultimately being entrusted with the responsibility of operations of the infrastructure (Hardcastle and Boothroyd, 2003). Their mandate is to ensure the effective life-cycle functioning of the asset (Consoli, 2006).

FINDINGS

Applying a stakeholder theory social network perspective coupled with the attributes of power and interest to PPP, figures 1, 2 and 3 have been constructed. These figures delineate the transitional relationships between PPP stakeholders. Stakeholder relationships are identified as altering in the procurement, construction and operational phases.

Within these phases, two relational dynamics have been recognised. This is the macro-level relationship; the formalised contractual agreement between the Authority and the SPV. This is represented by the arrowed line. In addition to this on-going long-term arrangement, there are also micro relationships. These secondary relationships comprise interactions within the SPV, and between SPV members and the Authority. This is signified by a single line.

Macro-level relationship

The macro-level relationship exists between the Authority and the SPV. This is an on-going dyad that will run for the duration of the project, though literature signposts the principal dynamic shift in this relationship occurs at financial close as both parties become contractually bound (Chinyere and Xu, 2012).

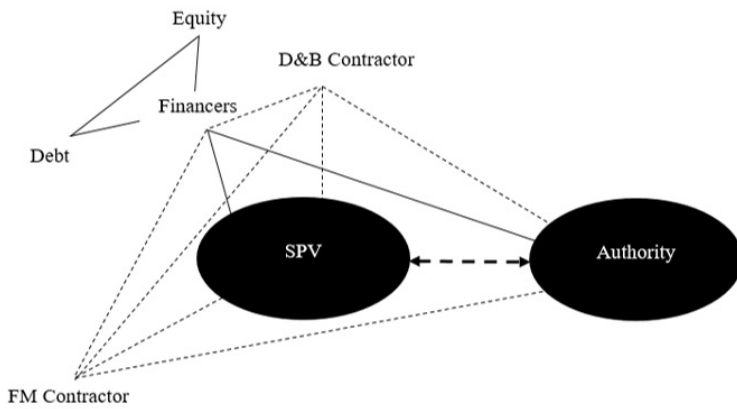


Figure 1: PPP stakeholder relationships in the procurement phase

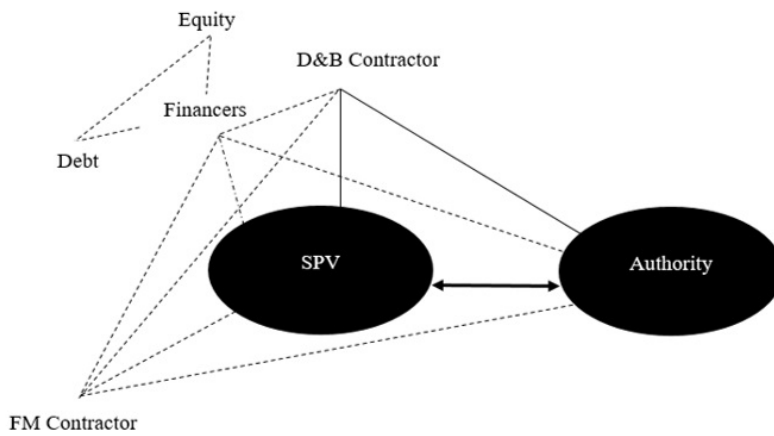


Figure 2: PPP stakeholder relationships in the construction phase

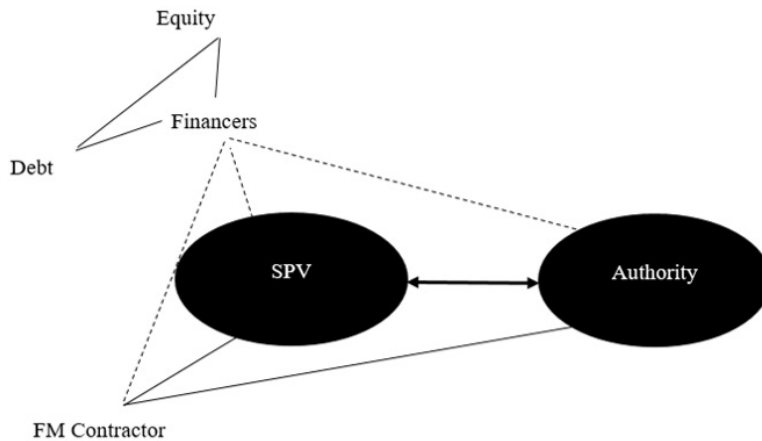


Figure 3: PPP stakeholder relationships in the operations phase



Pre-financial close (figure 1), the nature of the environment is commercially charged as the Authority seeks to encourage competition to maximise VfM (Barlow and Köberle-Gaiser, 2008). This is represented through the broken arrowed line. The Authority is responsible for undertaking tasks including: defining the required service, appraising of project viability and evaluating alternatives, producing a business case,

and commencing the project development (Grimsey and Lewis, 2007). SPV teams compete for the project, with a preferred bidder being selected to enter into contract negotiations (Barlow and Köberle-Gaiser, 2008). Leading up to financial close, the nature of this relationship is tentative, with little security of project progression, however, as both organisations approach a contractual agreement, the platforms of the purchaser/provider, together with the dynamics of the relationship transition (Barlow and Köberle-Gaiser, 2008). Previously, both organisations are separate entities, however, through formalising the contract, both stakeholders agree to enter into a partnership for the collective delivery and management of the project. The construction of these sustainable relationships becomes critical in that these stakeholders are now reliant upon each other for the project success. This is indicated through the solidifying of the broken arrowed line.

Micro-level relationship

While the macro relationship is somewhat straightforward, comparatively, the micro arrangements are much more intricate and complex. Under threat of potentially incurring monetary penalties for poor asset provision, the nature of the internal SPV relationships are performance orientated. Pursuing economic advantage, consequently, every stakeholder's actions affect all other SPV stakeholders. Though there is continual interaction between all stakeholders across all stages of the project, to understand PPP micro relationships it is pertinent to return to Roehrich and Caldwell's (2012) aforementioned assertion: i.e. the SPV will unbundle roles and responsibilities contingent upon the project phase. By virtue of this 'unbundling' of tasks, differing SPV stakeholders' power and interests will transition and thus determine stakeholder relationships not only inherent to the SPV, but also corresponding to the Authority. Therefore, in addition to internal SPV networks, micro relationships are also constituted from SPV member-Authority arrangements.

In the procurement phase, though the D&B, and FM contractors are involved, they are lesser roles comparative to the front-ended financier involvement (Zheng *et al.*, 2008). This heavy early involvement may be explained by the high levels of uncertainty and risks in the procurement phase prior to financial close (Chinyere and Xu, 2012). This reasoning is pertinent when coupled with Demirag *et al.*, (2015) who claimed that, conventionally, debt funders are risk adverse; seeking to balance risk/reward profiles. Chinyere and Xu (2012) asserted project lenders, in the earlier phases, are instrumental; undertaking strong supervisory roles pertaining to design, organising the SPV, negotiating arrangements with the Authority, and positioning constituent stakeholders. On these grounds, the financial stakeholders possess high levels of both power and interest. This relational dimension is reflected through the solid line exhibited between the financiers, the SPV, and the Authority in figure 1. The auxiliary roles, i.e. D&B and FM contractors, are represented through the broken lines on the grounds that these stakeholders are not yet directly involved in the provision and delivery of the service and therefore possess lower levels of power and interest.

Following financial close, micro relationships shift. Having secured the project, financier interests lessen; reflected through the broken line. Though there are still high levels of risk during the construction phase, these can be mitigated and managed through fixed price contracts (Burke and Demirag, 2015; Demirag *et al.*, 2015). Notably, however, when a risk of delay is presented jeopardising returns, the interests of financiers can shift manifested through the exertion of pressure on other SPV stakeholders. This is also the case during operations (Zheng *et al.*, 2008). Accordingly, the dimensions of the SPV will evolve. Different to the procurement

phase, D&B contractors are now directly involved and thus possess high levels of interest and power. The D&B contractors are typically responsible for the provision and commissioning of the asset. Determined by an output specification, the D&B contractors will collaborate with the Authority and other SPV stakeholders to construct the asset on time and within budget (Roehrich and Caldwell, 2012). During construction, again similar to the procurement phase, the FM will have input, although, they have no direct involvement in the provision of the asset. These dimensions are reflected in figure 2. The solid lines between the D&B contractors, the Authority and the SPV indicate these dynamics in the construction phase.

Having completed its mandate of designing and building the facility, the project will progress to the operational phase (figure 3). FM interest and power will increase as this stakeholder is responsible for the performance of the asset. This is exhibited by the changing relationships between themselves, the SPV and the Authority (Roehrich and Caldwell, 2012). Following construction, the profile for risk is dramatically reduced. There is resultantly little requirement for direct financial involvement and thus little interest. However, as before mentioned, while this is not always the case, it is common for debt and equity holders to refinance or sell off their shares to a secondary market (Demirag *et al.*, 2015). It is common for 'bond shareholders' such as pension or insurance funds to enter a project, replacing primary financiers. These stakeholders are typically risk adverse, preferring not to invest until the asset is operational, avoiding construction risks and uncertainties (Buchanan *et al.*, 2014). Likewise, equity shares are often sold by the constructors to other SPV stakeholders or less active third-party equity investors as they seek to recycle funds to grant them the freedom to move onto other projects (Demirag *et al.*, 2015). Reduced risk, little involvement, re-financing as well as the entering of secondary market financiers, the interests in the provision of the asset of financiers remain low and as such is represented through staggered line. However, the relationships and interests within this stakeholder grouping are changing. This dynamic is represented through the solid line between 'debt', 'equity' and 'financier' stakeholders. Furthermore, D&B contractors, selling off their equity investments and moving onto other projects, have been removed from the diagram.

RESEARCH IMPLICATIONS

Within PPP, stakeholder relationships have been discerned as a primary source of poor project performance. Appropriately, the topics of relationships, relationship management and collaboration are currently prevalent. Still, despite this growing body of literature, the fundamentals of these arrangements are not yet fully understood or defined. PPP arrangements differ from traditional procurement as a result of the sharing of roles and responsibilities. A manifestation of this blurring has been little agreement between PPP stakeholders. It is argued, there is a knowledge gap pertaining to PPP stakeholders meaning existing literature fails to effectively address many of the inherent relational issues. This research addresses this knowledge gap and has two significant implications. Firstly, it offers an original PPP framework grounded in stakeholder theory to identify and understand stakeholders. In doing so, this research offers a set of principles, as opposed to a definitive list which runs the risk of excluding potential future stakeholders. Indeed, an example of this is apparent in the introduction of PF2. PF2 will now see a central public sector body now directly invest into project equity. Though deemed to still be in its infancy, by employing this study's definition of legitimacy, this organisation can be determined as a stakeholder. Secondly, utilising this framework, this research applies these principles to existing

literature. Centred on legitimacy, PPP stakeholders have been identified. Equally, adopting the constructs of power and interest, the study has provided an understanding of these stakeholders, in turn contributing the essential building blocks of these relationships to inform future research. The UK government has declared its commitment to PPP and no doubt future variants of these models will continue to be mechanised. As PPP models continue to develop and evolve in the UK, this potentially will bring about new stakeholders. As such, this will see the evolution of existing relationships but also significantly the creation of new unknown dynamics. Nevertheless, through the application of this framework, despite the advancement of future PPP arrangements, these stakeholders can continue to be identified and understood.

CONCLUSION

This investigation, grounded in stakeholder theory has contributed to knowledge by not only providing an original insight into existing PPP stakeholder relationships, but also by contributing a set of principles to understand future arrangements. By doing so, this study provides the vital foundations to inform future PPP stakeholder relationship research.

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