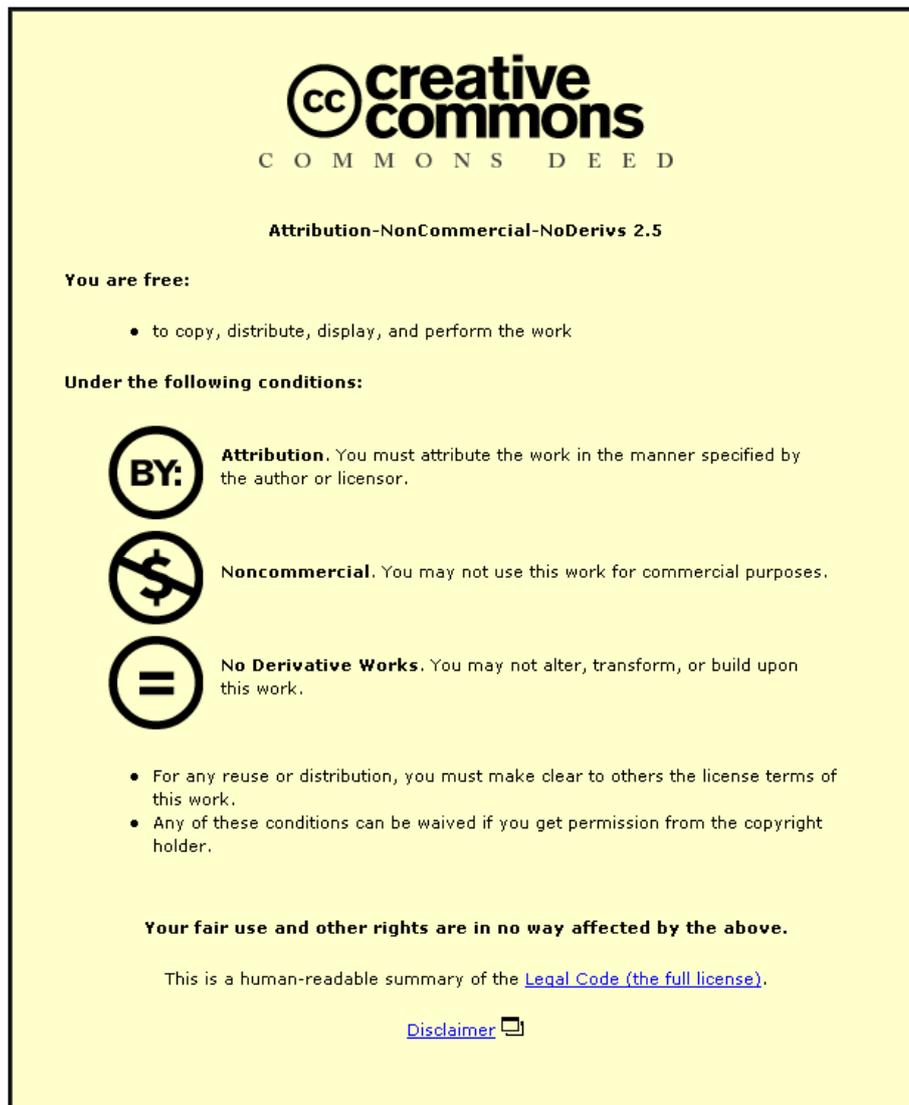


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Hunters and farmers? The HRM implications of 'product-service' in construction

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ABSTRACT

Providing additional services to accompany the sale of products is increasingly central to the business strategies of manufacturing companies. Such packages of products and services have become known as 'integrated solutions' or 'product-service' modes of working. In construction, the concept can be traced to build-operate-transfer (BOT) projects of the 1980s, where a consortium would finance, design construct and operate a facility for a specified period of time. More recently this approach is evident in PFI/PPP projects. It has been argued that firms attempting to shift to an integrated solutions model have to transform their cultures, mindsets, capabilities and organizational structures. This paper presents the findings of research which is examining the potential human resource management implications of a shift from 'product' to 'product-service' in the construction industry. A case study was conducted at a leading UK construction company, based upon 15 semi-structured interviews conducted with a range of senior managerial respondents. The results reveal that delivering integrated solutions may be hindered by two distinct mindsets within construction organizations: 'hunters' and 'farmers'. Whereas the former focuses on securing short-term wins within defined and time-limited relationships, the latter are more concerned with cultivating and nurturing the relationship over the long-term. The paper explores the tensions between, and the challenges of, the two mindsets in relation to drive for integrated service strategies within major construction organizations.

KEYWORDS: product-service, integrated solutions, behaviours, human resource management.

1. INTRODUCTION

This paper presents the findings of a case study conducted in the UK construction sector of a construction organization increasingly engaging in through-life service in addition to their traditional product offering. Specifically, it concerns the challenges that the drive towards PFI/PPP procurement strategies presents construction companies rooted in the product-delivery paradigm. The paper begins by reflecting upon the increased interest in service provision generally, before considering interest in the construction sector specifically. It then presents the case study findings, with a particular focus upon the differences in the dominant mindsets between the building and maintenance arms of the organization. The research reveals that although a management philosophy of divisional autonomy and decentralisation has traditionally been regarded as central to the success of the organization, the current marketplace is demanding a more integrated offering, which in many respects is countercultural to traditional modes of working. It is argued that this presents several transitional challenges given the prevailing attitudes and behaviours of many of those working in the industry.

2. TOWARDS INTEGRATED SOLUTIONS IN CONSTRUCTION

Discussions regarding a trend towards 'integrated solutions' or 'product-services' has become highly topical in recent years in both the academic and consultancy literature. Other terms have also been used to describe this phenomenon including 'servicisation' (Quinn *et.al*, 1990), 'servitization' (Vandermerwe and Rada, 1988; Van Looy *et.al*, 1998), 'going downstream' (Wise and Baumgartner, 1999), and 'winning in the aftermarket' (Cohen *et.al*, 2006). At the core of most of these phrases is a concern with the provision of additional services which are complementary to a tangible product in order to increase the value for customers. Benefits for the provider are said to include the direct benefit of services often being more profitable than physical products, and indirectly because they may act as a good source of differentiation in a competitive market place. Ultimately they may even lead to additional demand for products. Other benefits are said to include lengthening customer relationships, creating growth opportunities in mature markets, balancing the effects of economic cycles, and in providing capabilities in responding to changing client demands (Brax, 2005). In the context of manufacturing in particular, it has been argued that organizations must exploit downstream opportunities if they are to maintain their competitiveness (Wise and Baumgartner, 1999, 141; Davies et al 2006).

Manifestations of this trend include computer manufacturers such as IBM and Siemens which now derive more than 50% of their turnover from

services, while others, such as ICL (Fujitsu Services), have completely exited manufacturing (Howells, 2000). Leading companies including General Electric, Rolls-Royce, Ericsson and EDS are said to be competing on the basis of integrated solutions (Davies *et.al*, 2006). As a consequence several commentators have identified a continuum of positions between producing pure tangible goods and providing a pure service. For example, Kotler (2003) suggests that there are five main types of service mix, beginning with a pure product, a tangible good with accompanying services, hybrid, major service with accompanying minor goods and services, and finally a pure service. Brax (2005) suggests that there is a trend away from pure product with many companies currently operating at the second and third stages. Similarly, Gebauer *et.al* (2005) have described a “stepwise transition from products to services” (p.14).

Despite the apparent emphasis on bundling services with products, some have questioned whether ‘pure product’ organizations ever existed. Indeed Harvard marketing professor Theodore Levitt argued in 1972 that in fact all industries are effectively service industries, but that some industries just had greater service components than others (Levitt, 1972). The notion that customers would like ‘solutions’ to a problem rather than a physical product is also not necessarily new. Again, Levitt argued in 1970 that “people don’t want to buy a quarter-inch drill, they want a quarter-inch hole” (Levitt, 1970; see also Canton, 1984). Xerox is a good example where clients have never really wanted a photocopier per se, but rather the ability to make photocopies, given that copier machines are often too expensive and unreliable for customers to purchase outright (Howell, 2000). Accordingly, the idea of solutions in the context of consumer marketing has been around for at least thirty five years. Nonetheless, the proliferation of the literature surrounding integrated solutions in recent years suggests that this is highly relevant to contemporary business to business markets.

In the context of construction, integrated solutions also have a long history. Indeed, the concept can be traced to the 19th century when infrastructure projects around the world were promoted and financed by private investment. More recently the concept can also be traced to Build-Operate-Transfer (BOT) in the 1980s, but in particular to the popularity of Public Private Partnerships (PPP) and Private Finance Initiative (PFI) procurement strategies. PFI can be viewed as a response by the government to control public spending within the Public Sector Borrowing Requirements (PSBR) limits, as well as the allure of achieving ‘Value for Money’ and transferring risk (Illidge and Cicmil, 2000). In the early 1990s, PFI was unveiled by the Conservative administration as a means of improving the UK’s aging public sector infrastructure stock. Under the current administration PFI/PPP has remained as a key part of the Government’s modernisation strategy (Jackson, 2004), and government policy suggests that it is here to stay (HMSO, 2003). However, the emphasis appears to

have shifted away from the impact on public borrowing, towards the way risk is allocated in public infrastructure projects (Bing *et.al*, 2005). Such schemes include financially free-standing Design, Build, Finance and Operate (DBFO) strategies, where contractors may finance an entire project and recoup costs and derive profits from agreed user/toll charges. A second derivative of DBFOs involves the leasing of publicly provided services to the private sector contractor, where the private sector meets the cost of the building as well as services such as maintenance and cleaning, with the contractor receiving a fee for service provision. A third version is where joint ventures involve a partnership between, for example, a Local Authority and a private contractor where the risks and profits are shared (Illidge and Cicmil, 2000). A voluminous research literature has emerged in relation to the pros and cons of PFI/PPP procurement strategies. Advocates suggest benefits such as better project technology and economy, greater public benefit, public sector saving in transaction costs, and public sector avoidance of regulatory and financial constraints. The UK Government have suggested that in their research 89% PFI projects were delivered on time or early and 77% public sector managers agreed the project was meeting their initial expectations (HMSO, 2003). Conversely, critics point to limitations including inexperience of the participants, over-commercialisation of projects, and high participation cost and time (Li *et.al*, 2005, 125). However, it is argued that this operating model requires new capabilities in terms of systems integration, operational service, business consulting and financing (Brady *et.al*, 2005). Often, however, the capabilities argued to be required are often expressed in the abstract, and neglect the fact that ultimately changes in capabilities are likely to mean changing the capabilities and attitudes of employees within the organization.

Of course, some of the literature does acknowledge that operating in this way may not necessarily be straightforward. Rather, it is argued that to operate in this way is likely to require the creation of a 'service culture' and an appropriate service climate. The difference in norms, values and cultures between a 'product mentality' and a 'service mentality' may result in a clash between culture and counterculture, when the creation of a seamless product/service offering is likely to require a coherent symbiotic relationship between product and service oriented values (Gebauer *et.al*, 2005). More recent work by Davies *et.al* (2006) also acknowledges how "changing the mindsets of thousands of employees who have grown up with a narrow vision of traditional products or services is perhaps the biggest barriers of all" (p. 47). For example, while traditional manufacturing/product-oriented values may be said to include efficiency and the creation of economies of scale, service values are more likely to be concerned with issues around innovation, flexibility, customisation and variety. Nevertheless, it is likely that creating and embedding an appropriate 'service culture' should be concerned more with balancing and

combining the two value sets rather than necessarily replacing one with the other (Bowen *et.al*, 1989). Accordingly, the aim of this research was to understand more about the meaning and manifestations of through life service provision in the context of the British construction sector. There is a clear need for such context-specific research, given that much of the existing research is often universalistic, prescriptive and acontextual. Moreover, the issues around through life service provision also hold important practical implications, vis-à-vis how organizations position themselves to operate more effectively in the PFI/PPP marketplace.

3. METHODS

The aim of this research was to understand more about the implications for organizations seeking to compete in the emerging through life service marketplace. Given the exploratory nature of the research, a case study approach was deemed most appropriate for revealing the contextual factors shaping organizational strategies and their effectiveness in this regard. An advantage of case studies is that they are empathetic and responsive to emergent themes, and seek to understand the actors frame of reference. This is especially important in relation to new and emergent topics when it is difficult to predict in advance the most appropriate questions to ask (Stake, 2000). A total of 16 semi-structured interviews were conducted in total with a range of senior managerial respondents from three main divisions of a major UK construction organization. The interviews were conducted across two divisions: the civil engineering arm is referred to as 'BuildCo' and the term maintenance business known as 'MaintainCo'. Interviews were also carried out with employees of a specialist PFI unit 'PFI Projects'. From BuildCo interviewees included the Managing Director of Major Projects, Business Development Manager and Commercial Manager. At MaintainCo respondents included the Commercial Strategy Manager, Business Development Manager and Managing Director of Strategic Roads. PFI projects interviewees included a Bid Director and an Executive Director of a concession. Interview themes include organizational strategy, PFI/PPP, innovation, knowledge and learning, and human resource management issues. Interviews were semi-structured and all were recorded and subsequently transcribed verbatim. Interview data was supplemented by analysis of relevant documentation.

4. CASE STUDY – CONSTRUCTIONCO

ConstructionCo is a major UK-based contracting organization operating worldwide. It consists of over 20 operating companies (opcos) operating with a devolved management structure. The business is organised along principal work streams which reflect its market coverage. Traditionally the opcos reported to the centre primarily on a financial performance basis, although developments in other areas mean that the style is shifting

slightly, but overall the devolved management structure is a key characteristic of the organization, and viewed as “part of the success story of ConstructionCo.” The BuildCo division has a large turnover and a good track record of winning major projects, ranging from construct-only works contracts to more complex ‘asset based service driven solutions’. The division employs over 1500 staff, in a range of managerial, administrative, technical and operative functions. Typical projects include highways, marine, tunnelling, water supply and rail infrastructure.

MaintainCo is primarily responsible for term-maintenance contracts for the Highways Agency (HA) and Local Authorities (LA), although other activities include street lighting and off track rail maintenance. The division also most employs direct labour employing a similar number of staff as BuildCo. Rapid expansion and the acquisition of other firms has led to the transfer of many people under the Transfer of Undertakings Protection of Employment (TUPE) regulations. The scope of the division has recently increased towards a broader and more strategic agenda in which they aim to provide a wider range of strategic services in addition to the more “mundane” tasks or looking after safety barriers, carrying out repairs after an incident, and picking up litter. Generally, there is more strategic work with the HA and more routine maintenance activities with LA clients. MaintainCo is the only part of the organization that has direct contact with both the client (HA), and the customers (e.g. road users). Their role is therefore seen to be shifting from one of rudimentary maintenance to one of ‘network management’.

Increasingly, BuildCo and MaintainCo were having to work together to deliver a product service offering. This forms a key plank of ConstructionCo’s competitive strategy which is based upon providing a wide range of market leading skills and disciplines and a capacity to use an appropriate mix of skills in delivery. Indeed, the organization’s position as one of the largest UK construction organizations was frequently cited as a source of competitive advantage by those interviewed, as it meant the company had a large pool of resources which it could mobilise to meet particular client requirements. In particular, it was suggested that increasingly clients are looking for a product which will stand the test of time *and* be competitively priced. It was suggested that clients were becoming increasingly aware of the need for best value rather than lowest cost. The subsequent emphasis had been on relationship building and a move away from one-off transactions. This was inducing fundamental changes in the way in which both of the divisions did business.

Despite the emphasis on better customer relations which had clearly pervaded both divisions, the research also revealed significant differences were identified between the two divisions, with a history of parochialism and rivalries between divisions rather than a more joined-up approach. This was said to partly reflect the differing predominant cultural styles

between the staff employed in each division. Employees within BuildCo were described as 'hunters' with those employed by MaintainCo as 'farmers'. Hunters were said to be driven the adrenaline rush of winning a large, high-profile project and going out and doing it as fast as possible, and completing it profitably. Hunters were described by one informant as "uncouth savages" who relish the buzz of winning and building, and then quickly move on to the next project. They were also described as working in an intense deadline oriented environment, and aiming to get the 'best' they can within the space of time available, and as such are required to work in a pragmatic way. BuildCo employees also took great pride in being able to point to a tangible product which they helped build. There was little empathy with other divisions within the group; rather it was suggested that they were the "hands-on out there in the field building it" division, typically "working in their own little world merrily building the product". It was suggested that the traditional mentality was that "if they could get money of out the client they would, and they had no incentive to work better because it made no difference to them". Pragmatically, the view was that if clients want a high quality product then they would have to pay a high price for the project. Although this traditional 'hard-nosed' mentality was thought to be less pervasive than in the past due to the decreasing use of fixed-price contracts and the current emphasis partnering arrangements, it was also argued that changing this mindset would take a long time to achieve within BuildCo. Farmers, on the other hand, were seen as the antithesis of Hunters. They were seen to cultivate relationships with clients, and this was identified as a mentality which was more pervasive in the MaintainCo and PFIPProjects divisions of the organization. They were seen as taking a long-range perspective in developing knowledge on the needs of their clients in order that they could develop a better value solution to their needs. The key differences between these mindsets are summarised in Table 1.

Table 1 Comparison of mindsets of 'hunters' and 'farmers'

BuildCo	MaintainCo
Short-term focus	Long-term focus
Pragmatic	Idealistic
'Good enough' delivery	Continuous improvement
Maintain distance from client organization	Nurture close relationship with client

The tension between the two perspectives was highlighted by the Bidding Manager, who suggested that the default mentality in the BuildCo was one

of pragmatism, and a reluctance to overcomplicate issues which could be detrimental to the short-term profitability, efficiency or timely completion of the project. He suggested that this reflected “a difference between the kind of organizations that do construction, and the kind of organizations that do operation and maintenance”. As the Business Development Manager in BuildCo explained, the focus in his division was very much upon, “selecting and going after schemes that we can ultimately win and be profitable at”. It was suggested that there was a fundamental difference in personality between the divisions, and even antipathy between them. Indeed, it was suggested that BuildCo often has a better working relationship with other construction companies during joint ventures than with its own infrastructure division. A senior manager in BuildCo suggested that some of the friction arose because in-house companies appeared to expect to be treated favourably, whereas his view was that they ought to be treated equally like any other project partner. Nevertheless, there was a general sense that internal working relationships had been improving over time, and an increasing awareness that the Group as a whole could benefit if the sister companies co-operated better and “extracted more synergies from an integrated approach” in preference to traditional competitiveness or ambivalence.

As the Managing Director of MaintainCo explained, “We don’t have a lot of links with the ConstructionCo Group outside of the specific project activities. There are some but not many”. Another manager within MaintainCo articulated how he did not really feel like he worked for ConstructionCo per se, but rather that he worked for MaintainCo, despite the fact “ConstructionCo happened to be the logo on his pay packet”. A MaintainCo Contracts Manager also suggested that she would only really make contact with other parts of ConstructionCo on an ad hoc basis, when they required advice on a specific issue where they would be likely to have the necessary expertise. Clearly, the downstream maintenance may be viewed as a small part of a major PFI build, for example a £1 million per year maintenance contract is a small part of a £100 million project. It was also suggested that sometimes friction arose because the BuildCo division was not perceived to be as focused on the end customer. Conversely, the counterargument from BuildCo employees was that their focus was getting the project completed on time and in budget which also formed key client requirements.

A Director of BuildCo also acknowledged how as a group, ConstructionCo may aspire to join-up the individual businesses, but that inevitable difficulties arose where the individual opco strategies were misaligned. He suggested that this may require a change in the way the individual opcos are incentivised within the broader opco structure. It was proposed that traditionally the opcos were incentivised to compete with each other, because they act as autonomous businesses. However, despite the

apparent tensions, it was not believed that replacing the two mindsets would be the answer. As a Bidding Manager explained: "I think it would be a mistake to say, well that's wrong, that's the wrong thing to do and you should all come together and have a uniformed ConstructionCo". Rather, the challenge appear to be finding a way of bringing the two cultures together.

5. DISCUSSION

Interest in delivering integrated solutions in the context of ConstructionCo is strongly related to changing client demands and in particular changing public sector procurements strategies such as PFI/PPP. The paper has outlined how the concept of integrated solutions is fraught with tensions in terms of the different default mindsets between those focused on the requirements on winning and completing projects, and those tasked with maintaining the infrastructure over a period of time. This is consistent with the literature which suggests the effective provision of integrated solutions may require a transformation not only in organizational structures but also in organizational cultures and the attitudes and mindsets of employees (Brady *et.al*, 2005). Within a decentralised business such as ConstructionCo, divisional autonomy is often identified as one of the key strengths. Inter-divisional competitiveness is perceived to be healthy, and specialisation is believed to allow each opco to understand the needs of their different clients and customers.

However, the evidence suggests that though the organization may be attempting to provide a more integrated offering in many respects, this is countercultural to traditional modes of working and as such presents challenges in terms of the attitudes and behaviour of employees. Again, this resonates with concerns in the literature that there may be two distinctive mentalities within the organization between a 'product mentality' and a 'service mentality'. At ConstructionCo this has been described using the metaphor of 'hunters' and 'farmers' to capture the different dominant mindsets between the BuildCo arm and the MaintainCo Service division. Despite their successes as individual opcos, with BuildCo a leading UK civil engineering business, and MaintainCo a rapidly growing maintenance division, bringing the two opcos together to offer a joined-up coherent 'solution' appears to be far from straightforward. In particular, there was the perception that the BuildCo division did consider maintenance to be of little value, and remain focused upon the tangible product. The lack of empathy between the two opcos was underlined by the fact BuildCo managers suggested they often had a better relationship with the BuildCo divisions of other competitor organizations than they did with their own in-house maintenance team. Equally, employees within MaintainCo did not

really relate to the ConstructionCo Group much at all, perceiving their own business and operations to be mostly separate from the organization.

Nevertheless, there was an awareness that to truly deliver an added value solution to the client would require better collaboration between the opcos in order to achieve the synergies between the massive resource pool from which ConstructionCo clearly benefits. Of course this does not mean that there is necessarily a new uniform culture which should be fostered across the organization, but rather that the challenge was in finding a way to balance the two mindsets in a complementary fashion. This would overcome the current barriers which appear to inhibit ConstructionCo's ability to be a provider of truly 'integrated solutions' to their clients. Integrated solutions are said to concern identifying customers problems, and providing services to design, integrate, operate and finance a product or system during its lifecycle (Davies *et.al*, 2006). As such, it is suggested that despite its size and success, ConstructionCo is still in early stages of the transition to product-service. In other words, although their service mix may have shifted from a pure product focus to a tangible good with accompanying services, a more integrated hybrid has yet to emerge and is likely to require a significant changes in terms of uniting the two distinctive organizational mindsets. If this achieved then this could mean that the business can capitalise on its understanding of the client, and in particular build a richer understanding of the clients technologies, processes and plans. This is especially important where in terms of rivals the company is similar in terms of performance, price or quality. Deep knowledge of clients is more difficult for rivals to acquire (Cohen *et.al*, 2006).

It is not only employment relations within single organizations which merit further attention, however. Many claim that hierarchical Fordist organizations are being replaced by the networked organizational form or 'horizontal corporation model' (Castells, 1996). Traditional organizational boundaries are argued to be less relevant as they are blurred through joint ventures, subcontracting and partnerships between networks of small and large organizations. Indeed, the activities of single organizations are likely to be highly influenced by inter-organizational relations (Grimshaw and Rubery, 2005). The operation of construction firms aspiring to deliver seamless integrated solutions almost epitomises the notion of a fragmented, complex network of actors and activities which have to be delivered in a joint-up manner through life to meet the demands of clients and customers. In reality working within this paradigm is unlikely to be straightforward.

6. CONCLUSION

Clearly, despite the burgeoning literature on PFI/PPP, limited attention has been given to the capabilities required to operate and compete successfully in this environment. In particular, the extant literature has tended to overlook the human resource management implications, such as the need to consider the potentially incompatible organizational cultures or dominant mindsets, which are rooted in a more transactional mentality, and where attitudes and behaviours compatible with a through-life relational approach are countercultural. Given the continued popularity and growth of PFI/PPP procurement strategies this issue is clearly worthy of further detailed consideration by construction sector managers and researchers alike. However, the case study findings presented in this paper suggest that while this appeared to be an issue acknowledged by organizational actors, it was not one which had been considered strategically; the reality was one of 'muddling through'. Of course, all research has limitations, and this particular study represents only a single snapshot of the issues at a particular point in time. It was also based upon the responses of managers, and their views and opinions cannot be viewed as representative of organizational views as a whole. Nevertheless, this research has provided insights into what through-life service provision means in practice, and especially what it may mean in terms of human resource management. It is suggested that, given the PFI/PPP marketplace appears to provide a distinctive and enduring economic and political context, such issues warrant further research.

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