

Employee representation and voice channels in multinational companies operating in Britain

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ABSTRACT

MNCs from different countries of origin are widely held to have distinct preferences regarding the presence of employee representative structures and the form that employee 'voice' over management decisions takes. Such preferences are said to derive from the national models which prevail in the different countries of origin in which MNCs are based. Findings from a large-scale survey of the UK operations of MNCs point to significant recent innovation in representation and voice arrangements by this key group of employers. Country-of-origin influences on patterns of representation and the relative emphasis on direct or indirect channels of employee 'voice' are found to be attenuated by other factors, notably sector and method of growth.

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1. Introduction

Multinational companies (MNCs) from different countries of origin are widely held to have differing preferences over the presence and form of arrangements for employee representation and voice: union representation or not; indirect or direct forms of consultative voice. Yet no single study has examined the preferences of MNCs based in a range of major countries, including different parts of Europe, within a single host environment. Drawing on original survey data, the paper aims to do this.

Separate studies have established the distinctiveness of representation and voice arrangements in their British operations of MNCs headquartered in, respectively, the US (e.g. Ferner et al, 2005), Japan (e.g. Wilkinson et al, 1993) and Germany (e.g. Tüselmann et al, 2005) as compared with domestic practice. Much less is known about the approaches of MNCs based in other parts of Europe. Indeed survey-based studies have tended to treat Europe as a homogeneous block, in which MNCs from European countries are ‘lumped together’ (Ferner, 1997: 22). The relationship between indirect and direct forms of consultative voice has also been extensively addressed (Brewster et al, 2007; Bryson, 2004; Wood and Fenton-O’Creavy, 2005), but not through the prism of the practice of MNCs based in different countries.

As a large, internationally-open ‘liberal market’ economy whose institutional arrangements are relatively permissive of variation in industrial relations practice, including employee representation and voice arrangements, Britain offers an insightful environment to examine the influence of different ‘home country’ models. Moreover, given the political-economic context prevailing since the mid-1980s, (multinational) employers may have been less constrained than hitherto in exercising their preferences (Charlwood, 2006). This suggests scope for innovation by MNCs which might previously have adapted to local conventions, with the result that home-country influences have become more apparent.

The paper draws on the findings of a large-scale survey of employment practice based on interviews with senior HR executives in three hundred MNCs with operations in Britain. The data allow exploration of variation between MNCs headquartered in different parts of Europe, as well as those based in Japan and the US. Two main issues are explored in the paper: patterns of representation, distinguishing between union and non-union based structures, and recent changes therein; and the presence of indirect and direct forms of consultative voice and, where both exist, the relative emphasis accorded to each.

The next section of the paper summarises recent evidence on employee representation and consultative voice in Britain, reviews existing studies of the impact of MNCs from different countries of origin on practice and sets up two main propositions to be investigated. The survey of MNCs’ employment practice in the UK and the data items the paper draws on are introduced in section 3. Section 4 reports findings on each of the three propositions, including the results of logistic regression analysis. Section 5 discusses the findings and draws conclusions.

2. Representation and consultative voice: adding in the multinational factor

Although operationalisation of the concepts of employee representation and consultative voice varies in the extensive recent literature on practice in Britain (Brewster et al, 2007; Bryson, 2004; Millward et al, 2000; Willman et al, 2006) two key distinctions are apparent. The first is between union recognition and non-recognition, and within the latter between those organisations which have non-union structures of employee representation and those which have none. A second is between indirect (representative-based) and direct channels of consultation, with the latter being defined as covering two-way forms of employee involvement such as team briefing, quality circles and meetings between managers and the workforce as a whole (e.g. Bryson, 2004). Recent studies have mapped significant change in both of these dimensions. Reviewing findings from the 2004 Workplace Employment Relations Survey (WERS), Charlwood and Terry (2007) underline that alongside a further decline in union representation comes a 'growing heterogeneity of representational forms within British workplaces' which include non-union structures and hybrid arrangements combining both union and non-union representation. WERS2004 also found a shift in the mix of channels through which consultative voice is exercised, with a decline in the proportion of workplaces with a joint consultative committee or covered by a committee at a higher level in multi-site organisations, and an increase in the already high proportion of workplaces utilising one or more forms of direct, two-way forms of employee involvement (Kersley et al, 2005). The decline in indirect forms of consultation is all the more striking given the prospective implementation of the UK's Information and Consultation of Employees (ICE) legislation, which came into effect in April 2005. Although expressly permitting compliance via direct as well as indirect employee voiced channels, this legislation has nonetheless been widely anticipated to prompt the further spread of indirect consultative arrangements (Hall and Terry, 2004).

Bringing MNCs into the picture, a core issue in debates over their impact on employment practice in host environments has been the extent to which they seek to innovate, through inwards diffusion of home country practices, or to adapt to prevailing practice locally. Because of their embeddedness in national institutions, including frameworks of labour law, employee representation and indirect channels of consultative voice might be regarded as matters more constrained to local adaptation than direct channels of employee involvement, which in turn are more open to innovation (Ferner, 1997). In the context of contemporary Britain, however, the growing heterogeneity of representative arrangements which Charlwood and Terry (2007) identify, the minority coverage of both union representation and indirect consultative arrangements (Kersley et al, 2005) and the permissive framing of the ICE legislation, suggest that these features too might be open to innovation.

Existing research on the practice of MNCs in their foreign operations has tended to focus on union representation, with rather less attention being paid to consultative voice. For instance, 'although there is increased recognition that multiple [voice] channels may be the norm, at least within Europe' (Wood and Fenton-O'Creevy, 2005: 29), with the exception of Wood and Fenton-O'Creevy's study the balance between indirect and direct channels in MNCs remains neglected. Empirical research has also largely focused on the operations of MNCs headquartered in a handful of countries: the US above all, Japan, Germany and the UK.

US-based MNCs have 'long been associated with hostility to unions in their foreign operations' (Ferner et al, 2005: 703): a picture confirmed by the comparatively high incidence of non-unionism amongst their operations in Britain reported in a number of previous surveys (as

reviewed by Ferner et al, 2005). Guest and Hoque (1996), for example, report that US-based MNCs are less likely to recognise unions at greenfield sites than locally based (UK-owned) firms. Under the American system there is little scope for non-union forms of representation (LeRoy, 2006), reflected in ‘a marked preference for non-collective employee representation’ (Colling et al, 2006) or direct forms of employee involvement. Amongst the operations of US-based MNCs in Britain, Colling and his colleagues also detect a measure of pragmatism: union recognition being widely accepted in the manufacturing operations studied. They draw attention to variations according to sectoral norms and age of subsidiary which give rise to ‘intra-model’ variation. Such variation reflects, at least in part, the heterogeneity amongst firms found within the American business system (e.g. Katz and Darbishire, 2000).

Japanese-owned MNCs are usually assumed to have a preference for some kind of enterprise union or company council, reflecting the company union model that prevails in Japan (Guest and Hoque, 1996). Wilkinson et al’s (1993) survey of the manufacturing operations of 26 Japanese-owned MNCs in Wales found union recognition at almost all. Recognition, however, took the particular form of a single union agreement in the great majority of instances. Moreover, almost all had also established non-union based consultative forums which often assumed a role in wage determination (in place of collective bargaining). In contrast, and pointing to the presence of intra-model variation, the Japanese-owned plants in Elger and Smith’s (2005) in-depth study in an English new town were predominantly non-union. Other studies of Japanese MNCs in Britain suggest that they pursue a dual track approach to consultative voice, as they are more likely than either US-based MNCs or local firms to have representative-based forms of voice and to make use of team briefings and quality circles (Guest and Hoque, 1996; Wood, 1996).

The German model is associated with extensive indirect consultation and codetermination. In a major survey of the operations of German-based MNCs in Britain, compared against a reference group of their American counterparts, Tüselmann et al (2005) identify the emergence of a modified German model which combines newer, direct consultation practices with the established tradition of indirect consultation. They also find clear evidence of its translation into the British context, where union recognition is combined with widespread take-up of direct consultation practices. Accordingly, German-based MNCs are more likely to recognise trade unions than their US-based counterparts and also display an equivalent incidence of direct consultative practices to that found in American firms. Ferner and Varul (1999) draw attention to the existence of intra-model variation, in the form of non-unionism amongst some UK operations of German-owned MNCs, locating it in the devolution of responsibility for IR policy to subsidiary managers.

Although there is little data on the practice of Swedish multinationals overseas, survey evidence of representation and consultative voice arrangements in Sweden confirm that in addition to the high levels of union representation, which provide the basis for trade-union based consultative voice within firms – both core features of the Swedish system - there has also been widespread take-up of direct forms of employee involvement (Brewster et al, 2007; Gill and Krieger, 2000). Yet in a study of employee involvement practices in three smaller-sized Swedish MNCs, Andersen (2006) found that direct forms of consultative voice tended to be transferred to the UK operations but not indirect forms.

There is also little information on representation and voice arrangements in the overseas operations of French MNCs. Union representation is a minority phenomenon amongst firms in France, reflecting low levels of union membership, although other forms of employee

representation are widespread (Gill and Krieger, 2000). Consultative structures, which are mandatory in firms employing at least 50, are found in four out of every five such firms, although their impact on business decisions is limited when compared to parallel arrangements in Germany and Sweden (Tchobanian, 1995). Direct forms of employee consultative voice seem to be less widespread than in many other European countries (Gill and Krieger, 2000).

UK-based MNCs have been found to be somewhat more likely to recognise trade unions in their UK operations than their overseas-owned counterparts, with the reverse being the case for direct forms of employee voice (Marginson et al, 1993). There was no difference between the two groups in the incidence of indirect consultative voice. Investigating representation and voice arrangements in the European operations (including Britain) of 25 UK-based MNCs, Wood and Fenton-O’Creevy (2005) found that only one in six had union-based representative arrangements, and that one-third had no representative arrangements, relying solely on direct forms of consultative voice. This suggests significant intra-model variation. Although the two surveys are not directly comparable, the findings of the second also suggest that practice amongst UK-based MNCs might have shifted since the first was undertaken.

This review of extant findings provides the basis for the two propositions to be examined, concerning, respectively, the presence and form of employee representative structures and the relative emphasis management accords to direct or indirect forms of consultative voice.

Proposition 1A: Patterns of employee representation will differ between the operations of MNCs based in different countries, given their differing industrial relations systems. In particular:

- i) US-owned MNCs will be comparatively less likely to have representative arrangements, either union or non-union;*
- ii) Japanese-owned MNCs will, on balance, be comparatively more likely to have representative arrangements, either union or non-union;*
- iii) German-owned MNCs will be comparatively more likely to have union-based representative arrangements;*
- iv) UK-owned MNCs will be comparatively less likely to have representative arrangements, either union or non-union.*

Proposition 2A: The relative emphasis placed on direct or indirect forms of consultative voice will differ between the operations of MNCs based in different countries, given their differing industrial relations systems. In particular:

- i) US-owned MNCs will emphasise direct forms;*
- ii) Japanese-owned MNCs will place equivalent emphasis on both forms;*
- iii) German-owned MNCs may either emphasise indirect forms or place equivalent emphasis on both*
- iv) UK-owned MNCs will emphasise direct forms.*

A counterfactual in the case of either proposition is that intra-model variation may dampen country-of-origin influences. Indeed other factors, such as sector, age of subsidiary and company strategy, may also influence patterns of employee representation and relative emphasis as

between direct and indirect channels of consultation. Intra-model variation arising from the influence of these factors suggests two alternative propositions:

Proposition 1B: Differences in patterns of employee representation according to the country of origin of MNCs will be attenuated by other factors, such as sector, age of subsidiary and company strategy.

Proposition 2B: Differences in the relative emphasis on direct or indirect forms of consultation according to the country of origin of MNCs will be attenuated by other factors, such as sector, age of subsidiary and company strategy.

3. Data and method

The data are drawn from a large-scale, 2006 survey of employment practice in the operations of 302 MNCs in the UK involving a personal interview with a senior HR executive in each. The achieved sample is larger than that in most other surveys of aspects of employment practice amongst multinationals (Edwards et al, 2007), and allows comparison of the practice of MNCs from different countries of origin, including intra-European variation, within the same host environment. The survey covered MNCs with at least 500 employees worldwide: in the case of overseas-owned companies, inclusion in the survey required that they also had at least 100 employees in their UK operation; for UK-owned multinationals the second criterion was that they should have an operation employing at least 100 in at least one other country.

The survey was based on the most comprehensive listing of the population that has been compiled, and involved two stages. Edwards et al (2007) provide a detailed account. At a first stage a short screening questionnaire was administered to companies provisionally identified as multinationals in the population listing. Of the 1419 companies where calls were successfully completed one in three turned out not to meet the size criteria above. Non-response complicates the calculation of the response rate, but for the first stage it was an estimated 54 per cent (Edwards et al, 2007)¹. The second stage involved a wide-ranging, face-to-face structured interview with a senior HR manager in the UK operations. These were sought from the 903 MNCs which were confirmed as conforming to the survey's size criteria at the first stage. Interviews of approximately 70 minutes duration were successfully completed in 302 multinationals, representing just over one-third of the MNCs positively confirmed at the first stage. Representativeness checks between two stages of the survey revealed similar profiles according to country-of-origin and employment size, but indicated slight under-representation of service sector MNCs in the main survey as compared to the screener. To correct for this, the main survey findings have been weighted to reflect the sector profile of the screener sample².

Employee representation and consultation was one of four substantive areas of employment relations practice on which the survey focused. Concerning the first proposition, respondents were asked about forms of employee representation for the largest occupational group (LOG) amongst the non-managerial employees in the UK operation. Specifically they were asked about recognition of trade unions for the purposes of collective representation and/or any non-union

¹ This is on the assumption that non-respondents would have screened out of the population on the basis of the size criteria at the same rate as respondents.

² Representativeness checks of the screener sample against the original database listing of eligible companies have also been undertaken (Edwards et al, 2007).

based structures of collective representation, such as a company council. On the second, respondents reporting both the use of direct forms of employee communication and consultation and a regularly functioning representative-based (indirect) structure or structures for employee information and consultation within the UK operation were asked about the relative emphasis management placed on the two channels.

Although each MNC's country of origin was identified, undertaking viable statistical analysis required grouping some countries of origin into larger geographical clusters. Specifically, companies were categorised into eight groups: the US, the UK, France, Germany, the Nordic countries (of which the largest number are Swedish-based companies), the rest of Europe, Japan and the rest of the world.

Section 2's consideration of the potential influence of country of origin on employee representation and consultative voice arrangements drew attention to the intra-model variation uncovered by some studies. The survey contains data on a range of other factors also likely to influence representation and voice arrangements and thereby constitute sources of intra-model variation. These include demographic variables, such as sector and employment size, and measures of company structure and strategy. Each of these factors, and their anticipated influence, if any, on the three dimensions of representation and voice identified above, are briefly considered in turn below.

Sector. Differences can be expected across the three broad industrial sectors identified: manufacturing, other production and services. In particular, union organisation is longer established and more widespread in the manufacturing than service sectors (Dølvik, 2001), a distinction which also prevails amongst MNCs (Ferner et al, 2005). In turn this is likely to be reflected in manufacturing MNCs placing greater emphasis on indirect forms of consultative voice, than their service sector counterparts.

Employment Size. The survey asked about the number employed in the UK operations. Representative structures, either union or non-union based, might be more common in larger than smaller sized UK operations (Marginson et al., 1993); larger UK operations might also be more likely to emphasise indirect forms of consultative voice.

Vintage. Following Charlwood's (2006) contention that the political and economic context now prevailing in the UK is less constraining than hitherto, MNCs which have established operations in the UK more recently may have enjoyed more scope to establish non-union based representative arrangements than longer established firms. Longer established firms might engage in 'double breasting' (Beaumont and Harris, 1992) - entailing a mix of union and non-union arrangements at, respectively, older and newer sites.

Method of growth. MNCs growing by acquisition are more likely to have mixed patterns of employee representation, involving union and non-union based structures inherited at different sites, than those which have grown organically (either by opening new sites or expanding existing ones).

Diversification. A mixed pattern of employee representation might also be more common in MNCs whose UK operations comprise unrelated businesses, as compared to those operating in a single business.

In order to test the propositions developed in section 2, two sets of logistic regression analysis were undertaken. These enable examination of the influence of country-of-origin, and the role of

demographic and corporate structure and strategy variables as possible sources of intra-model variation, on the respective dimensions of employee representation and voice. For both dimensions, the number of US-based multinationals (but not those based in any of the other country groupings) was sufficiently large to directly address intra-model variation amongst these companies in the regression analysis. Mean values of the country of origin and other variables used in the regression analysis are reported in Appendix Table A1.

4. Findings

The survey’s findings in respect of the propositions specified in section 2 are considered in turn, commencing with descriptive information before presenting results from the logistic regression analysis.

a) patterns of employee representation

Unions representing the largest occupational group (LOG) are recognised at one or more sites in 47% of MNCs with operations in the UK, including 16% across all sites, 23% at some or most sites and 8% at a MNC’s single UK site. Non-union representative arrangements for the LOG exist in approaching one-half of those MNCs not recognising unions at any site, accounting for 24% of cases. In the great majority (4 out of every 5), these arrangements cover all sites or a company’s single UK site. In addition, a proportion of companies with union recognition at some or most sites have non-union representative arrangements at other sites where there is no recognition, accounting for 11% of all cases. In total there are union and/or non-union representative arrangements for the LOG in 71% of MNCs. Table 1 summarises the pattern, distinguishing between four types of arrangement which form the dependent variable in the subsequent regression analysis.

Table 1: Patterns of employee representation

<i>Representation arrangement</i>	<i>%</i>
Union only (all, most/some, single site(s))	37
Non-union only (all, most/some, single site(s))	24
Hybrid (union at some sites, non-union at others)	11
Neither union nor non-union	29

Base: All companies (N=302)

Respondents were also asked to describe management policy towards union recognition for the LOG. Roughly twice as many reported that company policy was ‘not in favour of union recognition’ (44%) as reported that policy was ‘in favour’ (21%). In the remaining 35% of cases, management takes a neutral stance. There is a relationship between policy and the patterns of representation reported in Table 1, although a less than complete correspondence. Whilst in virtually all cases where policy is to favour union recognition, unions are indeed recognised within the UK operations this is also the case for a minority (16%) of cases describing policy as not favouring recognition. Where policy is described as being neutral, cases split evenly between instances where there is union recognition and those where there is not.

Further findings reveal a discernible recent trend away from union recognition and towards non-union representative arrangements, providing supportive evidence that MNCs may be acting as innovators in arrangements for employee representation in the UK. The trend away from union recognition is apparent amongst ‘unionised’ companies which have opened new sites. Of 60 MNCs which both recognise unions at existing sites and had opened one or more new sites in the previous 3 years, just 18% had recognised unions at all new sites whilst 42% had not recognised unions at any; the remaining 40% had recognised unions at some. Turning to non-union representative arrangements, half (51%) of the MNCs with these reported that they had been established within the previous 3 years. The second finding suggests significant recent innovation in representative arrangements, possibly prompted by introduction of the UK’s Information and Consultation of Employees legislation (see below).

The regression analysis proceeds in two steps. First, country-of-origin influences on the two-way contrast between MNCs reporting any representative arrangement (union and/or non-union) and those reporting none are investigated in a binary logistic regression. Second, influences on the four alternatives in Table 1 are explored. Since there is no clear ordering amongst the four alternatives, the appropriate estimation technique for the second step is multinomial regression. In both steps ‘neither union nor non-union’ representation is taken as the reference category.

The estimates resulting from the ‘any representation’ set of regressions are reported in Table 2, first, including the country-of-origin variable only and, second, the other factors also.

INSERT TABLE 2 ABOUT HERE

The first set of estimates is significant at the 1% level overall. The Beta coefficients indicate some significant country-of-origin influences on the presence of any representative arrangement as compared with the US-owned reference group. The odds ratios give the relative magnitude of these effects. Specifically, the odds of French- and German-owned MNCs having arrangements for employee representation are, respectively, more than three and almost seven times that of their American counterparts. MNCs based in the Nordic countries, the rest of Europe, Japan and the rest of the world are not significantly more likely to have representative arrangements than US-based MNCs. The second set of estimates, including also the other factors, is also significant at the 1% level overall. Moreover, the step chi-square indicates that the inclusion of the other factors significantly adds to overall explanatory power. The Nagelkerke R^2 rises from 0.08 to 0.27. French- and German-owned multinationals continue to be significantly more likely than US-owned companies to have representative arrangements, and so now do those based in the UK. A strong sector contrast is evident, with both service and other sector multinationals being significantly less likely than those in manufacturing to have representative arrangements. The odds ratios indicate the magnitude of these sector effects as around one-sixth and as less than a third, respectively. None of the other structural variables exercises a significant influence on ‘any representation’.

Results of estimates from the multinomial regression of the four alternative forms of representation arrangement, first, including the country-of-origin variable only and, second, the other factors also are reported in Table 3.

INSERT TABLE 3 ABOUT HERE

The first set of estimates only achieves significance at the 10% level overall. The Beta coefficients indicate that some of countries/regions of origin are significantly associated with

particular patterns of employee representation, as compared with the reference category of US-owned MNCs. The odds ratios indicate that the odds of French and German-owned MNCs having union only representative structures as compared to none at all are, respectively, more than three times and almost ten times greater than US-owned companies. French-owned companies are also significantly more likely than US-based multinationals to have non-union only representative structures. The other significant country-of-origin influence concerns UK-owned MNCs, which are significantly more likely than US-based companies to have hybrid representative arrangements. Representative structures in MNCs based in the Nordic countries, the rest of Europe, Japan and the rest of the world are not significantly different from those found in US-based MNCs.

Turning to the second panel of Table 3, which includes the other factors, the estimates are significant at the 1% level overall. The step chi-squared statistic indicates that the inclusion of the other factors significantly improves overall explanatory power. The Nagelkerke R^2 increases from 0.11 to 0.35. The same country-of-origin effects remain significant influences; in addition, UK-based MNCs are now also significantly more likely to have union-only representative structures than US-owned companies. Of the other factors, two significantly influence representation arrangements. Striking sectoral differences are again apparent. Service-sector multinationals are significantly less likely than manufacturing ones to have any of the three patterns of representative arrangement as compared to no form of representation at all. MNCs in other production are also less likely to have union and non-union representation arrangements than those in manufacturing. One further factor also exercises a significant influence: multinationals which have engaged in acquisition are significantly more likely to have hybrid representative arrangements. UK employment size, vintage and diversification do not significantly influence arrangements for employee representation.

The presence of intra-model variation was investigated further for the US-based multinationals within the sample. A logistic regression for any representation against sector, size, age of subsidiary and aspects of company strategy, reported in Appendix Table 2, was significant at the 1% level. The Nagelkerke R^2 was 0.42. A striking sectoral difference is again apparent: American service sector multinationals are significantly less likely than their manufacturing counterparts to have any form of representative arrangement. The other factors, however, do not appear to be a significant source of intra-model variation.

Overall, support for proposition 1 is mixed: whilst some individual country-of-origin influences are apparent, some others are not. On the specific sub-propositions: i) relating to US-owned MNCs is supported only in comparison with companies based in Germany, France and the UK (once the other factors are controlled for); ii) concerning Japanese-owned MNCs, is not supported; iii) relating to German-owned companies is supported; and iv) is indirectly supported, given that UK-owned MNCs are comparatively more likely to have hybrid arrangements. The superiority of the regressions including the other factors - in terms of overall significance and the influence exercised by sector and method of growth -, together with the findings from the US MNCs-only analysis, indicates stronger support for the counterfactual which takes account of intra-model variation³.

b) indirect and direct consultative voice

³ Ordered logit regressions on management policy towards union recognition, not reported here, generated similar findings.

Almost three-quarters of MNCs (73%) reported that there are regular meetings between management and employee representatives at the level of the UK operation for the purposes of information and consultation. In addition, there are representative-based consultative structures below the level of the UK operation, covering individual or groups of sites, in three-quarters (77%) of multi-site companies. Taken together, 82% of MNCs have arrangements for indirect consultative voice within their UK operations. Logistic regression analysis, not reported here, found that German- and Nordic-based MNCs were significantly more, and multinationals based in the Rest of the World significantly less, likely to have indirect consultation arrangements, than the US-owned reference group. MNCs in the manufacturing sector were also significantly more likely to have consultative arrangements than those in services, and the likelihood of arrangements being in place increased with the employment size of the UK operation.

Implementation of the UK’s ICE legislation would seem to have prompted substantial recent change in arrangements for employee consultation. Forty-two per cent of companies with consultative arrangements reported that they had made changes over the previous 3 years: in nine out of every ten cases, such change involved the establishment of new arrangements at all (three-quarters of the relevant total) or some (one-quarter) sites; in seven out of ten it (also) involved modification of existing arrangements. This picture contrasts with the one presented by WERS2004 – see section 2 – suggesting that MNCs might be leading innovation, albeit legislatively induced.

Following Bryson (2004) and Willman et al (2006), direct forms of employee consultative voice were taken to include two-way forms of employee communication and involvement, including team briefings or similar, and problem-solving or continuous improvement groups⁴. One or both of these direct forms were found in all but four companies (1%).

Respondents in the 243 MNCs which report both indirect and direct forms of consultative voice were asked about the respective emphasis placed on the indirect and direct channels⁵. Their responses, which form the dependent variable for the regression analysis, are reported in Table 4.

Table 4: Relative emphasis on indirect and direct channels of consultative voice

<i>Relative emphasis</i>	<i>%</i>
Emphasis on indirect channels	16
Equivalent emphasis on direct and indirect	42
Emphasis on direct channels	41
[Don’t know]	[1]

Base: Companies with both channels of consultative voice (N=243)

The three alternatives in the table are clearly ordered; hence the estimation technique adopted is ordinal logistic regression taking ‘emphasis on indirect channels’ as the reference category⁶.

⁴ There is no measure of meetings of senior managers with the whole workforce *which allow for employee input* in the survey, which Bryson (2004) and Willman et al (2006) also include in their operational definition. The survey did ask about meetings of senior managers with the whole workforce, but without specifying that they should allow for employee input. All cases which reported these, also reported team briefings.

⁵ One company reported having neither indirect nor indirect consultative voice arrangements; three had indirect but not direct arrangements; and 55 had direct but not indirect arrangements.

⁶ The ordering was confirmed by the parallel lines test.

Results of estimates including country-of-origin only and then also the other factors are reported in Table 5. A positive sign on a coefficient indicates that an emphasis on indirect consultation is more likely than equivalent emphasis on both, which in turn is more likely than an emphasis on direct consultation. A negative sign indicates the opposite.

INSERT TABLE 5 ABOUT HERE

The estimates including country-of-origin only (first and second columns) again only achieve significance at the 10% level overall. Japanese-based MNCs are significantly more likely than their US counterparts to emphasise indirect forms of consultation, as are those based in the rest of Europe. The odds, for example, of Japanese-owned companies emphasising the indirect consultation channel over an equivalent emphasis on both, or placing equivalent emphasis on both over emphasising the direct channel, are some four times greater than for US-owned multinationals. None of the other country-of-origin variables exercises a significant influence.

The inclusion of the other factors (columns 3 and 4) results in a more robust set of estimates: the chi-squared is significant at the 1% level overall and also for the inclusion of the other factors. The Nagelkerke R^2 is 0.19, as compared to 0.06 previously. The same country-of-origin influences remain significant. In addition, there are significant sector differences, with multinationals in services and other production showing a marked tendency to emphasise direct over indirect channels as compared with those in manufacturing. Contrary to expectations, MNCs which have established operations in the UK over the past 5 years are significantly less likely to emphasise the direct channel than longer established companies. Given that these companies were also noticeably more likely to report being involved in a merger or acquisition over the previous 5 years than longer established MNCs⁷, it is tempting to infer that current policy might reflect a legacy effect from previous ownership. Overall, though, MNCs which have grown by acquisition show a marked, and significant, tendency to emphasise direct over indirect channels. On diversification, companies diversified into related businesses are significantly less likely to emphasise direct channels than those focused on a single business, although those diversified into unrelated businesses do not differ significantly. UK employment size does not have a significant influence.

Again, the presence of intra-model variation was investigated further for US-based multinationals. A logistic regression against sector, size, age of subsidiary and aspects of company strategy, reported in Appendix Table 3, was significant at the 5% level. The Nagelkerke R^2 was 0.22. Again, a sharp sector difference was evident: US MNCs in services are significantly more likely than their manufacturing counterparts to emphasise direct forms of employee involvement. Again, the other factors did not appear to be a significant source of intra-model variation.

Overall, support for proposition 2 is modest: the regression including the country-of-origin variables achieves overall significance only at the lowest (10%) confidence threshold; and most of the individual country-of-origin influences are not significant. On the specific sub-propositions: i) relating to US-owned MNCs is confirmed only in comparison with MNCs based in two of the other seven countries/regions; ii) concerning Japanese-owned MNCs is supported; iii) concerning German-owned MNCs is not supported; whilst iv) receives support as UK-owned

⁷ Eighty-five per cent of MNCs establishing operations in the UK over the previous 5 years report being involved in a merger or acquisition over that period, as compared with 46% of MNCs with UK operations established for more than 5 years.

are no less likely to emphasise direct channels than US-owned companies. The superiority of the regression including the other factors - in terms of overall significance and the influence exercised by four of the five demographic and company strategy variables -, buttressed by the findings from the US multinationals-only regression, provides support for the counterfactual which takes account of intra-model variation.

5. Discussion and Conclusion

The paper's investigation of home country influences on the employee representation and voice practices of MNCs in a single host environment reveals a more complex picture than is often assumed. Whilst some country-of-origin influences are apparent, they are not as sharp as might be anticipated. Moreover, demographic variables, such as sector and employment size, and corporate structure and strategy have also been shown to influence employee representation and voice arrangements. This indicates the presence of important intra-model variation amongst multinationals headquartered in any given country or region. In this concluding section, wider implications of the findings are reviewed.

First, the findings of several previous studies on the influence of country-of-origin on the practice of multinationals headquartered in particular countries are confirmed. These include the well-established preference of US-based MNCs for non-unionism, and for direct forms of employee communication and consultation (Colling et al, 2006; Ferner et al, 2005). Tüselmann et al's (2005) conclusion that German-based MNCs will tend to recognise trade unions in the UK context is also confirmed, although there is not clear-cut support for their proposition that German companies are embracing a new model in which direct forms of employee consultation play as important a role as indirect ones. Contrary to some previous studies (Guest and Hoque, 1996; Wilkinson et al, 1993), but consistent with Elger and Smith (2005), Japanese-owned multinationals do not seem more likely than their US counterparts to have employee representative structures, although they are more likely to emphasise the indirect consultative voice channel where such structures are present.

An innovative aspect of the paper is that MNCs headquartered in different parts of Europe have been differentiated. The validity of doing so is underlined by the varying magnitude and significance of the influence of companies based in, respectively, France, Germany, the Nordic countries, the UK and the rest of Europe in the two sets of regression analysis. On patterns of employee representation, for example, French-based MNCs are distinctive in terms of a comparatively high incidence of non-union as well as union representative arrangements, whereas – perhaps surprisingly – those based in the Nordic countries do not evidence the preference for union-based structures that their German counterparts do. Indeed, like companies based in the rest of Europe, employee representation arrangements in Nordic-based multinationals in the UK do not differ significantly from those found in US-owned companies. UK-owned companies, for their part, are distinctive in the incidence of hybrid representation arrangements.

Second, the attention drawn to the presence and, by implication, importance of intra-model variation in some previous studies (e.g. Colling et al, 2006; Ferner and Varul, 1999) is underscored by the present findings. Of the demographic variables, it is broad industrial sector rather than employment size that exercises the most clear-cut and consistent influence on patterns of representation and channels of voice. The contrasts between manufacturing and

services in terms of union representation and the incidence of indirect forms of consultation are well established. In addition, the findings also show that non-union representative arrangements and, where both consultative channels exist, relatively less emphasis on direct channels are also features of manufacturing as compared to service MNCs. Methodologically, the findings also caution against drawing general conclusions about country-of-origin influences from survey studies which are confined to one sector. Of the corporate strategy and structure variables, method of growth exercises the most clear-cut influence. MNCs which have engaged in recent acquisition stand out in their representation and voice practices from those which have not. Considerations of acquisition might also help to explain the unexpected finding on the vintage variable, namely that MNCs more recently establishing operations in the UK are more, not less, likely to emphasise the indirect consultative channel. The operations in question are not necessarily greenfield; they could have been recently acquired, and with them existing modes of voice practice.

Third, even though they might have been more muted than expected, the presence of country-of-origin influences confirms the UK as an environment which is permissive of variation in industrial relations practice. Moreover, the presumption in the literature that employee representation in particular is a practice on which MNCs are likely to adapt to local conventions (see Ferner, 1997), because of considerations such as labour law and union organisational strength, is confounded by the present findings. Consistent with the contention that the UK's current political-economic context might provide scope for innovation in representation and voice arrangements (Charlwood, 2006), the surveys' findings identify considerable recent change amongst MNCs on both dimensions. Representative arrangements which are non-union based have spread and, prompted by the 2005 implementation of the UK's ICE regulations, there has been significant activity in establishing new indirect consultative structures where these did not previously exist. The two developments are, at least in part, related. On both counts the picture differs from that emerging from the comprehensive, workplace-based, economy-wide 2004 WERS (Kersley et al, 2005). Although the timing of the two surveys might account for some difference, in that WERS2004 was undertaken before implementation of the ICE regulations and the multinationals' survey after, the scale of the recent changes revealed by the present study suggests that MNCs are a source of innovation – in part legislatively induced - in representation and voice practice in Britain. Investigation of whether such a 'multinational effect' is in operation, as well as whether companies headquartered in some countries are more likely to act as innovators than those based in others, are questions which call for further analysis.

Table 2: Any representative arrangement regression results

Independent Variables	Odds Ratios	Beta Coeffs (SEs)	Odds Ratios	Beta Coeffs (SEs)
Intercept	-	0.718***(0.195)	-	1.545***(0.500)
<i>Origin – US</i>				
Origin – France	3.413	1.227*(0.647)	4.338	1.467**(0.716)
Origin – Germany	6.825	1.921*(1.053)	9.027	2.200**(1.098)
Origin - Nordic	2.072	0.728 (0.589)	1.682	0.520 (0.651)
Origin – UK	1.733	0.550 (0.425)	2.788	1.025**(0.493)
Origin – Rest of Europe	1.073	0.070 (0.428)	1.276	0.244 (0.478)
Origin - Japan	2.072	0.728 (0.589)	1.987	0.687 (0.650)
Origin – Rest of World	-0.488	-0.718 (0.510)	0.465	-0.765 (0.593)
<i>Sector - Manufacturing</i>				
Sector - Other Prodn	-	-	0.284	-1.259**(0.615)
Sector – Services	-	-	0.137	-1.988***(0.341)
<i>Vintage -10+ years</i>				
Vintage - 0-4 years	-	-	1.816	0.597 (0.540)
Vintage - 5-9 years	-	-	1.190	0.174 (0.401)
<i>Growth - neither</i>				
Growth – acquisition	-	-	1.178	0.163 (0.458)
Growth – new sites	-	-	0.891	-0.116 (0.410)
Growth – both	-	-	1.066	0.064 (0.449)
<i>Diversific'n – single</i>				
Diversific'n - unrelated	-	-	0.521	-0.653 (0.711)
Diversific'n – related	-	-	1.152	0.142 (0.411)
UK emp size / 1000	-	-	1.000	0.000 (0.040)
N		291		291
Model Chi-square		15.57**		60.65***
Step Chi-square		-		45.08***
Nagelkerke R ²		0.08		0.27
-2LLR		324.74		279.65

N is reduced because of missing values on some variables.

The reference categories are in italics.

Levels of significance are denoted by stars: * = 10% level, ** = 5% level, *** = 1% level.

Table 3: Pattern of representation regression results [country of origin only]

Independent Variables	<i>Union Only</i>		<i>Non-union only</i>		<i>Hybrid</i>	
	Odds Ratios	Beta Coeffs (SEs)	Odds Ratios	Beta Coeffs	Odds Ratios	Beta Coeffs (SEs)
Constant		0.025 (0.225)		-0.262 (0.243)		-1.361*** (0.354)
<i>Origin – US</i>						
Origin – France	3.250*	1.179* (0.696)	4.333**	1.466** (0.702)	1.300	0.262 (1.208)
Origin – Germany	9.750**	2.277** (1.073)	3.900	1.361 (1.180)	3.900	1.361 (1.458)
Origin - Nordic	2.194	0.786 (0.642)	1.625	0.486 (0.713)	2.925	1.073 (0.842)
Origin – UK	1.517	0.417 (0.483)	1.156	0.145 (0.543)	4.333**	1.466** (0.580)
Origin - Rest of Europe	1.463	0.380 (0.466)	0.650	-0.431 (0.599)	0.780	-0.248 (0.852)
Origin - Japan	2.194	0.786 (0.642)	1.950	0.668 (0.690)	1.950	0.668 (0.936)
Origin - Rest of World	0.542	-0.613 (0.601)	0.289	-1.242 (0.819)	0.867	-0.143 (0.858)

N 291
 Model Chi-square 30.70*
 Nagelkerke R² 0.11
 -2LLR 105.60

N is reduced because of missing values on some variables.

The reference categories are in italics.

Levels of significance are denoted by starts: * = 10% level, ** = 5% level, *** = 1% level.

Table 3 (cont) Pattern of representation regression results [country of origin plus other factors]

Independent Variables	<i>Union Only</i>		<i>Non-union only</i>		<i>Hybrid</i>	
	Odds Ratios	Beta Coeffs (SEs)	Odds Ratios	Beta Coeffs (SEs)	Odds Ratios	Beta Coeffs (SEs)
Constant	-	0.815 (0.551)	-	0.774 (0.578)	-	-1.608 (0.942)
<i>Origin – US</i>						
Origin – France	3.766*	1.326* (0.780)	6.277**	1.837** (0.782)	1.280	0.247 (1.315)
Origin – Germany	13.207**	2.581** (1.126)	4.428	1.488 (1.213)	7.064	1.955 (1.560)
Origin - Nordic	1.788	0.581 (0.714)	1.457	0.376 (0.764)	2.211	0.793 (0.921)
Origin – UK	2.681*	0.986* (0.553)	2.101	0.742 (0.601)	5.905**	1.776** (0.705)
Origin – Rest of Europe	1.761	0.566 (0.525)	0.718	-0.332 (0.628)	1.324	0.280 (0.927)
Origin - Japan	2.062	0.724 (0.708)	1.633	0.490 (0.733)	3.366	1.214 (1.022)
Origin – Rest of World	0.560	-0.580 (0.685)	0.276	-1.287 (0.868)	0.863	-0.148 (0.998)
<i>Sector - Manufacturing</i>						
Sector - Other Prodn	0.290*	-1.240* (0.691)	0.201*	-1.605* (0.842)	0.363	-1.015 (0.850)
Sector – Services	0.123***	-2.095*** (0.380)	0.202***	-1.598*** (0.403)	0.061***	-2.804*** (0.602)
<i>Vintage -10+ years</i>						
Vintage - 0-4 years	2.343	0.851 (0.586)	1.349	0.300 (0.676)	1.489	0.398 (0.751)
Vintage - 5-9 years	1.389	0.328 (0.439)	1.257	0.229 (0.469)	0.562	-0.576 (0.766)
<i>Growth - neither</i>						
Growth – acquisition	1.090	0.086 (0.498)	0.900	-0.106 (0.566)	3.651*	1.295* (0.739)
Growth – new sites	0.679	-0.386 (0.455)	1.279	0.246 (0.570)	0.562	-0.576 (0.932)
Growth – both	0.721	-0.328 (0.506)	1.039	0.038 (0.561)	5.715**	1.743** (0.738)
<i>Diversific'n – single</i>						
Diversific'n - unrelated	0.544	-0.609 (0.814)	0.355	-1.037 (0.980)	1.410	0.343 (1.111)
Diversific'n – related	1.348	0.298 (0.459)	0.893	-0.113 (0.477)	2.022	0.704 (0.775)
UK emp size / 1,000	1.008	0.008 (0.045)	0.900	-0.105 (0.082)	1.023	0.023 (0.047)

N	291
Model Chi-square	112.60***
Step Chi-square	536.67***
Nagelkerke R ²	0.35
-2LLR	641.97

N is reduced because of missing values on some variables.

The reference categories are in italics.

Levels of significance are denoted by stars: * = 10% level, ** = 5% level, *** = 1% level.

Table 5: Emphasis on direct or indirect consultation regression results

Independent Variables	Odds Ratios	Beta Coeffs (SEs)	Odds Ratios	Beta Coeffs (SEs)
Intercept – emphasis on direct	-	-0.061 (0.197)	-	-0.271 (0.422)
Intercept – equivalent emphasis on both	-	1.983***(0.243)	-	1.973***(0.445)
<i>Origin – US</i>				
Origin – France	1.586	0.461 (0.463)	2.064	0.725 (0.514)
Origin – Germany	2.219	0.797 (0.538)	2.082	0.733 (0.553)
Origin - Nordic	1.531	0.426 (0.484)	1.519	0.418 (0.510)
Origin – UK	1.168	0.155 (0.378)	1.948	0.667 (0.424)
Origin – Rest of Europe	2.120*	0.751*(0.430)	2.176*	0.778*(0.452)
Origin - Japan	4.103***	1.412***(0.490)	3.463**	1.242**(0.501)
Origin – Rest of World	2.615	0.961 (0.625)	1.990	0.688 (0.645)
<i>Sector - Manufacturing</i>				
Sector - Other Prodn	-	-	0.381*	-0.964*(0.554)
Sector – Services	-	-	0.483**	-0.729**(0.287)
<i>Vintage -10+ years</i>				
Vintage - 0-4 years	-	-	2.148*	0.765*(0.449)
Vintage - 5-9 years	-	-	1.143	0.134 (0.336)
<i>Growth - neither</i>				
Growth – acquisition	-	-	0.384**	-0.956**(0.382)
Growth – new sites	-	-	0.864	-0.147 (0.348)
Growth – both	-	-	0.350**	-1.051**(0.413)
<i>Diversific'n – single</i>				
Diversific'n - unrelated	-	-	0.684	-0.379 (0.712)
Diversific'n – related	-	-	1.827*	0.602*(0.356)
UK emp size / 1000	-	-	0.987	-0.013 (0.024)
N		235		235
Model Chi-square		12.20*		41.64***
Step Chi-square		-		29.44***
Nagelkerke R ²		0.06		0.19
-2LLR		62.04		441.91

N is reduced because of missing values on some variables.

The reference categories are in italics.

Levels of significance are denoted by stars: * = 10% level, ** = 5% level, *** = 1% level.

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References

- Andersen, M (2006) 'The influence of national business systems and company characteristics on the cross-national transfer of employee participation practices' PhD Thesis, University of Warwick.
- Beaumont P and Harris R (1992) 'Double-breasted recognition arrangements in Britain' *International Journal of Human Resource Management* 3, 2, 267-83.
- Brewster C, Brooks M, Croucher R and Wood G (2007) 'Collective and individual voice: convergence in Europe?' *International Journal of Human Resource Management* 18, 7: 1246-62.
- Bryson A (2004) 'Managerial responsiveness to union and non-union voice in Britain' *Industrial Relations* 43, 1, 213-41.
- Charlwood A (2006) 'What determined employer voice choice in Britain in the 20th century?' *Socio-Economic Review* 4, 2, 301-9.
- Charlwood A and Terry M (2007) '21st century models of employee representation' *Industrial Relations Journal* 38, 4, 320-37.
- Colling T, Gunnigle P, Quintanilla J and Tempel A (2006) 'Collective representation and participation' in Almond P and Ferner A (eds) *American Multinationals in Europe* Oxford: OUP.
- Dølvik, J (ed) (2001) *At your Service? Comparative Perspectives on Employment and Labour Relations in European Private Sector Services* Berne: Peter Lang.
- Edwards T, Tregaskis O, Edwards P, Ferner A and Marginson P with Arrowsmith J, Adam D, Meyer M and Budjanovcanin A (2007) 'Charting the Contours of Multinationals in Britain: Methodological challenges arising in survey-based research'. Jointly published as *Warwick Papers in Industrial Relations* no. 86, Coventry: IRRU, and *Leicester Business School Occasional Papers* no. 83, Leicester: DMU.
- Elger T and Smith C (2005) *Assembling work: remaking factory regimes in Japanese multinationals in Britain* Oxford: OUP.
- Ferner A (1997) 'Country of origin effects and HRM in multinational companies' *Human Resource Management Journal* 7, 1, 19-37.
- Ferner A, Almond P, Colling T and Edwards T (2005) 'Policies on union representation in US multinationals in the UK' *British Journal of Industrial Relations* 43, 4, 703-28.
- Ferner A and Varul M (1999) *The German Way? German Multinationals and the Management of Human Resources in their UK Subsidiaries* London: Anglo-German Foundation.

- Gill G and Krieger H (2000) 'Recent survey evidence on participation in Europe' *European Journal of Industrial Relations* 6, 1, 109-32.
- Guest D and Hoque K (1996) 'National ownership and HR practices in UK greenfield sites' *Human Resource Management Journal* 6, 4, 50-74.
- Hall M and Terry M (2004) 'The emerging system of statutory worker representation' in Healey G, Heery E, Taylor P and Brown W (eds) *The Future of Worker Representation* Basingstoke: Palgrave Macmillan.
- Katz H and Daribshire O (2000) *Converging Divergencies* Ithaca, NY: ILR Press.
- Kersley B, Alpin C, Forth J, Bryson A, Bewley H, Dix G and Oxenbridge S (2005) *Inside the Workplace* London: Routledge.
- LeRoy, M (2006) 'The power to create or obstruct employee voice' *Socio-Economic Review*, 4, 2, 311-19.
- Marginson P, Armstrong P, Edwards P and Purcell J (1993) 'The control of industrial relations in large companies' *Warwick Papers in Industrial Relations* No. 43, Coventry: IRRU.
- Millward N, Forth J and Bryson A (2000) *All Change at Work?* London: Routledge.
- Tchobanian R (1995) 'France: from conflict to social dialogue?' in Rogers J and Streeck W (eds) *Works Councils: Consultation, Representation and Co-operation in Industrial Relations* Chicago: University Press.
- Tüselmann H-J, Heise A, McDonald F, Allen M and Voronkova S (2005) 'German multinational companies in the United Kingdom' Report to the Hans Boeckler Stiftung, August.
- Wilkinson B, Morris J and Munday M (1993) 'Japan in Wales: a new industrial relations', *Industrial Relations Journal*, 24, 4, 273-283.
- Willman P, Bryson A and Gomez R (2006) 'The sound of silence: which employers choose no employee voice and why' *Socio-Economic Review*, 4, 2, 283-99.
- Wood S (1996) 'How different are human resource practices in Japanese transplants in the UK' *Industrial Relations*, 35, 4, 511-25.
- Wood S and Fenton-O'Creevy M (2005) 'Direct involvement, representation and employee voice in UK multinationals in Europe' *European Journal of Industrial Relations*, 11, 1, 27-50.

Table A1: Mean values of independent variables included in the regression analysis

Variable name	Description	Mean value (A)	Mean value (B)
<i>Origin</i>	Country or region of origin		
US [reference]		0.41	0.41
France		0.08	0.09
Germany		0.05	0.06
Nordic		0.07	0.08
UK		0.14	0.15
Rest of Europe		0.11	0.10
Japan		0.07	0.08
Rest of World		0.06	0.04
<i>Sector</i>	Broad industrial sector		
Manufacturing [reference]		0.51	0.57
Other Production		0.07	0.07
Services		0.41	0.36
<i>Vintage</i>	Years established in UK		
0-4 years		0.13	0.12
5-9 years		0.21	0.22
10+ years [reference]		0.66	0.66
<i>Growth</i>	Method of recent growth		
Acquisition		0.20	0.21
New sites		0.23	0.25
Both		0.24	0.21
Neither [reference]		0.33	0.34
<i>Diversification</i>	Diversification into related or unrelated businesses		
Unrelated		0.06	0.05
Related		0.78	0.78
Single [reference]	No – single business	0.17	0.17
<i>UK emps / 1000</i>	UK employment / 1000	2.04	2.38
N =		291	235

The two sets of regressions relate to differing bases, to which the columns refer:

- column A: pattern of employee representation (base: all companies)
- column B: relative emphasis on direct or indirect channels of consultative voice (base: companies reporting both channels)

N in each column is reduced because of missing values for some variables.

Table A2: Any representative arrangement in US MNCs regression results

Independent Variables	Odds Ratios	Beta Coeffs (SEs)
Intercept	-	2.228**(0.876)
<i>Sector - Manufacturing</i>		
Sector - Other Prodn	0.123	-2.094**(0.891)
Sector – Services	0.046	-3.078***(0.584)
<i>Vintage -10+ years</i>		
Vintage - 0-4 years	1.086	0.083 (0.965)
Vintage - 5-9 years	2.615	0.961 (0.671)
<i>Growth - neither</i>		
Growth – acquisition	1.633	0.491 (0.752)
Growth – new sites	1.824	0.601 (0.694)
Growth – both	1.040	0.039 (0.767)
<i>Diversific'n – single</i>		
Diversific'n – unrelated or related	0.536	-0.624 (0.760)
UK emp size / 1000	1.269	0.238 (0.158)
N		119
Model Chi-square		43.78***
Nagelkerke R ²		0.43
-2LLR		106.77

N is reduced because of missing values on some variables.

The reference categories are in italics.

Levels of significance are denoted by stars: * = 10% level, ** = 5% level, *** = 1% level.

Table A3: Relative emphasis on direct or indirect consultation in US MNCs regression results

Independent Variables	Odds Ratios	Beta Coeffs (SEs)
Intercept – emphasis on direct	-	-1.111 (0.696)
Intercept – equivalent emphasis on both	-	1.354*(0.717)
<i>Sector – Manufacturing</i>		
Sector - Other Prodn	0.797	-0.227 (0.974)
Sector – Services	0.254	-1.372***(0.482)
<i>Vintage -10+ years</i>		
Vintage - 0-4 years	1.766	0.569 (0.814)
Vintage - 5-9 years	1.030	0.030 (0.530)
<i>Growth - neither</i>		
Growth – acquisition	0.615	-0.486 (0.592)
Growth – new sites	1.036	0.035 (0.519)
Growth – both	0.668	-0.403 (0.677)
<i>Diversific'n – single</i>		
Diversific'n – unrelated or related	0.821	-0.197 (0.609)
UK emp size / 1000	0.848	-0.165 (0.140)
N		97
Model Chi-square		20.45**
Nagelkerke R ²		0.22
-2LLR		161.47

N is reduced because of missing values on some variables.

The reference categories are in italics.

Levels of significance are denoted by stars: * = 10% level, ** = 5% level, *** = 1% level.