

PORTSMOUTH BUSINESS SCHOOL
DOCTORATE OF BUSINESS ADMINISTRATION

Title: An exploration of the importance of trust in the post-acquisition integration context in high-technology industry.


Author: Ed Derbyshire

Tutors: Dr Andreas Hoecht, Dr Birgit Schyns

Year of submission: 2010

Word count 48,080

Signed statement of originality: “Whilst registered as a candidate for the above degree, I have not been registered for any other research award. The results and conclusions embodied in this thesis are the work of the named candidate and have not been submitted for any other academic award.”

Signed: ... 

E. L. Derbyshire

Abstract

Title: **An exploration of the importance of trust in the post-acquisition integration context in high-technology industry.**

Author: **Ed Derbyshire**

Tutors: **Dr Andreas Hoecht, Dr Birgit Schyns**

Year of submission: **2010**

The acquisition and successful integration strategies of companies is of particular interest given the significant numbers of acquisition failures: over 65% of acquired companies are either sold or divested within the first two years of new ownership (Dooley & Zimmerman, 2003). The cost of a failed acquisition can run into tens of millions of euros. If acquisition is important as a means of growth than are there means available to increase the chances of success?

Acquisition as primary source of inorganic growth is important within the high-tech sector as this allows the acquiring company to obtain critical new technologies and products as well as access new or adjacent markets (Marks & Mirvis, 2001). In acquiring a high-technology company the acquirer is, in essence, buying the extrinsic and intrinsic knowledge resident with the acquired staff (Chaudhuri & Tabrizi, 1999). Whilst the extrinsic knowledge may be captured in documentation and drawings it is the intrinsic knowledge that may well be critical for realisation of the full value of the acquisition. This key knowledge is normally held by a small number of the acquired staff (Wooldridge, 2006). If these key staff members then, as a result of either the acquisition itself, or the ensuing integration, become unsettled or unwilling to remain in employment with the acquiring company then this knowledge is at risk. The exodus of these

key staff members could well significantly devalue the purchase and, in extreme cases, could render the acquisition a failure (Hacker, 2003).

At the point of acquisition the only initial legal safeguard to retaining the critical staff members is their contracts of employment. The uncertainty caused by the acquisition and subsequent integration could cause the staff member to reassess his or her role in the new organisation and decide to leave the company (Krug, 2003). If sufficient key staff leave the company the damage may be significant. The challenge of retaining these key staff members at acquisition and, subsequently, through and beyond the integration process is thus critical, particularly for high-tech' companies (Chaudhuri & Tabrizi, 1999).

Given the terms of employment are initially deemed to be satisfactory by the acquirer, what other measures can be put in place to ensure the retention of these key people in the new organisation?

This research explores aspects of trust, its definition, development and role in the post-acquisition integration context of the high-tech electronics area and whether trust could be one of the factors that influenced key staff to remain with the acquired company in two different geographic locations.

The practical outcome was the development and production of a number of trust measurement tools that were first utilised and then supplied to the case study companies for on-going use for both post-acquisition integration and also general monitoring

The research was undertaken, consequently, driven by the need to explore conditions and contingencies of trust that may provide important new knowledge that can be utilised to assist with attempting to understand the role of trust in the context of high-tech company acquisitions. Two case studies at two separate geographical locations (in two countries) within a leading edge technology company have been completed. These studies were both designed to be longitudinal

and multilevel in nature, encompassing both the relationship from staff to management and from management to staff. A further aspect that has been explored is the relationship between 'head office' senior management and the geographically remote acquired company management. Full access has been granted to all staff and management constituting an excellent data gathering opportunity.

A number of trust measurement tools have been reviewed and several selected for use (Gillespie, 2003, Spreitzer & Mishra, 1999). However, examination of the literature concerning trust measurement has indicated there is some absence of suitable tools that can measure trust spanning from a belief trust base (where the trustor *believes* he/she can trust the trustee) through to trust informed actions (Dietz & Den Hartog, 2006). This lack of appropriate means of measurement has led to development of two further trust measurement tools that will span this range of trust. To add to the value of the studies, as mentioned above, several points of trust measurement were carried out. Longitudinal trust measurement was selected on the basis of seeking to establish trust trends and possibly related management actions. Data has been collected over three years. Data has been gathered through surveys and semi-structured interviews to afford a mixed method quantitative/qualitative approach.

The thesis contains an extensive review of the trust literature, describes the reasons for choice of the above mentioned methodology and reports results of analysis on the data collected to-date. The study concludes with discussion of the potential contingencies that can be undertaken by management in order to both monitor and maintain trust levels, the limitations of the research and areas for further study.

Acknowledgments

My thanks go to a number of people who have contributed greatly and without whom the journey would not have been possible.

Firstly, the teaching team at Portsmouth University, especially Dr Andreas Hoecht and Dr Birgit Schyns. Both Andreas and Birgit have been extremely supportive and have provided constant encouragement over the last four years.

Secondly, to my previous employer, who generously funded the entire course, and in particular the senior management team who have been supportive and patient as the research has developed.

Thirdly, to my wonderful wife, Jane, who put up with long studying hours over seven years of MBA followed by this DBA. I look forward to spending more time with her in the months ahead! Also my just married daughter, Lizzie, who has had a distracted father for many years and who has started her own research journey.

Fourthly, to the 'A' team who went through the MBA together and have remained firm and encouraging friends over the years; Mark and Janice Hunt and Stuart and Rose Doe.

One other Friend remains to be thanked – and here I turn to C. S. Lewis, who can say it better than I could....

“The term is over: the holidays have begun. The dream is ended: this is the morning’. And as He spoke He no longer looked to them like a lion”. (Lewis, C.S., (1956). *The Last Battle*. London: Collins.

Contents

Title	1
Abstract	2
Acknowledgement	5
Chapter 1 The research problem to be studied	12
1.1 What is the research and why is it important?	12
1.2 Aim, objective and practical outcome of the DBA	13
1.3 Study direction and challenges	13
1.4 Contribution of research	14
Chapter 2 Background, research stages and ethical approach	16
2.1 Background of post-acquisition integration literature and research direction	16
2.2 Author's background	17
2.3 Company background	18
2.4 Research stages	21
2.5 Ethical approach	23
Chapter 3 Literature review	28
3.1 Introduction	28
3.2 What do we mean by trust?	29
3.3 What is the trust type we are exploring?	32
3.4 How does trust develop in an organisation?	34
3.5 Where does culture fit with trust?	42
3.6 Where does trust sit in the post-acquisition integration context?	43
3.7 Where are the trust gaps?	50

3.8	Linking the literature to the research	57
Chapter 4 Research methodology		60
4.1	Introduction	60
4.2	Corporate management sponsorship and enrolment	62
4.3	Methodology adopted	63
4.4	Methodology discussion	76
4.5	Limitations and implications	80
Chapter 5 Qualitative findings		86
5.0	Introduction	86
5.1	Qualitative research stages and emergent codes	87
5.2	Manager's trust in staff	90
5.2.1	Canadian managers' view of the importance of organisational trust	91
5.2.2	Initial post-acquisition trust in the Canadian company	91
5.2.3	Management trust building in the Canadian company	92
5.2.4	Trust breakdown and recovery in the Canadian company	94
5.2.5	Initial pre-acquisition lack of trust in the US company	97
5.2.6	US managers' view of the importance of organisational trust	100
5.2.7	Initial post-acquisition trust in the US company	101
5.2.8	Management trust building belief in the US company – six months post-acquisition	101
5.2.9	Perceptions of effectiveness of trust building in the US company	103
5.2.10	Management trust building in the US company – eighteen months post-acquisition	106

5.2.11 US managers' suggested trust building solutions	110
5.3 Trust elements in company integration	115
5.3.1 Manager's competence and its role in trust	115
5.3.2 Manager's concern and its role in trust	117
5.3.3 Manager's openness and its role in trust	121
5.3.4 Manager's reliability and its role in trust	127
5.4 Trust as a factor in retention	130
5.5 Discussion	142
Chapter 6 Quantitative findings	144
6.1 Introduction	144
6.2 Normality and data integrity	145
6.3 Factor analysis	149
6.4 Multilevel analysis exploration	156
6.5 Analysis of trust elements	159
6.5.1 Openness and disclosure	160
6.5.2 Reliability and reliance	162
6.6 Retention	165
6.7 Discussion	166
Chapter 7 Summary and conclusions	169
7.1 Concluding discussion	169
7.2 Limitations and further study	177
7.3 Stakeholder outcomes	179
7.4 Dissemination of knowledge gained	180

7.5	Practitioner recommendations	180
7.6	And finally...	184
	Bibliography	185
	Appendix A Personal learning and development	204
1.0	Introduction	205
2.0	Setting the scene	206
3.0	The journey so far...	211
3.1	Personal development	211
3.1.1	Importance of lifelong learning	212
3.1.2	Present role as Managing Director	214
3.1.3	Why undertake the DBA?	214
3.1.4	Personal traits	216
3.1.4.1	Personal feedback summary	216
3.1.4.2	Personality tests	218
3.1.4.3	SWOT	220
3.1.5	Theories of learning and learning style	221
3.1.6	Mentoring structure	224
3.2	Academic development	224
3.2.1	Current skills inventory	225
3.2.2	Required skills	226
3.2.3	Stakeholder feedback	228
4.0	The road goes ever on and on...	230
4.1	The vision – learning goals (DBA and beyond)	231

4.2	Development plans	231
5.0	So what?	234
5.1	Reflective approaches	234
5.2	Measurement techniques	235
5.3	Reflection on the DBA	236
Appendix B Questionnaire and survey tools		239
Appendix C Publication and dissemination		253
Appendix D Ethical approval for research		282
Appendix E Major trust disciplines		288
Figures		
Figure 1	Three way trust relationship framework	17
Figure 2	Research stages	22
Figure 3	Market Research Society interview rules	24
Figure 4	Market Research Society online survey rules	25
Figure 5	Organisational trust relationships	32
Figure 6	The stages of trust development	38
Figure 7	The nature of employee trust	41
Figure 8	Executive turnover rate	44
Figure 9	A depiction of the trust process	54
Figure 10	Overall company structure	60
Figure 11	USA divisional organisation structure	61
Figure 12	Canadian divisional organisation structure	61

Figure 13 Company management and staff structure	62
Figure 14 Three way trust relationship	65
Figure 15 Application of research methods to three way trust model	66
Figure 16 Qualitative research stages from interview to findings	88
Figure 17 Normal distribution example of staff data	146
Figure 18 P-P staff normality plot example	147
Figure 19 Normal distribution example of manager data	148
Figure 20 P-P managers normality plot example	148
Figure 21 Staff data scree plot	150
Figure 22 Management data scree plot	154
Figure 23 Predictors v sample size	158

Tables

Table 1 Timeline of comparative organisational trust forms	36
Table 2 Key papers influencing research design and measurement development	56
Table 3 Senior management questionnaire – principal literature references	67
Table 4 Research timeline	75
Table 5 Qualitative interviews undertaken	86
Table 6 Coding framework for Canadian and US company qualitative analysis	89
Table 7 Summary of manager responses showing similarities and differences	114
Table 8 Summary of Explanatory Factor Analysis results for staff trust	151
Table 9 Summary of explanatory factor analysis for management trust	155
Table 10 Power versus sample size	157

Chapter 1 The research problem to be studied

1.1 What is the research and why is it important?

Growth of industrial companies and organisations is based on competition and the drive to maximize profits (Porter, 1980). This growth can be through two primary means. Firstly, through what is called 'organic' growth, that is, growth through addition of numbers of staff and facilities and products funded by the company itself (Meer, 2005) and, secondly, through acquisition or merger, where one company buys or agrees to merge with another (Haspelagh & Jemison, 1991).

Acquisitions are, necessarily, expensive in terms of time and money and are subject to frequent failure (Porter, (1987), Chaudhuri & Tabrizi, (1999), Gopinath, (2003)) across all market sectors from banking to pharmaceuticals to electronics. Of these failures (up to 74% across industries where companies acquired non-related businesses in different markets – Porter, 1987) between a third to a half are due to employee problems (Davy, Kinecki, Kilroy & Scheck, 1988). One manifestation of 'employee problems' is the loss of key staff (Krug, 2003). The staff are holders of key knowledge and hence the loss of these 'knowledge workers' (Raspe & Van Oort, (2006), Yigitcanlar, Baum & Horton, 2007) weakens the acquisition and in some cases weakens it to the point of failure (Cartwright & Cooper, 1996).

It could therefore be concluded that if we could understand what factors caused the key staff to leave the newly acquired organisation this might allow us to develop strategies to counter those reasons and, thus, increase the likelihood of retaining the employees, thereby increasing the chances of a successful acquisition. One such factor is trust. Trust has been identified as a key factor in staff retention (Searle & Ball, (2004), Nikandrou, Papaalexandris & Bourantas (2000)).

Understanding that trust is indeed one of the factors that achieves key staff retention and developing means of monitoring and building that trust can be seen as an important in increasing the opportunities for successful acquisitions. Given the significant cost in terms of time, money and the impact on people of unsuccessful acquisitions this is a worthwhile and important study.

1.2 Aim, objective and practical outcome of the DBA

The objective and aim of this DBA thesis is to explore aspects of trust, its definition, development and role in the post-acquisition integration context of the high-tech electronics area and to determine whether trust is one of the factors that influences key staff to remain with the acquired company in two different geographic locations.

The practical outcome was the development and production of a number of trust measurement tools which were first utilised and then supplied to the case study companies for on-going use for both post-acquisition integration and also general monitoring. These tools can be found in Appendix B.

1.3 Study direction and challenges

The research used an exploratory case study approach utilising two companies in North America, both in the high-tech electronics sector. These companies were chosen due to the ability of the author to obtain full access to all their staff as an employee of the sponsoring organisation who owned them. The intention of the study was to develop trust measurement techniques, building on existing proven tools, and extending and adapting these tools to derive

meaningful data from staff and managers. The data was then analysed to assist understanding current trust levels and longitudinal measurements were made to determine trust level trends. This involved utilisation of different research methods for data capture such as on-line surveys and semi-structured interviews. The implication of using these methods of data capture forced the author to consider a mixed method research strategy. This multi-strategy approach raised many potential issues; perhaps the most obvious being the need for well-designed research. Combining research methods raised the bar in terms of the researcher's need to design well. A further issue was the appropriateness of the selected method. Utilisation of both qualitative and quantitative approaches to capture the data from managers and staff was a new and challenging area for the author. One side effect of using mixed methods was the accumulation of a significant amount of data which required extensive time to sort and analyse. A further challenge for the researcher was to develop the skills and capabilities to be able to exploit both methods, which involved theoretical learning and understanding and use of several different tools to facilitate data capture and analysis. The methodology utilised is explored in greater depth in chapter 4.

1.4 Contribution of research

The research contribution to knowledge is founded on the utilization of a multilevel, longitudinal approach to trust exploration in two separate geographical locations within two different countries. Schoorman, Mayer and Davis (2007, p.345) state that "one of the weaknesses in much of the current trust research is that it is limited to relationships at a single level of analysis, considering either dyadic trust relationships within organisations or trust between organisations". The lack of, and therefore need for, longitudinal trust studies in future research is emphasised in the trust literature (McAllister, (1995), Morrow, Hansen & Pearson (2004),

Lewicki, Tomlinson and Gillespie, (2006). Variations in geography and country have impact on trust formation (Harris & Dibben, 1999) and this is also addressed by this study which offers new findings.

Dietz & Den Hartog (2006), building on the work by McEvily, Perrone & Zaheer (2003), identify three trust elements; namely belief (where the trustor *believes* the trustee to be trustworthy), decision (where the trustor *decides* to trust the trustee) and action (where the trustor has undertaken risk bearing *actions* with the trustee). They assess major trust measurement tools produced to date against these three elements and conclude that no one measure addresses all three. They also highlight the lack of multilevel trust measurement (bi-directionally between managers and staff) in a similar manner to Schoorman, Mayer and Davis (2007).

This study, therefore, explores these gaps (multi-level, longitudinal and geographic locations) in the trust knowledge in the post-acquisition integration context. The following chapter describes the background literature and research direction as well as the author's and company background, the research stages and ethical approach adopted.

Chapter 2 Background, research stages and ethical approach

2.1 Background of post-acquisition integration literature and research direction

The issue of trust is a complex 'wide' area which is subject to a high level of fragmentation (McEvily, Perrone and Zaheer, 2003) with no apparent single definition (Costa (2003), Morrow, Hansen and Pearson (2004)). However, despite the enormous volume of work on trust there is still relatively little research centred on intra-company trust, represented by the process of acquisition and subsequent integration relationship ((Jarillo (1990), Stahl, Chua & Pablo (2003)). Acquisition, representing as it does, often very significant investments in both financial and human resources offers a key area to explore the role of trust as one of a number of factors which can contribute to performance and retention. This is of special interest given the significant failure rate of acquisitions of 65 – 70% (Porter, 1987) where relationship issues are the cause of half of these failures (Cartwright and Cooper, 1996). The issue of key staff retention in the new acquisition is of paramount importance in protecting the resource investment (Shrivastava, 1986; Cartwright & Cooper, 1990; Birkinshaw, Bresman & Hakanson, 2000; Dooley & Zimmerman, 2003, Krug, 2003) and, as argued in this thesis, will be influenced by trust levels as one among several factors between the three principal stakeholder parties (namely senior management, newly acquired key staff and the appointed local manager). Rather than a research programme of more general academic nature, it was proposed, as required by the DBA approach, to develop the knowledge based upon a practical application of trust understanding and building through the acquisition and integration process. The proposed research was based on a multi-strategy approach.

As shown in Figure 1 below, there are three sets of interactions contained in the relationship model, senior management – local manager, local manager – key acquired staff and key acquired staff – senior management.

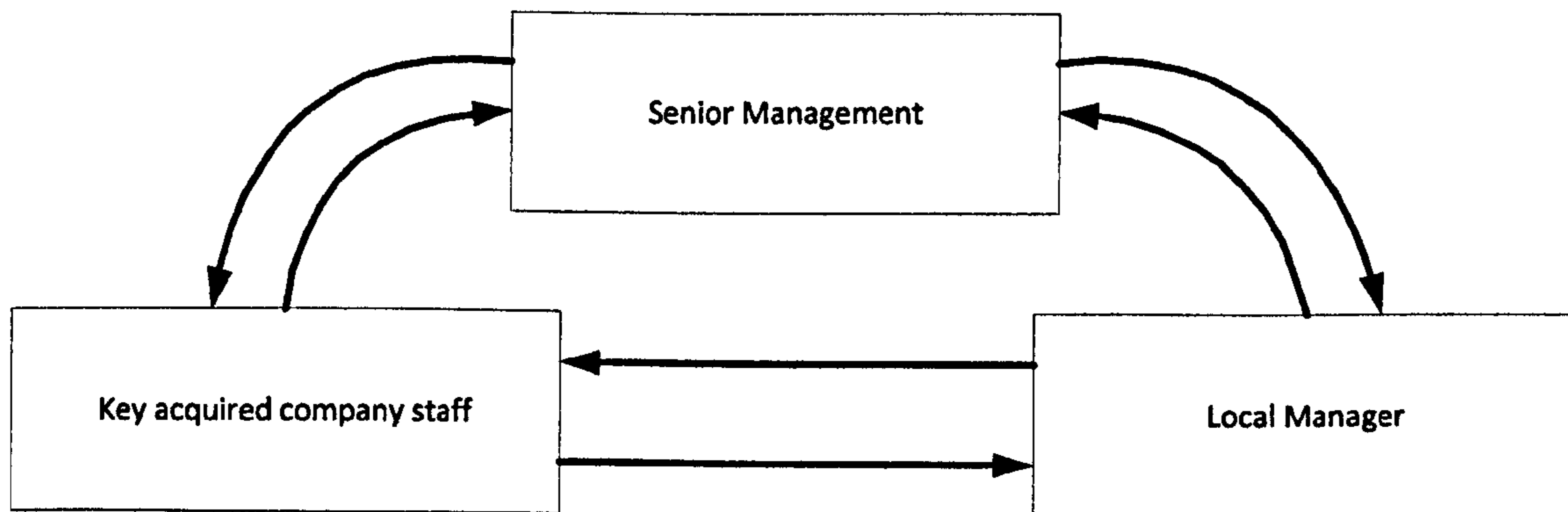


Figure 1 Three-way trust relationship framework

The research is intended to explore the trust relationships between the three parties and, by adding to the current knowledge in this area, could also serve to increase the chances of successful company integrations, in the context of ‘high-tech’ electronic design companies in North America.

2.2 Author’s background

The author was employed by the case study company in the role of establishing a new arm of the business in the United Kingdom, specifically a business to service the rf/microwave test system design market sector. As preparation for this task the company sponsored the author to undertake an MBA which was completed in 2006. As part of the MBA the author began researching trust, risk and control and their impact in the workplace. Presenting the findings of

the dissertation to the senior management in the sponsoring company was rewarded by the offer to extend the sponsorship to cover a more in depth look at trust and its potential role as one of the influencing factors in key staff performance and retention. This occurred as a result of a company integration which had not run smoothly with the resignation of the recently appointed general manager of the newly acquired company. The sponsoring company intended, at that time, to undertake a number of acquisitions and was thus eager to obtain a better understanding of factors which would assist with better management of these new companies and protect the significant investment dollars that would be spent. The DBA offered the opportunity to further the trust research achieving a balance between practitioner and academic disciplines. This matched well with the company goals (practitioner) and the author's personal goals (practitioner and academic).

The company allowed the author access to two separate companies that had been subject to acquisition by the parent company, located in the United States and Canada, together with all levels of staff. This thesis is based on the resultant work and findings.

2.3 Company background

The head office of the companies under study was located in Canada. The company employed approximately 1200 staff with 950 plus being based in Canada. The company also had small sites in the UK, US and China. The company was overwhelmingly engineering based with a very significant percentage of staff science graduates. The age profile of the case study companies was such that the predominance of staff and management ages were in the 40 – 49 and 50-59 age bands. This reflects the national workforce demographic trend observed in North

America (Beatty & Burroughs, 1999). The effect of the ageing trend is that specialist knowledge workers are increasingly, on average, older and as the population ages there are fewer of these key workers available in the employment market. These knowledge workers are critical to the electronics high technology niche business (Benson & Brown, 2007) engaged in by the companies under study. This underlines the relevance and importance of this research that sought to explore aspects of trust, its definition, development and role in the post-acquisition integration context of the case study companies and to determine whether trust was one of the factors that influenced key staff to remain with the acquired company across the two different geographic locations. In the case of the Canadian case study company, for example, a staff member would need to move many hundreds of miles should he or she seek a new position in another company needing similar specialist skills. The employment situation in the USA is very different, however, with many companies adjacent to the case study company engaged in similar high technology activities. Transferring to another company in the case of the USA case study company would be very straightforward and would allow the staff member to continue in his or her specialist area with minimal disruption.

The data gathering undertaken in this research was achieved through use of semi-structured interviews and questionnaires. It was initially proposed by the author to use focus groups in addition to these other methods. However, both companies had recently committed to running a bi-annual staff survey as a separate exercise in addition to the planned interviews and questionnaires. Consultations with the management in both companies resulted in acceptance and deployment of the research data gathering tools (interviews and questionnaires) but precluded use of focus groups as this was felt by the senior managers as too great a time imposition on the

staff and managers (including costs to the company) as well as being in danger of losing the attention of the employees.

The two case study companies design, build and test a number of different products that are utilised in a high-tech industry. Given the preponderance of engineering or engineering background staff throughout the organisation and the production-basis of the company this tended to mean that most activities of the company were governed by published processes and procedures. This led to a dominance of company operations, including acquisitions, by process methodology closely aligned to 'hard' methods as highlighted by Senior (2002).

In the light of the above it was not surprising, therefore, that a process-based approach to acquisition, as advocated by Haspeslagh and Jemison (1991), was used by the company over the previous five years as it embarked on an 'organic' (Meer, 2005) and non-organic (or acquiring) growth strategy. Two acquisitions were made in that five year timescale. The first was made in Canada in November 2005. The acquired business (26 staff) was a section of a much larger business that was being split up and sold. The unit designed scientific instruments for the high-tech industry. The organisation was keen to acquire the company due to the adjacency of their high-tech technology products to their own. The new business unit was located in Canada, some significant distance from head office. A General Manager was appointed to run the newly acquired company. The manager was recruited just prior to the due diligence phase of the acquisition. He was an ex-employee of the company and had been involved in running a number of small businesses in the time between leaving and re-joining the company.

In early 2007 the General Manager of the recently acquired Canadian company resigned. This further highlighted to the sponsoring organisation senior management the issue of retention of key staff members post-acquisition within the company and the need for a better

understanding of what caused staff to leave and, if they could be retained, what methods were available to monitor the likelihood of potential leavers.

The second acquisition was made in the US, augmenting a small team of approximately 30 staff who had set up the business from the start some six months earlier, with the acquired staffing of over 70 employees. The acquisition closed in May 2008 and involved the purchase of a division from a much larger national US company. A President was appointed to run the new company, recruited locally. Given that this acquisition was twice the value of the Canadian investment the sponsors were keen to press forward with exploring, via this research, factors that could predict and anticipate levels of retention of key managers and staff.

2.4 Research stages

The research stages that encapsulate the aims and objectives of the research are illustrated in Figure 2 below. These encompass a detailed literature review to establish both an understanding of the definition and the basis of trust together with a review of trust in a post-acquisition context. The review of the literature uncovered a gap in trust knowledge in this area as well as revealing the presence of existing trust measurement tools which were then further developed to address the identified gap in knowledge. The tools were pilot tested and utilised to gather data. Once gathered the data was analysed to confirm whether or not the aim and objective of the research was met; namely, that trust was one of the factors in post-acquisition performance and retention in the examined context. Finally the issue of generalisability was addressed, together with identification of future areas of research.

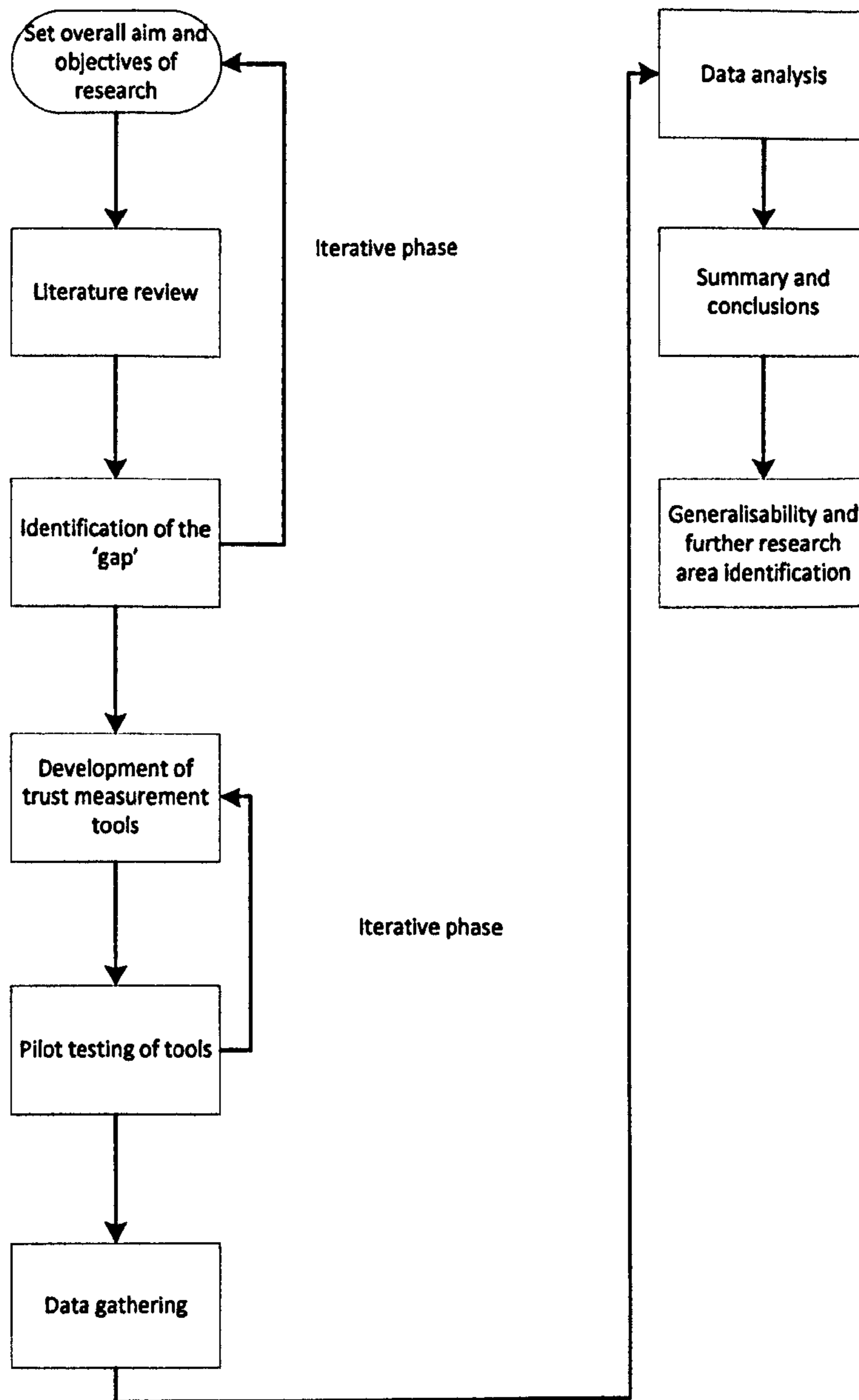


Figure 2 Research stages

2.5 Ethical approach

The ethics considered relate, principally, to the researcher and research participants. Two principal aspects of ethics were addressed: the overall ethical approval of the research and questionnaire specific ethical guidelines.

The overall ethical approval of the research was obtained through submission of the ethics form to the university research ethics committee. The research was approved and evidence of both ethical application and subsequent approval can be found in Appendix D.

The established ethical guidelines utilised were those set out by the Marketing Research Society (hereafter MRS) for both qualitative face to face interviews and quantitative on-line surveys. Figure 3 below illustrates the MRS code of conduct for interviews. These guidelines were selected on the basis that they were highly applicable and well established.

The Rules	
B15	If there is to be any recording, monitoring or observation during an interview, Respondents must be informed about this both at recruitment and at the beginning of the interview.
B17	Respondents must not be misled when being asked for cooperation to participate in a research project.
B18	A Respondent's right to withdraw from a research project at any stage must be respected.
B34	At the time of recruitment (or before the research takes place if details change after recruitment), Members must ensure that Respondents are told all relevant information as per rule B21 and: <ul style="list-style-type: none"> • the location of the discussion and if it is to take place in a viewing facility; and • whether observers are likely to be present; and • when and how the discussion is to be recorded; and • the likely length of the discussion including the start and finish time; and • the Member, moderator and/or research agency that will be conducting the research;
B37	Members must make clear to Respondents the capacity in which observers are present; Clients must be presented as such, even if they are also Researchers and/or Members of MRS.

Figure 3 Market Research Society Interview Rules (2006)

The conduct for on-line surveys is included below. These guidelines were honoured in this research.

The Rules	
B8	The anonymity of Respondents must be preserved unless they have given their informed consent for their details to be revealed or for attributable comments to be passed on.
	<i>Comment: Members must be particularly careful if sample sizes are very small (such as in business and employee research) that they do not inadvertently identify organisations or departments and therefore individuals.</i>

Figure 4 Market Research Society On-line Survey Rules (2006)

Figure 4 above illustrates the MRS rules for on-line surveys. MRS (2006) recommends that a minimum of ten participants are interviewed. This was a good fit with the number of individuals to be interviewed in the case study companies (8 and 13 respectively). Through careful anonymisation of the responses between the two companies it was possible to protect the anonymity of the contributors thus maintaining the ethical stance of the research.

In addition, Bryman and Bell (2003, p.539) point out four business research ethical principles:-

- (i) avoiding harm to participants
- (ii) lack of informed consent
- (iii) invasion of participants' privacy
- (iv) deception of participants

Points (i) to (iv), inclusive, were addressed such that there was active avoidance of harm to participants, a high level of informed consent (see Appendix B introduction sheet), no invasion of participants' privacy and no knowing deception of participants.

However, it is incumbent on the researcher to consider the reflexive nature of the research. Given the fact that the author worked for the company under study one's initial view might be that there is certainly a case for reflexivity in this thesis. This is tempered to some extent by the fact that the author was employed by the UK element of the company and the studied elements were located in Canada and the USA. This entailed proposing and engaging with staff members that were, initially, unknown to the author. There is also the issue of the difference in cultures between the UK, Canada and the USA. These differences entailed a cautious approach by the author such that perceived ethical boundaries and limits existing in Canada and the USA would not be crossed. One immediate impact of this was to slow the process of introduction and approval of the research in each case study company. A final factor that was considered was the nationality of the author – British. This required careful consideration in that language changes between the UK, Canada and the USA. Efforts were made to keep all presentations and questions in terms that were clear and understood by the interviewee such that ethical standards (as discussed above) were maintained, and, furthermore, data gathered was clear in meaning to the UK researcher. This was aided by the author having spent three and a half years in Canada in the nineties. It would be untenable, however, for the author to claim there was no influence exerted by the context in which he was working at all as, clearly, he was employed by the company (albeit in the UK) and was thus influenced by several factors; the need to ensure the company research and academic goals were met. In attempting to meet the company research goals some level of bias and influence was inevitably incurred but the ethical guidelines were adhered to. The academic goals were also met by this research, but again, the author cannot claim an absence of contextual influence in this work. Steps have been taken, through reflection and analysis of the data and subsequent findings during the course of the research, to minimize this influence.

This chapter has described the background literature and research direction as well as the author's and company background, the research stages and ethical approach adopted. The next chapter addresses the trust literature with a particular focus on trust definition and trust in the post-acquisition context and the associated gaps that are subsequently explored in this work.

Chapter 3 Literature Review

3.1 Introduction

The goal of the research is to explore aspects of trust, its definition, development and role in the post-acquisition integration context of the high-tech electronics area and, specifically, to seek to discover whether levels of trust between staff and managers have influenced key staff to remain with the acquired company longitudinally and in two different geographic locations. This requires us to develop our understanding of the definition and role of trust in organisations and its link to the retention of key staff within the subject company. We should, therefore, examine the relevant literature concerning trust to determine the definitions, arguments and 'state of the art' such that we can attempt to build further on these foundations. The chapter addresses the trust literature, commencing with an introduction, followed by an examination of trust definitions and the trust type we are exploring. This is followed by sections covering trust development in an organisation setting, a brief look at how culture fits with trust, the place of trust in the post-acquisition integration context and the particular gaps in that context that this thesis explores.

The researcher faces a significant challenge in a review of the trust literature given its breadth and depth. This chapter has therefore adopted an approach of a 'zooming in' funnel-type process looking in turn at the meaning of trust in a wide sense, the place of trust in the academic disciplines, trust types and forms then narrowing the focus to trust applied to the post-acquisition integration field. Finally, the chapter concludes with an examination of the potential gaps in the trust literature which are subsequently addressed in the following chapters.

3.2 What do we mean by trust?

A review of trust definitions in the literature reveals some trust definitions that have significantly higher levels of reference than others. Arguably one of the most cited, Mayer et al., (1995) p712, defines trust as “the willingness of a party to be vulnerable to the actions of another party based on the expectation that the other will perform a particular action important to the trustor, irrespective of the ability to monitor or control that other party.” Among many currently active writers citing this definition and using the definition as a springboard to their trust research area are Spreitzer and Mishra (1999), Williams (2001), Mayer and Gavin (2005), Saunders and Thornhill (2004), Morrow, Hansen and Pearson (2004) and Puranam and Vanneste (2009).

This definition (Mayer et al., 1995) was then further developed by Rousseau, Sitkin, Burt and Camerer (1998, p395) to define trust as “a psychological state comprising the intention to accept vulnerability based on positive expectations of the intentions or behaviour of another.” Again, this definition is cited by a number of researchers (Gillespie (2003), Long & Sitkin (2006) and Van de Ven & Ring (2006).

Another often cited trust definition is that provided by Gambetta (1988, p217) who presents the definition as “the probability that he (the trustee) will perform an action that is beneficial or at least not detrimental to us (the trustor) is high enough to consider in engaging in some form of co-operation with him”. Gambetta (1988) also mentions trust placed in the trustee by the trustor is critical before any monitoring of the action undertaken by the trustee and independent of the trustor’s capacity to monitor the action. One further example definition is provided by O’Brien (2001) who defines trust as confidence in the outcome of a situation and an expectation about the positive actions of other people, without being able to influence or monitor the outcome. She also points out that trust implies risk because it is based on confidence in a

relationship, or the capacity to deliver, without having to monitor the outcome continually. The theme of vulnerability due to exposure to risk is highlighted.

Given the number of differing definitions of trust that exist it is not surprising that from these multiple definitional foundations the research in trust has developed into an extremely diverse and wide-ranging field. The major trust disciplines in organisational science range from psychological trust, concerned with the individual and sometimes group (Rotter, 1967, Tyler, 1990, Rousseau, Sitkin, Burt & Camerer, 1998, Costa, 2003, Clark & Payne, 2006, Lewicki, Tomlinson & Gillespie, 2006) ; sociological, concerned with the group and society (Lewis & Weigert, 1985, McAllister, 1995, Mollering in Bachmann and Zaheer, 2006) ; economic trust, concerned with the individual or larger firm (Fukuyama, 1995; Williamson, 1996; Gomez & Santor, 2001; Khalil, 2003; Casson & Guista, 2006) and socio-psychological trust focusing on group analysis (Cummings and Bromiley, 1996). The range of disciplines in trust research continues to grow and the above descriptions should not be deemed exhaustive.

For the purposes of this thesis the author has adopted the psychological trust discipline. Here the studies are primarily based around the individual, or occasionally the group, emphasising the cognitive (reasoned) and affective (emotional) models, with the aim of understanding the individual's psychological processes and dispositions to trust another party. One notable example in this large school of thought is Mayer, Davis and Schoorman (1995) who examine the antecedents of interpersonal dyadic trust based on factors of perceived trustworthiness of the trustee (as seen by the trustor) and the trustor's propensity to trust. McAllister (1995) establishes, focusing on organisational managers, that some level of cognitive trust is necessary for affect-based trust to develop. The matter of trust development is argued by Jones and George (1998) who advocate building trust from the initial state of conditional trust to a level of unconditional

trust, which, they argue, fosters development of tacit knowledge that will benefit the organisation. McAllister, Lewicki and Bies (2000) challenge previous psychological studies as somewhat one-dimensional with a single component or dimension of the trust relationship determining the quality of the entire relationship. They argue that relationships are multifaceted and multiplex. In this multifaceted relationship it is possible for trust and distrust to exist at the same time. This tends to push against a more traditional view that trust and distrust are at either end of a continuum (Rotter, 1967). This more multidimensional view is further extended by Lewicki, Tomlinson and Gillespie (2006) who highlight the work of Shapiro, Sheppard and Chedraskin (1992), Lewicki and Bunker (1995, 1996) and Rousseau, Sitkin, Burt and Camerer (1998) stating that the authors suggest transformational models of trust that change in nature over time due to repeated and varied interactions that allow the actors to gain more knowledge about the other. Applying the psychological discipline to trust levels in the post-acquisition or post-merger integration phase we are dealing with primarily dyadic relationships between individual key staff, local management and senior company management.

The researcher is driven, given the vastness of the literature in at least two of these trust research areas, toward a selection of one discipline from the three disciplines: sociological, socio-psychological and psychological. Economic trust is discounted by the author on the basis that neither neoclassical nor institutional trust matches the research subject as well as the remaining three. Of these three, the author has selected the psychological approach due to its closeness in fit with the multidimensional, longitudinal study of different individuals in the organisational setting, in particular key staff, local management and senior company management. This is not to say there is no application for an examination of sociological or socio-psychological trust; more that in the author's opinion psychology offers the required

relationship-based depth that will assist in exploring the role of trust in key staff retention as this can be considered primarily, as far as the individual actor is concerned, a dyadic relationship.

3.3 What is the trust type we are exploring?

If we are to investigate aspects of trust and its measurement as part of the post-acquisition integration we should be aware of the differing forms of trust as defined in the literature and who trusts whom in the organisation. For the purposes of this thesis we are examining the trust between staff and managers and managers and staff in a bi-directional sense as illustrated below in Figure 5.

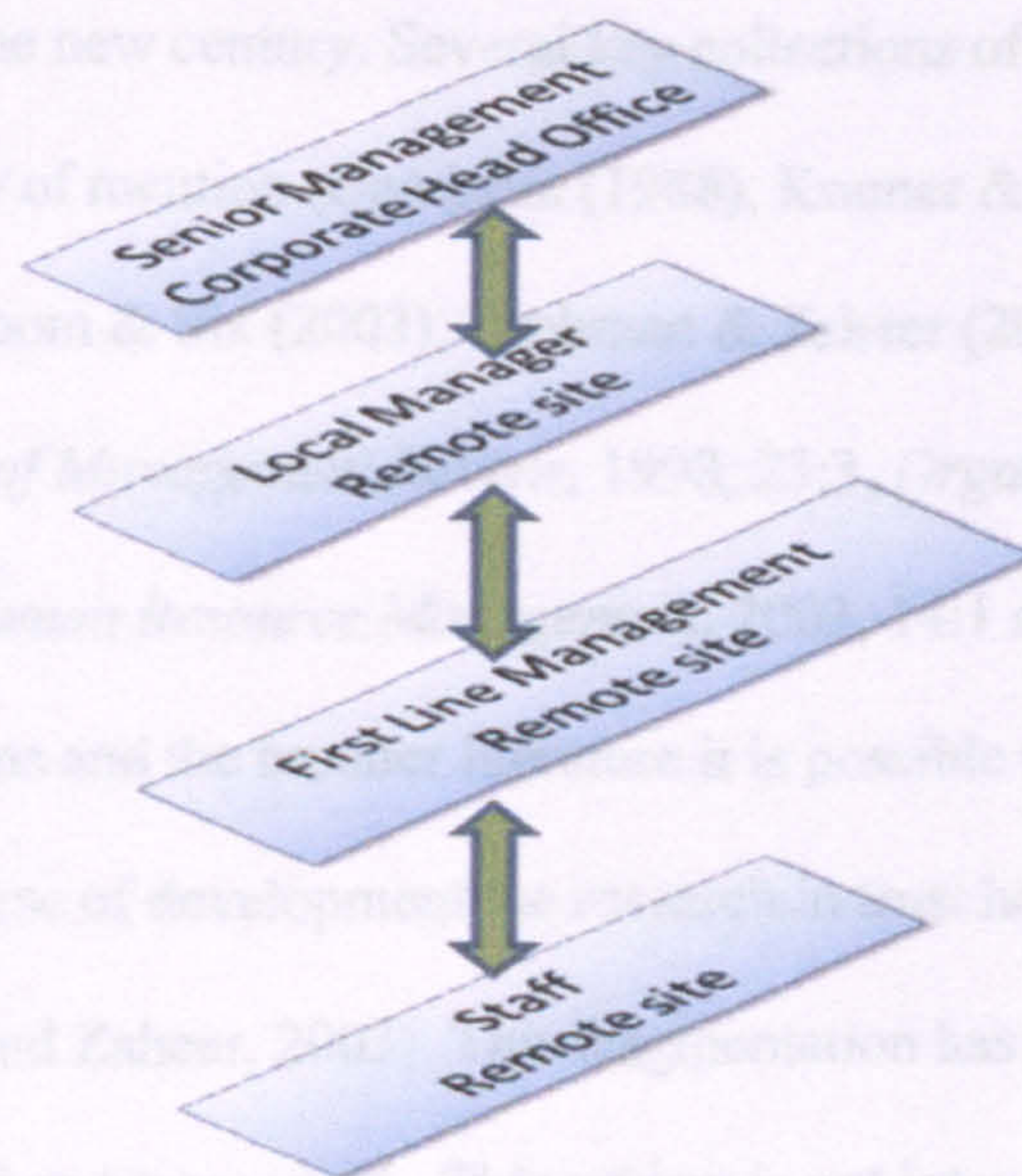


Figure 5. Organisational trust relationships

The early work on trust and its role in organisations gained momentum in the sixties and seventies. Notable frequently cited early contributors to the field were Deutsch (1958, 1962) and Zand (1972). These early studies of interpersonal trust were mainly based in the ‘relational’ area

(Pearce, 1974) but increasingly it was recognised that trust had a major role to play in an organisational setting. Lewicki and Bunker (1996) describe this development and the application of interpersonal trust to working relationships. The organisational trust literature now in existence represents a very substantial body of work.

Interpersonal trust can be argued as forming the fundamental element of all trust (Hoecht and Trott, 1999) involving personal judgment (i.e. on a relational basis), and so, in effect, it can be postulated that organisational trust at a foundational level may be very closely related to relational trust. This relational organisational type of trust 'fits' within the general psychological approach to trust research which has been adopted for this thesis.

The late seventies and eighties saw a proliferation of research with a sustained intensity which has continued into the new century. Several key collections of papers regarding the state of trust research are worthy of mention (Gambetta (1988), Kramer & Tyler (1996), Lane & Bachmann (1998), Nooteboom & Six (2003), Bachman & Zaheer (2006)) as well as special journal editions (*Academy of Management Review*, 1998, 23:3, *Organization Studies*, 2001, 22:2, *International Journal of Human Resource Management*, 2003, 14:1 and *Personnel Review*, 2003, 32:5). From these collections and the broader literature it is possible to identify some of the many trust forms. During the course of development the research in trust has become fragmented in nature (McEvily, Perrone and Zaheer, 2003). This fragmentation has led to a number of broad trust areas being recognised and researched. This review is not intended to be complete and all-encompassing but offers some of the principal interpersonal trust research to form a backdrop to the exploratory trust theme of this thesis. There exists a significant body of literature concerning both trust antecedents and trust forms. This study, however, does not address trust antecedents due to the very wide bounds that would then be imposed on this work which would cause a

necessary 'shallowing' of the depth of study. Thus, to maintain an in depth focus and objectivity to the research the author has chosen to centre the study on interpersonal (organisational) trust.

3.4 How does trust develop in an organisation?

Driscoll (1978) and Scott (1980) divided the concept of trust into two components; a global (attitudinal/ affective) component and a specific (situational/cognitive) component. The specific or cognitive component was felt by the authors to apply to organisational applications. Trust research based around the cognitive form was evident in the nineties through Butler (1991), who built on the earlier studies by Jennings (1971) and Gabarro (1978), focusing on the cognitive form correlating with and predicting organisational analysis and outcomes. Butler (1991), whilst building on the earlier work, argued that due to the complexity and specificity of trust in an organisation the global (attitudinal/affective) trust form was not applicable. This is in interesting contrast to Gabarro (1978) who, in examining the trust relationships between corporation presidents and their vice presidents, identified affective trust as an important component. Butler (1991) also developed the knowledge of trust by examining the conditions (antecedents) of trust in a specific person and identifying the Conditions of Trust and Items (CTI), an early form of measuring the conditions which would facilitate trust. The conditions for trust development identified by Butler were *availability, competence, consistency, discreetness, fairness, integrity, loyalty, openness, promise fulfillment* and *receptivity*. Overall trust was added to verify the relationships between the conditions and overall trust in the trustee.

The emphasis of cognitive trust being appropriate for organisations persisted for some considerable time until becoming challenged by newer research. McAllister (1995), building on

earlier work by Lewis and Weigert (1985), and operating from a sociological base, was able to show that cognitive and emotionally-based trust were two distinct forms and were both applicable to the organisation. Jones and George (1998) in their psychologically-based research argued that ongoing development of trust between individuals in an organisation was dependent on moods and emotions which would affect the ongoing experience and relationship.

Further evidence for the emergence of these two forms of trust are provided by Hoecht and Trott (1999) who state that trust can be viewed as a personal judgment which involves an emotional as well as a cognitive dimension. Fryxell, Dooley and Vryza (2002) outline two forms of inter-organisation trust, firstly, trust that is formed based on good reasons with evidence of trustworthiness present and, secondly, trust based on emotional bonds. Fryxell, Dooley and Vryza (2002) describe the first form of trust as cognitive-based trust which they propose that, combined with formal control, can greatly assist with binding parties to mutual promises. The authors describe the second form of trust based on moods and emotional bonds as affect-based trust. This form of trust promotes the belief that the trustee cares about the relationship and, more importantly, is attentive to the needs of the trustor. Chowdhury (2005) provides a simple definition of cognition-based trust in that it is based on cognitive reasoning regarding the extent of reliable role performance and the extent of professional credentials of the trustee. This assessment of the trustee performance and credentials could be described as producing a 'process-based' trust in that the trust is related to a cognitive process. He continues by defining affect-based trust as the development of strong personal values and emotional ties between the trustor and the trustee. These values and ties help improvement of mutual understanding and an emotional openness with much reduced concern regarding vulnerability. The increased level of

the resulting social intimacy further builds development of shared values, perceptions and mental models.

Schoorman, Mayer and Davis (2007) commenting on their earlier studies (Mayer, Davis & Schoorman, 1995), state that their seminal trust model represented a cognitive approach to trust and recognised that the roles of affect and emotion would influence the antecedents of trust and therefore are integral to trust. So it would seem that there is substantial support from the literature regarding cognitive and affect-based trust as two clear forms of trust.

Table 1 below illustrates the timeline with some of the principal authors for cognitive and affect-based trust described above.

Author	Year	Trust form
Jennings	1971	Cognitive
Gabarro	1978	Cognitive
Driscoll	1978	Attitudinal/affective Situational/cognitive
Scott	1980	Attitudinal/affective Situational/cognitive
Lewis and Weigert	1985	Cognitive Affective
Butler	1991	Cognitive
McAllister	1995	Cognitive Affective
Mayer, Davis and Schoorman	1995	Cognitive
Jones and George	1998	Affective
Hoecht and Trott	1999	Cognitive Emotional
Fryxell, Dooley and Vryza	2002	Cognitive Attribution/affective
Chowdhury	2005	Cognitive
Schoorman, Mayer and Davis	2007	Cognitive Affective/emotional

Table 1. Timeline of comparative organisational trust forms

Exploring the literature further, a number of authors argue for further discrete and separate aspects of trust.

Zucker, (1986), provides one such example in three forms; process-based trust – where trust is built on past evidence; characteristic-based trust – where a person has trusted characteristics as an individual, and finally institutional-based trust – where trust is tied to formal structures of the individual or firm. Here, ‘process-based’ trust could be aligned with cognitive trust as described above and typified by McKnight, Cummings and Chervany (1998) who argue that trust grows through experiential knowledge and initial assumptions and dispositions. Again, a cognitive assessment process is undertaken. McKnight, Cummings and Chervany (1998) describe institutional trust in a manner that also aligns with Zucker (1986). Finally, ‘affect-based’ trust could be seen as similar to Zucker’s characteristic-based trust model.

Drucker (1993) emphasises that ‘old fashioned’ integrity can be a basis for affect-based trust growth.

Lewicki and Bunker (1996) in their seminal research also identify three forms of trust: calculus-based trust, knowledge-based trust and identification-based trust. Their work is an extension of the earlier work of Shapiro, Sheppard and Cheraskin (1992) who proposed deterrence-based trust, knowledge-based trust and identification-based trust forms. Deterrence-based trust is defined by the authors as where the trusting parties maintain consistent behaviour which is sustained under threat of punishment. Lewicki and Bunker extend and moderate this form of trust by renaming it calculus-based trust; that is, trust based on both fear of punishment *and* the rewards available from its maintenance. Knowledge-based trust is defined by both Shapiro et al and Lewicki and Bunker as the trustor knowing the trustee well enough such that the trustee’s behaviour is anticipatable and predictable. This implies a depth of knowledge of the trustee generated over time with repeated interactions. Identification-based trust is defined by Lewicki and Bunker (1996) as identification with the trustee’s desires and intentions. At this

advanced level of trust each party understands and appreciates the other's wants and a significant level of mutual understanding is created to the point where each can act effectively on the others behalf. Of interest is the authors' theory of growth from one trust state to another, commencing with calculus, moving to knowledge and, in some cases, finally to identification-based trust. It is possible to align Lewicki and Bunker's identification-based trust with relational trust and hence affect-based trust, whilst knowledge-based trust can be aligned with cognitive trust. Lewicki and Bunkers trust development model is shown below in Figure 6.

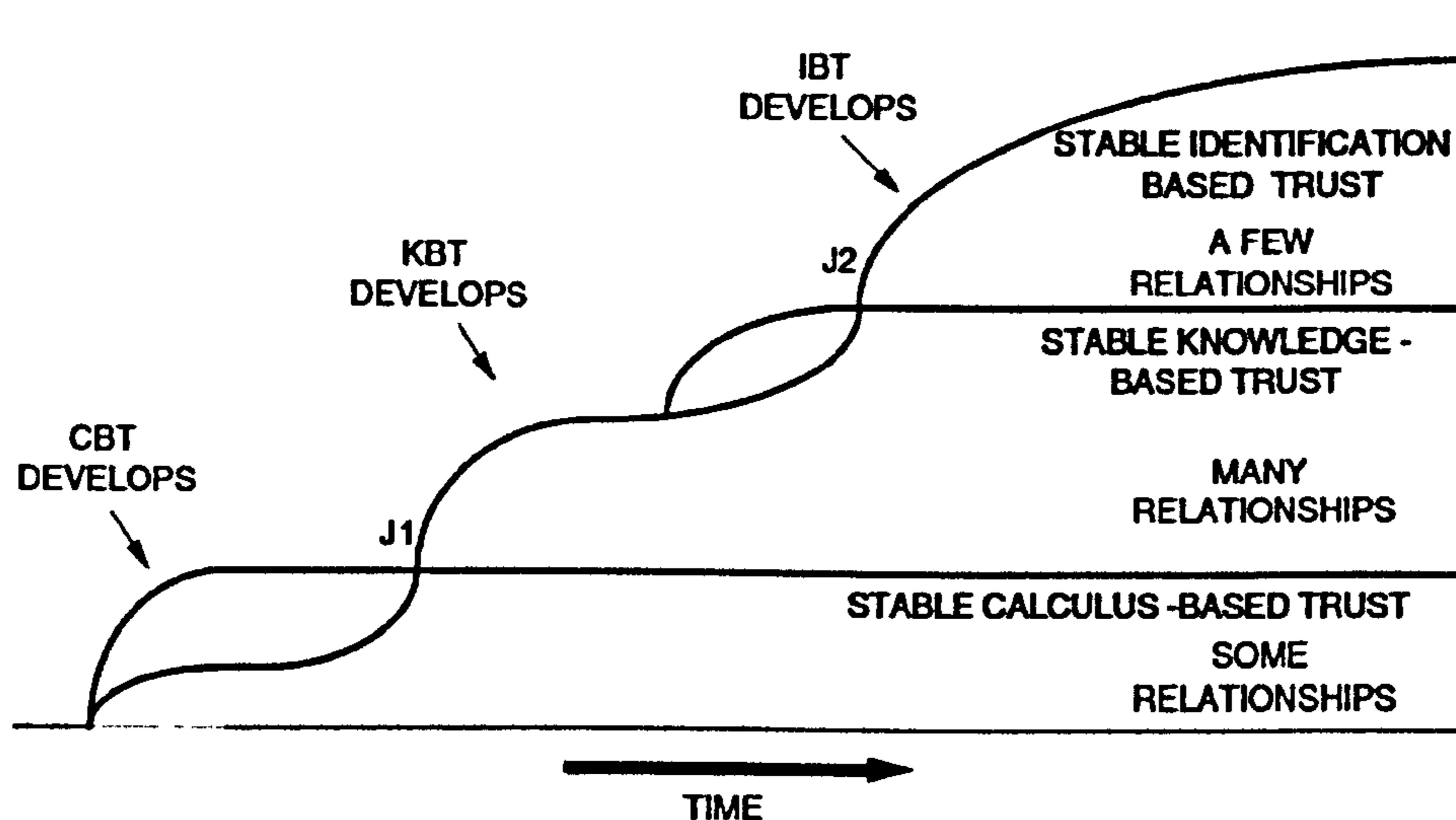


Figure 6. The stages of trust development

Lewicki and Bunker (1996)

One of the very frequently referenced papers concerning trust is that of Rousseau, Sitkin, Burt and Camerer (1998) who, whilst probably providing one of the most widely cited definitions of trust, identify three trust forms: calculus-based trust, relational trust and institutional trust. Calculus-based trust is defined as trust that is based on the rational choices of the trusting parties based on economic exchange. This trust is defined as limited to situations where evidence of failure to perform can be obtained in the short term and where willingness to

trust is limited to specific exchanges such as financial and not personal. Relational trust, in contrast, is defined as trust that is derived from repeated interactions over time between the trusting parties. Relational trust builds on previous interactions between the trustor and trustee and, as the continuing interactions lead to formation of attachment based on reciprocal interpersonal care and concern, emotion enters the relationship between the parties. This form of trust can be seen to align very well with McAllister's (1995) definition of affective trust. The third form of trust identified by Rousseau et al (1998) is institutional trust which is concerned with trust in the institution itself. This trust is fostered by the institutional legal structures, societal networks and both norms to limit conflict and increase co-operation between members of the institution thereby ensuring that the mission and goals of the institution can be achieved. Of interest here is the progression from calculus-based trust to relational-trust (or affect-based trust) over time and repeated transactions between the trusting parties in a similar manner to Lewicki and Bunker (1995) as shown above.

Writing from the psychological discipline, Jones and George (1998) argue that the roles of emotion or affect in creation of trust are relatively unexplored issues. They define trust as conditional and unconditional. Conditional trust is trust that promotes cooperative behaviour that does not call for significant personal costs or self-sacrifice. Unconditional trust, in contrast, is built on conditional trust, whereby confidence levels in the trustee are raised through repeated behavioural dealings and positive affect increases as positive moods and emotions strengthen the affective bonds between the trustor and the trustee, leading to further increased levels of trust. In other words affect is the necessary ingredient to move trust from conditional to unconditional. This affect-based approach is supported by Ashkenas, DeMonaco and Francis (1998) in their earlier work, who, when discussing successful company integration, state that failing to take

steps to address the “soft” side of integration turns the “hard” aspects of integration into mere mechanical exercises.

Williams (2001) further develops the affect-based trust research. She notes that preceding writers who described trust as a continuous process, had tended to ignore affect in their models citing Mayer, Davis and Schoorman (1995) and Ring and Van de Ven (1994) in particular. She cites Jones and Georges’ (1998) model as an exception to this criticism and argues that the role of affect in trust development has not been clearly defined. That this statement of the state of knowledge in this area can be made as recently as 2001 is indicative of the diversity and lack of cohesion, not surprising given the huge width and complexity of trust forms and types,. Williams (2001) provides a trust development model that brings the cognitive and affect elements together, with affect being postulated as a key influence for interpersonal trust development through cognitive, motivational and behavioural paths.

O’Brien (2001) leans toward the affect-based organisational trust model advocating trust development through communication, openness, fairness, recognition and care and concern rather than a more process-based formula or model.

Das and Teng (2001) describe further forms of trust; goodwill trust and competence trust. Goodwill trust is defined as being about one’s good faith, good intentions and integrity and could be seen as linked to Drucker’s affectual view. The authors describe competence trust as a trust based on the various resources and capabilities of a firm. This could be biased more towards the ‘process-based’ trust as discussed above.

Lane (1998) in Lane and Bachmann (1998) describes value or norm-based trust. This trust form is based on the concept of suspension of self-interest in favour of collective order; the trustor will meet his or her social obligation and exercise responsibility toward the trustee.

Another author, Piske (2002), describes 'process-based' trust (Zucker, 1986) as simply cognitive trust with formal controls.

Young and Daniel (2003), writing from a social science viewpoint, present a trust model shown below in Figure 7 that focuses on cognitions and emotions combining together to develop varieties of affectual trust. Their concept of affect based trust has now moved to encompass cognitive elements within the resulting developed trust.

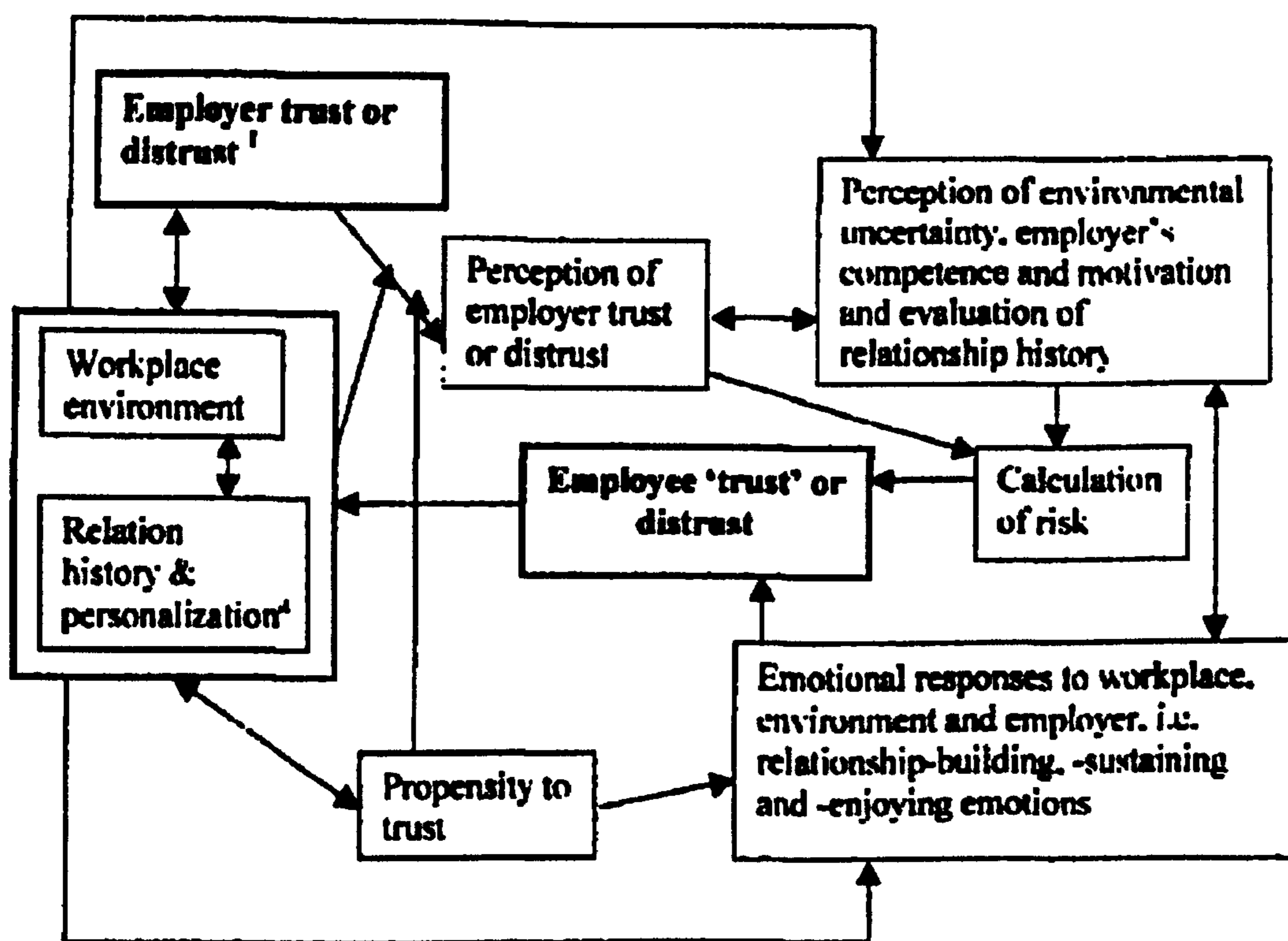


Figure 7. The nature of employee trust (Young and Daniel, 2003)

This progression, as the research field continues to mature, is indicative of the differing elements and forms that combine to produce the multidimensional aspects of affect-based trust. Young and Daniel (2003) also support the point of view that cognitive (or calculative) trust, if it does not contain elements of emotion, may not be considered as 'real trust'. They argue that trust must

involve additional attributes or elements grounded in caring and affect. This could be seen as a similar view to that of Jones and Georges (1998) description of conditional and unconditional trust described above.

Galford and Drapeau (2003) identify the building blocks of trust as old-fashioned managerial virtues like consistency, clear communication, and a willingness to tackle awkward questions. Tyler (2003) introduces motive-based trust. This form of trust is based on the trustor believing that the trustee is motivated by a concern for the trustor's welfare. Tyler's research is based on the public's levels of trust of the police, hence there exists a potential link with institutional trust as described by Rousseau et al (1998) above.

Turning from the wider forms of trust growth we now consider specific research pertaining to trust applicable to the field of post-acquisition or merger integration. So where does trust fit in to the post-acquisition or merger integration context?

3.5 Where does culture fit with trust?

Whilst not the major thrust of this thesis nonetheless if we accept the view of Birkinshaw (1999, p.39) that "a company considering the acquisition of another firm needs to devote explicit attention to integrating both tasks and people", then we should briefly consider aspects of culture that may affect trust and hence the integration progress. Chaudhuri and Tabrizi (1999) argue for the importance of 'cultural integration' between the acquiring and acquired companies and this begs the question, what do we mean by culture in an organisational setting? Kilmann, Saxton and Serpa (1985) define organisational culture as shared philosophies, ideologies, values and assumptions that knit an organisation together. Senior (2002, p.124) defines culture as "the

collective programming of the human mind that distinguishes the members of one human group from another. Culture in this sense is a system of collectively held values". Cartwright and Cooper (1993, p.60) define organisational culture as "symbols, values, ideologies and assumptions which operate, often in an unconscious way, to guide and fashion individual and business behaviour". They go on to state that "the socio-cultural integration of two previously discrete and often rival workforces, and their organisational cultures, is a major ungluing and regluing job" and "the degree of culture fit that exists between the combining organisations is likely to be directly correlated to the success of the combination". Relating culture to trust Huff and Kelley (2003) argue that the country culture (and hence, largely, the culture of the organisation in that country) will have a material impact on the willingness of the willingness (or otherwise) of the acquired staff to trust the acquiring company. It would thus seem of importance that careful consideration of the organisational culture of the acquired company be undertaken by the acquiring company with respect to their own.

3.6 Where does trust sit in the post-acquisition integration context?

Given the substantial investment of time and money that is required for an acquisition or merger the integration of the different company or organisational elements that come together to form the new collective identity is of primary importance. The investment in the integration phase is critical in order to achieve the merger or acquisition goals. These goals might be, among many possibilities, to achieve a broader portfolio of products, increased market sector share, adjacent market access or absorption of a potential or current competitor – in short to achieve strategic goals more quickly and inexpensively than if the company were to act on its own (Marks and Mirvis, 2001). The integration normally involves several principal elements namely

the facilities, products and the staff. The integration of the staff is dependent on many factors and variables (Shrivastava, 1986; Cartwright & Cooper, 1990; Birkinshaw, Bresman & Hakanson, 2000; Dooley & Zimmerman, 2003). The knowledge that is required to develop new products successfully, or to manufacture or improve existing products is resident with the staff (Graebner, 2004). A number of key staff members will be instrumental in the success of the organisation or company (Wooldridge, 2006) and it is these staff, in particular, and their retention within the new identity, who are of critical importance to the acquisition or merger. Loss of these key staff members involves loss of valuable intellectual property (Hacker, 2003), particularly critical for high-technology companies, which may render the merger or acquisition less profitable and even, in the extreme, cause failure. Krug (2003) mapped executive turnover in over 450 merged and non-merged companies. The results are shown below in figure 8.

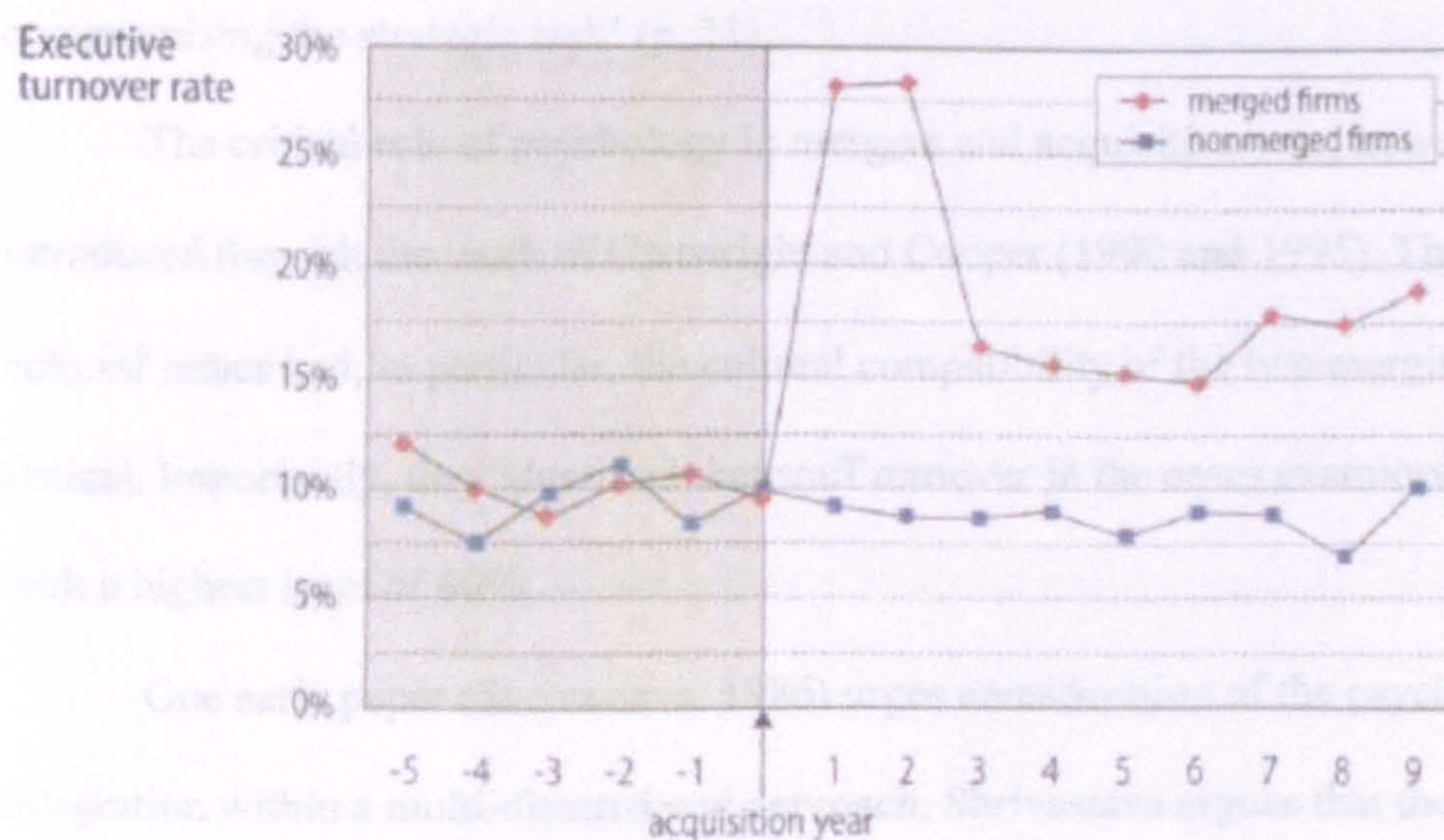


Figure 8. Executive turnover rate (Krug, 2003)

If the loss of key staff (which will include executive staff) follows these findings we should consider carefully what preventative actions and strategies are open to companies contemplating

merger or acquisition. Our identified parameter explored in this thesis is that of trust of staff in managers and managers of staff.

The role of trust has had limited attention within acquisitions and mergers, particularly during the integration phase as stated by Searle and Ball (2004, p.708) who argue that 'this is a significant omission as on-going co-operation of this important group (*key staff who remain*) is pivotal, ensuring the continuing viability of the firm'.

Haspeslagh and Jemison (1991), in their seminal work, underline the criticality of the integration process to the success of the acquisition. They state that 'all too often, firms forego the benefits of acquisition by insisting on compliance with a pre-determined path or, to the contrary, by avoiding changes in the acquired company that would minimize resistance and disruption. The key to integration is to obtain the participation of the people involved without compromising the strategic task' (p. 11).

The critical role of psychology in mergers and acquisition was, however, largely introduced through the work of Cartwright and Cooper (1990 and 1995). They argued that cultural issues and, in particular, the cultural compatibility of the two merging organisations was critical. Importantly, they identified that staff turnover in the cases examined was at least 30%, with a highest level of 60%.

One early paper (Shrivastava, 1986) urges consideration of the psychological aspects of integration within a multi-dimensional approach. Shrivastava argues that the main challenge of managing merging companies is the integration of the two parts into a single unit. The author points out that the integration of procedures, physical assets, technologies and production systems, whilst important, is not as difficult to manage as the managerial and socio-cultural

integration of the two entities. However, at the time of writing (1986) “very little is known about the sociocultural integration of merged companies” (Shrivastava, 1986, p. 66).

More recently, Birkinshaw (1999) examines the post-acquisition integration phase emphasising the criticality of key knowledge assets. “Core knowledge workers such as scientists, engineers and professionals need to be managed very carefully during the integration process. Such people are used to doing things their own way. They like some guidance, but hate direct orders; they like to be consulted, but don’t necessarily want a high level of responsibility. Managing them can be difficult at the best of times, requiring great patience, give and take, and a *high level of trust* (italics added by author). But such qualities are seldom in evidence in the early days of an acquisition” (Birkinshaw, 1999, p. 33). The author argues for a combined approach of human and task integration; human integration is defined as satisfaction and shared identity among staff of the merged company whilst task integration is defined as the combination of value-adding activities that will generate synergies. Birkinshaw, Bresman and Hakanson (2000) further develop the human and task integration research as defined by Birkinshaw (1999). Their research examines the post-acquisition processes in three acquisitions made by Swedish multinational companies. They conclude that the task integration process was slow and required an acceptable level of performance in the individual divisions studied prior to integrating them into other divisions, and that the human integration process was also slow and difficult to manage but critical to a successful acquisition outcome. Finally, the authors state that the ‘relationship between the task integration process and acquisition success is mediated by the level of human integration already in place. Thus, a very low level of human integration will limit the effectiveness of task integration as a driver of acquisition success’ (p. 419). There are some aspects to their research that are open to comment, in particular the difficulty with the

generalisability of their studies, given the relatively narrow focus on Swedish multi-national companies acquiring foreign companies with significant R & D operations.

Building further on the theme of trust in the post-acquisition integration phase Nikandrou, Papaexandris and Bourantas (2000) state that establishment of trust between management and acquired staff is an important factor in a potentially successful outcome. In order to achieve this the authors argue that management trust can be fostered through development and delivery of a staff-centred communication plan both preceding and after the acquisition is completed. They also provide some evidence that trust levels in the companies they examined were initially high immediately post-acquisition but diminished with time. In proposing a communication strategy the authors suggest that useful communications (economic intentions) be promulgated in the early stages of the integration to build trust of management and, as time proceeds, the communications should be delivered frequently to foster trust level maintenance. Criticism can be offered in that, again, generalisability may be an issue given that the context is exclusively Greek private sector. Of 27 acquisitions researched only 133 employees were sampled and of these over 80 percent were graduates.

Marks and Mirvis (2001), whilst not referencing trust specifically, outline the importance of both strategic and psychological preparation for an acquisition or merger. Considerable discussion is given to the need for understanding (on the part of both acquirer and acquired companies) of the psychological processes likely to be experienced by the staff concerned. The authors also stress the need for strong communication throughout the acquisition or merger integration with these factors in mind. The paper is based on extensive experience in over 70 mergers or acquisitions and focuses on the preparation recommended for acquisitions or mergers. Whilst there may be useful advice in this paper the authors have utilised an action research type

narrative and, although obliquely referencing empirical research, do not provide (other than examples in narrative form) much substantiation of their recommendations. However, given the breadth of their experience in a number of industries and the large number of acquisitions or mergers in which they have participated, it would be foolish to dismiss their recommendations on that basis. A cautious approach, with effort to validate their findings, would seem to be appropriate.

Dooley and Zimmerman (2003) use marriage as a metaphor for mergers. They argue that “a good metaphor can provoke a wide range of analogies, and these analogies can be further developed and manipulated into specific questions and/or hypotheses about the issue in question” (Dooley and Zimmerman, 2003, p. 55). The authors draw on the metaphor to argue that communication is critical, in particular drawing on interpersonal conversation which should be maintained between key players and be of a positive nature. They believe that attention to positive conversation (utilizing training, if necessary, to increase individuals’ skill levels) will increase the likelihood of uncovering which aspects of the merger need mutual attention. Interestingly, the authors also highlight the needed presence of affect and trust for their conversational approach to be fruitful. Primarily qualitative in nature, the authors focus on the extrapolation from the importance of positive conversation in a marriage setting to the post-merger context. Although they argue for similarities between the two cases there is some doubt as to the full extent of this postulated argument in that the *motivations* of the two parties in both cases could be markedly different (personal versus commercial for example), thus leading to different behaviour patterns and outcomes. Thus the marriage analogy, although initially appearing to be addressing the two cases, may be open to criticism.

Having reviewed the post-acquisition integration trust literature in brief it is interesting to note that Young and Daniel (2003) challenge as to whether the high level of concern with trust levels in organisations is really merited. They state that 'trust may play a more limited role than psychologists would have us believe' (Young & Daniel, 2003, p. 151). There exists some debate in the literature around this point with many pro-trust advocates (Sako, 1998; Lazaric, 2003, in Nooteboom & Six, 2003; Covey, 2006; Mishra & Mishra, 2008), a position that is also reflected by the author.

Linking trust levels to outcomes or performance, however, in this study, is open to the criticism, highlighted by the authors, that performance may come before trust (i.e. as performance builds so does trust) rather than trust in the first place offering a platform for performance. A further question is the authors' findings that cognitive trust will be most prevalent when risk to the trustor is significantly high, and affect will be dominant as the perceived risk in the relationship is at a lower level. The authors' research method was based on administration of a questionnaire at a single point in time and, in recognition of this 'snapshot' approach and its potential shortcomings in determining trust development and causality, in common with McAllister (1995), they call for a longitudinal empirical study of trust development. This paper does provide some useful indications of trust antecedents and some linkages between trust and performance and thus is of interest to the study of post-acquisition or merger integration.

Examining the implications of the review of the trust literature for research design in the area of organisational post-acquisition or merger integration, it can be seen from the selection of papers discussed above that, despite the breadth and depth of the trust research field, there still exist fertile areas for study which will augment the knowledge in this area.

However, we should now move on to look for any potential gaps in the trust literature which can be explored and built on to investigate the research objective outlined in Chapter 1.

3.7 Where are the trust gaps?

An examination of the trust literature reveals that the research performed to date is somewhat fragmentary and there is evidence of this from as early as the seventies where Porter, Lawler and Hackman (1975, p.497) point out that trust “tends to be somewhat like a combination of the weather and motherhood; it is widely talked about, and it is widely assumed to be good for organisations. When it comes to specifying just what it means in an organisational context, vagueness creeps in”. By the nineties McAllister (1995) observes that although trust’s importance has been acknowledged, the matter of how it develops and functions has received little systematic theoretical attention. More recently, this century the understanding of what trust is has been challenged by Young and Daniel (2003), who argue that despite the recognition of the centrality of trust in human behaviour, the actual meaning of trust remains unclear. Furthermore, Morrow, Hansen and Pearson (2004) comment that despite increasing interest in the effects of trust on organisations, trust remains an elusive construct to measure in empirical studies. The authors’ comments reveal the broad width of the trust literature but also the lack of clarity and empirical study carried out to-date. This is the first gap that this thesis addresses namely, the lack of empirical study in organisational trust.

Given the research aim of exploring trust in the multi-level staff, manager and senior management relationships to determine whether it might be a factor in key staff retention, we have focused on two principal papers; Lewicki, Tomlinson and Gillespie (2006) and Dietz and

Den Hartog (2006). These have been selected due to their examination of current trust measurement, relatively recent publication and their clear indication of a gap in the literature which provides a good fit with the subject matter of this thesis. Lewicki, Tomlinson and Gillespie (2006) are one of a number of authors who have tried to draw elements of the trust field together to illustrate potential gaps in the knowledge and point out where future research could be of value. In their paper the authors focus on behavioural and psychological trust over time in inter-personal relationships and examine the subject areas using a standard set of questions: how is trust defined, where does the level of trust begin and what causes trust to change over time? Examining the authors' study of psychological trust Lewicki et al argue for three conceptualisations of psychological trust namely uni-directional, two dimensional and transformational models. The uni-dimensional model accepts that trust, although consisting of many components (cognitive, affective or emotional, behavioural intention) is, in effect, a single construct. Answering the first definition and measurement question the authors utilise the trust definition provided by Rousseau et al (1998). They state that interpersonal trust (in this conceptual model) begins either at a zero level (e.g. Jones and George (1998) mentioned above), at moderate to high trust (see McKnight, Cummings and Chervany (1998)) or distrust (highlighted by Mayer, Davis and Schoorman (1995)) and argue that trust or distrust change over time due to a large number of identified antecedents; trustworthiness of the trustee, the trustor's disposition to trust and the implication of affect.

The two dimensional model, by contrast, includes the same components (cognitive, affect and behavioural elements) but separates trust and distrust into two distinctly different constructs (see Lewicki, McAllister and Bies (1998) discussed above). However, the authors point out that, having defined the two dimensional conceptual model, there exist significant challenges as "the

implications for measurement are complex and yet to be tackled. Further measurement work is required to identify the facets and interdependencies underlying the constructs of trust and distrust and test if these distinctions hold empirically” (Lewicki, Tomlinson & Gillespie, 2006, p. 1004). This tends to reinforce the gap highlighted by Morrow, Hanson and Pearson (2004). The final model examined in this paper is the transformational trust model. Here Lewicki et al draw on earlier work by Lewicki and Bunker (1995) in postulating three different levels of trust (discussed above - see Figure 6); calculus-based trust, knowledge-based trust and identification-based trust. Only two attempts have been made to measure these trust types; in both cases the original author was involved and no independent measurement has been undertaken (Lewicki & Stevenson (1998), and McAllister, Lewicki & Chaturvedi (2006)).

Lewicki et al conclude by arguing that there is “very little consistency or overlap in the use of trust measures’ (p.1014) leading to fragmentation and are inconsistent in that the measures do not correlate with the full definition of trust which the authors have chosen. The authors also raise the issue of construct validity for existing trust measures. In proposing the way ahead for researchers Lewicki et al argue that a mixed approach is required utilising both quantitative and qualitative methods, with a longitudinal basis emphasising qualitative elements such as in-depth interviews. Strong support is given to field-based case studies as a basis for measuring trust models. This view of the importance of longitudinal trust measurement can also be seen in studies by Dirks (2000) and Shamir and Lapidot (2003).

This is the second gap which this thesis attempts to address; namely, a longitudinal exploration of trust measurement based on both qualitative and quantitative mixed method approaches, utilising in-depth interviews and on-line surveys

Two principal studies have been made in the field of validated trust measurement reviews. McEvily and Tortoriello (2007) and Dietz and Den Hartog (2006), in their critiques and review of major intra-organisational trust measures, add further dimensions to the shaping of post-acquisition or merger trust research through their detailed assessment of whether the existing trust measures match the definition of trust in the workplace which they are attempting to measure. Dietz and Den Hartog (2006) argue that knowledge of trust must be based on the validity of the measures developed in its study. Based on the review of a number of the most cited definitions of trust from Zand (1972) to Rousseau et al (1998) they state that trust constitutes three principal elements; namely 'belief', 'decision' and 'action'. This is based on the work of McEvily, Perrone and Zaheer (2003), who produced a three part definition of trust; expectation (aligned to Dietz & Den Hartog (2006) belief element), willingness to make oneself vulnerable (the authors' decision element) and taking risk (the action element). The belief element is held by the trustor and is based on a subjective and confident number of beliefs about the trustee and the trustor's relationship with the trustee. It could also be defined as, the authors argue, an assessment of the level of trustworthiness of the trustee, although they do differentiate between trust and trustworthiness as two separate constructs.

The decision element is where the trustor, building on a set of beliefs, now decides that trust can be placed in the trustee; in essence, the trustor believes the trustee to be trustworthy and is ready to commit to trusting (making oneself vulnerable (Mayer et al (1995)) with an expectation of a favourable, as opposed to an unfavourable outcome. The trustor is thus intending to take trusting action(s).

The action element involves the trustor taking risk-bearing actions on the basis of belief and the decision to trust. The authors point out that the risk-bearing action undertaken by the

trustor is quite separate from the trustworthiness of the trustor as viewed by the trustee and the action element is “at best only a *likely* consequence of the decision to trust; it is by no means guaranteed”(p.560).

The authors also offer a multi-dimensional integrated trust model building on the earlier work of Mayer et al (1995) and Ross and LeCroix (1996) shown below in Figure 9.

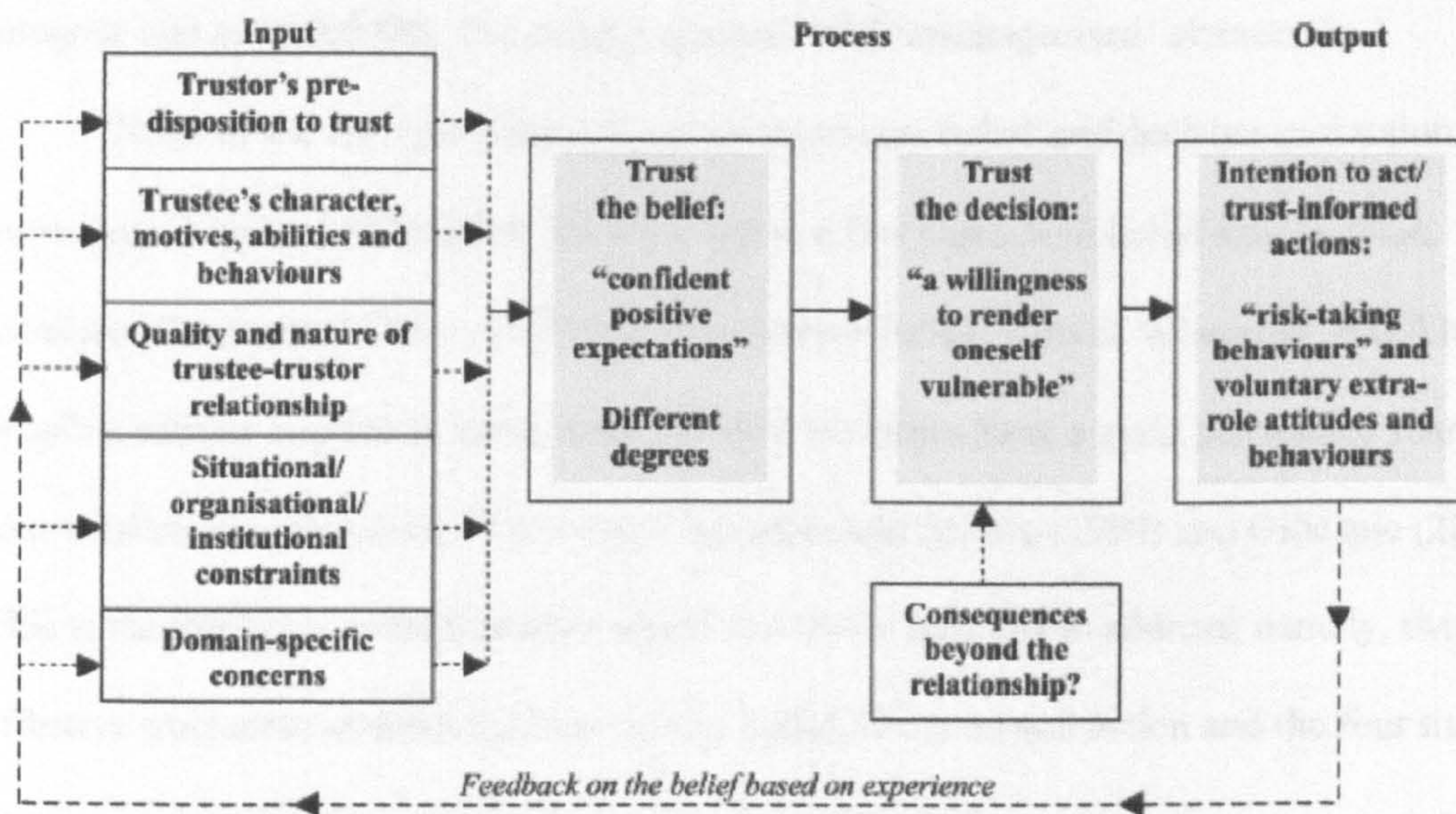


Figure 9. A depiction of the trust process. Dietz and Den Hartog (2006)

The authors continue, arguing that the trust measurement should also include four trust components; namely, ability, benevolence, integrity and predictability which are required for the trustor to form belief and decision elements about the trustee. Also highlighted by the authors is the need for a trust measure to consider the source or sources of evidence in a trustor’s decision to trust and the fact that trust levels will potentially have an imbalance, in that one party will trust the other differently (or more than the other) according to the nature of their organisational

relationship. An example of this possible trust imbalance is given concerning management and staff (with trust decreasing towards the bottom of the organisational hierarchy – note here this could be an argument for ‘flatter’ organisations).

In the final part of the paper the authors review a total of fourteen existing trust measures from McAllister (1995) to Tzafrir and Dolan (2004) against their ‘belief, decision and action’ process, and percentage weighting of the four trust content elements (ability, benevolence, integrity and predictability, but adding ‘general’ and ‘uncategorised’ elements).

None of the fourteen measures reviewed covers belief *and* decision *and* action. Indeed, most cover only one of belief *or* decision and in a few cases *both* belief and decision. Two measures (Mayer and Davis, 1999 and Schockley-Zalabak, Ellis & Winograd, 2000) have possible actions implied in some items. Several measures have a good percentage share of the four trust content elements, in particular Spreitzer and Mishra (1999) and Gillespie (2003). This is the third gap in the literature which this thesis attempts to address; namely, that of a more effective trust measurement tool that covers belief, decision and action and the four trust elements of ability, benevolence, integrity and predictability.

The most balanced outcomes against these multiple criteria are provided by two reviewed measures. Firstly, Spreitzer and Mishra (1999), who focus on belief, have a balanced percentage spread against the four trust content elements with no negatively worded items and no use of the word ‘trust’. Secondly, Gillespie (2003), who focuses on decision, again has a balanced percentage spread against the four trust content elements, no negatively worded items and no use of the word ‘trust’.

These two measures were selected as the basis for further development in the setting of trust measurement in post-acquisition or merger integration. Development of the selected

measures is required, as highlighted in this chapter, to encompass the three elements of Dietz and Den Hartog's trust process, whilst maintaining the even percentage spread against the four trust content elements and ensuring that the research includes a multi-dimensional assessment of trust levels within the examined organisation from senior management to local management to staff and vice versa. Table 2 below illustrates the key literature that has influenced the author's research design and trust measurement development.

Author	Date	Element
Rousseau, Sitkin, Burt and Camerer	1998	Trust definition
Krug	2003	Executive leavers post-acquisition
Mayer, Davis and Schoorman	1995	Interpersonal dyadic trust
Lewicki and Bunker	1996	Organisational trust growth model
Lewicki, Tomlinson and Gillespie	2006	Transformational psychological organisational trust
Dietz and Den Hartog	2006	Organisational trust measurement survey
Spreitzer and Mishra	1999	Management trust measure
Gillespie	2003	Staff trust measure

Table 2 Key papers influencing research design and measurement development

Building on Dietz and Den Hartog's work, and adding constructive comments by Lewicki et al (2006), this thesis utilises a mixed method quantitative and qualitative research approach using longitudinal field-based case studies as a basis for multiple use of trust measures. Research validity can be augmented, as indicated by Lewicki et al (2006), by utilising consistent measures, applied in a manner that ensures that the measure is aligned to the trust condition, with attention to consistency and overlap.

3.8 Linking the literature to the research

The aim of the research was to explore aspects of trust, its definition, development and role in the post-acquisition integration context of the high-tech electronics area and to determine whether trust was one of the factors that influenced key staff to remain with the acquired company in two different geographic locations.

There are a number of areas of the literature that inform the research aims. Initially we can see a clear link between the research aims and the definition of trust. Perhaps one of the most widely referenced definition of trust is that provided by Mayer, Davis and Schoorman (1995) which was further developed by Rousseau et al (1998, p.395) as 'a psychological state comprising the intention to accept vulnerability based on the positive expectations of the intentions or behaviour of another'. The need to clearly define trust is critical for the purposes of this research.

Moving on to the development and role of trust we have referenced the early literature of Deutsch (1958, 1962) and Zand (1972) covering 'relational' trust before the emergence of organisational trust work. Hoecht and Trott (1999) argue that interpersonal trust can be considered as forming a fundamental element of all trust. McEvily, Perrone and Zaheer (2003) point out that despite the broad literature on trust (or even because of the very width) that the subject has become fragmented in nature. The author has chosen to centre this study on interpersonal (organisational) trust to assist in maintaining an in-depth focus and objectivity in exploring the research aims, principally dealing with aspects of psychological trust (as opposed to sociological, socio-psychological and economic trust).

Through the seventies and eighties there was a proliferation of trust research mentioned earlier in this chapter (section 3.3) focusing on trust in the organisational context. Lewicki and Bunker (1996, 2006) propose a trust growth model (calculus, knowledge and identification-based trust) that provided a widely referenced source against which the research could be judged. In a seminal paper Mayer, Davis and Schoorman (1995), further augmented by Spreitzer and Mishra (1999), highlight four elements of trust; concern, competence, reliability and openness. These trust elements were seen by the author as important and the data was analysed with reference to them (among others).

Focusing in particular on the role of trust in the post-acquisition integration context the literature highlights many factors and variables (Shrivastava, 1986; Cartwright & Cooper, 1990; Birkinshaw, Bresman & Hakanson, 2000; Dooley & Zimmerman, 2003). There were many potential aspects of trust that could be explored and compared with the literature. One example is the role of the key worker (as highlighted by Wooldridge, 2006) and their critical importance to the acquiring organisation. Hacker (2003) points out that loss of these key workers, with their valuable intellectual property, can make acquisitions less profitable or, in extreme cases, cause the acquisition to fail altogether. Krug (2003) has produced evidence of executive turnover rates that suggested to the author that retention was worthy of consideration. This literature strongly informs the research undertaken and was a powerful stimulus for initiating the research in the first place. Added to this was the sponsoring organisation's interest in this area (retention) making the literature to research link a vital element in this thesis. Relatively recently Searle and Ball (2004) have argued that the role of trust has had limited attention within the acquisition context and an understanding the trust elements that assist with the retention of the key staff is

critical in ensuring future viability of the organisation. This served to further highlight the need for research on trust in the post-acquisition context.

An examination of the literature also revealed the presence of a number of trust measurement tools that could be utilised to gather data. Dietz and Den Hartog (2006) provide a good review of existing trust measures. In particular, Spreitzer and Mishra (1999), who provide a managers measure, and Gillespie (2003), who offers a staff measure, were a good starting point. The literature also informs the research through identification of gaps in the current knowledge. The first gap is informed by Morrow, Hansen and Pearson (2004) who call for more empirical trust studies which this work attempts to address. The second gap is informed by Dirks (2000) and Shamir and Lapidot (2003) argue for more longitudinal studies in trust. The third gap is informed by Schoorman, Mayer and Davis (2007) who point out that many authors have focused on staff or managers trust and have not considered a multidimensional approach. The fourth gap is highlighted by Dietz and Den Hartog (2006) who propose that trust is made up of three steps (belief, decision and action) and, in their assessment of the existing trust measures, indicate that no measure currently existed that covered all three steps in the trust process. This thesis attempts to address these four informed gaps as can be seen in the following chapters.

This chapter has addressed the trust literature, commencing with the introduction, which was followed by an examination of trust definitions and the trust type we are exploring. This was followed by sections covering trust development in the organisation setting, with a brief look at how culture fits with trust, the place of trust in the post-acquisition integration context and the particular gaps in that context that this thesis explores. The manner that the trust literature informs the research is also provided. The following chapter addresses the methodology utilised in determining the research path, design and associated data collection and analysis.

This chapter opens with a brief overview of the structure of the case study companies.

This is followed by a short section discussing the corporate enrolment and sponsorship. These

paragraphs lay the foundation for the following adopted research methodology, discussion and

examination of limitations sections that follow.

4.1 Introduction

The company studied had its corporate headquarters located in Canada. The company was selected on the basis that the author was an employee and had been sponsored to undertake the study. Two separate divisions were selected for the case study explorative research. Both divisions studied were separate legal entities owned by the parent company, one located in Canada and one in the USA, as shown below in Figure 10.

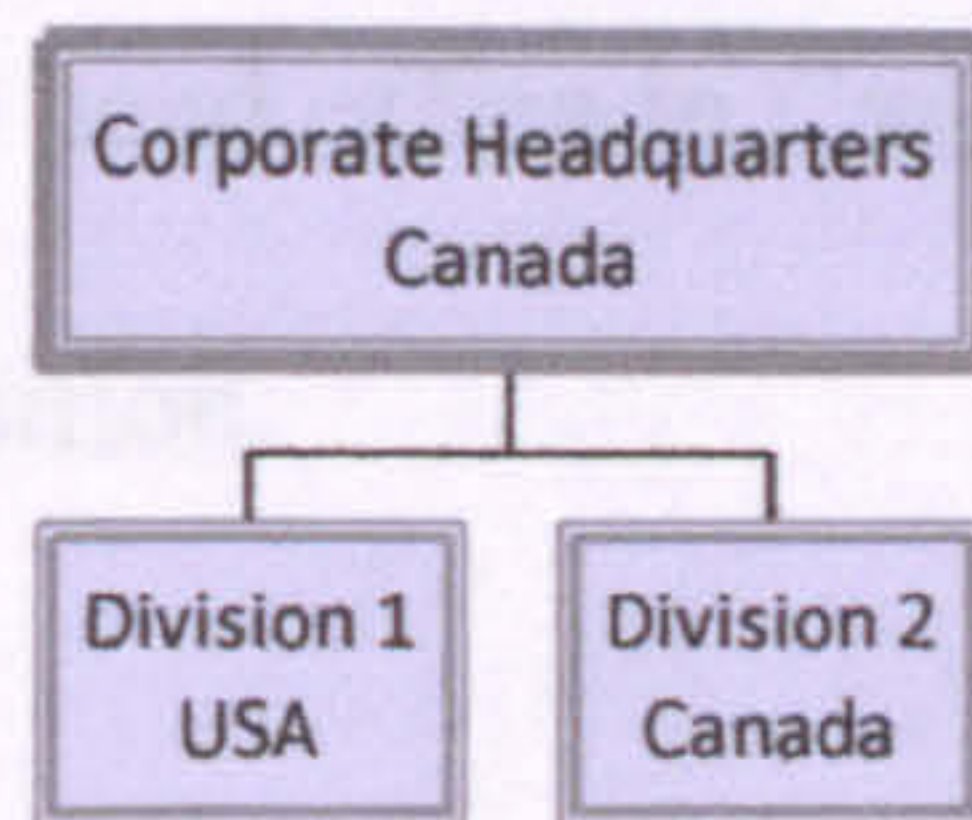


Figure 10. Overall company structure

The USA division had been founded just one year before the US acquisition and at that time consisted of approximately twenty staff under the division president. The acquisition of a local USA company added a further approximately eighty staff making a new total of roughly one hundred employees. The division structure was then reorganised, in the light of the greatly

increased staff numbers, to include a first line team of managers reporting to the division president. Only one of the acquired staff was included in the first line managers of the new reorganised division. The divisional president reported, as before, to the senior management team located at the head office in Canada. Figure 11 below illustrates the new company structure after the acquisition.



Figure 11. USA divisional organisational structure

The Canadian division was acquired with no existing site location or staff. This division was physically remote from corporate headquarters. A new local manager from corporate headquarters was appointed by the senior management team to run the newly acquired site. The initial staff numbers acquired were twenty-six at this location. The local manager reported to the senior management team located at the head office in Canada. Figure 12 below illustrates the new company structure after the acquisition.

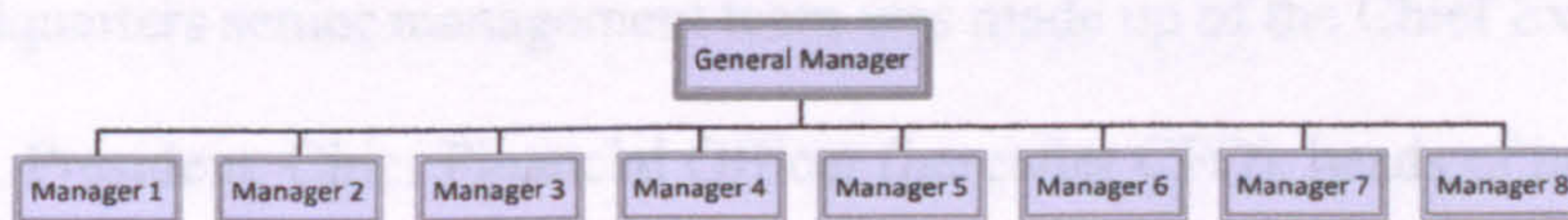


Figure 12. Canadian division organisational structure

We therefore have a number of layers of staff in these two divisions from the larger staff numbers, to smaller first line management teams, the local manager (all at a remote from head office location) and, finally, the headquarters-based senior management team. This is illustrated below in Figure 13.

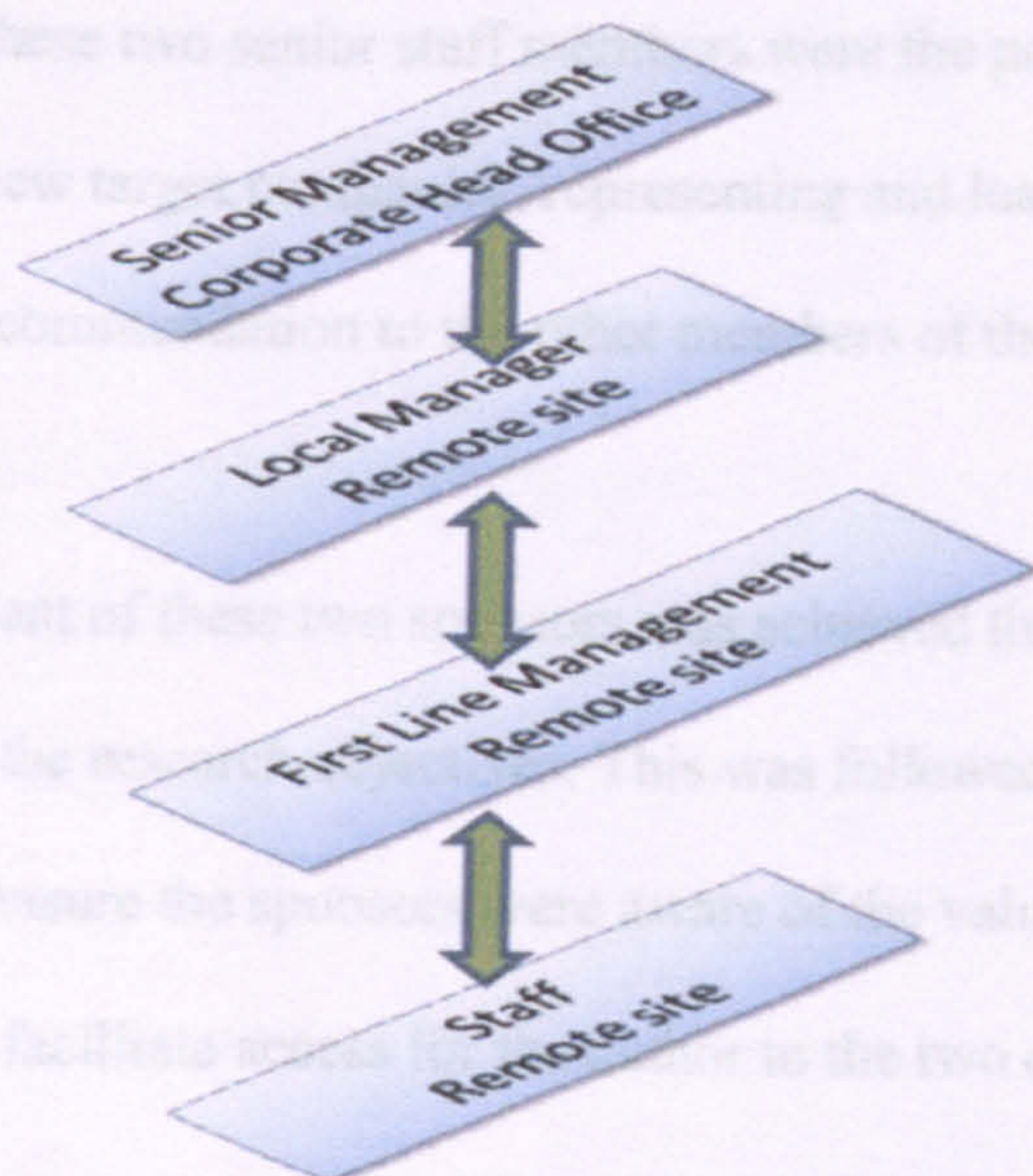


Figure 13. Company management and staff structure.

4.2 Corporate management sponsorship and enrolment

The headquarters senior management team was made up of the Chief Executive Officer (hereafter CEO), President, Chief Financial Officer (hereafter CFO), heads of business units and heads of support units (quality, human resources, etc.). This was too large a group of individuals, some of whom had a low level of influence on the aims of the research, to attempt to convince of the value of the study. However, the company operated a further somewhat 'unofficial' senior management team comprising the CEO, President, CFO, and head of Corporate Development. The members of this team were the principal stakeholders in any acquisition and were vitally

interested in making the post-acquisition integration successful. A critical part of this success was seen by them as retention of key staff members of the newly acquired organisation. To this end two key influential senior management members of the 'inner team' were identified as sponsors of the research. The two senior staff selected were the CFO and the Vice President of Corporate Development. These two senior staff members were the prime movers in the selection and 'deal making' for the new target companies, representing and leading the financial and business assessment and recommendation to the other members of the senior management team and the board of directors.

Support and enrolment of these two sponsors was achieved through briefings to present and obtain agreement as to the research objectives. This was followed by periodic briefings on the state of the research to ensure the sponsors were aware of the value of the study and its progress and to continue to facilitate access for the author to the two divisions under study.

4.3 Methodology adopted

Rather than a research programme of more general academic nature, it was proposed, as required by the DBA approach, to develop knowledge based upon a practical exploration of the possibility that trust was one factor in the post-acquisition integration which might have relevance to staff retention. This was achieved through use of two case studies in the sponsoring company as described above. . The case study approach was adopted for this research due to a paucity of such studies in trust measurement in high-tech industry involving multi-dimensional layers of staff, local management and senior management. The case studies were conducted using the seminal approach of Yin (2003) augmented by other more recent works such as

Hancock and Algozzine (2006). The ideographic opportunity offered by the case study allows depth of research but raises questions about generalisability. The case study “tends to take an inductive approach to the relationship between theory and research; if a predominantly quantitative strategy is taken, it tends to be deductive” (Bryman and Bell, 2003, p.55).

One criticism of the case study is that it is undertaken at a fixed point in time. This can be countered through consideration of a longitudinal study as provided by this thesis. In addition, the longitudinal study was chosen on the basis of being able to offer trending analysis to the sponsoring company as part of the practitioner element of this research. The methodology chosen addresses the three gaps identified in the previous chapter; namely production of empirical trust data, longitudinal trust measurement and trust measurement which addresses the trust stages ‘belief, decision and action’ with the trust elements ability, beneficence, integrity and predictability (Dietz and Den Hartog, 2006). This is supported by an academic undergirding based on literature and current research available.

The literature that has influenced the author is shown below in Table 2 in the preceding chapter.

As shown in Figure 14 below, there are three sets of interactions contained in the relationships between staff in the divisions under study; namely between senior management and the local manager, between the local manager and key acquired staff and between key acquired staff and senior management. This study considers each of these relationships to be two-way as shown.

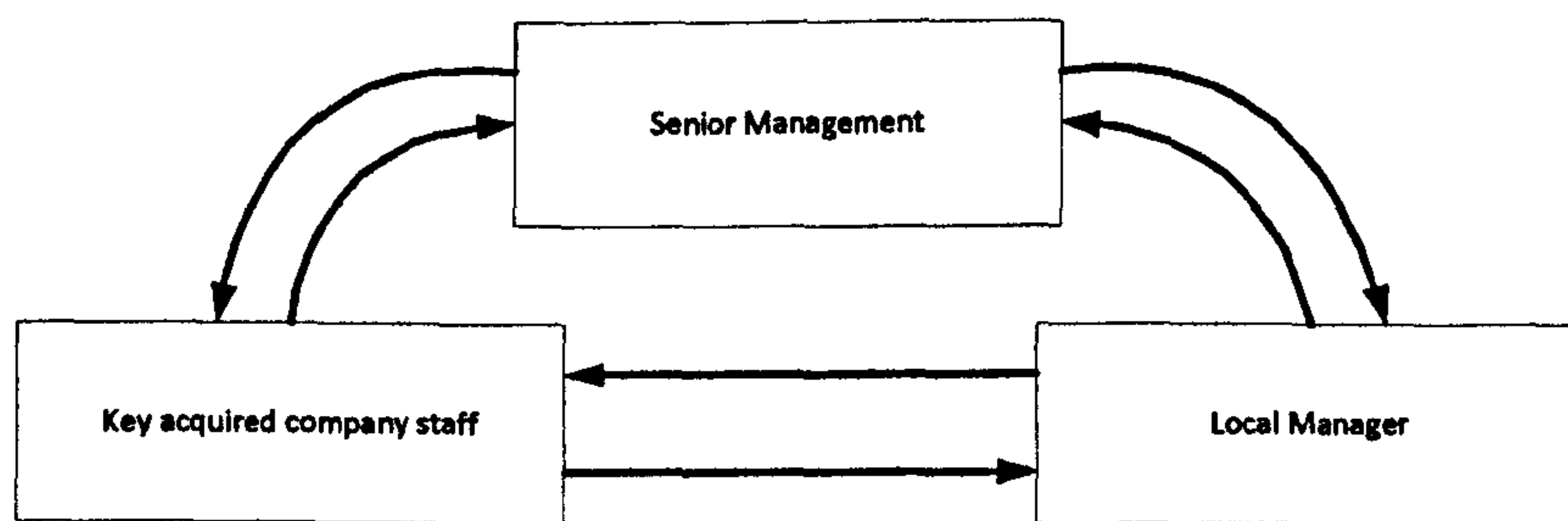


Figure 14. Three-way trust relationship

A mixed method was selected encompassing qualitative and quantitative approaches for the study. This involved interviewing the senior management, local manager and first line management teams of both divisions under a qualitative semi-structured interview process. The qualitative approach was of value here as, in effect, limited numbers of key senior individuals' opinions were being sought. This was augmented through use of an on-line survey of both staff and managers using a quantitative approach. The quantitative approach used questionnaires that were used to poll all staff and managers. This approach was selected due to the practical limitation of over one hundred interviews being required. Utilising a mixed method approach can offer triangulation of findings due convergence and corroboration of results as well as providing research strengths of both qualitative and quantitative approaches (Brewer & Hensher, 1989, Maxcy, 2003).

The Canadian division, having been acquired in 2005, could, at the time of this study, (2008 onwards) be considered to have already completed any integration. However, early investigations by the author revealed such a wealth of potential data still in the staff members' recollections that it was deemed worthwhile to undertake one data gathering exercise.

The US division, by comparison, having completed its acquisition within six months of the study commencing, offered the opportunity of obtaining two measurements which would constitute the

chance of a longitudinal study. The trust relationships and the research methods used are shown below in Figure 15.

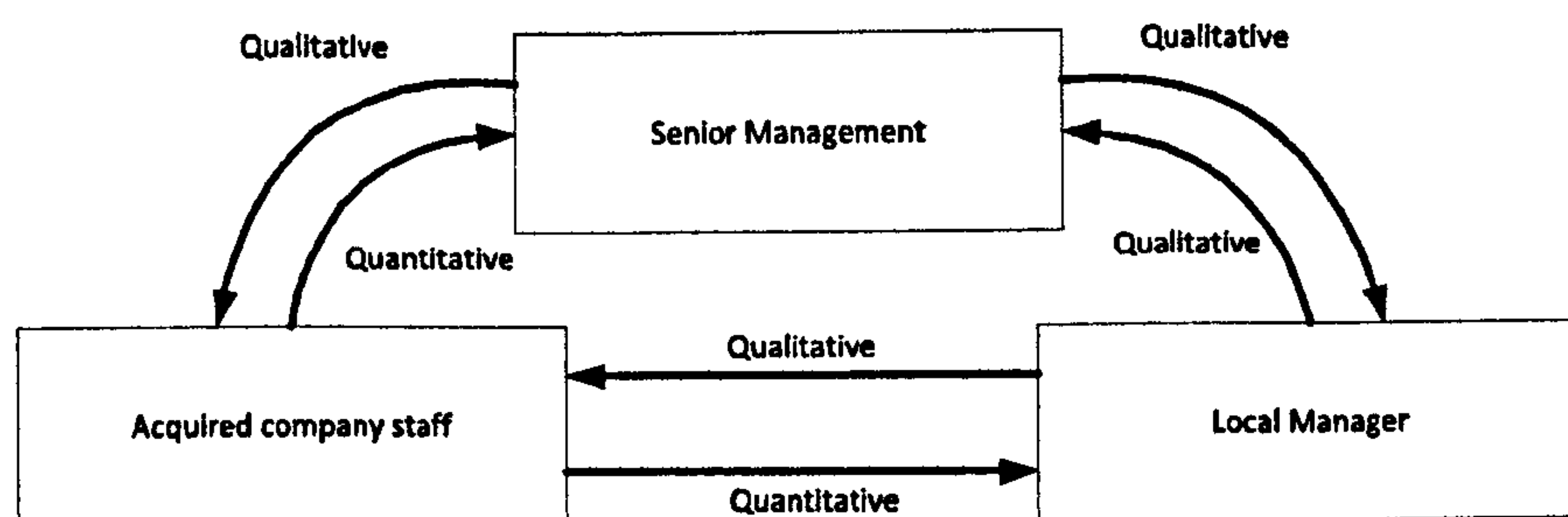


Figure 15. Application of research methods to the three-way trust model

The senior management qualitative semi-structured interview was based on a questionnaire developed by the author in an MBA dissertation (Derbyshire, 2006). The questionnaire consists of 13 questions relating to acquisition aimed at drawing out views on the role of trust and retention in the acquisition and can be seen below in Table 3. The table outlines the principal literature influences that suggested the question basis and format. Whilst Table 3 lists the key influencing papers it is also true to say that the researcher's wider reading also informed the choice of questions.

Question	Question intent	Principal literature reference	Comments
What are COMPANY's objectives for acquisition?	Comparison of literature supported reasons for acquisition and interviewees view	Kay (1995) proposes new market entry, complementary assets and competitor entry inhibition - Cartwright & Cooper (2001) argue for financial or value-maximising motives	Cartwright & Cooper (2001) also indicate other motives such as increase in market share, management prestige or protection from taxation
How do you feel the integration has progressed to-date?	Seeking to draw out manager observations of staff reaction to acquisition with basis in literature	Marks (1982) & Marks & Mirvis (2001) listing of mainly negative effect such as increased anxiety concerning job, job role, future	Can also include feelings of betrayal and loss close to grieving for relative (Marks & Mirvis (1986)
What methods of communication have been utilised in the integrated organisation?	Drawing out level of communication used by managers and allowing comparison to importance of communication highlighted in literature	Papadakis (2005) cites communication as among the most influential factors in successful integration. Reinforced by Nikandrou, Papaalexandris and Bourantas (2000)	Call by Papadakis (2005) for more empirical research in effect of communications in integrations
How would you describe your experience of participating in the company integration process?	General question to facilitate personal reflections and role in integration	Comparison to Salama, Holland & Vinten (2003) looking at strategies for successful BP-Amoco integration	Marriage metaphor used by BP senior manager similar to Dooley & Zimmerman (2003)
What was/will be the process followed?	Attempts to discover a) was there a defined integration plan or process and b) how closely was the plan followed	Huang & Kleiner (2004) refer to the critical importance of an integration plan with associated process steps	Authors highlight slow speed of integration as a potential issue
What measures are in place to monitor the success of the acquisition?	Seeks to elicit views on a) presence of integration measures and b) details of what constitute measures	Schoenberg (2006) compares managers assessment of acquisition versus market reaction and expert informants assessment. Reveals diversity and non-correlation of success measures.	Author calls for development of multiple measures of acquisition performance
Can you identify any cultural differences between COMPANY and the acquired company?	Importance of cultural differences strongly reflected in literature and question looks to determine a) managers view of any cultural differences and b) managers view of importance of cultural issues in integration	Cartwright & Cooper (1993), Chaudhuri & Tabrizi (1999) argue for the importance of 'cultural integration'.	Even though cultural aspects are not central to this thesis to omit this area totally would be to miss one important integration factor
How do you plan to ensure the retention of your staff?	Question seeking recognition of importance and relevance of staff retention by managers and existence of any strategy being followed	Ranft & Lord (2000) describing retention of staff in high tech acquisitions argue for autonomy, status and commitment being important. Krug (2003) identify executive key leavers	The authors also indicate that economic incentives are not successful in retention
Describe the involvement of your immediate manager in the integration.	Upward looking question looking for trust building and retention-based actions of senior manager	Draws on Mayer, Davis & Schoorman (1995) and Spreitzer & Mishra (1999) manager trust research	Also includes senior case study manager's view of headquarters manager (CEO). Allows checking for trust risk element (Mayer, Davis & Schoorman, 1995).
What role do you see for trust in the integration process?	Seeks to discover interviewees a) importance or otherwise of trust and b) any identified role for trust in integration	Spreitzer & Mishra (1999) argue for competence, concern, reliability and openness as trust elements. Addition of Gillespie (2003) reliance and disclosure	Gillespie (2003) reliance and disclosure very similar in definition to Spreitzer & Mishra (1999) reliability and openness
What actions have been undertaken in the integration process to build or maintain trust?	Question aimed to draw out specific trust building actions as viewed by the interviewees (managers)	Lewicki & Bunker (1996) propose trust building model (calculus, knowledge and identification trust) augmented by Lewicki, Tomlinson & Gillespie (2006) transformational trust building	Similar to Rousseau, Sitkin, Burt & Camerer (1998) calculus and relational trust
Would you say these actions have been effective or ineffective?	Aim here is to draw out the perceived effectiveness of any specific actions noted in question 11 above.	Comparison of data with trust elements (Spreitzer & Mishra, 1999 & Gillespie, 2003)	Looks for evidence of openness, disclosure, reliability, reliance, competence and concern
Can you think of anything else that could have been done to improve trust in your organisation after the acquisition?	Seeking additional 'rich data' to augment any of the above areas and allow an opportunity to explore possible new factors	Ranges from Haspelagh & Jemison (1991) process based integration through to Benson & Brown (2007) knowledge worker retention	Allowed a reflective and 'catch all' to finalise the interview data

Table 3 Senior management questionnaire – principal literature references

The semi-structured management interviews were all recorded (utilizing the wav format) on a digital recorder with the permission of both the individuals involved and the individual managers. Ethical guidelines were followed in briefing each manager prior to the interview and

in subsequent storage, handling and dissemination of results involving this work and subsequent papers and process documentation. A full level of co-operation and participation of all available managers was achieved; the only non-participants were those who were unavoidably off-site during the week of interviews (one manager in the US and none in the Canadian company). The interview recordings were subsequently transcribed into word format such that they could be source documents for the Nvivo© software application. The first round of interviews was carried out in late 2008 with the managers of both the Canadian and the US companies. This was followed in late 2009 by a second round of interviews with the US company management. As mentioned in the preceding chapters the acquisition in Canada was completed in late 2005 and it was felt by the author (and is reflected in interview comments highlighted in this chapter) that whilst some integration remained many staff considered the integration to be complete. An example of this view is provided by a manager in Canada who states “And, as far as I can tell, I mean all the elements are in place, so I would say, in that sense, it’s complete”. Another manager quotes “As far as I’m concerned, the integration is long gone. It’s over with”. For this reason only one round of interviews was performed in Canada and, in late 2009, subsequently, a second round of interviews was carried out in the US company. This was based on the fact that the acquisition was completed in early summer of 2008 and thus the ‘measurement points’ of October 2008 and October 2009 were both immediately adjacent to the start of the integration and one calendar year later. This time span was chosen to allow for development of trust levels, to check whether these levels had altered in the intervening year and to allow a period for monitoring staff who might leave the organisation.

In order to facilitate entry extensive discussions with the senior management of the two companies were required, as discussed in the previous chapter both for access to staff, and,

perhaps more critically, to the management team. Accessing candid views of commercially extremely sensitive information regarding acquisitions and subsequent 'lessons learned' from senior staff is an area, unsurprisingly, of cautions and provisos where it is difficult, potentially, to obtain non-biased and meaningful data. The key then was to persuade the management team of the potential value of the research and its aim of seeking to understand how the integration was progressing in terms of the trust levels held by management of their staff. Within these limits, then, the data was gathered after obtaining full co-operation from the management teams in both companies. One factor which seemed to facilitate the access was the promised feedback of summary results enabling adoption of recommendations into company acquisition and integration procedures.

In all eight managers (one female and seven male) were interviewed in Canada, consisting of the General Manager and the first line management team. In the US company the President and the first line management team were all interviewed, with one exception who was away on business (two female and eleven male). The same numbers were interviewed in both 2008 and 2009 at the US site.

None of the individuals at either company was known to the author prior to the interviews. Careful attention was paid to interviewing those management individuals who were part of the senior management team. The same individuals were also requested to complete the quantitative managers' survey discussed in the previous chapter.

The quantitative on-line surveys were selected, initially, based on the paper by Dietz and Den Hartog (2006) which examines a number of trust measures developed between 1993 and 2004. The authors examine the measures from the viewpoint of trust based on *belief* that trust can be placed in the trustee – 'confident positive expectations' (p.7), followed by a *decision* to trust –

'a willingness to render oneself vulnerable' (p.7) and finally moving to intention to act (*action*) – 'risk taking behaviour and voluntary extra-role attitudes and behaviours'(p.7).

In essence the authors' argue for a progression from believing that an individual can be trusted, followed by a positive decision to trust the trustee, culminating in decisive actions of trust. In the authors' examination of the measures, the examined tools are sorted against their criteria of belief, intention and action-based trust. The authors also identify characteristics of the trustee (benevolence, competence, integrity and predictability) which encourage the willingness to trust in accordance with Mayer et al (1995) – benevolence, competence and integrity, and Cunningham and McGregor (2000) – predictability.

The choice of the measures was driven by the need to include balanced, well-validated tools that would produce quantitative data which could be supplemented by suitable qualitative data utilizing the semi-structured managers' questionnaire. Two measures were chosen from those reviewed: Gillespie's (2003) measurement of staff trust in management and Spreitzer and Mishras' (1999) measurement of management trust in staff.

The staff trust in management measure uses the Behavioural Trust Inventory developed by Gillespie (2003). The measure is used in this thesis with the author's permission. This is a well-validated tool that is based on previous work by Mayer, Davis and Schoorman (1995) and Zand (1972). Since its development over 2000 individuals have been surveyed and the data analysed. There is a good balance between benevolence (28% of content), competence (33% of content), integrity (18% of content) and predictability (20% of content) according to Dietz and Den Hartog (2006). There are no negatively worded items (where negatively worded items can elicit a response based on distrust rather than low trust). Negatively worded items are best avoided for this reason (Schriesheim, Eisenbach & Hill, 1991). None of the items specifically

mentions 'trust' in their wording. This is of interest as Cummings and Bromiley (1996) caution against specifically mentioning trust, further reinforced by Schriesheim, Eisenbach and Hill (1991) who state that positively worded questions are usually more reliable and accurate. In terms of trust dimensions Gillespie identifies two, namely reliance and disclosure. The two dimensions make it 'possible to discriminate between a person's willingness to trust another by relying on them, from a person's willingness to trust another by disclosing personal or sensitive information to them. The results also indicate that the variance across the BTI items is adequately captured by these two dimensions' (Gillespie, 2006, p.24).

Ten items are used, having been selected and subject to piloting with a sample of individuals not connected with the sponsoring company. Gillespie has undertaken an exploratory factor analysis, confirmatory factor analysis, appropriate reliability and validity analysis. Finally, cross-validation was checked and confirmed. The measure is not without limitations however, with the results predominantly collected from one R & D based organisation. In addition, the cross-validation performed is subject to further examination in terms of applicability.

Dietz and Den Hartog (2006) identify this measure as primarily one measuring 'belief'. Whilst this is of some importance it does not address the identified gap of 'belief, decision and action' identified earlier in this study.

In order to address this gap the author needed to further extend the 'range' of this measure to cover 'action'. This entailed further development of Gillespie's original measure. This was achieved by the author through utilization of the same items as the BTI (belief) measure but instead of wording each item such as, 'how willing are you to...share your feelings with your manager?' the tense was altered to read, 'I *was able* to share my personal feelings with

my manager'. By altering the tense of the item to 'past tense' it is possible to capture the 'action' element i.e. it is more than a belief or intention (*I have trusted through taking action(s)*).

In this manner we can cover both the belief and action elements of trust measurement between staff and managers within the two divisions. This use of the past tense to cover the 'action element' results in a total of twenty, as opposed to the original ten items. The author's developed tool is shown in Appendix B.

The next requirement was to further develop a meaningful measure for managers' trust in staff. Again, referring to Dietz and Den Hartog (2006), there are a number of measures which operate in this area. Careful examination has led to utilization of the measure of managers' trust in staff developed by Spreitzer and Mishra (1999). This measure is used with the authors' permission. This is a sixteen item survey that was developed using data gathered from the US automobile industry. The measure was subject to a confirmatory factor analysis, reliability and validity testing. This survey is well established with a significant data base. The measure is well-balanced between benevolence (28% of content), competence (25% of content), integrity (22% of content) and predictability (19% of content). 6% of content was uncategorized by Dietz and Den Hartog (2006). There were no negatively worded items. None of the items specifically mentions 'trust', affording increased accuracy and reliability, as highlighted by Schriesheim, Eisenbach and Hill (1991). 'Managers' trust in employees was measured with 16 items that assess the four dimensions of trust in the theoretical framework—concern, competence, reliability, and openness. These items have been shown to have acceptable levels of validity and reliability and were found to load onto a single factor in a factor analysis' (Spreitzer & Mishra, 1999, p.166).

There are some limitations, however, in the generalisability of the findings, based as they are, on the US auto industry. The data was collected from senior managers and thus may be subject to bias on the managers' part when compared to the staff (i.e. the managers may have a more positive view than staff). There is also some subjectivity in the measurement of the dependent variables (labour productivity and innovation) as they are only addressed by a single item in each case. This might be problematic for innovation, in particular, due to the difficulty of defining 'innovation'. Interestingly, the authors call for further longitudinal field research and suggest that a two way empirical study is needed both from managers' trust in staff and staff trust in managers, covering two of three identified gaps this thesis is attempting to address. Dietz and Den Hartog (2006) identify Spreitzer and Mishra's measure as primarily one of 'belief'. This is suggested by examination of the items. For example, 'Employees' will keep the promises they make'. This is, in essence, a future tense belief statement. If we are to cover the 'action' element, much as discussed in the paragraph above, we need to ascertain if an action has been carried out. Hence the author has further developed this measure by adding further items where the initial belief item is rewritten to reflect the trust action, using the past tense, such that the example item now reads '*Employees have kept the promises they made*'. The author's developed tool is shown in Appendix B.

The use of these well-validated measures forms a solid basis for this thesis but did require further development by the author as indicated above. By incorporation of the 'action' element and assessing both managers' trust of staff and staff trust of managers rich data was accessible through the two case studies. This use of the past tense to cover the 'action element' resulted in a total of thirty-two as opposed to the original sixteen items. The surveys were piloted using 'neutral' staff and managers from outside the case study company. Comments were sought with

regard to the layout and accessibility of the draft surveys. Especial attention was paid to the feedback from the 'neutral' participants with respect to the clarity and comprehensibility of each question. The clarifications regarding the layout and question wording were then added.

In order to facilitate both administration and data gathering from the surveys the author needed to utilise electronic distribution via email. Accordingly, the surveys were transferred into electronic format. The surveys were administered on-line via the well-known 'Survey Monkey' web tool (www.surveymonkey.com) in late 2008 in Canada and October 2008 and October 2009 in the US division. Extensive preparation of both managers and staff was undertaken prior to administration in both company sites. This included a management discussion on the purpose of the questions and the plan for feedback of results. These briefings utilised slides for the staff 'all hands' meetings as well as a management briefing note as detailed in Appendix B. In essence here, the researcher needed to persuade the management team of the potential value to the business of seeking to understand how the integration was progressing in terms of the trust levels held by management and staff. In particular, with the US case study company, what was the status of trust? Could trust be one factor that related to key employee retention? Briefings for the staff were carried out at the 'all hands' meetings augmented by email communication. Initially the author proposed use of multilevel analysis of the data but subsequent investigation revealed that the group sizes were simply too small and too few in number to facilitate this method. T tests and ANOVAs were selected as the best means of dealing with the small sample sizes and cross checking of the analysis was made with the qualitative analysis undertaken. In summary, the author's selection of mixed methods derived qualitative data through use of the semi-structured interview process and quantitative data through use of the two measurement

tools discussed above. Table 4 below shows the major research milestones for the course of the DBA.

Year	Date	Activity
2006	April	MBA Dissertation 'Trust, Risk and Control' accepted by University
	October	Commence DBA
2007	April	Research question & proposal submitted
	May	Research proposal accepted
	June	Literature review commenced
	August	Training on Endnote bibliographic tool
	November	Trust measurement tool review
2008	January	Ethical approval of planned research granted by University
	April	Pilot testing of measurement tools (draft A)
	June	Revision and re-pilot of measurement tools (Draft B)
	August	USA and Canadian case study visits ('selling' of research)
	September	Final version of measurement tools for deployment completed
	November	First survey using measurement tools (USA and Canada) via Survey Monkey
	November	Initial review of quantitative results
	November	First semi-structured interviews (USA and Canada)
	December	Initial review of qualitative results (recordings)
	2009	January
May		Methodology writing commenced
September		Preparation for second visit to USA (management briefings)
November		Second survey using measurement tools (USA) via Survey Monkey
November		Initial review of quantitative results
November		Second semi-structured interviews (USA)
December		Initial review of qualitative results (recordings)
2010	January	Transcription (professional) of all interview recordings to 'Word'
	February	Training on Nvivo tool for qualitative analysis
	February	Qualitative analysis commenced
	March	Training on SPSS18 tool for quantitative analysis
	March	Quantitative analysis commenced
	April	Trainin on MLWIN tool for multi-level analysis
	June	Draft analysis completed for qualitative and quantitative data
	July	Submission of initial draft thesis
	August	Restructuring and additional sections of thesis added
	October	Review and proof-reading, production of thesis
	November	Submission to University of thesis
	December	Viva
	December	Commenced minor corrections as per viva
2011	January	Submitted final version of thesis (all corrections added)

Table 4 Research timeline

4.4 Methodology discussion

It is pertinent at this point to discuss the selected methodology in more detail. Producing research of value that can be justified necessitates careful choice of research design, aligned with the individual's research philosophy and biases, with due attention to a variation of methods to ensure adequate triangulation. Consideration of the context, location, available time, level of access and support are just some of the factors that will influence the choice of methodology selected. Replicability, reliability and validity also need to be considered in the research approach, which should meet suitable ethical standards and protect the sponsoring company, group and individual(s).

In choosing an epistemological approach it is important to understand that there is some level of debate and lack of clarity encompassed by the topic of trust. Examination of the literature reveals that organisational trust "remains problematic for several reasons; problems with the definition of trust itself; lack of clarity in the relationship between risk and trust; confusion between trust and its antecedents and outcomes; lack of specificity of trust referents leading to confusion in levels of analysis; and a failure to consider both the trusting party and the party to be trusted" (Mayer, Davis and Schoorman, 1995, p.709). One might imagine that the literature would, however, have matured since the mid-nineties. However, according to Schoorman, Mayer and Davis (2007), revisiting their seminal trust research (1995) many issues still exist; "one of the weaknesses in much of the current trust research is that it is limited to relationships at a single level of analysis, considering either dyadic trust relationships within organisations or trust between organisations" (Schoorman, Mayer and Davis, 2007, p345.). While this is only one aspect of organisational trust other recent authors identify other aspects

that remain to be researched. Morrow, Hansen and Pearson (2004, p.48) state “despite increasing interest in the effects of trust on organisations, trust remains a seemingly elusive construct to measure in empirical studies”. Indeed, this statement is initially somewhat surprising as, searching the literature, a number of quantitative models and frameworks have been developed to measure trust yielding empirical results (Nyham, 1999; Tyler, 2003; Gillespie & Mann, 2004; Mayer & Gavin, 2005; Bijlsma-Frankema, de Jong & van de Bunt, 2008). This is reinforced, in more recent times, by a growing number of qualitative research models (Young & Daniel, 2003; Searle & Ball, 2004; Saunders & Thornhill, 2004; Kim, Dirks & Cooper, 2009). The proliferation of both quantitative and qualitative models and the associated debates concerning each models validity could, perhaps, be considered corroborating evidence of Morrow, Hansen and Pearson’s viewpoint. This abundance of models could be considered as providing circumstantial evidence that the ‘difficult to measure’ aspect of trust and trust development claimed by researchers has led to more models being developed in order to try and address the diverse area of trust and, in particular, the issue of trust measurement.

The balance of trust in key organisational literature is largely based on a case study design (e.g. Young & Daniel (2003), Morrow, Hansen & Pearson (2004)) with a mixture of qualitative and quantitative research strategy. The use of a case study quantitative approach seems somewhat less common, possibly attributable to the difficulty of first defining the object to be measured and then producing a sufficiently robust measurement (e.g. McAllister (1995)). However, even though the majority of researchers use a qualitative case study approach it is incumbent on the researcher to consider the alternatives, especially with triangulation in mind. From a review of the literature concerning research techniques it is apparent that there is much discussion concerning the research paradigms. These have broadly settled on three separate

'schools'; qualitative, quantitative and, more recently, the emergence of a third paradigm drawing on aspects of the first two - mixed method.

In the first instance, we should consider the potential advantages and disadvantages of a purely qualitative approach and relate these to the subject research.

The advantage of utilising the qualitative paradigm, which has become increasingly popular in business research, is, given its basis in an inductive, interpretivist and constructionist approach (Burke Johnson & Onwuegbuzie, 2004), its ability to capture the richness and fullness of the research subjects in a social science setting (Saunders, Lewis & Thornhill, 2003).

Qualitative data is based on the participant's interpretation of sometimes complex phenomena and can be helpful in understanding the 'how and why' of the contextual events and phenomena. Eliciting descriptive data from participants, without the 'tighter' confines of a set questionnaire, offers potentially richer results which provide a participant-unique interpretation of events or phenomena ((Bryman & Bell, 2003). However, there are some disadvantages associated with this paradigm. These include the issue of generalisability and replicability in case study research relating to other settings, contexts or participants. In other words, the data, whilst rich, is somewhat unique to the particular research scenario, in this case the company under study (Bryman & Bell, 2003). Given that the data is interpreted (even if software is utilised for some of the analysis process) it is possible that the biases of the researcher could influence the final results. The inapplicability of a purely qualitative method for this research can also be considered from a practical viewpoint, based on available time (given the finite time requirements of the DBA) and the numbers of staff involved. A purely qualitative approach, assuming data gathering was achieved through interviews, or even focus groups, would involve very significant amounts of analysis (Silverman, 2005). Furthermore, as the researcher was sponsored, and the research

was undertaken on a part-time basis in parallel with a normal working role, the company could not afford the author the time required for this approach or allow the disruption to the day to day business activities of staff needing interviews. In purely practical terms, therefore, consideration of different approaches was needed in the context of this research.

Given the difficulties with a purely qualitative approach we should consider the advantages and disadvantages of a quantitative approach. The quantitative paradigm, based as it is on a primarily positivist, deductive and objectivist and statistical numerical basis (Burke Johnson & Onwuegbuzie, 2004), offers speed of data gathering, ease in covering a large number of participants (when compared to the qualitative paradigm), facilitation of understanding of cause and effect relationships by removal of variables influence, wider acceptance in the business community ('science' as opposed to 'emotions') and can provide generalisability (given replication against many scenarios) and validation of developed hypotheses (Bryman & Bell, 2003). The speed, 'science' and cover of large numbers of participants was of interest to the author who was working within limited timescales and budget and where it was important that disruption to company staff was kept to a minimum. There are, however, some disadvantages associated with the quantitative paradigm. Selection of the variable(s) under study may not reflect the cause of effects under research. The emphasis on a deductive approach, where one develops ones hypotheses initially and then tests against these, may lead to the researcher seeking for confirmation in the data gathered rather than assessing the data in a more neutral way (inductive); in the case of this thesis, however, this was not an issue due to the exploratory nature of the research. Finally, there is a risk that the outcome of the research may be too generalised to be of use in the specific research scenario being examined (Burke Johnson & Onwuegbuzie, 2004). This latter disadvantage was more significant than it might seem at first in that the author

needed to supply specific research to the sponsoring company which accounted for its unique culture and context.

Considering these research strategies it would appear that, given our discussion above, a mixed model strategy (quantitative and qualitative) was suited for these two exploratory case studies offering the benefits of both approaches (Burke Johnson & Onwuegbuzie, 2004) and allowing triangulation (Saunders, Lewis & Thornhill, 2003). This addresses both sets of advantages and perhaps offsets to some degree the disadvantages of each paradigm. However, as with most aspects of research there is no general panacea and the researcher needs to select the paradigm that best fits with the research context and study aims, mindful that there should be a competent research design, good match to research questions and area, and ability to meet the increased resources required and satisfy the need for appropriate skills (Bryman & Bell, 2003). The mixed method paradigm, combining the other two principal paradigms, has the advantage that both numbers (statistical analysis) and words can co-exist, with the statistical element adding more 'science' to the qualitative results. This broadens the range of the research possible and with careful application can be used to develop stronger findings and resulting conclusions (Brewer & Hunter, 1989, Johnson & Turner, 2003). A further benefit of this paradigm is the possibility of increasing the knowledge base to facilitate both theory and practice (Burke Johnson & Onwuegbuzie, 2004).

4.5 Limitations and implications

The use of the case study research design, centred on two company divisions offered an opportunity for a combination of qualitative and quantitative strategies, a mixed method

approach where triangulation was achieved through data from one research strategy being cross checked against the other strategy. There is some debate and controversy concerning the mixed methods paradigm (Smith, 1983, Howe, 2004) with authors arguing that mixed methods cannot be combined as the two paradigms are irreconcilable and individuals should, in effect, be committed to one epistemological and its associated ontological philosophy. The author is aligned to Burke Johnson & Onwuegbuzie, (2004), who argue in favour of the mixed method approach, citing its potential to create a more complete knowledge base and supplement each individual paradigm's weaknesses with the alternate paradigm's strengths.

Limitations apply though, given the relatively short timescale of the study and the small number of companies measured. Indeed, the longitudinal nature of the study was time-limited and increasing the number of measurement points would be likely to be beneficial for future research. It is also possible to argue that a greater selection of companies or organisations in the high-tech industry could be included. Another limiting factor could be the context in which these companies find themselves in terms of location and culture. Given a slightly different culture in the US with respect to Canada (Trompenaars & Hampden-Turner, 1997) could any generalisations be made concerning the joint results?

We should also address the question of generalisability and validity of the mixed methods approach. Generalisability of this research must be in question simply because of the selection of two relatively small company divisions in two different countries. Although we have attempted to sample the entire population of each division through use of semi-structured interviews and on-line surveys we are not sampling across the 'high-tech' industry and therefore we can generalise only to that specific location and company under study (Bryman & Bell, 2003, Saunders, Lewis & Thornhill, 2003). Looking at the qualitative approach, although we have

interviewed a high percentage of the management population of the two divisions over two measurements separated by a year, we concur with Bryman & Bell (2003). They state that 'people who are interviewed in qualitative research are not meant to be representative of a population and indeed, in some cases, like managers, we may find it more or less impossible to enumerate the population in any precise manner. Instead the findings of qualitative research are to generalise to theory rather than to populations' (p.300). In terms of quantitative approach we do not, either, have representative sampling of the population (Silverman, 2005). We cannot therefore generalise across the 'high-tech' industry, however tempting this may be, given the small sample size. This is one of the major limitations of this study and suggests an avenue for further work.

Turning to validity of the study Bryman & Bell define validity as 'whether a measure of a concept really measures that concept' (p. 77). Validity is broken down into different aspects; face validity, concurrent validity, predictive validity, construct validity and convergent validity (Bryman & Bell, 2003). Face validity for this research was obtained through sessions with supervisors, one of whom is an established trust author. This served to validate the proposed measures and principal arguments of this thesis. Concurrent validity is highly pertinent in that we are seeking to explore trust and see if it is one of the factors which can be linked with staff retention. However, it has been difficult to link the two in the case of this study due to the very small number of staff who have left the two case studies. Thus we cannot say that there is concurrent validity or not, given the data and based on the analyses performed. Predictive validity, being a future criterion against which retention of staff can be measured is not applicable to the current research although it will be for future studies in this area. Construct validity is not fully applicable, as the study is not based on developed hypotheses but is

exploratory in nature. As the future research develops, though, this will be a consideration.

Convergent validity, where measured results (from an interview for example) are compared to observations of the same individuals, can be argued as existing for this work, at least to a certain extent, in that the managers interviewed are asked to comment on their immediate manager who is then also questioned. This allows a cross-check of at least the senior manager in both case studies. Robson (2002) outlines some threats to validity; namely history, testing, instrumentation, mortality, maturation and ambiguity in causal direction. Care was taken to make sure that the study was focused on trust exploration after acquisition, using carefully designed questions, to ensure the history threat was minimised. The testing threat is interesting in that the staff can bias their answers according to what they assessed as 'wanted'. However, by oblique questioning technique the main aim of the research was not apparent and so this risk was minimised. The instrumentation threat, where the staff were influenced by management directives, was not observed in any of the cases and is believed to be minimal. The mortality threat, where participants drop out of the surveys due to leaving the company or deciding not to participate any longer, was seen to some extent with several management changes and four leavers during the course of the research. Some respondents in the US longitudinal study responded to one of the two measurement points only, for example. The maturation threat takes into account outside influences on the surveyed staff which alter their views and outlook. This was seen in the longitudinal study in the US where subtle changes were observed, in some cases, in the managers' semi-structured interviews. However, it is difficult to be precise as to the cause as many factors are involved. What we can say is that some maturation may exist, albeit at a low incidence rate. (Most of the trust measures were consistent between measurements 1 and 2).

Finally, ambiguity in causal direction is a potential challenge to the research in that

determination of the true cause to effect direction needs to be understood. In our case causal direction of lowering trust resulting in staff leaving remains open to further research; however, we did not find evidence of low trust (quite the reverse, in fact) and did not have a significant number of leavers, so this threat to validity needs to be borne in mind.

Overall then, we can say that the measures chosen are largely well established and validated (Spreitzer & Mishra, 1999 and Gillespie, 2003). This serves to ensure this exploratory work has some validity provided appropriate care has been taken surrounding the development of the author's management measurement tool, that the analysis takes the threats into account and, finally, that the findings are treated with caution bearing in mind the limitations outlined in this chapter.

The method selected for data gathering, as outlined earlier in this chapter, used the three tools: adapted Gillespie (2003) questionnaire for the staff; adapted Spreitzer & Mishra (1999) questionnaire for the managers and Derbyshire (2006) interview questions (see Appendix B). The author was able to obtain sponsorship from the company for the staff and managers' questionnaires to be distributed electronically and for the key managers to be interviewed. The response time for the questionnaires was approximately fifteen minutes for both staff and managers with the semi-structured interviews taking between three quarters and one and a half hours. The USA organisation selected the author's surveys to the exclusion of the bi-yearly survey which was administered via email by company headquarters. Given this preference and the stated need for minimal interruption to the business for both case study companies by respective senior managers it was not possible to conduct any further data gathering, such as through utilisation of focus groups in the timescale. Achieving precedence over the normal bi-

annual company survey in the USA and strong support from both companies would yield sufficient data to enable the research to be meaningful.

Concluding this chapter we can say that a challenge existed for the researcher to undertake the study using two different paradigms (under the mixed method approach) almost in parallel. This placed a high demand on the author as an understanding of both qualitative and quantitative strategies was needed. Whilst not a limitation when viewed from an intellectual basis, nonetheless this approach required considerably more time, offered the possibility of errors by the researcher in trying to undertake parallel research design and analysis and could have provided conflicting findings. The issue of reflexivity is also pertinent and this is examined as part of the ethical discussion in chapter 2 of this thesis.

The challenge of the research was to ensure that, given the above limitations and implications, the aim of the research could be met (exploring the role of trust as a possible factor in staff retention in the post-acquisition integration phase).

This chapter provided a brief overview of the structure of the case study companies. This was followed by a short section discussing the corporate enrolment and sponsorship. This was followed in turn by sections that examined the adopted research methodology, discussion around that methodology and concludes with an overview of potential research limitations.

Having established our methodology and collected the data we can now move on to explore the findings of the mixed method approach, commencing with the qualitative findings (Chapter 5) before considering the quantitative findings (Chapter 6).

Chapter 5 Qualitative findings

5.0 Introduction

This chapter addresses the qualitative research findings based on data gathered from the three sets of interviews with senior managers in the two case study companies as shown below in Table 5. The 'first line' managers and senior local manager were interviewed in each company. The Canadian company managers were only interviewed once due to the acquisition being in late 2005, some three years before the research visit. The US company was visited twice as it offered an opportunity for longitudinal study with an acquisition only six months before the first visit. This spacing of visits was chosen to provide a fairly immediate data gathering followed by a second visit a year later to test the development of trust in that time.

Company	Company location	Acquisition made	Interview date	Interviewed	Total Interviewed
1	Canada	Oct-05	Nov-08	1st line managers and senior manager	8
2	US	May-08	Nov-08	1st line managers and senior manager	13
2	US	May-08	Nov-09	1st line managers and senior manager	13

Table 5. Qualitative interviews undertaken

The chapter considers, firstly, the research stages undertaken together with the coding of the gathered qualitative data. Secondly, aspects of the managers' trust is examined for each company; Canadian and US. Paragraphs 5.2.1 to 5.2.4 explore the Canadian managers' views on the importance of trust, initial post-acquisition trust, evidence for management trust building and

trust breakdown and recovery. Paragraphs 5.2.5 to 5.2.11 explores the US managers' views of the importance of trust, initial pre and post-acquisition trust, trust building belief, suggested trust building solutions and perception of effectiveness. Thirdly, the following section examines the derived data from both Canadian and US companies with respect to the four elements of trust (Mayer et al., 1995 & Spreitzer and Mishra, 1999) used as a basis for this work; identified as openness, concern, reliability and competence. Finally, the chapter concludes with a consideration concerning the evidence in the data from both companies for trust being a possible factor in retention.

5.1 Qualitative research stages and emergent codes

There were a number of steps undertaken to reach the findings and these are highlighted in Figure 16 below.

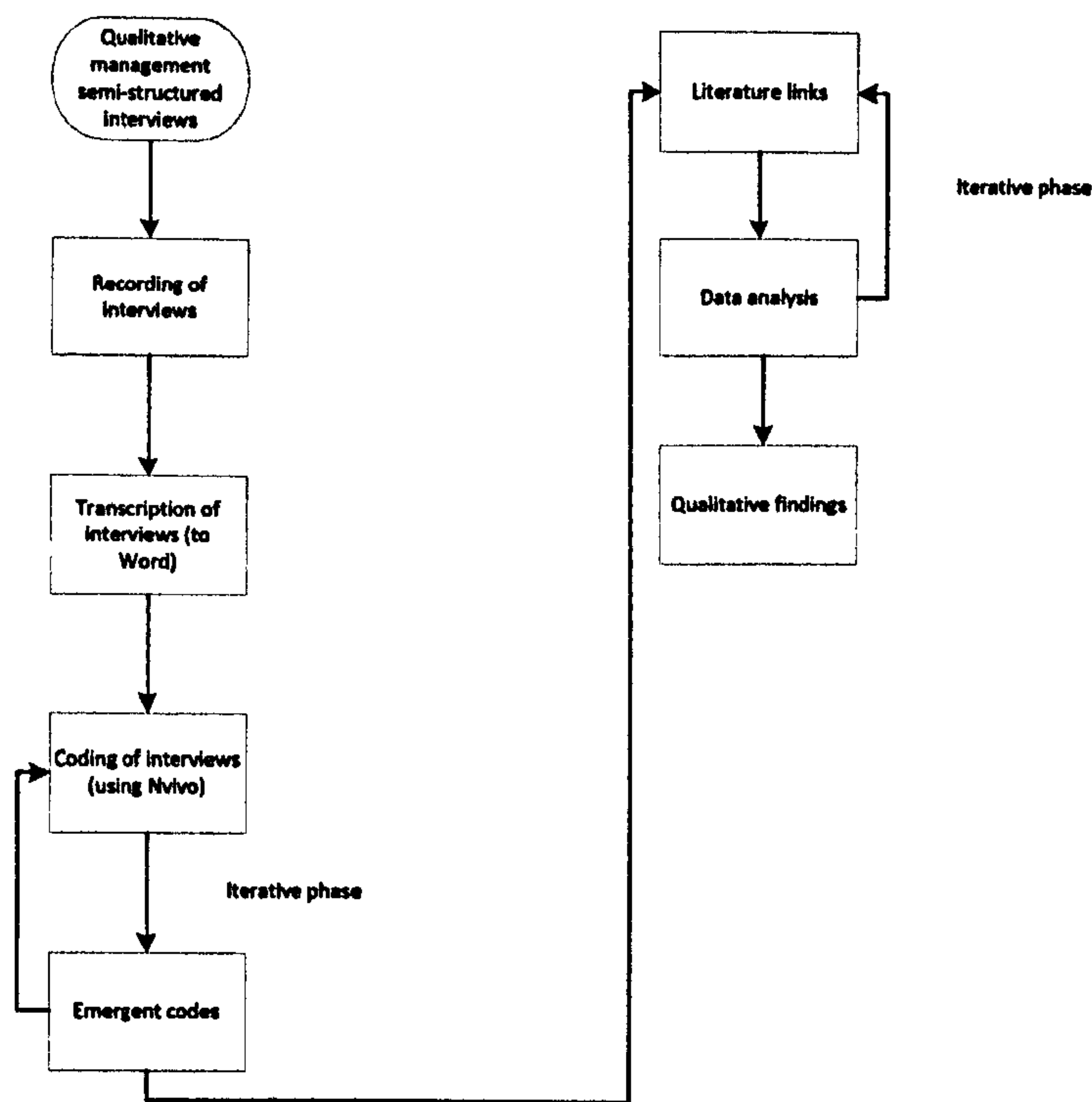


Figure 16. Qualitative research stages from interview to findings

The interviews were conducted and the recordings subsequently professionally transcribed into Microsoft Word™ format, a form that was suitable for inclusion in the qualitative tool Nvivo™.

The interview transcriptions were duly coded, the data was carefully reviewed and, using the Nvivo™ software application, allocated to emergent codes. This was an iterative process involving several passes through all the data, followed by reviews of the allocated codes such that there was a development of the codes to produce the final version. The coding was performed for both companies and Table 6 below shows the resultant codes.

Subject	"Positive" codes	"Negative" codes
Trust	Importance of trust	Lack of trust
Retention	Retention of staff	Dispensing with staff
Openness	Staff communication	
Competence	Competence	
Concern	Concern	Ignoring advice
Reliability	Reliability	
Staff Impact	Confidence of acquired staff Commitment to company Morale	Criticism of acquisition
Integration	Integration of two company elements Cultural development Success measures Rewards Customer relationship Environment	Differences between companies

Table 6. Coding framework for Canadian and US company qualitative analysis

The coding that emerged was based on the data review (which was totally under the control of the author, rather than automated by the software application) linked to the trust literature, in particular referring to the trust elements identified by Mayer et al (1995) of openness, competence, concern and reliability. These codes were also selected as they were present in the Spreitzer and Mishra (1999) manager's trust measure which was adopted for the quantitative measurement of managers trust in staff (discussed in Chapter 6, following). Additional codes were added to reflect the data content and grouped under either 'positive' or negative headings as shown above in Table 6.

Note that 'positive' codes in this case can be defined as those codes which explore the aspects of the subject matter and do not necessarily contain all positive sentiment or expression on the part of the interviewees. The 'negative' codes include comments and criticism which contrast with some of the 'positive' codes, although not all data is negative per se. An example of this would be, under 'positive' code *concern*, which explores expressions or evidence of management or staff concern, the contrast of what could be seen as outgoing and positively intended concern contrasting with the 'negative' code of *ignoring advice*. This data deals with perceptions of ignored advice from staff to management or intra-management advice (manager to senior manager as an example) and could be construed as negative in nature.

Subsequent to the completion of the coding (an iterative process in itself) the literature was linked to the data analysis in a further iterative process to ensure that the data extracted could be compared to the organisational trust literature such that the aims of the research could be achieved; namely, to explore aspects of trust, its definition, development and role in the post-acquisition integration context of the high-tech electronics area and to determine whether trust was one of the factors which influenced key staff to remain with the acquired company in two different geographic locations.

5.2 Manager's trust

The following section explores the role of trust specifically between managers, staff and senior management in the post-acquisition integration context, one of the common factors between the two case study companies.

5.2.1 Canadian managers' view of the importance of organisational trust

Examining the Canadian data, we find an immediate possible link of trust to retention as argued by a manager, 'it's people, people's skill, people's experience, people's knowledge that counts so we start losing key people in the *high-tech (authors wording)* business we'll struggle so, yes, the trust is a big element', (personal communication, November 2008).

On this basis, then, we can contend that trust is important in company integration (Krug & Nigh, (2001), Stahl, Chua & Pablo, (2003)). However, what can we learn from the managers about their view of the importance of trust in the context of the Canadian case study company? The managers, almost without exception, underline the importance of trust in this context describing trust as 'huge', 'very crucial', 'absolutely key' and 'a big one', (personal communication, November 2008). This tends to reinforce the existing literature which underlines the importance of organisational trust (Kramer, 1996 in Kramer & Tyler, 1996, Mayer et al, 1995, Rousseau et al, 1998).

5.2.2 Initial post-acquisition trust in the Canadian company

Two managers state their view of the opening position on trust in the purchasing company, 'we started off open to trust' and 'we were always very hopeful. See, trust is... Sometimes your perspective, I hope this happens, I have to trust you. Given the circumstances, you may choose not to trust somebody, but I had nothing to lose by trusting the people from C'. This willingness to trust the acquiring company is broadly reflected across a number of other managers, one of whom reflected that 'trust is always important because you become very

cynical if it's not', whilst another said 'give them (*the acquiring management*- author) some benefit, because they've elevated themselves to management position, they should have a level of experience and trust that you can automatically assume is there', and lastly 'once you open yourself up to people and tell them why this is important to you, people may react to you differently because all of a sudden they can either empathise with your position or they can see that there's some sincerity in what you're saying. And they start to trust you', (personal communication, November 2008).

This seems to imply an initially trusting culture in Canada as highlighted by Rousseau et al (1998) as institutional trust, that is, trust fostered by legal structures and norms. One factor that seems to have built initial trust is cited by one manager who states that 'People had huge hopes. They had huge expectations. They trusted primarily J (CEO), because he came in, he gave one of his very, very inspiring speeches and everybody kind of clung on to that and I think that there was a lot of trust there, which is a great way to start', (personal communication, November 2008).

5.2.3 Management trust building in the Canadian company

A factor that emerged as a trust building function was the need for actions to match words as stated by one interviewee: 'it is important to come in and tell people what your plans are and you've got to follow through on those plans otherwise people aren't going to trust you, you know once bitten twice shy, right, so I'd say obviously it is a big element is trust. You know, say something, follow through and specially that time when a company takes over another company because that's a very precarious time for people'. Another Canadian manager further

underlines the importance of 'closing on promises', by arguing that 'something that was very critical in terms of trying to build trust (*is to* – author) answer people's questions forthright, and make sure you repeat that message enough. 7 times, 8 times, then people will begin to believe what it is that you are saying. And you have to match your words and your actions. And we have really tried to do that'. This would seem to be closer to knowledge-based trust (Lewicki & Bunker, 1995).

A further manager, reinforcing this emerging factor of matching words and actions, states 'the company has certainly earned the trust that we place in it by following through on their plans that they made public to us and retaining us and retaining our abilities and so just plain making us a more important part of the company, not just an afterthought or an add-on, as we had become accustomed to thinking of ourselves'. Three others commented that 'doing what they did to set up the business built the trust, no one had to try to gain my trust as a specific thing', 'my impression is that corporate wants to make a go of this. Sees this as a lucrative place to invest a lotta money, and they have' and 'it was clear, we're doing this to make this a going concern. We're not going to do this in a half assed way, we're going to do it right, and they did. So to me, it just implied a trust in our group', and, finally 'if you were thinking about trust in terms of whether the company has earned our trust and respect it's the fact that they have made us corporate headquarters rather than C. We had this tremendous inflated feeling of importance that day when that was announced', (personal communication, November 2008). Several managers, reflecting on the trust that their staff had in them, commented, 'I have a lot of my employees come in and ask me how things are doing this or that or the other thing, and we have open exchanges about that, about why things happen, and so I believe they're pretty well informed. So that's me trying to maintain trust within my employees, so that they understand and feel

comfortable about things’, and ‘I’ve developed a really good relationship with people in my group. I think they trust me. They think I – my perception is that they believe that I’m open with them and certainly I believe that they’re open with me. They share their concerns with me’.

Another observation on trust by one manager refers to the importance of openness and communication and, these factors being present, that trust can be considered to be self-maintaining: ‘nobody’s actively tried to maintain trust in any way, other than communication lines are kept pretty open, and discussions are open, therefore the trust maintains itself’, (personal communication, November 2008). This importance of openness and communication to foster trust is supported by Butler (1991) and Galford and Drapeau (2003). Openness and communication are discussed further on in this chapter and form important elements of trust. So ‘walking the talk’ would seem to be an important factor in trust building and maintenance, certainly in the case of the Canadian case study company. This trust building would seem to align with Lewicki & Bunker (1996) in terms of early calculus-based trust developing into more generally held knowledge-based trust.

5.2.4 Trust breakdown and recovery in the Canadian company

During analysis of the data, though, it became apparent that there had been somewhat of a trust breakdown between the staff and the appointed managers sent from head office. One manager summarises the situation: ‘And then we lost it all (*trust of managers in senior management* – author) because all of a sudden people started to lose trust in the management that we put here, in the response that we gave them from C, all those promises that we had made, we really didn’t live up to them. So I think, you know, once the trust has gone then, especially if

you're key managers here, how we treated people, you know, some of them quite startling'. Another manager adds, talking about the history of the senior position in the Canadian company that spans both the previous company and the acquiring company, 'we went through a man in the corner, a person in M's position every nine to twelve months, so we had, M's like the fourteenth person in 11 years to be in this role, so we've learned to be sceptical and hear what they say, but they are not going to be there for very long, so why bother, because you know, give them nine months and they'll be either pushed, they'll leave because they can't stand the organisation above them'. The act of sending managers from head office was criticized in terms of effectiveness and trust levels by one manager who explained that 'you can't just parachute somebody in and expect them to be trusted if they show no indication of being there, particularly for a company with a history of parachuting senior management...by the time we get them educated into what we want and how we need to be managed, they leave, and you have start training somebody else, so yeah trust plays a huge part', (personal communication, November 2008). This view of 'educating' the senior manager and the subsequent development of trust that results on the part of the management team shows a further facet of trust building that might merit further investigation that is beyond the scope of this thesis.

The initial senior manager at the acquisition, P, was only in post for a short while and, according to one interviewee 'we were very sceptical about what we heard particularly from P, and he proved to be just like the others, you know, he came in, promised a lot, did nothing and inflicted in a very non understanding way processes and procedures that didn't work, and just proceeded to get upset when we pointed out this doesn't work'. P was followed by R, who one manager stated 'R when he came in (said) "I am here temporarily until we can find a real manager"...so we had no reason to trust them because they had no ownership of the issue, they

weren't here, and it was clear to us that they weren't here any more permanently than the guys from (*previous company* – author) and they had no ownership of making a nice environment or doing anything to help us. They were here to inflict whatever they had been told to inflict from headquarters', (personal communication, November 2008). At this point trust of both the senior manager and the parent company appeared relatively low compared to the starting point at acquisition and possibly could be verging on distrust whereby there is expectation that the trustee will not act in the best interests of the trustor (Lewicki, McAllister & Bies, 1998). The early sense of commitment and 'walking the talk' has diminished in the perception of some of the management team.

Following R a new manager was appointed and elicited a different reaction from one manager who felt that 'M on the other hand has come in, she's moved her family here, she's bought a house, or built a house, and gives the appearance that she wants to work with the group, to grow the group and be part of the group and she has transferred to (here), now that allows us to trust her much more, because she has clearly come to be on this side of the fence' and 'I think people trust M a lot more than we could ever trust the previous incumbents', (personal communication, November 2008). There is some circumstantial evidence, therefore, that the trust levels between the senior manager and the management team have been repaired, or at least recovered somewhat from the low point. One interviewee provided some pointers to the trust 'dip' by observing that 'trust has been pretty positively placed, though there were a few rough edges in the early days where their (*head office/senior manager* - author) vision of how manpower is done, human resources is done and the like was a little different from ours', (personal communication, November 2008). We now turn to the US company management trust aspects.

5.2.5 Initial pre-acquisition lack of trust in the US company

We initially analysed the primary data from the first data gathering at the US company in November 2008. This uncovered evidence of a pre-acquisition exodus of staff. Here, in common with the Canadian company, we found an immediate possible link of trust to retention as argued by one manager. 'First they go into like shock, and then anger, and they do stupid things like 'well, the company's going to be sold and I better go and get another job. Because I can't trust these (*acquirers* – author) and they will do the absolutely dumbest things. People gave up 800 thousand dollar retirement plans because they were so in fear of an acquisition of a company they didn't know', (personal communication, November 2008).

This is a very dramatic example of the effect of lack of trust in the acquiring company leading to, on the face of it, irrational behaviour on the part of the staff being acquired. And at the heart of the issue is the fact that there was no trust (or knowledge) of the acquiring company, leading some staff members to take what can only be called drastic action as a result of the lack of trust. Several authors argue that this is distrust; the trustor has no expectation of the trustee or (even more exaggerated) that the trustee would engage in potentially damaging actions (Butler, (1983), Govier, (1994), Mayer et al, (1995), Lewicki, McAllister & Bies (1998). This underlines the effect of lack of trust can have on staff retention as highlighted by Dirks and Ferrin, (2002) and Colquitt, Scott & LePine, (2007). Further evidence of lack of trust immediately prior to and at acquisition was also offered. Citing staff trust of the parent company, one manager states 'the people coming from (*the previous company* – author) had very little trust of management or our motivation or our acquisition strategy. There was very much a lack of trust. And it wasn't based solely on being C, it was based on the fact that they had been moved and sold and sold again and

moved and treated badly'. The manager goes on to say, regarding trust from the acquiring team, that 'I think on the acquirer side, our side, we also kind of lacked trust. Because we didn't like the way they were doing things. We couldn't trust people to do, to kind of perform at the level that we were expecting them', (personal communication, November 2008). It is worthy of note that there is evidence that the acquired company in the US had a similar history to that of the Canadian acquired company in that it was passed from company to company ('we were A, then to B, then to C and now to D', personal communication, November 2008) and this would appear, in both cases studied, to be a difficult environment for trust building which is borne out by the fact of being 'moved and sold and treated badly'. There is evidence here of distrust as described by Lewicki, McAllister and Bies, (1998).

There is also some evidence for loss of trust immediately prior to the acquisition which occurred due to the need for commercial sensitivity. This resulted in a small number of 'to be acquired' staff, who would work on the due diligence and acquisition/integration planning, being briefed and involved prior to the announcement of the deal closing. The briefed staff were at manager level and were at risk of losing the trust of their staff as related by one manager: 'I think the classic example of trust after the announcement (*of the acquisition* – author) was made, my highest level senior scientist came in my office...I have a little bunch of cards on my desk that I got in 1986 from a communications class and you take the card and it has got a saying for the day. He went to my desk and he took the cards, he shuffled through them all and there is one card that says 'Trust'. He put the card back on the very front of the stack and put them back in the little holder, turned it around and said (tapping his finger) 'Trust'. He took it very seriously that I did not tell him anything about it. No matter how he asked I still never told him. So he thought that I did not trust him, so he lost trust in me'. Another manager, commenting on trust

levels during the pre-acquisition phase, states 'it became really obvious that something was going on. And then, after I said 'hey, something is on the horizon about a sale, let me know. Get me on the team I will help you guys.' And until the very last moment the (senior manager – author) denied anything was happening. And then the defense was, 'well you know what it's like; we don't want to be accused of fanning off or insider trading.' It was a lot of BS. Trust? No trust!' (personal communication, November 2008). This is in effect a breaking of a psychological contract between leader and follower as outlined by Barnett & Schubert (2002). The divulgence of acquisition activities is a difficult area in terms of staff briefing as, due to US legal issues concerning publicly traded companies, it is common for briefed employees to have to sign a non-disclosure agreement. This bars them from communicating about any aspect of the impending sale to other staff or anyone outside the company and sets up a possible loss of trust scenario as outlined above if, and normally, when, the news that a sale is underway leaks out. 'I had been through two other transitions before and when you're on that group of one or two that know about it way in advance, you sort of give an oath. You sign legal papers that you don't disclose anything. That's a big burden... people would come up to you and you couldn't say anything and they knew that you knew but then they would not trust you and so you be would holding your trust but then you were losing (their) trust. Very brutal cycle', (personal communication, November 2008).). In this example the breach of affective trust between the employees could lead to emotions of violation on the part of the trustors which could result in the employees focusing increasingly on transactional obligations (Atkinson, 2006).

5.2.6 US managers' view of the importance of organisational trust

Considering the data what was the managers' view of the importance of trust in the context of the US case study company? The managers, almost without exception, emphasise the importance of trust in this integration context as 'the most important key to the whole thing', 'critical', 'probably one of the most important things', 'the number one thing that you got to have', 'it's a huge piece of it', 'paramount', 'very critical', 'implicit in everything you are doing', 'a very important element' and 'a very important aspect', (personal communication, November 2008). Clearly the majority of managers felt that trust was central to the integration process reflecting the work of Krug & Nigh, (2001) and Stahl, Chua & Pablo, (2003). It is easy to gain an impression that trust was seen by all the management staff as implicit and vital in the integration process. However, there was one exception which is worthy of note. The manager commented that, 'Personally, I see trust as very unimportant in this relationship. You have to do some basic trusts, like you have to trust when you're buying a company and when we're working with the (*acquired* – author) guys now and the (*acquiring* – author) guys, you've got to trust that what they are saying to your face is true. Because you can't substantiate everything in documentation or whatever. But even there you have to take everything with a grain of salt...it's a trust by show me sort of thing. It's a trust by let's see how it turns out sort of thing'. This expression of trust would appear to be similar to calculus-based trust (Lewicki & Bunker, 1995).

5.2.7 Initial post-acquisition trust in the US company

A further point to note is that despite the previous poor experiences with perceived 'bad' treatment there was a need for, and recognition of, the importance of trust felt by the acquired staff, as expressed by one manager who joined as part of the acquisition, 'After being lied to for a year, everybody was just looking for the truth, you know. So who can we trust, you know'. This was reinforced by another manager who stated, referring to the acquired managers and team leaders, that 'they are all trust-ready people in their own right. I think people gave each other a chance...to prove themselves and if you don't do that we would have sunk. That was a big deal', (personal communication, November 2008). This 'readiness' to trust is similar to that cited by the Canadian managers.

5.2.8 Management trust building belief in the US company – six months post-acquisition

The trust building model proposed by Lewicki & Bunker (1995) highlighting the role of calculus-based, knowledge-based and identification-based trust was helpful as we examined the interview data for the US company for November 2008, some six months following the closing of the acquisition.

One manager provides a thoughtful description of trust-building that is based on experience, picking out the fragile nature of trust and the need for 'nurturing'. 'My philosophy is don't trust anybody. Trust is not something that you can provide. Trust is something that you have to develop over a long period of time. Trust is not something that you can give or prove. Trust can be damaged very easily. It's not something where you say 'I trust you' because trust

has to be continually demonstrated and continually fed and nurtured', (personal communication, November 2008). This outlook is similar to that outlined by Kramer (1996) in Kramer and Tyler (1996) whereby all information relevant to the success of placing trust in the trustee is analysed before and after trusting has occurred and trust can be withdrawn quickly should it be seen as misplaced.

Another manager offered an opinion on how trust could be built, commenting that 'I think the development of trust is to know that you had somebody to go to, not only that but you have the responsibility to go to somebody and communicate, not only a bounce direction but side to side. Once you realise that there is a give and take relationship required and once that is established and proven and continued... that's when a trusting relationship starts to develop'. This could be argued as calculus-based trust (Lewicki & Bunker, 1995). Another manager offers a trust-building solution, saying 'make sure everyone is on the same page with what's the vision of the company. If you have got a problem with it then well let's talk about it. All that instils trust'. A further interviewee states that 'one thing to build trust is, like I said, these 'all hands' meetings where you tell it how it is. You tell that we won something but you also tell that you lost something....And not hiding any bad things that's very positive for building trust'. A manager summarises that 'trust is earned as things come up and actions are taken to follow up into ultimately close on promises, on expectations', (personal communication, November 2008).

An interesting aspect was brought up by one individual who argued for consistency in management to provide a platform for trust-building *even if they don't like the workplace*. 'Consistency in the early phases of an organisation is as important as all the trumpets and bells and buzzers there are, because people want to come to work and have, even if they don't like it, they want to be consistent. So they know what to expect. So I think that helps the attitude and

latitudes and then consistent management and consistent forward progress it's going to make a huge difference and I think that it all contributes to trust as you go along', (personal communication, November 2008). This view, unfortunately, was an isolated one and no further evidence of this approach was detected in the data. In contrast to this view the Institute of Leadership and Management (2009, p.8) discussing line manager consistency argue that 'employees will be tolerant of erratic behaviour, provided their managers fulfill their expectations in other dimensions'.

We should also check for the intent of the acquiring management team. Was the management team that carried out the acquisition open to trust-building? The senior manager, reflecting the views of most of the managers, commented that 'trust was a big thing and honesty was a big thing for us so even if things were difficult or were going to be seen as somewhat significant changes, we didn't try to hide them under the carpet or sugar coat them. We tried to make sure people were as educated in the processes and the challenges as possible', (personal communication, November 2008). This approach highlights openness, one of the four trust elements first identified by Mayer et al (1995), discussed in section 5.4 below.

5.2.9 Perceptions of effectiveness of trust building in the US company

However, despite the mainly positive views on the need for trust building at this six month point, doubt surfaces in the reflections of the interviewees. When questioned whether they thought trust-building had been effective one manager said, 'it's hit and miss, some of them are (*trusting* – author) some of them aren't, we still have continuous failures of communication, continuous failures of expectations being relayed down correctly and then the (*managers and*

team leaders – author) saying ‘I didn’t know that’s what you wanted me to do, say that again?’ So that’s a development of trust as well and it’s 50/50. I wouldn’t say it’s much better than 50/50’. One interviewee observed the effect of not having full trust between all members of the management team, explaining that ‘we are in a good old boys club (*which* – author) is such a negative contributor because the (*acquired management* – author) erode the overall trust, and between the entire management team, just like termites. It eats at the structure. I think the management team ourselves, with the exception of one individual, are marching in all the same direction and have the same goals’. Another manager expressed concern saying, ‘ultimately if a big chunk of the population has the old management in place and that person is filtering stuff or is feeding back, ‘oh yes we are doing things’ but in actuality isn’t. Then these people aren’t seeing the connection between words and actions. Which builds trust. They are seeing it as; it’s still same old same old. And that’s a concern I think’, (personal communication, November 2008). It would appear, at this point in the integration, that there is at least one member of the management team who does not have the full trust of a number of colleagues. This existence of mistrust between management team members may pose risks of the spiral reinforcement model operating (Zand, 1972), affecting the trust of the staff in the management team through lack of reliability (Spreitzer & Mishra, 1999).

We have considered trust within the management team at this six month point post-acquisition but manager’s trust levels in staff are also somewhat open to question. This is revealed by one manager who stated that ‘Do I trust all of my original (*pre-acquisition* – author) brethren? Yeah pretty much. Do I trust all of the new folks that have come in to the organisation; do I feel like I can trust them without question? Not yet’, (personal communication, November 2008).

There is also some question about the managers' trust for senior management at this six month point. An interviewee, reflecting on 'upward trust', expressed concern regarding lay-offs, that 'from a standpoint of trust, its little bit impacting, like wow, am I the next guy? What's after we get rid of the last contractor. And (*the senior manager* – author) is pretty honest about it. He says 'we don't have the money right now.' So if the last contractor has gone we still don't have the money right now. Who's next? So can I trust that decisions are made that take everything into account or is it just a bottom line decision? You know, the guy that makes the most has to go... its shaking up the trust a little bit although I understand from a business standpoint'. The same manager goes on to raise the issue of senior management loss of ('downward') trust in the managers, pointing out that 'the company puts a lot of hope in you that you will be the guy who will be a part of the big machine that works and if you disappoint them and they can't trust you anymore because you are flaky or something. It's like the door swings both ways. We also have to be able to trust our management to make the right decisions', (personal communication, November 2008). Here, the interviewee captures the mutual trust element between senior management and managers, the 'door swings both ways', which this thesis attempts to grapple with.

One manager, commenting on trust levels between staff and managers, indicates that he doesn't 'feel trust is here at the moment. And, interestingly enough, hearing hallway conversations it is pretty clear that some of the (*acquired* – author) people do not trust (*the acquirers* – author) yet. The workers', (personal communication, November 2008).

It would seem that whilst some evidence exists of trust-building with some success there is a significant element still present that does not have the same level of trust as some of the most forthright advocates and practitioners amongst the management team. Again the risk here is of

escalation of mistrust unless prolonged disconfirming behaviour is detected on the part of the trustor (Zand, 1972).

The final word on development of trust at this six month stage of the integration rests with one manager, who summarises the trust building to-date by arguing that ‘I don’t know if we have done enough to convince the new acquisition that we or (*the company* – author) is trust worthy. There are a number of issues that are out there. I think they (*the staff* – author) are still on the fence about whether they can truly trust what it is that we are doing. And so with time if we can keep the retention they will see what we are up to is for the good of the company as we build a company that is fun to... work for and I think they will be able to see that trust’, (personal communication, November 2008).

5.2.10 Management trust building belief in the US company – eighteen months post-acquisition

The next data gathering point for the US case study company was November 2009, approximately eighteen months after the acquisition. At this point in the integration the managers reported trust-building efforts from, primarily, two different viewpoints; firstly ‘we’ve done all we can’ and secondly ‘we still have some way to go’.

Representing the ‘we’ve done all we can’ element the senior manager stated that ‘there is still a lack of trust and I don’t know why. I don’t know what we could have done differently’. A manager states that ‘at one point there is trust, but then after you get into it this far there’s like reality and I think the reality was we put, we tried to put a very, have a positive attitude, and give people individual responsibility to do what they are supposed to do, and I think the problems that we are dealing with now are people are not able, are either unable to step up or haven’t stepped

up and aren't performing at the level of expectation, so it's not a matter of trust, it's just a matter of dealing with performance not living up to expectations'. Here the manager is arguing that the trust-building is over and the issue now is performance of certain staff members. There is a possible indication here of the manager feeling that some staff have not reciprocated the trust offered and opportunity for increased performance and thus violated the exchange relationship (Whitener, Brodt, Korsgaard & Werner, 1998).

Another manager, representing the view of 'we've done all we can' for trust-building comments that 'I think finally we've got a pretty good team that's marching forward in a positive direction and I think that the management team itself is able to work well together with very little animosity or distrust among the team which there was before. So I think that that is a good thing that's settling out finally'. One other comment was noted from an interviewee who felt that all that could be done was done given the circumstances but that there was possibly some more effort that could be added to further build trust. 'You know it could have been helpful to have really taken a mixture of both groups into small groups and done some more team discovery activities that people could more quickly learn about each other and how they operate and what to expect from each other. So I think that's something that we could have done better on or we could have done that might have helped maybe things a bit quicker, but again I go back to the situation and the scenario that we were in and I don't know where we would have fit that in', (personal communication, November 2009).

There are some indications that some of the management team feels that 'we still have some way to go' and this is reflected in the analysed data. As an example, one manager argues that 'trust is a huge element and it's not clear to me that even now that we have the trust of all the employees that came over with the acquisition. Trust not only of kind of interpersonal things or

between employee and manager. But, also trust that we, as a company, are doing everything that we told them that we would do so they could succeed'. These doubts are mirrored in other manager's comments: 'there are some people that have an interesting perception of what trust is, and I don't know if you're ever going to get to a point where they feel there's a sense of trust there. There are some people that have issues, you know, from just the way they've been treated over the last 20 years, not by us, but... This is a group of people that have been merged, spun off, pushed off, sold off, over the last 5, 10 years, and probably feel like yesterday's newspaper or something, in some cases. Some of that will just take a lot of... Some people take a lot of time and some people may never get to a point where they feel trusted. It just may not get through to some people'. This manager's view could be interpreted as regarding the history of the acquired staff as almost a conditioning factor and acknowledgement that some staff members may never trust in the way the majority does. This is echoed by Nikandrou, Papalexandris and Bourantas (2000) who, examining a slow change process following acquisition, argue that elongated lengthy change processes prolong job uncertainty and affect willingness of the staff to place trust in the organisation.

Another aspect of 'we still have some way to go' that emerges from the data is the 'walls' that occur between groups or individuals. Evidence for this comes from one source who states 'one thing that has discouraged trust is that, as we have integrated and as we have uncovered some of the difficulties from the acquired company, I think some walls either have been built up or continued to be in place because of, maybe, management'. Another source comments 'integrating two teams is difficult, because there is always going to be an initial 'us and them' environment. And to erase that you have to build that trust...I think that a lesson for any integration is that you have to actively work at tearing down the barriers all the time. Any time

any confrontation becomes with an 'us and them' it needs to be knocked down immediately to form that new 'all of us' entity. So I think we could have done a better job of that'. Lastly, another manager points out that 'in some areas we've built up walls; the team that we got not trusting the team that was here and vice versa. Because there's been finger pointing at times and that doesn't solve anything', (personal communication, November 2009). Tyler (2003) underlines the importance of developing trust when organisations need co-operation and are not able to provide significant incentives or sanctions (such as during post-acquisition integration period).

The same manager offers an analogy of the importance of persisting with trust-building in the face of these issues: 'It's like braces on teeth, you've got to keep the pressure on for a long time to straighten teeth out. It's going to take a long time to change culture, to develop trust in an organisation. You've got to keep it up, there's a maintenance factor too. It isn't just a onetime thing and you walk away and it's there forever. Plant the seed and you've got to water it every day', (personal communication, November 2009).

Another manager repeats the words reflecting action theme. 'What we've found in the integration is some of the folks that came over saw it only from a "How do I trust you, new management" as opposed to "How do I get you to trust me as well", and I think trust has to be established and continually worked as a two-way street. It's not something that you can demand. It is something that you earn. And it's something that you earn, both parties have to earn, or all sides have to earn more through actions and commitments and less through words', (personal communication, November 2009). This 'two way street' is highlighted as important as trust is not seen as uni-directional by this individual. This view is supported by Brower, Lester, Korsgaard & Dineen, (2009, p.343), who, in their examination of trust between managers and staff, state that 'leaders and subordinates are partners in a social exchange. If either member of

the dyad has a lack of trust, it is difficult to maximize the potential outcomes evolving from this relationship’.

Another interviewee, citing the need for further efforts regarding trust-building, says, ‘But I don’t think the population trusts what we are trying to do as much as they need to. I have been struggling with how do we, you know, I am just trying to lead by example trying to do the right thing. We have got to run a business and we also have to make the workforce better, so we just have to keep doing the same thing and lead by example and then hopefully they will come around’. Another interviewee sums up the perceived ‘score’ ‘on a scale of one to ten, building trust, I would say, we’re below the five spot; three or four at times. I think we haven’t actively worked on that enough’, (personal communication, November 2009). It would appear that at least some staff are still developing calculus-based trust or mistrust. If we tentatively accept that the staff trust of management is not perceived as at a sufficient level by the majority of the managers it is worth investigating as to what has caused this and what are the suggested solutions.

5.2.11 US managers’ suggested trust building solutions

The data from the US company at the eighteen months post-acquisition point reveals a number of suggested means to build trust.

One manager highlights a ‘living trust’ stating that he strives to ‘gain their (*acquired staff* – author) trust by following through on our (*management* – author) commitments and making sure they’re aware of that, and I think again we continue to do that and it’s something that you do every day, you do it on a one and one basis with people, you do it on your program teams, you

do it with the bargaining unit, you communicate about it in an all hands. You try not to let things fester. If someone's got concerns somebody's got issues, if some people feel that something's being ignored, you jump in, you roll up your sleeves, and you address it, and I think by being proactive like that, then I've been successful in building trust', (personal communication, November 2009). This 'proactive' approach which is deemed to be successful by the individual would appear to call for a dynamic daily effort with the manager's staff team. Here we can see elements of the trustor and trustee working together, communicating, seeing how the trustee responds to different circumstances and learning to trust each other as each becomes more understandable and predictable (Lewicki, Tomlinson & Gillespie, 2006).

One manager, commenting on the senior manager's approach to gain trust at group meetings, states, 'He tried to gain the trust. I could see he made a great effort but sometimes it took as negative. Because he didn't present everything as a fact. But last time I think he did and he showed a little bit of negative side. Interestingly people thought that last meeting was very good. Because finally the people thought "Oh now we are treated fairly, or equally, because he showed negative side to us also. Not only rosy stuff", (personal communication, November 2009). This is very interesting in that presentation of just good news can be interpreted as 'life cannot be that beautiful' (personal communication, November 2009) and injection of negative elements can actually assist in the facilitation of trust in the senior individual. This may perhaps indicate a facet of the trust element of openness (Spreitzer & Mishra, 1999).

Other US managers offer additional potential solutions to trust-building; 'a big part of trust is any time you see something escalating beyond a professional level, it's got to be put down quickly'. This seems to link quite well with the 'jump in, roll up your sleeves' approach advocated above. 'Trust not only kind of dealing with inter-personal issues. But also to be able

to provide the professional tools that they need. That is very key'. This focus on the tools needed to carry out the allocated work is clearly also a factor to be considered and may relate to the 'following through on commitments' advanced by most managers.

Organisation structure and clear responsibilities having a role in trust-building as suggested by an interviewee, who argues that 'when you bring two groups together, if you don't understand your role and your authority and your accountability, there's going to be conflicts...that doesn't build trust; it does the opposite. So clear-cut chains of command, clear-cut roles and authorities and accountability is key to it all', (personal communication, November 2009). Bijlsma-Frankema (2004) highlights this issue of structural control versus co-operation and trust-building in the post-acquisition context.

Involvement of more staff in the pre-acquisition phase and integration planning is seen by one manager as a way 'to improve trust, we should have had, at least internally, a more integrated team. And I also think that with respect to the integration, we perhaps missed an opportunity to involve more of the workers in the process of the integration and less of the managers', (personal communication, November 2009). This view tends to reinforce the 'loss of trust' stories of the trust card mentioned earlier and may be worth considering as a way to engage more senior staff than just the management team. If this were adopted as a practice it would be a possible way to include key staff and potentially increase or maintain trust levels perhaps making retention of these key staff more likely. This is one of the contentions of this thesis.

Drawing together the different threads of trust-building a manager states that 'you've gotta sort of earn trust and I think trust is something that also takes time, you know. It's like even, look at a relationship, you know. A relationship isn't just, you know, one week, two weeks, three weeks, a month. That's still in the honeymoon stage, you know. It takes years and

years to really truly earn trust'. Another adds 'if you don't have trust of the people working for you, you'll never get trust the other way. It's a two-way street'. Finally a manager sums up the trust progress between data gathering points; 'in terms of the level of trust within the organisation over time. It's gone up and down over time, at times, I think overall I feel more positive about it than what I did, you know, a year ago', (personal communication, November 2009).

Given the fact that trust takes time to be built (Lewicki & Bunker, 1995) there is some evidence that the trust levels have risen at the US case study company but there is also a clear understanding that there is more work to do to bring the staff and managers trust to a uniform level.

There is some evidence that could indicate that trust is one of the factors we should consider if we are concerned about retention of key staff in the future. However, it is likely that trust is only one of several factors that could contribute to retention such as 'habit' and impending retirement as examples. We have explored, albeit briefly at a macro level, management trust, its perceived role, initial levels and post-acquisition development and possible solutions to build trust. Table 7 below provides in summary form the principal responses of the USA and Canadian managers to the semi-structured interview questions. The table also highlights possible similarities or differences after data analysis.

Question	Canadian response summary	USA response summary	Similarity/differences
What are COMPANY's objectives for acquisition?	Growth including new products and capability	Growth with product heritage	Growth in common but US sought heritage in products whilst Canada sought new products with associated capability
How do you feel the integration has progressed to-date?	Good start damaged by remote manager, later recovered by new manager	Good start with significant effort made, 'we still have some way to go'	Canadian seconded manager only successful on third appointment (local commitment)
What methods of communication have been utilised in the integrated organisation?	General meetings, emails, managers talking to their teams	General meetings, email, one-on-ones, news letter, suggestion box, group meetings, lunchtime informal meetings	Broadly similar but more in depth effort with different communication types in USA
How would you describe your experience of participating in the company integration process?	Difficulties with senior manager changes and imposition of headquarters processes and ways of doing business	Broadly positive with exception of two managers who were removed (people leadership and not reflecting the integration needs)	Senior manager issues major difference
What was/will be the process followed?	Change of senior managers made integration process difficult and disjointed. Arrival of third senior manager under acquisition stabilised the situation	Strong focus of management team on integration needs with forward planning and extensive communication effort	Integration planning in USA compared to frequent manager changes in Canada
What measures are in place to monitor the success of the acquisition?	Financial milestones, schedule achievement but not as part of integration plan	Financial performance, schedule adherence, well being of staff as part of an integration plan	Integration measures mainly around financial and schedule milestones. USA had formal integration plan whilst Canada had none
Can you identify any cultural differences between COMPANY and the acquired company?	Fairly even split across senior managers with range of belief between none and some large cultural differences	Awareness of differences, partly due to the proximity of the acquired company	Remoteness and unfamiliarity with acquisition in Canada compared to awareness of acquisition history in USA
How do you plan to ensure the retention of your staff?	Initial care and attention, but lapses due to changes of senior manager	Emphasis on care and attention, working to plan, through to acquisition plus eighteen months	Retention in Canada due to initial care and attention but subsequently at least in part due to contextual employment prospects and 'knowledge worker' commitment. USA due to care and attention plus habit, age, rewards and recognition and personal development opportunities
Describe the involvement of your immediate manager in the integration.	Initial involvement through supportive visits, all hands addresses but generally 'hands off'	Initial involvement through supportive visits, all hands addresses but generally 'hands off'	Very similar in both case studies
What role do you see for trust in the integration process?	Trust 'a big element', 'huge', 'crucial', 'absolutely key'	The most important key to the whole thing', 'paramount', 'implicit in everything you are doing'	Very similar recognition in both case studies of the integral role of trust in integration
What actions have been undertaken in the integration process to build or maintain trust?	Need for actions to match words, 'closing on promises'	Enormous communication effort, consistency and not hiding bad news	Effort put into and level of communication in USA (versus Canada), damaged in Canada by changes in senior manager
Would you say these actions have been effective or ineffective?	Integration effectiveness damaged by senior manager changes, recovered through commitment of third manager and imposition of headquarters processes	Broadly effective but 'some way to go'	USA communications effort and manager stability with plan broadly effective. Canada less so with manager changes.
Can you think of anything else that could have been done to improve trust in your organisation after the acquisition?	Avoiding manager changes and imposition of headquarters processes	Little apart from possibility of use of off-site team building groups	Absence of integration plan and manager changes in Canada affected integration effectiveness versus faster progress in USA based on consistency, communication and planning

Table 7 Summary of manager responses showing similarities and differences

5.3 Trust elements in company integration

The four elements of trust discussed by Mayer et al (1995) and Spreitzer and Mishra (1999) were used as a basis for this work; identified as openness, concern, reliability and competence. The authors argue that these elements form constituent parts of trust and are thus of interest to the author. We shall briefly examine these in turn commencing with competency.

5.3.1 Managers' competence and its role in trust

The first element of trust, as described by Spreitzer and Mishra (1999), is competence. In this case we are defining competence as 'the condition of being capable; ability' (Collins English Dictionary, 2000) of the management team. There are two emergent threads of perceived competence in the data; one concerning the senior manager in the Canadian company and the other concerning the senior manager at the US company.

Considering the Canadian senior manager first one manager states that '(senior manager – author) is a great guy, really great guy actually. Just feels like one of the engineers, and he is one of the engineers originally, so he fits in just fine, everybody is quite happy to work with him. He is very congenial'. The interviewee cites an indication of the positive effect of this competence as 'I don't hear grumbling anymore...you can always tell from the grumble indicator', (personal communication, November 2008).

The US senior manager is subject to observation from two managers; '(Senior manager – author) was very involved in the integration. He was involved not just in the business sense, which you would expect...but also he's a very well qualified engineer and he has a very good

grasp of this hardware, so he was also involved from a technical aspect. He's done a remarkable job of – he's very even tempered. He's very calm' and 'has done an excellent job in terms of communicating not just with his staff but with the whole company in terms of what he expects out of people. What he expects out of the company and is very understanding and willing to work with everybody to make that happen', (personal communication, November 2009). Another manager describes the effects of this perceived competence, in this case publically recognising and rewarding individual achievements which reinforce the required direction of the company, and says that 'mentioning, in the meeting, that someone has really contributed a lot and did a good job...it's a good way to appreciate...they (*the actions of the senior manager* – author) were effective', (personal communication, November 2008).

It is worthy of note that the Canadian senior manager subsequently left the company whilst the US senior manager is still in post to this day.

There is one example of differences in perceived competence leading to a manager leaving the company. One manager was appointed, in the US company, as the Head of Engineering. The senior manager relates that he 'was excellent technically (and) didn't have the administrative skills that we wanted, however I felt that being a second priority, I really wanted technical leadership...earn their respect as a group through your technical leadership rather than your people leadership and then I figured the rest might follow'. He continues, 'that didn't happen and so it turns out that (*manager* – author) had excellent technical knowledge, but not a lot of technical leadership with the group. So it was truly an open circuit...so he is not with us anymore', (personal communication, November 2009). This could be an example where competence needed may need to be carefully defined prior to acquisition or employment of a manager. Potentially just competence in one area, albeit required by the business, may not be

sufficient (as possibly indicated in this example) and further competency, such as people leadership skills, may be needed to successfully lead a technical group. We could possibly link, with this case, lack of retention with lack of competence. This might be seen to imply that if one possesses the required competence, not only could the team not go 'open circuit' but also that retention of the manager might be more likely.

We can see some evidence in the data that would support the management competence being an element of trust in the case of the US senior manager but only indications in the Canadian data.

5.3.2 Managers' concern and its role in trust

We now turn to concern, as the second constituent part of trust (Spreitzer and Mishra, 1999). The data was examined for 'concern' evidence and revealed a number of instances. The presence of concern from the acquiring company in Canada was mentioned by several managers who 'went out of their way to make people here feel at home, I think. As I said I think the most commendable thing they did was have the CEO come down a week or two after the acquisition' and 'it's like we were foster parents that had adopted abused children. And so we needed to show them appreciation, care, nurturing, all these good things', (personal communication, November 2008). Similarly in the US company, managers expressed their perception of concern emanating from the acquiring company; 'He (*senior manager* – author) started out with interviewing everybody and, because we come from different companies, so he had to learn about each and everybody and learn about peoples' expectations and peoples' problems. So I think he did that fairly well. I have seen a lot of people in his office that he was talking to to see

what's going on. So that's again more of a personal aspect right'. Another manager, describing the intent of the acquiring company, emphasizes that 'we really tried to focus as much as we could on a very positive upbeat message about the benefits of the acquisition. That they weren't going to lose anything. That we were going to take care of them. Not like some of the other organisations that had kind of put them in their back pocket and didn't really focus their energies on them'. Another interviewee adds that the intent was to 'put an environment in place where they want to be here. So make them feel part of a family, give them challenging work. Pay them fairly, we are going to celebrate, we are going to have a lot of fun', (personal communication, November 2008). This evidence of concern experienced and intended by the acquiring company leads to a question; what is the effect of this expressed concern and has it had any impact on the staff and managers? There is some, admittedly anecdotal, data that provides an indication that the effort expended on showing concern is not being wasted. One manager reveals 'I'm kind of amazed, there was one co-worker at (*previous company* – author) which I wouldn't say, I didn't think highly of them but he was kind of a, I don't want to use words but I'm positively surprised how this person has excelled here. I think that's part of the positive attitude that this place has you know, that people can finally sort themselves off of all the old burdens and live up to their potential you know', (personal communication, November 2008).

There are, however, a number of instances in the data where lack of concern is evident in the Canadian case study company. These range from general statements such as 'it was nice to be bought by somebody who was interested in us, but then they came in with all the procedures and the rigid work practices and it really wasn't that good an introduction to the company' to criticism of the strategic plan and involvement of key staff; 'you'll be told about it when it's necessary for your involvement, well, we (*key staff* – author) don't think so [laughter]. We all

seem to share the same opinion that we feel that we ought to have been involved from the very beginning, because it is us that generates where we are going', (personal communication, November 2008).

Lack of concern can be found in statements made by managers of the US case study company but are somewhat different in content. Where the Canadian company criticism is based around company strategy the US criticism is focused more on people related issues. One example is a manager who, describing the hesitancy of acquired staff to commit to the new organisation, states that 'they haven't yet bought into the enrolment of what we are trying to do here. As managers it's our job to ensure that they are enrolled. So enrolment is an important fetcher of trust, eventually. But you have got to be real careful because artificial enrolment just comes across as being crass, biennial and not really something that you can trust in itself'. Another manager, talking about his need to express care and concern for his team, reveals that he calls some members of his team 'little birdies with their beaks wide open waiting for somebody to drop a worm in there. I can only drop so many worms a day. I'm trying to help them but at one point they have to be able to be self-propelled. Otherwise they will fail. And that was one of the things I noticed in the integration process is that now that I have to manage people, I have to care for them and it kind of annoys me a little bit if I constantly have to drop worms in their beaks. I'm trying to get them up to speed but it's tough', (personal communication, November 2008).

There is also some evidence for possible negative effects of concern by managers. An interviewee, discussing the CEO's involvement with staff, states that the CEO 'was very sensitive about it. He tried to comfort people in that sense. That was very good. But, at the same time, people realised "Oh they are trying to comfort me. Now I can relax a bit'. Another manager, reflecting on the past history of the US company, says 'we were sensitive to people's

feelings, I think we bent over backwards to try to earn trust and try to motivate, but it's hard to overcome the sort of dysfunctional group dynamics, the organisational pressures they have been under', (personal communication, November 2009).

However, the expression of concern is seen by several interviewees as part of the reason for retention of staff, both in the Canadian and US companies. A Canadian manager describes the senior manager of the company as 'a great guy, really great guy actually. Just feels like one of the engineers and he is one of the engineers originally, so he fits in just fine, everybody is quite happy to work with him. He's very congenial'. Another manager, reflecting on concern and retention, points out that 'all the social, what I mentioned earlier, that is already a kind of a 'make people happy programme', so at least they feel welcome here. You feel like a place that you want to stay'. Lastly one interviewee, outlines the ongoing intention of the management to 'make it the best place they (*acquired staff* – author) have ever worked and then they won't want to leave. And I always know that you come to work and you have a challenging place to work and that you're fairly paid and there's a balance between what you can do outside of work and at work. You have no reason to look around. It's only when one of those three things sort of goes awry then you start looking around and is the grass greener. And it always looks greener', (personal communication, November 2008). This is linking a good work environment to retention.

The final word on concern goes to a US manager, who, discussing the motivation for retention highlights repeatedly negative 'feeling' being a primary issue. 'So how can you keep the staff, that's a very good question. When you ask people it's always money. Money seems to fix everything. But we also learnt it's not always the money. We had people leaving (*previous company* – author) and it wasn't the money, it was other things. It was having the feeling of

being poorly managed, having the feeling of there is no hope, we are going nowhere with this business. Having the feeling the company doesn't take me serious...money is just a short term fix. So what could we do to retain people? One thing is to get them more involved. Show them more that they are a core person. That they are really appreciated. Very important', (personal communication, November 2008). It is the author's contention that trust, and in this case, the element of concern, can be used to build positive feelings of perceived appreciation by the acquiring company staff. We can see from the data that there is some support for concern building trust but, again, there are other contextual issues and factors that affect the trust of the managers' and staff.

5.3.3 Managers' openness and its role in trust

We now examine the openness element of trust, as described by Spreitzer and Mishra (1999). As previously stated, for the purposes of this thesis, we are considering openness and communication to be closely aligned. Examining the Canadian data one manager offers a link between openness and trust as he states that 'once you open yourself up to people...people may react to you differently because all of a sudden they can either empathise with your position or they can see that there's some sincerity in what you're saying. And they start to trust you'. Another manager reinforces the culture of openness that the acquiring company brought, commenting 'right from the start the company seemed to cultivate a certain openness to communicate. Again there was concern about some hidden agenda but it didn't pan out that way, it was again more openness right away with what the objective was and what they would do' and 'they seemed to want to know what's working well and what isn't. You know, what

people's feelings are and things and I think the other thing they did rather well was the, as I said, these frequent meetings in the early times with the CEO right up front', (personal communication, November 2008). The visit of the CEO is picked out by a number of managers as critical and this is also reflected in the US company, 'that won a lot of people over who were on the fence'.

The theme of openness can be seen in strong intent statements from some managers. Firstly, 'you should be open with people and let them know what's going on which I think we did here I mean we told people that we were serious about acquiring this and we were going to build this up and we weren't going to do anything but build this place up and we followed through on that', making clear to staff the strategy of the acquiring company. Secondly, the desire for openness with their teams; 'I believe in open relationships, because they then, they're not working for the company, they're working for me, and I prefer it that way... they do work for the company but the most important relationship they have, day to day, is the one they have with me' and, again linking openness and trust, 'I've developed a really good relationship with people in my group. I think they trust me. They think I – my perception is that they believe that I'm open with them and certainly I believe that they're open with me. They share their concerns with me', (personal communications, November 2008).

One interesting comment from an interviewee relates to trust being self-maintaining in the presence of communication; 'nobody's actively tried to maintain trust in any way, other than communication lines are kept pretty open, and discussions are open, therefore the trust maintains itself' and this is similar to sentiments expressed by a manager at the US company as described above.

A manager brings the openness and communication threads together with the need for trust between different levels of senior managers, managers and staff teams, describing his role in building trust at all levels in the company through communication; 'I believe they're pretty well informed. So that's me trying to maintain trust with my employees, so that they understand and feel comfortable about things. In the same way that I go to my boss and their bosses and I talk to them and they tell me things, and because the communication lines are open, I have an innate sense of trust that just stays there', (personal communication, November 2008).

Considering the US company, the evidence shows a considerable effort at openness in terms of information for acquired staff, especially in the early months, as shown by one manager who outlines what was done; 'Every month we have a communications meeting. There's a lot more access to information in this environment than they've had previously. They kind of have access to all of the management. They have access to our plans and strategies. The CEO has been making an extra effort to have small group and one-on-one meetings. And people walking around and just a higher level of contact with management and staff. So I would say it's been a conscious effort to increase the amount of communications and make people aware of what's going on and continue to be saying the same messages and giving the information. To keep people feeling secure and a part of what's happening'. Another manager links the openness and communication with trust stating the need to have 'someone who conveys a sincerity and honesty and says "Yeah this is really it and I put my trust in the management team and we're behind them and we're going to support them and do that." That really...that was probably the most important element of it', (personal communication, November 2008).

A manager reinforces this view explaining that 'we tried to keep the lines of communication open...trust was a big thing and honesty was a big thing for us...I don't know

that you can over communicate but we certainly strove to make sure there was a large volume of communication. Especially during the first three or four critical crucial months of the integration', (personal communication, November 2008).

If we examine openness and communication we can quickly detect from the data the need for full openness that is disclosure of both good and bad news ('life cannot be that beautiful'). An interviewee advises 'any times you stifle communication the folks in the trenches panic. Probably rightfully so, because they are like, 'you know what, if they are not giving us info. It's probably not good info'. So I always think there has got to be open communication', (personal communication, November 2008). If we are to accept this advice then we should consider what means of communication have been utilised in the US company.

There were a significant number of communication means adopted which ranged from an address from the CEO very soon after acquisition, 'all hands meetings', a newsletter (capturing all principal statements about strategy and integration plans and answers to questions raised), one to one meetings with managers, managers meeting with their staff teams, senior manager 'lunch time chats' with small numbers of staff, managers walking the building talking to staff to creation of an anonymous email address that was for questions people did not feel comfortable raising in the meetings.

On the face of this effort to maximize the openness and communication it might appear that this would be sufficient to assure all the acquired staff. However, this is not to take into account one vital factor, namely, the culture of the acquiring and acquired staff. One manager points out that '*(the acquiring – author) culture (is) very warm, open and accepting very driven, very results orientated, yet supportive and willing to encourage people to succeed...which is a very different culture from where they (the acquired company – author) have come from*'. This

hint is then expanded upon by the same manager who states that 'I think one of the key aspects of our culture, which I think is a bit of a struggle, is the concept of open communication in addressing issues. I think something that was pretty common within this group...was this idea of withholding to your advantage and working on answers based on that and creating a second network for gain', (personal communication, November 2008). So the concept of too much openness potentially causing an issue is raised and there is one reference to this revealed by a manager, talking about a colleague on the management team. 'That manager knows what to do, and how to do their job, is straight-forward, says how it is, and also is a nice person. But because they just put the information right out there, people were taking it as too direct and didn't understand where that person was coming from. You have to watch those things', (personal communication, November 2008). We perhaps need caution, as suggested, and a clear understanding of the contextual nature of the acquired as well as the existing staff.

Other problems concerning openness were highlighted at the second data gathering interviews. An interviewee, citing communication about organizational changes, states that 'we continue to use all the hands as really the key, the key way to communicate staff of the organisation, changes where I think we have not done well particularly in the last year...we've just taken this huge amount of work into our facility, more work than the former (*company* – author) has ever had in their factory at any given time, we have resorted to shuffling deck chairs'. Another manager adds 'I think that tapered off quite a bit. Today we don't have a newsletter, which I'm trying to resurrect, because I think we need one. I think, today, we are not doing as good a job communicating with the workforce as we should, as a management team'. Further criticism is provided by one individual who, speaking about the small team meetings states that the 'one-on-one with a small group...personally I've never seen those really work because

there's always one fellow who talks a lot and other people are quiet and they can be rolling in their seats. So I think to really get good communication going would be the improvement', (personal communication, November 2009). It would seem that getting the balance of communication and openness is challenging; this is borne out by a manager who lists the many communication methods used and then adds 'the more you peel back, the more you find. Just when you think – at 18 months (*post acquisition* – author) you'd think we wouldn't be finding new surprises and yet I just got out of a meeting finding new surprises, so. Still very – still awkward', (personal communication, November 2009). It would appear that the level of communication and openness required is still very high in this company to continue to keep a high level of trust between the different layers of the organisation.

Another note of interest on openness is, once more evidence for the link with retention. 'From the lessons learnt in the past, keep everything under a shroud of secrecy, you may pay the price. You may pay the price with people being insecure looking for other venues to go or just a general understanding but it's an at will appointment', says one manager (personal communication, November 2008). Here we see the dilemma of briefing the staff as fully as possible, whilst remaining within any local laws regarding dissemination of information about a publicly traded company. Perhaps a more realistic approach in this case would be to brief the key staff prior to, and the entire staff immediately following, the acquisition to prevent insecurity leading to vital employees leaving.

Lastly, encapsulating this discussion of the role of openness, when pressed for the main action undertaken to maintain and build integration trust an interviewee summarised the action needed as 'just openness. Anyone can ask a question. Communicate; put the facts on the table...all that instils trust', (personal communication, November 2008).

We can see from the data that there are some indications that openness does indeed appear to be a contributor in the building of trust. Of interest is the need for balance of openness between disclosure of both positive and negative aspects of the business or department and complete openness which, in certain contexts (unused to this approach) may be counter-productive.

5.3.4 Managers' reliability and its role in trust

The final element of trust as defined by Spreitzer and Mishra (1999) is reliability.

Reliability in this context is the perceived reliability of the trustee. Whilst careful analysis of the data does not reveal any direct mention of 'reliability' in this context there are a number of references to consistency (which can be defined as conformity to previous attitudes, behaviour or practice – Collins English Dictionary, 2000). This consistency does yield some results from the data.

Firstly, looking for expressions of reliability we find a number of managers, particularly in the US company, who describe the desire for consistency as a model behaviour. One manager, talking about the CEO who visited the new acquisition shortly after closure, states that the CEO 'continued after that to be consistent and show the commitment and so that's been a really critical thing to have...someone who conveys a sincerity and honesty and says "Yeah, this is really it, and I put my trust in the management'. Another manager, discussing the efforts to build trust, hints at reliability (consistency) as an element; 'Once you realise that there is a give and take relationship required and once that is established and proven and continued you do it more than once and then the next time...that's when a trusting relationship starts to develop'. Another interviewee reinforces the need for consistency by stating '(CEO – author) is consistent and the

management team is pretty much consistent on the message that these are our expectations. And I think that consistency in the early phases of an organisation is as important...because people want to come to work and have, even if they don't like it, they want to be consistent...and I think that it all contributes to trust as you go along', (personal communication, November 2008). This view of the need for management consistency and its link to trust is underlined by one manager, who, commenting on management efforts, mentions the perceived effect of the consistency on the staff; 'we have been very consistent and had a very measured hand in how we approach dealing with people issues, dealing with business issues, sharing communication, treating people with respect, and trying to communicate expectations and I think people see that...taking a very consistent measured approach and communicating about it and when people see you doing what you said you were going to do...(you) gain their trust', (personal communication, November 2009).

There are some detected issues, however, concerning reliability and trust. An interviewee revealed that 'I think there has to be, at one point there is trust, but then after you get into it this far (*eighteen months* – author) there's, like, reality...we tried to put a very, have a positive attitude, and give people individual responsibility to do what they are supposed to do, and I think the problems that we are dealing with now are people are not able, are either unable to step up, or haven't stepped up, and aren't performing at the level of expectation, so it's not a matter of trust, it's just a matter of dealing with performance not living up to expectations', (personal communication, November 2009). This is interesting in that the manager seems to imply that trust is a separate issue to performance (or in this case, non-performance). It would seem that the interviewee regards trust, possibly, as an initial requirement but in the longer term does not see trust as an ongoing need, and is more concerned with 'reality', in this case the performance of the

staff. This view is challenged by another manager who, as mentioned above, states that it takes ‘a long time to develop trust in an organisation. You’ve got to keep it up, there’s a maintenance factor too. It isn’t just a onetime thing and you walk away and it’s there forever. Plant the seed and you’ve got to water it every day’, (personal communication, November 2009).

Finally, we examined the data to see if there was a link between reliability, as an element of trust, and retention. There is a reference provided by one manager, who states that ‘something that was very critical in terms of trying to build trust answer peoples questions forthright and make sure you repeat that message enough. 7 times, 8 times that people will begin to believe what it is that you are saying. And you have to match your words and your actions. And we have really tried to do that’, (personal communication, November 2008). Here, the interviewee appears to believe that consistency of responses will build trust but does not mention retention. Another interviewee points out that ‘if we can keep the retention they (*staff* – author) will see what we are up to is for the good of the company as we build a company that is fun and good to work for and I think they will be able to see that trust’, (personal communication, November 2008). This manager reverses the trust leading to retention link, postulating that if the staff can be retained this will, in effect allow the actions of the management team in creating a ‘fun’ company over time to increase the trust of the staff in the company. This data potentially highlights the importance of trust-building based on perceived reliability of the management team and the company but does not offer any direct links between reliability and retention, although it is not too far a leap to conjecture that reliability is an element of trust and trust can be linked to retention as shown in this chapter.

We can see from the data that there is some circumstantial evidence of reliability building trust and links to consistency. However, the support from the data is not strong and thus it is difficult to be certain about the effects of reliability on trust-building in the two divisions

5.4 Trust as a factor in retention

In line with the aims of this research we also examined the data for any evidence of links between trust and retention.

Analysis of the US longitudinal data revealed that, of 86 staff sampled, only 3 were not retained and no managers left between the sample points of November 2008 and November 2009. In the Canadian case study company only a single data capture was made in November 2008 due to the extended time since acquisition and the advanced state of the integration. There were both management and staff leavers prior to this measurement but access to these records was not made available to the researcher. Thus the research must rely on the primary data gathered in 2008 and 2009 for evidence.

Looking at both the acquired companies it became clear that the acquired elements had a history of difficulties with their parent companies. In the case of the Canadian company it had been sold several times and had become vulnerable to sale with its previous owners who then sold the unit to the acquiring company. The staff numbers had, at the time of the acquisition, reduced to only twenty-six. Some explanation for this reduction can be found in the data where one manager stated 'we were happy to leave E, very happy. We wanted nothing to do with them, they didn't want us around. And the morale in the remaining M office is abysmal, those people... It's like a mausoleum, and it's just horrible. And I've visited a couple of times now and I can't believe it. I'm just so happy' (personal communication, November 2008). Another manager related that 'the history of these guys.....is they've had quite a rocky road, they've always kind of been the sort of group that's stuck off to the side. I mean when E had them they kind of went through a lot of General Managers, I forget, I mean they'll tell you the numbers of General

Managers that they've had but they've never really been, I don't think, looked after and felt that they were an important part of an organization' (personal communication, November 2008). This background then raised concerns in the author's mind as to the likelihood of retention of the acquired employees. Subsequent analysis of the data, however, revealed some unknown and unexpected factors that limited the loss of staff and assisted retention in the Canadian company. The acquisition was completed and some initial staff were lost, 'We lost a few, a few right up front. We lost one very senior person as I think he was butting heads with management and not only above him but even his peers alike. We lost some of the people who didn't quite fit, you know, didn't quite have a home and those are the multidisciplinary people (personal communication, November 2008). However, after the initial leavers the situation stabilized and this appears to be primarily due to two factors: firstly, due to the initial care and attention to the integration process by the acquiring company based around trust-building which strongly contrasted with the selling company and secondly, due to the employment prospects. The first factor that appeared to have contributed to retention was the initial care and attention paid to the integration by the acquiring company. 'By and large I think C went out of their way to make people here feel at home, I think. As I said I think the most commendable thing they did was have the CEO come down a week or two after the acquisition and just by doing an all hands meeting where he gave his view of their world and his view of the behind the acquisition process and his vision for the future and fielded a few questions and the like. That gave everybody a big, warm, fuzzy you know it wasn't authoritarian....so people might have had their foot out of the door then pulled it back in again so that was good I think, in terms of ensuring retention and they also gave us that indication that they wanted it, they wanted retention and it makes a lot of sense, you know, in retrospect because why buy us' (personal communication, November 2008).

Another interviewee gave a possible reason for this effort on the part of the acquiring company; 'when you buy something, I don't care what it is, you can buy yourself a bicycle, you can buy yourself a car, at least at the beginning you treat it well, 'cause you like it. You went out and paid money for it, you're going to treat it nicely, unless you start to completely screw things up and the relationship can change. Staff retention was no longer the same issue', (personal communication, November 2008). This view is reinforced by another manager who states, speaking about the acquiring company, that 'they made the whole process very congenial to ensure its staff be retained' and 'they did a commendable job to make people feel comfortable after the acquisition' (personal communication, November 2008). It appears that the retention of staff could be linked to 'congenial' behaviour on the part of the acquiring company. It is interesting to question what constitutes this behaviour from the viewpoint of the managers in the acquired Canadian company.

The second element is the contextual issue of employment prospects. Occupying a particular niche in the high-tech industry the staff has a limited number of companies they can work in if they want to remain focused in their key skill area. If we accept the definition provided by Reed (1996) and Tam, Korczynski and Frenkel (2002) of knowledge workers as those staff processing information, problem solving and producing knowledge then the specialist engineering staff located at both case study companies can be considered, in the main, as knowledge workers. Given the age profile of the staff being mainly in the 40 to 49 and 50 to 59 year groups and the team identity it is likely that this assisted retention. A manager stated, 'we were a very tight group beforehand and there is a limited number of places that we could go and it all involved moving cities, and one of the big things was everybody has kids of about teenager age and nobody wanted to be the first one to move to another city'. Later, the same manager

added that 'I only stayed because I've got teenage kids who didn't want to move schools and there is nowhere else I can do this, I like my work, I think it is important, I feel I am making a contribution to society, and given the pain of moving you know, okay I'll accept the pain of dealing with this horrible organisation (*referring to the selling organisation - author*) rather than move and that was really it, I just stayed because I like the job, it's something I feel I'm making a contribution out of, that I couldn't do anywhere else easily, certainly not without moving cities or potentially without moving country' (personal communication, November 2008).

The reference to a 'tight team' is reflected by another manager who claims that 'only one guy actually left, and he only just left in the last few months, and he just wanted to do something different, and you know what? Once he told me that I realised, yeah, I can see that you did want to do that. But, you know, I'm still in regular contact with him, I consider him a friend, and he's kind of like, 'yeah, I miss the guys', so he'd come back. So that is a form of retention...we have a pretty good background in keeping a good relationship with our employees, and that they want to stay' (personal communication, November 2008). Benson and Brown (2007), writing about knowledge workers, found that these staff had a significantly higher attitudinal commitment and a lower intention to quit than routine task workers. A positive relationship to co-workers and high mutual commitment teams were also a factor in retention and evidence of team impact and co-workers can be seen in the comments of the interviewees above. However, the authors did reflect that other factors such as the external labour market (alluded to by one interviewee above) and the prestige of the work undertaken also influenced the staff's intention to quit.

This 'friendship' aspect is not reflected by all the managers, however, with one manager, talking about his own staff team, stating that 'I don't have a retention plan. If they left I'd

recover. It's not a critical, irreplaceable skill' (personal communication, November 2008).

Whilst this is an opposing view to the previous manager it was not a prevalent view amongst the rest of the management team at the Canadian company and reflects the somewhat less niche skilled team the manager is responsible for; perhaps the 'routine workers' as highlighted by Pava (1983).

The General Manager role particularly merited attention due to the record of poor retention not only under the previous company's ownership ('we went through a man in the corner, a person in M's position every nine to twelve months' (personal communication, November 2008)) but also, subsequently, under the newly acquired regime. The newly acquired company was managed by P, as general manager. P was appointed, having led the due diligence acquisition team for the parent company. He had experience of running small companies and was deployed to Canada from his home location in Wisconsin, US to study potential Canadian company strategy. He subsequently volunteered to run the acquired company as General Manager. He was interviewed by the executive management team, one of whom had reservations that 'P was more of a CEO than a General Manager and was too far away from the day to day' (personal communication, February 2009). However, despite these reservations, he was duly appointed in late 2005. Reflecting on his role one manager commented that 'we were very sceptical about what we heard, particularly from P, and he proved to be just like the others, you know, he came in, promised a lot, did nothing and inflicted in a very non-understanding way processes and procedures that didn't work, and just proceeded to get upset when we pointed out this doesn't work' (personal communication, November 2008). P subsequently left the company after just 15 months. In a follow-up interview (April, 2008) P indicated that within 12 months of the acquisition there was a 'large gap' between himself and the parent company management in

terms of understanding how the new company should be run. The research has uncovered some evidence for this breakdown of relationship. According to P, when he raised issues regarding the integration he was advised to 'stop whining and do it yourself' (*referring to resolving integration issues*) in a personal communication (April 2008). A manager observed that, 'I think we started out rocky because basically my perception was we didn't really have a plan initially and, as I say, we brought in P to run the place and for whatever reason P wasn't here that long' and another first line manager revealed the doubts about the likelihood of retention in that 'he was living in Wisconsin and we thought well this is non-tenable, you know. We've had so many managers who've lived in M and come down during the week for 2 or 3 days and here was another one doing a 4 day week, doing the same thing.... so we had no trust that he was here for the long haul' (personal communication, November 2008). This lack of management retention in an individual deployed to the new role is interesting in that the financial and operational aspects of the first year of operation were good with half of the purchase cost repaid to the parent company and a sizeable contract awarded all within the first twelve months. In other words, by some measures, the acquisition could be considered highly successful at this twelve month point. P left the company citing instability in his family. One senior manager, mentioned by P, 'wondered if P was an impediment to the integration process and would it go faster if he was not there' (personal communication, April 2008).

A temporary manager, R, was appointed from head office as an interim whilst a suitable candidate was found. The interim manager came into a somewhat sceptical view of post-holders as reflected by one first line manager who said that, 'when he (*R*) came in... we had no reason to trust them because they had no ownership of the issue, they weren't here, and it was clear to us that they weren't here any more permanently than the guys from the previous company and they

had no ownership of making a nice environment or doing anything to help us. They were here to inflict whatever they had been told to inflict from head office' (personal communication, November 2008). The first General Manager, who left cited family issues, but it is possible that other factors were contributors to the decision to leave such as those highlighted by Lee & Mitchell (1994). These include loss of job satisfaction and precipitating events in the working and family life of the individual; so-called 'shocks'.

By late summer 2008 a third General Manager was appointed by the parent company and the reaction to this appointment is noteworthy. One manager reflected that 'she's moved her family here, she's bought a house, or built a house, and gives the appearance that she wants to work with the group, to grow the group and be part of the group and she has transferred to here, now that allows us to trust her much more, because she has clearly come to be on this side of the fence'. Another manager says 'I think people trust M a lot more than we could ever trust the previous incumbents' (personal communication, November 2008). The fact that this third General Manager is still in post as of July 2010 provides some circumstantial evidence of a greater level of functionality and integration between the two companies and may indicate that the commitment to relocate from head office to 'this side of the fence' has gained the trust and commitment of the acquired staff by showing her own commitment ('she lives here now and so she wants this place to succeed', personal communication, November 2008).

In summary of the Canadian acquisition, then, it seems that apart from the initial leavers from the staff side the major issue has been the instability of tenure of the General Manager role and this would appear to have stabilized, at least in part, through the visible 'commitment' (Mayer et al, 1995) of physical relocation to the acquired site which has built trust levels.

Turning to the issue of retention in the US company we had two separate sets of data acquired one year apart (November 2008 and November 2009). We started with the examination of the US company data from November 2008 which was some six months after closure of the acquisition. At this stage there was recognition of the importance of retention of staff by the interviewees. One manager comments that 'retention is critical. I think what happens is any time there's a change, there is always going to be a panic period. Especially if you are the acquired. When you are the acquired, your first human reaction is 'ok, what does that mean for me?' (personal communication, November 2008). Another manager adds 'the people being purchased... thought that they were going to be laid off after being purchased. Not all of them but about 50% of the people expected to see lay off. They thought that the reason for the purchase was to get heritage only not employees. That means to some extent they had (a) lack of confidence' (personal communication, November 2008). Here we see some evidence of the acquisition causing the employees 'shock' which could precipitate staff leaving (Lee & Mitchell, 1994). Examining the pre-acquisition phase news had filtered out to the employees that a sale was in progress. Several managers indicated that the uncertainty created by the impending sale was exaggerated by the lack of visibility of what was being planned. They disliked 'being powerless and having no say so in the entire situation', 'I have no say so in my personal future. So if this ship goes down I go down with it there is nothing I can do so I get really nervous' and 'there are issues in terms of disclosing information before the sale is announced. But from the lessons learnt in the past, keep everything under a shroud of secrecy you may pay the price. You may pay the price with people being insecure looking for other venues to go' (personal communications, November 2008). There was clear recognition of the issue of disclosing too much information before completion of the sale but this was counterbalanced by the 'lessons of

the past' where key staff leave as a result of the uncertainty and feeling of 'powerlessness'. This was a reality in this case study as, according to one manager, 'that's why everybody is so concerned about an acquisition. Again, since layoffs are possible, you want to be able to get out when there is still time to get out' indicating an intention to leave. A second manager explained that 'that's the reason good ones left. People were aware that once they had (been) purchased they're somehow recognised as a kind of law. People call you second-class citizens or something. So they knew it so they jumped off the boat before being purchased. So they lost a lot of technical and skilled people'. A third manager reinforced the evidence for pre-closing leavers stating that 'people who knew told me that several key guys left' (personal communication, November 2008). This is interesting evidence that potentially augments Krug's work (2003) in that it suggests that as well as a *post-acquisition leaving peak* there may also be a *pre-acquisition peak* once the news of the impending acquisition reaches the staff of the 'to be acquired' company.

Whilst Krug (2003) examined executive turnover it is open to debate as to whether our somewhat broader definition of 'key staff' would follow a similar turnover. However, there is some evidence that the uncertainty caused by an acquisition (see references above) causes instability to such a level that key staff then leave either before or after the acquisition.

Uncertainty still would appear to exist six months post-acquisition, for the US managers, which is also consistent with Krug's (2003) findings. A manager stated that 'there are no guarantees. Someone on the acquired team may have a lot of knowledge. And when push comes to shove, you are still there to make money. And if now the company can't absorb that size staff then it's the nature of the business' (personal communication, November 2008). This is an interesting view in that the manager is implying that the acquired number of staff could face some reduction

in numbers due to the capacity of the business and this could well be one of the contexts that introduce uncertainty on the staff's part during the acquisition and immediately post-acquisition. The same manager also underlined this point by commenting that 'you still got your job *as far as you know*' (italics added by author). This could also be surmised to have some possible connection to the 'secrecy' comments above and is an indicator of uncertainty. A further indicator of uncertainty on the part of the US acquired managers can be seen in the observation of another manager that 'I think truth and honesty is very important. Retention is still an issue so we have to wait for the performance review period to start to see what kind of impression we really left with the (*acquiring company*) management' (personal communication, November 2008). Here we again see reference to truth and honesty (that could be considered as 'openness' - which is explored earlier in this chapter) being linked to retention.

The US company was visited again one calendar year later, in November 2009, to assess any potential changes in retention and trust levels. A further round of interviews with the same managers was conducted at this point now some 18 months after the acquisition was completed. One of the principal themes to emerge from this longitudinal data was some possible explanations for staff retention. This was of interest given the location of the US company in a geographic area that contains many competitors with similar needs to the case study company for skills and capabilities.

The first reason for retention was suggested by a manager who stated that 'I think there are still some folks who are closer to retirement, they don't care and they're biding their time and no matter what you do I don't think they're necessarily going to buy in to what we're doing' (personal communication, November 2009). Here, impending retirement could be interpreted as a reason for 'biding time' and although the individuals may not 'buy in' to the company's

strategic direction, nonetheless they were likely to remain due to the excellent retirement package transferred from the previous company to the new company. 'It's hard to find folks that jump ship a lot especially if they are just fattening up their retirement fund to retire' pointed out another manager (personal communication, November 2009). This is supported by Morrow (1993) who lists age as a factor in organisational commitment. Organisational commitment includes as an integral element the desire to stay with the company (Porter, Steers, Mowday & Boulian, 1974). Thus a key staff member's age could be a determinant of retention likelihood.

The second reason for retention was suggested by another interviewee who stated that 'the rewards and the recognition and the awareness of the staff and the contribution that the staff is making is going to do a good job in the retention side. So I am not worried about retention right now' (personal communication, November 2009). This seemed to indicate that management efforts based on communication (openness – Spreitzer & Mishra, 1999) and reward with the associated response to these efforts by the staff were seen as indicators of likely retention. The aspect of communication and the associated trust levels are explored earlier in this chapter.

A third possible reason for retention is advanced by another manager who argues that 'we had someone jump ship very quickly but it was only one. And the retention of the rest, I don't know if it's because they're happy or it's just again the kind of big company thing; nobody normally leaves. It's just habit', (personal communication, November 2009). This suggests that, even given the large number of competitors close to the US case study company, that inertia and the comfort of routine ('habit') may possibly play a part in retention, even in a period of change initiated by an acquisition. This is supported to some extent by Brewer & Hensher, (1998), who argue that organisational commitment increases the willingness to accept change. Here change is significant in light of the acquisition. Given the fact that this data is now 18 months removed

from the acquisition it may be suggestive that the commitment and trust felt by the key staff are such that retention is more likely.

The fourth possible reason for retention is new opportunities for staff development. 'We're small. We're growing. There's lots of opportunities to try something different or specialise in areas as we get larger. Those kinda things. And so we, also, for some of us, that works as a big incentive on, you know, staying', (personal communication, November 2009), states one interviewee. Personal development (either in technical specialisation or career development in a different direction or role) is of interest, seemingly, to at least some staff and this could be considered as an option to explore with staff to assist with retention. Again this would seem to reflect the work of Robinson, Sparrow, Clegg and Birdi (2005) in terms of key staff having a development path for increasing knowledge; a 'big incentive'.

Finally, it is pertinent to cover one management team leaver that slipped through the data points in the US company. G was appointed within one week of the initial interviews in November 2008 and was deemed to be too new by the senior management to be included at that time. Limited references were made to G 'doing a great job' at this point. During the second data gathering exercise it became obvious that G was no longer with the company. The interviewer, attempting to discover the reason, was informed by the senior manager (G's immediate reporting level) that 'G had excellent technical knowledge, but not a lot of technical leadership with the group. So it truly was an open circuit. When I would talk to G about trying to do A, B and C with the group it wasn't getting into the group and so the group was not gelling. In fact they were scattering and so they were becoming more chaotic and it was starting to affect programmes and things like that. So G and I agreed maybe it wasn't the right fit, so he is not with us anymore. So we are looking now for another engineering leader which are the hardest people to find, a

technical leader and a people leader in the same body', (personal communication, November 2009). Whilst citing technical leadership as being lacking in the individual the senior manager refers to the need for a technical and a people leader in the role. This is perhaps suggestive that not only the technical issues arose but that there were 'people issues' evidenced by the group 'not gelling' and becoming 'more chaotic'. There might be a suggestion, in this case, that the individual was recruited on the basis of technical knowledge with attention to the needed people skills either not accounted for in the interview process or, more simply, mistaken. There is evidence here of the competence element of trust (Mayer et al, 1995) – 'excellent technical knowledge' - but a lack of reliability (from the senior managers viewpoint) and openness (from G to the staff) leading to 'scattering' and 'chaos' with a deterioration of trust between the senior manager and G.

Comparing the two case study companies with regard to retention it would appear that there were a number of factors, amongst them trust, which contributed to staff remaining with the acquired companies in the face of significant change. One final quote is useful in summarising the position on retention and trust – 'you can get people to buy into your idea if they trust you then they will, if they don't then you're going to lose them', (personal communication, November 2009).

5.5 Discussion

The chapter has considered, firstly, the research stages undertaken together with the coding of the gathered qualitative data. Secondly, aspects of the managers' trust was examined for each company. We have found the perceived importance of trust in both Canada and the USA

by the managers was high. We have also noted the openness of the managers to trust in the acquiring organisation immediately post-acquisition. The importance of words matching actions emerged in the post-acquisition integration at both case study companies. The Canadian organisation offered important data concerning the integration trust breakdown and subsequent rebuilding of trust following the level of commitment shown by the newly appointed manager. Examination of the USA data revealed a lack of trust immediately pre-acquisition that was surprising and worthy of further investigation outside of the bounds of this thesis. The USA data also revealed that openness was perhaps the most critical element in trust building. Finally, we have explored the evidence in the data for trust being an element in retention. Interestingly here we have found that there are other factors such as habit, age, development potential and rewards and recognition as well as availability of similar work nearby. The aspect of knowledge workers having a higher level of commitment leading to retention was suggested in the USA data.

Having reported our qualitative findings we now turn to the quantitative data and findings involving managers' trust in staff and staff trust in management.

Chapter 6 Quantitative findings

6.1 Introduction

This chapter addresses the quantitative research findings based on data gathered from the two quantitative surveys outlined in the methodology chapter (see also exhibits in Appendix B). Normality and data integrity are addressed, followed by a section concerning the factor analysis performed. Continuing, a brief consideration of the multilevel analysis exploration carried out is described, followed by the analysis of the trust elements of openness and disclosure and reliability and reliance. Analysis of retention findings and a broad discussion of the overall quantitative results close out the chapter.

As mentioned in Chapter 4 a multi-strategy research approach was proposed in order to bring the relative strengths of both qualitative and quantitative approaches to the research aim. This strategy was chosen to ensure that the strengths of both qualitative and quantitative approaches were utilised (Burke Johnson & Onwuegbuzie, 2004) to maximize the possibility of achieving the aim of the research namely, to explore aspects of trust, its definition, development and role in the post-acquisition integration context of the high-tech electronics area and to determine whether trust was one of the factors which influenced key staff to remain with the acquired company in two different geographic locations. In the second part, the aim was to assuage the demand from the sponsoring company for 'scientific' results, which, according to the sponsors, should consist of the statistical mathematical analysis which could be presented in graphical and numerate forms (see also Bryman & Bell, 2003, p.493).

6.2 Normality and data integrity

The staff and management measured data was examined through use of the SPSS™ toolset and visually, both for normality and data integrity.

There were a total of 196 respondents recorded across both divisions. The data collected was carefully checked and no missing (or out of family) results were noted, with the exception of two staff who opted out of the survey and thus did not complete 'acquired' or 'not acquired' information, leaving 194 respondents. The categorical variables ranged from gender, whether manager or staff, what company (choice of two), whether a double measure was included (one company was measured once and the other measured twice, separated by 12 months), whether the measure was at time T1 or T2, whether the respondent was 'acquired' or not or, and, finally, whether the respondent was a new starter or not (this particularly referring to the multi-measured company where individuals joined in-between measurement time T1 and T2). Gender sample revealed approximately 75% of staff were male and 25% female. 16% of staff were from the smaller Canadian division and 84% from the larger US division. 83% of respondents were staff and 17% managers (a total of 21 across the two divisions). Of those measured, 58% were measured twice and 42% only once (in some cases due to lack of completion of measures, other cases as they were new starters between T1 and T2 (24%), and others due to leaving the company (a total of 1.5% leavers)). Finally, age (recorded using a Likert scale to represent age banding (e.g. 20-29 = 1, 30-39 = 2 etc.) was checked and 194 valid responses were recorded. No out of scale responses (outliers) were noted for any of the above variables.

Examination of the data revealed normal distribution for staff trust in management and management trust in staff. This was checked through examination of histograms, kurtosis and

skewness values. Examining the staff data revealed broadly normal distributions for each survey question with skewness and kurtosis close to zero. A typical example is shown below in Figure 16 with a skewness of $-.135$ and a kurtosis of $-.305$.

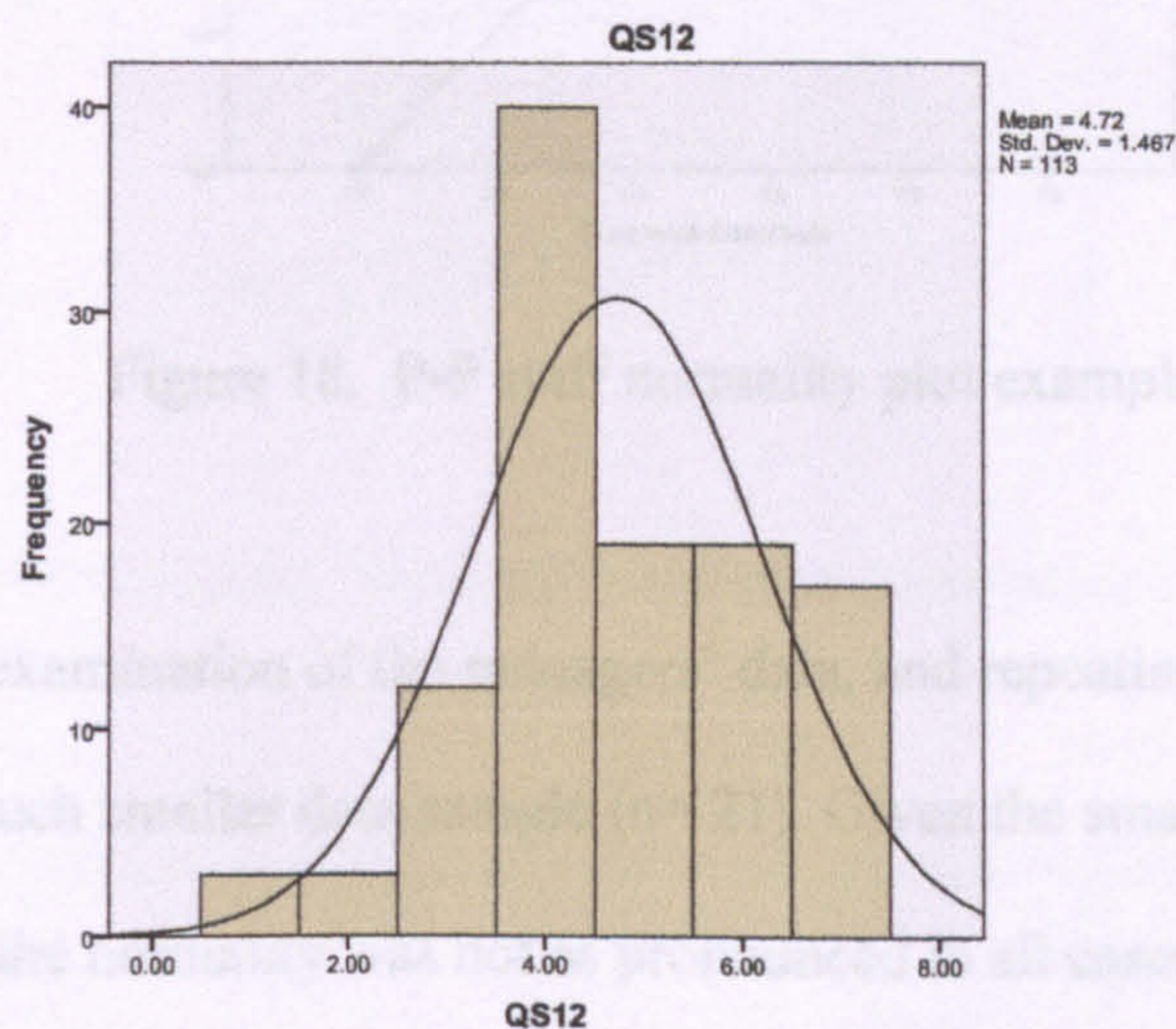


Figure 17. Normal distribution example of staff data (n=113)

A range of kurtosis results were seen at a worst case of -1.16 with the majority around -0.6 . The skewness ranged from a worst case of -0.27 with the majority around zero. The normality of the staff distribution is not altogether surprising as, according to Field (2009, p. 134), larger data samples tend towards normality and in the case of the staff survey data $n=113$ in this case.

Probability-probability plots were also examined to check for normality and one example is shown below in Figure 18.

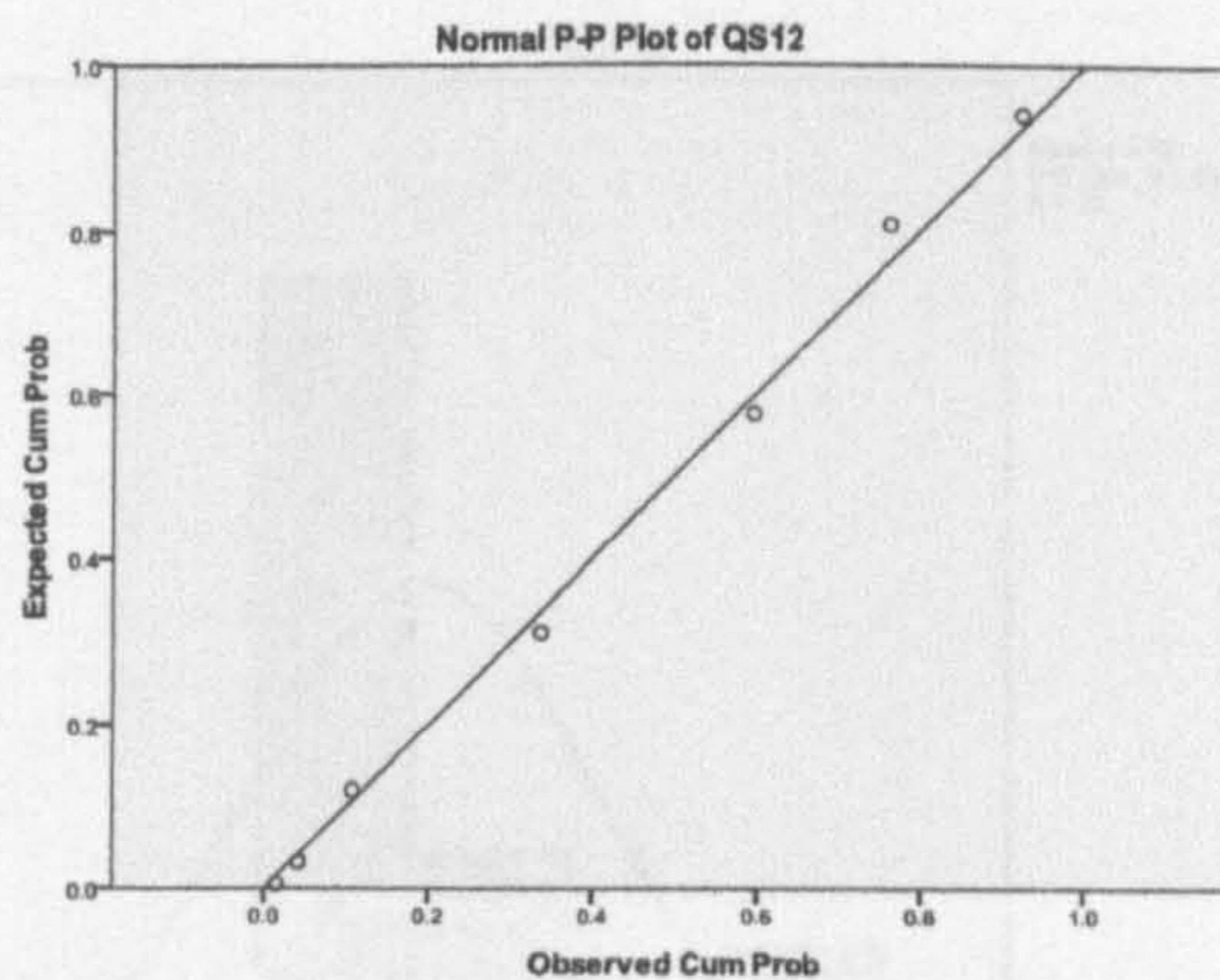


Figure 18. P-P staff normality plot example

Turning to an examination of the managers' data, and repeating the normality checks, we were dealing with a much smaller data sample ($n=21$). Given the small sample size it was not surprising to find that the normality was not as pronounced in all cases (Field, 2009, p.134) as the staff data and the histograms bore this out with a wider variation around the normal distribution.

A typical example of skewness was 0.129 with a kurtosis of -0.661. The skewness had a worst case value of +1.197 with the majority scattered around zero. A positive skewness value indicates, as seen in the example below in Figure 19, values towards the left hand side of the distribution, possibly indicating larger numbers of managers who are at least nominal in opinion concerning the particular question posed.

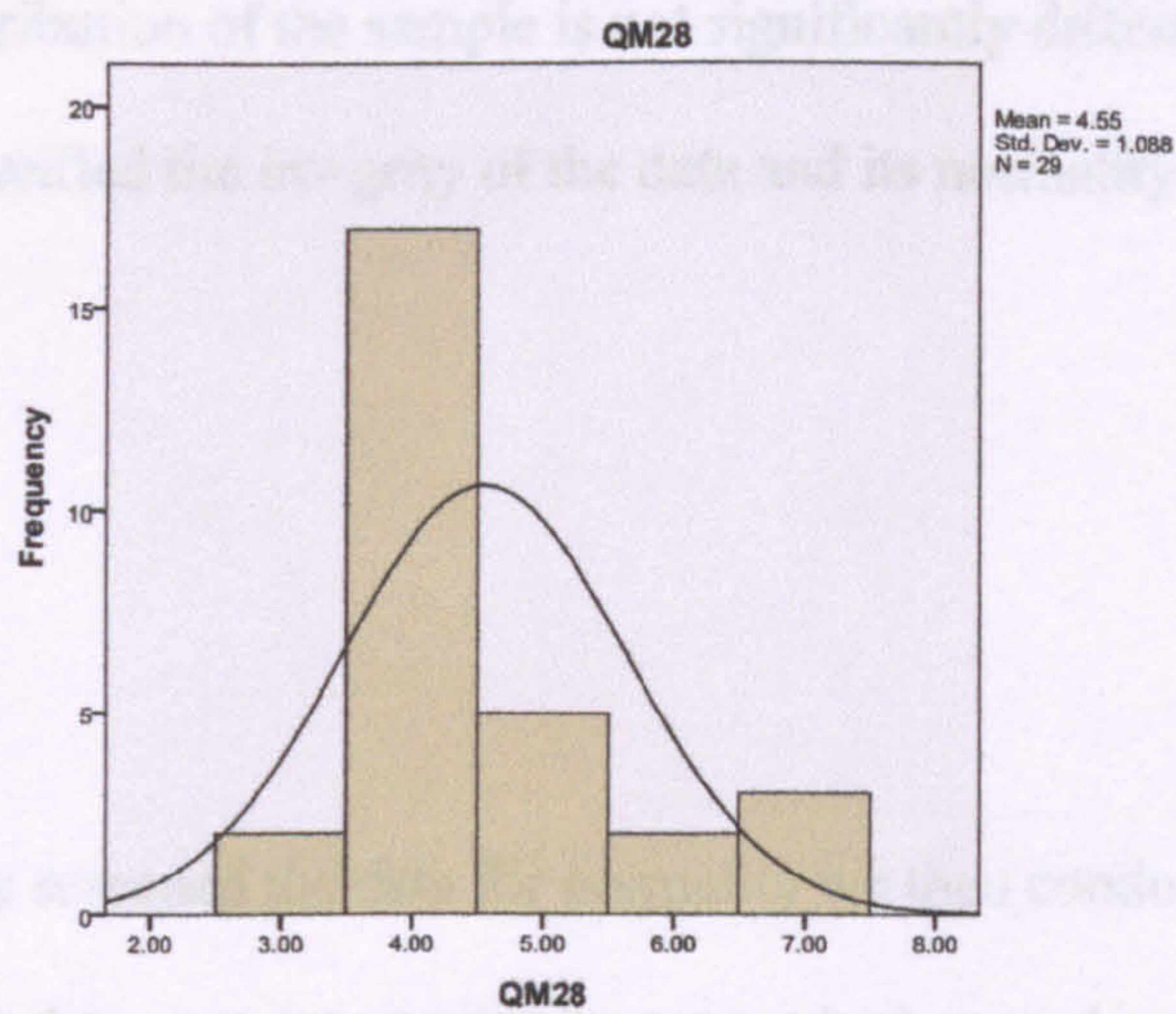


Figure 19. Normal distribution example of manager data (n=26)

Probability-probability plots were also examined to check for normality as shown below in Figure 20.

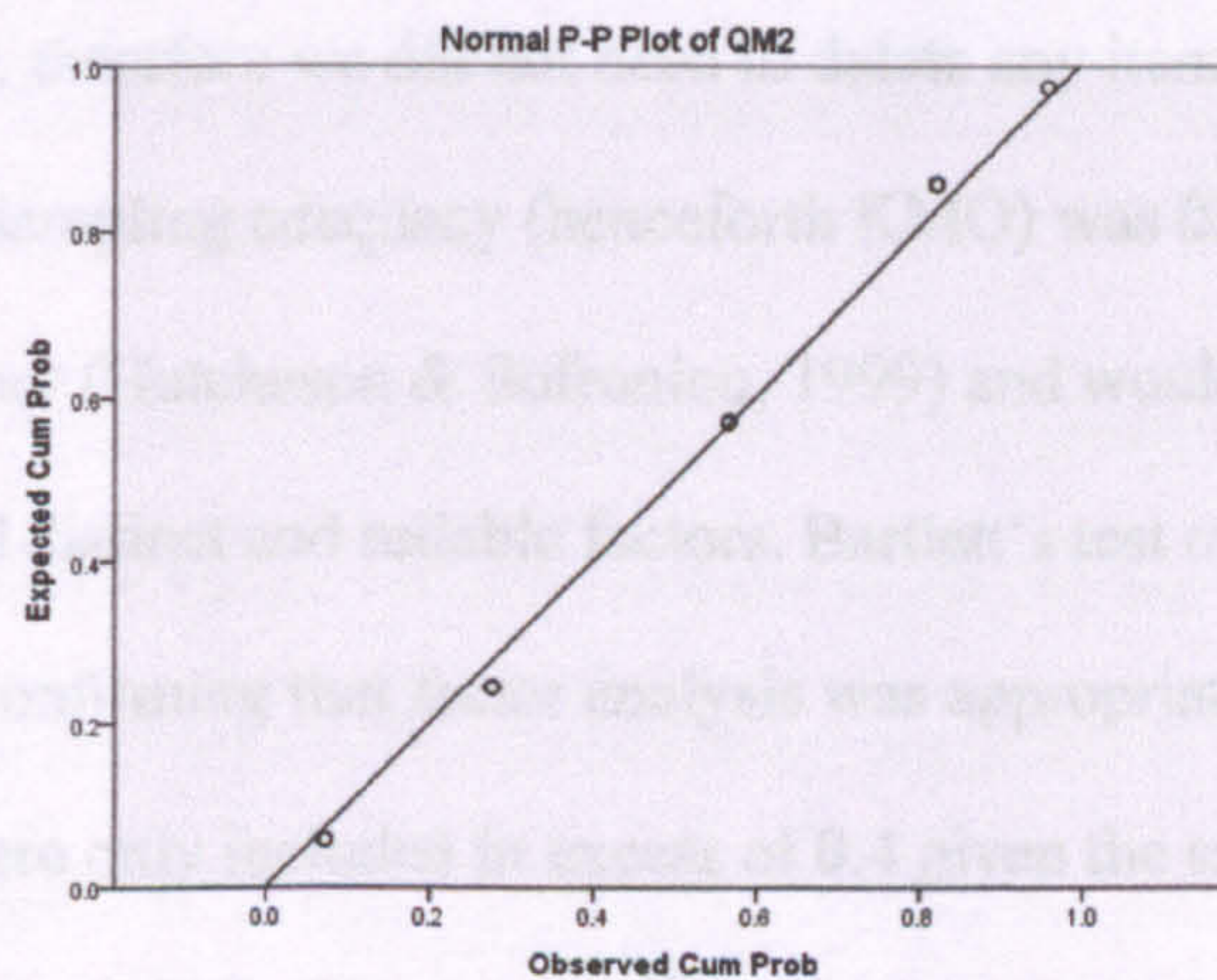


Figure 20. P-P Managers normality plot example

Further verification of the normality of the distribution was carried out by examination of the scale scores of the independent managers' variables, Kolmogorov-Smirnov (K-S) and Shapiro-Wilks (S-W) tests plus Q-Q plots. Both K-S and S-W tests yielded non-significant results

indicating that the distribution of the sample is not significantly different from normal distribution. Having verified the integrity of the data and its normality we moved on to factor analysis.

6.3 Factor analysis

Having initially screened the data for normality we then conducted a factor analysis. The goal was to explore the data, consistent with the research aims, and apply the findings to the sample collected. In essence this was a descriptive method approach, hence the use of principal component analysis. Given the difficulty with generalisability of these results to the high-tech industry as a whole, it was not appropriate to utilise inferential methods.

The staff data was examined and the Pearson correlation co-efficient gave values above 0.3 and not exceeding 0.9, therefore we did not need to delete any items at this point. The Kaiser-Meyer-Olkin measure of sampling adequacy (henceforth KMO) was 0.912, which indicated the sample size was satisfactory (Hutcheson & Sofroniou, 1999) and would yield relatively compact patterns of correlation and distinct and reliable factors. Bartlett's test of sphericity was also highly significant, again confirming that factor analysis was appropriate.

Factor loadings were only included in excess of 0.4 given the sample size of approaching 200 as suggested by Stevens (2002). Eigenvectors of >1 were selected in line with Kaiser's (1960) recommendations. Two factors emerged from the analysis that explained approximately 78% of the variance.

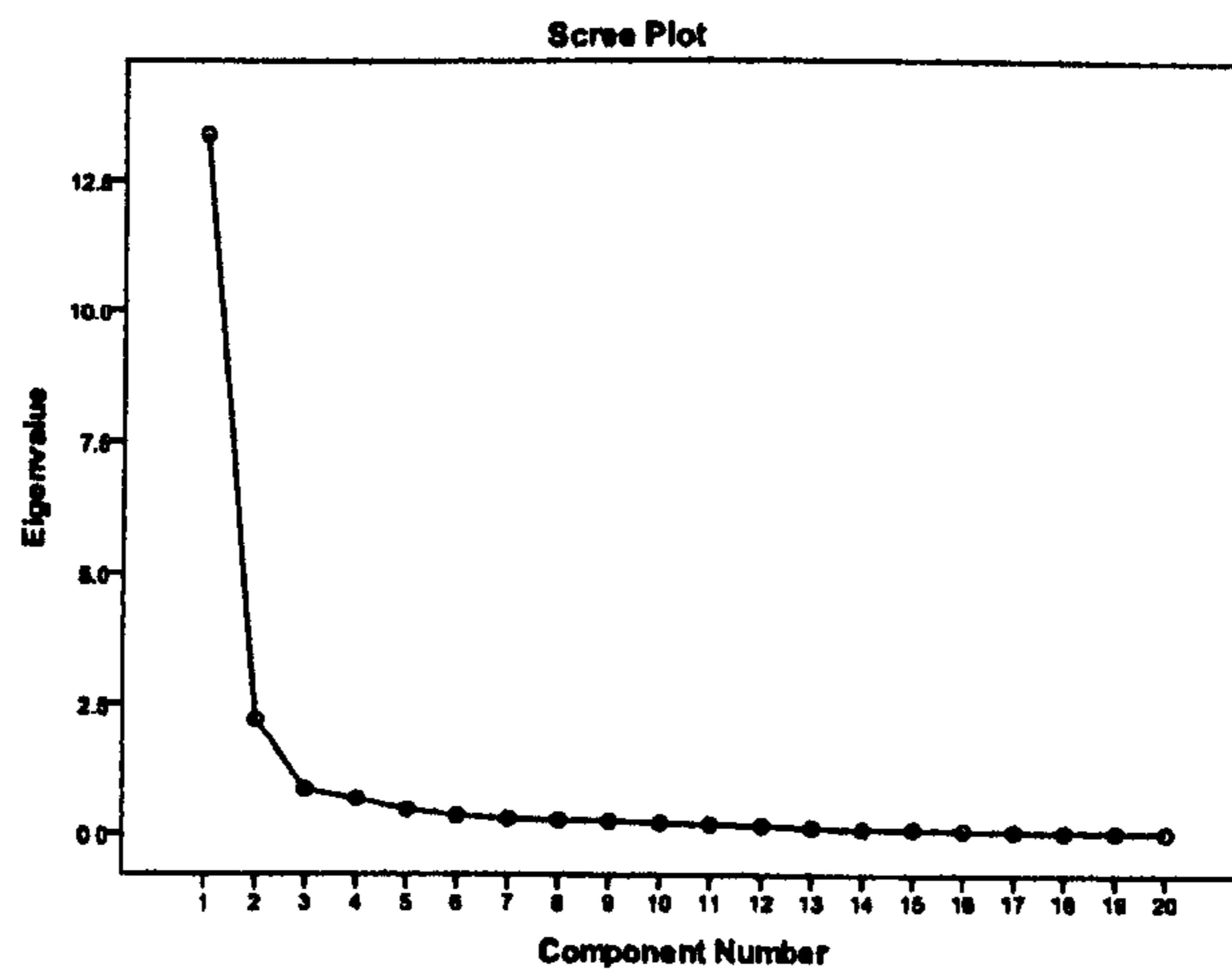


Figure 21. Staff data scree plot

There is some debate concerning factor selection on the scree plot. The author aligns with Cattell (1966) who argues that the cut off point for selecting factors should be at the point of inflexion on the plot, i.e. factors should be selected above this point. Examination of the scree plot indicated that two factors, the first at 66% and the second at 11%, were present as shown above in Figure 21.

Careful checking of the rotated components verified the presence of two factors.

The first factor was represented by ten variables and the second by ten variables. The first factor represents 'reliance' in that the items in the questionnaire are phrased 'willing to rely' or 'depend on'. The second factor represents 'disclosure', where the items are phrased 'willing to discuss, share or confide'. Reliability was assessed and was found to be over 0.9, indicating excellent reliability for both factors.

It was noted that items 6, 9, 11, 12, 15 and 19, after (varimax) rotation, had factor loadings on both components. These cross-loading items were removed from the analysis leaving

14 of the original 20 items (as shown below in Table 8) with seven items on 'disclosure' and seven items on 'reliance'.

Question Number	Question	Reliance'	Disclosure'
1	Rely on your manager's task related skills and abilities.	0.795	
2	Depend on your manager to handle an important issue on your behalf.	0.862	
3	Rely on your manager to represent your work accurately to others.	0.867	
4	Depend on your manager to back you up in difficult situations.	0.834	
5	Rely on your manager's work-related judgements.	0.832	
7	Discuss work-related problems or difficulties with your manager that could potentially be used to disadvantage you.		0.686
8	Confide in your manager about personal issues that are affecting your work.		0.835
10	Share your personal beliefs with your manager.		0.821
13	I was able to rely on my manager to represent my work accurately to others.	0.833	
14	I was able to depend on my manager to back me up in difficult situations.	0.792	
16	I was able to share my personal feelings with my manager.		0.862
17	I was able to discuss work-related problems or difficulties with my manager that could potentially be used to disadvantage me.		0.807
18	I was able to confide in my manager about personal issues that were affecting my work.		0.884
20	I was able to share my personal beliefs with my manager.		0.845
	Eigenvalues	8.127	7.484
	% of variance	40.636	37.421
	Cronbachs alpha	0.972	0.962

Note: Loadings less than 0.4 are not shown

Table 8. Summary of Explanatory Factor Analysis results for staff trust

According to Stevens (2002) factor loadings should be greater than 0.51 for sample sizes of 100. Given that our staff sample was based on $n = 118$ we were comfortably above this level, giving some confidence that the factor loadings were significant. The addition of the 'past tense' items to the measure did not significantly alter the factor analysis, thus the factor analysis confirmed the basis of Gillespie's original measure (Gillespie, 2003) and provided a level of confidence in the exploratory factor analysis. Reliability was assessed and was found to be over 0.9 indicating excellent reliability for both factors.

Again, using principal component analysis, we examined the management data. Here we faced an issue in terms of the small sample size ($n = 26$), and initial review of the literature pointed to little possibility of a valid exploratory factor analysis with sample size of less than 100. As an example Comrey and Lee (1992) argue for a 'good' sample size of a minimum of $n = 300$. Subsequent research revealed a view of sample size limit of no less than $n = 50$ (Velicer and Fava, 1998) and this level has been little challenged in the intervening years. More recently, however, studies have been undertaken, illustrated by that carried out by Preacher and MacCallum (2002), on factor recovery with small sample sizes. These studies showed that if communalities were between 0.8 and 0.9 with two factors, then a sample size as low as 10 can be used in an exploratory factor analysis. An earlier paper by Speed (1994) underlines the fact that one strength of a small sample size, as obtained under this thesis, is that although the sample is small it captures 100% of the population. Speed (1994, p.91) also argues that small sample sizes are 'no more likely to result in wrongly claiming a relationship exists than is the case for larger samples'. This research has been recently reinforced by de Winter, Dodou and Wieringa (2009) who argue that, assuming normality and well-conditioned data (high loadings, small number of factors and high numbers of variables), exploratory factor analysis can yield reliable solutions for

sample sizes well below the benchmark 50 level. The author adopted this approach and has performed the EFA on this basis. The analysis appears to provide results that are reasonably satisfactory. It was incumbent on the author to consider the alternative, however, which in this case was to consider the qualitative data available from the managers solely and not include the quantitative data at all. However, this would be to lose an opportunity for triangulation and thus the author persisted in the EFA for the management quantitative data.

The original Spreitzer and Mishra (1999) measure had sixteen variables and the author's addition of the 'past tense' increased the total number of variables by another sixteen making thirty two in all. The Pearson correlation coefficient gave values mostly above 0.3. However, there were some variables where there were a number of exceptions; these which were then excluded and the EFA rerun. There was no Pearson correlation coefficient > 0.9 at this point and all values exceeded 0.3. The variables numbered fourteen at this stage. After rerunning the EFA it was noted that KMO was still only 0.296, indicating an unsatisfactory sample size. Drawing on de Winter, Dodou and Wieringa (2009) careful examination of the commonalities was undertaken, which revealed two values below 0.6 (recommended by Field, 2009, p.662 as a minimum with less than thirty variables). Two further variables were excluded to ensure this guideline was met and the EFA was rerun. The KMO, using the remaining twelve variables, was shown as 0.641 indicating the sample size was acceptable (Hutcheson & Sofroniou, 1999) for factor analysis. Bartlett's test of sphericity was also highly significant, again confirming that factor analysis was appropriate at this stage.

Factor loadings were only included in excess of 0.4 and eigenvalues of >1 were selected. Two factors emerged from the analysis that explained approximately 77% of the variance, which again fits the small sample requirements as outlined by de Winter, Dodou and Wieringa (2009).

Examination of the scree plot indicated that two factors, the first at 64% and the second at 13%, were present as shown below in Figure 22.

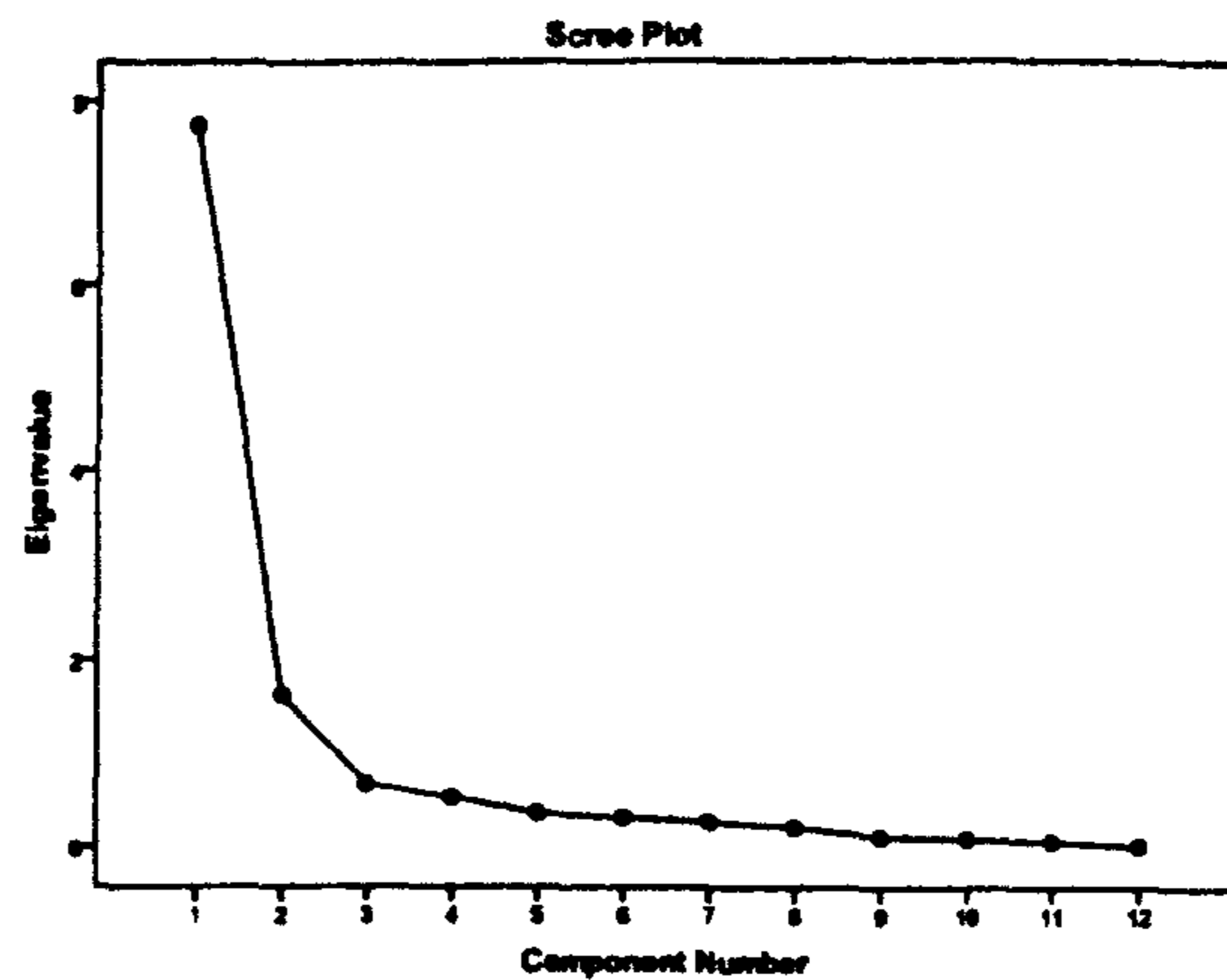


Figure 22. Management data scree plot

Careful checking of the rotated components verified the presence of the two factors. The first factor was represented by seven variables and the second by five variables. The first factor represents managers' trust 'belief' in that the items are phrased in the future tense, indicating belief that trust-based actions by employees *will take place*. The second factor represents managers' trust 'action' where the items are phrased in the past tense, indicating confirmation of trust-based actions that *have taken place*. Examining the rotated component matrix it was observed that items 1, 3, 4, 6, 7, 8, 11, 13, 15, 16, 19, 20, 21, 22, 24, 26, 28, 29, 30, 31 and 32 after (varimax) rotation, have factor loadings on both components, albeit above levels of significance on the part of one component and less than significant on the other component. These cross-loading items were removed from the analysis, leaving 12 of the original 32 items (as shown below in Table 9) with seven items on 'trust belief' and five items on 'trust action'. This leaves the exploratory factor analysis for the management data, given the admittedly small

sample size, in a position where the criteria outlined by de Winter, Dodou and Wieringa (2009) are met (high loadings, small number of factors and high numbers of variables). Reliability was also assessed and was found to be over 0.9 indicating excellent reliability for both factors.

Question Number	Question - Employees...	Belief trust	Action trust
2	...place our organisation's interests above their own.	0.726	
5	...express their true feelings about important issues.	0.863	
9	...share important information with me.	0.875	
10	...care about the future of our organisation.	0.838	
12	...have consistent expectations of me.	0.732	
14	...would acknowledge their own mistakes.	0.839	
16	...can be relied on.	0.789	
17	...have been completely honest with me.		0.826
18	...have placed our organisation's interests above their own.		0.809
23	...have contributed to our organisation's success.		0.88
25	...have shared important information with me.		0.864
27	...have helped solve important problems in our organisation.		0.874
	Eigenvalues	5.092	4.275
	% of variance	42.437	35.626
	Cronbachs alpha	0.942	0.945

Note: Loadings less than 0.4 are not shown

Table 9. Summary of Exploratory Factor Analysis results for management trust

Spreitzer & Mishra (1999) were able to load all sixteen original items onto a single factor in their factor analysis. The trust factor, thus loaded, consisted of four dimensions: concern, competence, reliability and openness. An α of 0.93 indicated a high level of reliability for these dimensions. In

this analysis two factors emerged and these are based on the 'future' and 'past' tense of the items (e.g. *employees share important information with me*, indicating trust belief and *employees have shared important information with me*, indicating trust action has taken place). The broadening of the original measure of Spreitzer and Mishra (1999) with the addition of the further 16 items relating to trust 'action' has had the effect of adding a second factor, a perhaps not unsurprising outcome. Having concluded the factor analysis we now turn to the full analysis which, initially, revealed several problems and issues.

6.4 Multilevel analysis exploration

Initially, using a multilevel analysis route looked to be a good solution for the data in that it was a hierarchical and clustered structure. Add to this the fact that the participants were located in two different geographical locations in two different companies and that the research was undertaken, in concept, as a longitudinal study and this was a good fit with multilevel analysis (Rasbash, 2010). The multilevel model deals with the data hierarchies and dependency of responses to items within each company and location (Twisk, 2006) and allows for partitioning of the variance within the individual companies and the variance between the companies. This type of analysis offered considerable interest in terms of the differences between the two companies where we might wish to have examined whether the variables of geographic location, management, legislation, neighbourhood and other contextual factors have affected the dependent variable under scrutiny.

However at this point, preparing for multilevel analysis, the author encountered some major issues with the data – namely, once again, as in the exploratory factor analysis, the small

sample size (53 staff, 13 managers for the US and 40 staff, 8 managers for Canada). However, this was an unavoidable issue as there was only access granted to the two companies for the purposes of this research and 100% of managers and staff were surveyed. Sample response for the Canada managers was 87% and staff achieved around 53% whilst the US response was 65% for managers and 55% for staff. It was when these small sample numbers were examined that the issue with multilevel analysis became apparent. In order to meet the target power one needs to understand the sample size required. This can be checked through use of software tools. The multilevel application selected for this task was the MLWIN macro (<http://seis.bris.ac.uk/~frwjb/esrc.html> retrieved on 23rd November 2009). This tool was run with the sample sizes obtained and the resultant power table is shown below in Table 10.

Sample size	Power
8	0.11
18	0.11
28	0.11
38	0.14
48	0.17
58	0.19
68	0.23
78	0.24
88	0.26
98	0.28
108	0.32
118	0.32

* Note β assumed at 0.15, variance at 1.05
 * Single level only

Table 10. Power versus sample size

This result caused serious concern as the power level, assuming β and variance as shown, was not sufficiently near the recommended benchmark level of 0.8 (Cohen, 1992) at the low sample

size, however, Moerbeek, Van Breukelen, Berger and Ausems (2003) point out that estimation levels for the multilevel logistic model are not as well developed as the linear multilevel model. Even if we did not accept this result it was clear from further research that sample size calculations for regression, where it is required to test the overall model, suggested that N be a minimum of $50 + 8k$, where k is the number of predictors, or for tests of individual predictors $104 + k$ (Green, 1991). For our case, where we had a total of 26 management responders, we used Green's calculations to provide a required sample size for overall model testing of $50 + (12 \cdot 8) = 146$ or for individual predictor testing $104 + 12 = 116$. Using the regression-based graph (Miles and Shevlin (2001), cited by Field, 2009, p.223) it is possible to check sample size required against number of predictors – see Figure 23 below.

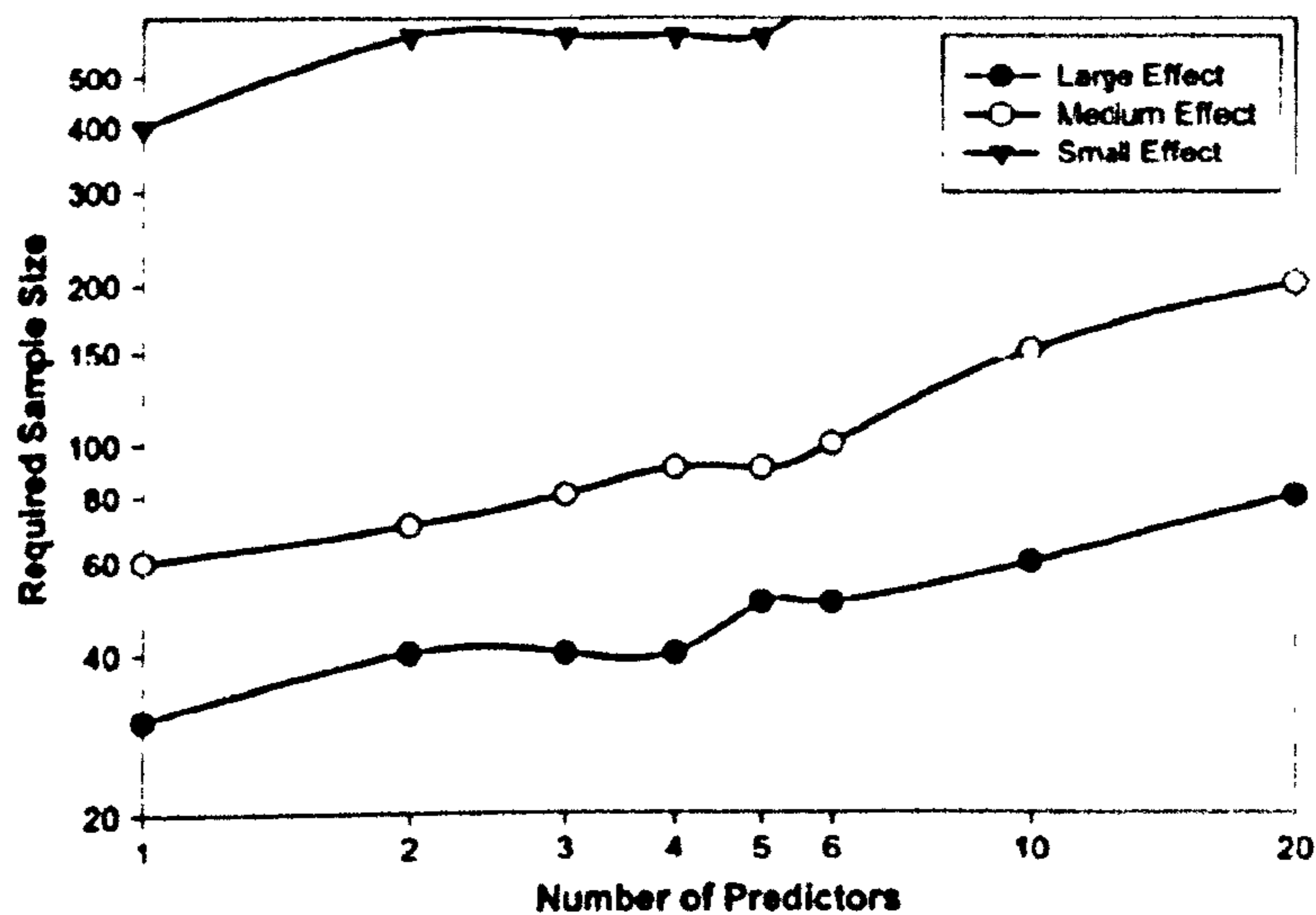


Figure 23. Predictors v sample size (Miles and Shevlin, cited by Field)

In our case, assuming 2 predictors (management and staff respectively) this gave a required sample size of approximately 40 for a power of 0.8 with a large effect, 70 with a medium effect and >500 for a small effect. It should be stressed that these are sample size calculations for

regression modeling only. For multilevel analysis, a further correction factor needs to be added to the standard sample size calculation (Twisk, 2006, p.124) based on the number of clusters and number of observations in each cluster¹. This has the effect of further inflating the sample size required and exacerbates the sample size issue facing the author.

Given the strong theoretical basis of these authors, and examining the staff numbers, we see that in our data we have two level 2 potential groups (Canada and the US) with group size of either 8 or 14 and two level one groups of either 40 or 53 respectively. This left the author with little option but to abandon the multilevel analysis as it would be unlikely to offer any meaningful findings or conclusions to be drawn.

6.5 Analysis of trust elements

The extracted factors for staff trust in management ('disclosure' and 'reliance'), first suggested by Gillespie (2003), and further developed in this thesis can be linked with two of the four elements highlighted by Spreitzer and Mishra (1999) namely; openness and reliability. Of these elements, openness, whereby the trustees have represented themselves and their capabilities in a truly open manner, was seen by the author as extremely close to the definition of disclosure

¹ Hox and Maas (2001) conclude that a minimum group number should be 50 but caution against using less than 100 where the sample size is small within each group (10, 20 or 50). Snijders and Bosker (1993) also argue for increased numbers of groups over increased sample size within groups. This view is further reinforced by the findings of Moineddin, Matheson and Glazier (2007) who conclude that a minimum group size of 50 with at least 50 groups is necessary. Maas and Hox (2005) postulate a minimum group number of 30 with a group size of 30, although they argue that it is possible to reduce the group size to as low as 5 but that this needs to be compensated by a larger number of groups than 10.

provided by Gillespie (2003) as the sharing of work-related or personal information of a sensitive nature. Regarding reliability, it is defined by Spreitzer and Mishra (1999) as the trustee doing what they say they will do. Gillespie (2003) defines reliance as relying on the trustee's skills, knowledge, judgments or actions. The author contends that these are very similar and if we accept this approach we have identified two common trust elements that run across both staff and management: this was worthy of further analysis.

6.5.1 Openness and disclosure

Initially, we need to accept the premise that communication is an inherent part of openness (Lewicki and Bunker, 1996). Mishra and Mishra (2008, p.32) define openness as building 'a climate of honest dialogue by disclosing information with each other in an effort to create a more trusting relationship'. It is this communication between the two trusting parties which forms the basis of openness.

Examining the data regarding disclosure from the managers' viewpoint (i.e. managers' view of the disclosure of their staff) we discovered notable results for differences between companies and between age ranges.

Management participants in the Canadian company ($M = 6.37$, $SE = 0.26$) regarded their staff as more willing to engage in disclosure than the US company ($M = 4.76$, $SE = 0.19$), $t(25) = 4.43$, $p < 0.05$, $r = 0.66$. Here the effect size was large accounting for $> 25\%$ of the total variance. The difference could be related to a number of different causes.

An ANOVA analysis was undertaken to examine differences in means between the different age groups and managers' view of staff disclosure. These revealed that there were no

significant differences between any of the three management age groups (30 to 39, 40 to 49 and 50 to 59).

These results would seem to indicate a significant level of management recognition of staff disclosure in both case study companies.

Examining the staff view of management disclosure data analysis using t tests revealed a number of differences between new starters and established staff, newly acquired staff and 'original' (i.e. staff associated with the acquiring company) staff and between age groups at the extremes of the age range.

Average new starters ($M = 4.34$, $SE = .38$) attributed slightly more disclosure, on the part of the managers, than the established staff ($M = 3.86$, $SE = .16$), $t(98) = 1.187$, however, $p > 0.05$ and $r = 0.12$ (small) which only accounted for 1% of the total variance.

Newly acquired staff ($M = 3.76$, $SE = .21$), that is staff acquired as part of the company purchase, attributed less disclosure from their managers in comparison to the established staff ($M = 4.09$, $SE = .21$), $t(98) = -1.12$, however $p > 0.05$ and $r = 0.11$ (small), again only accounting for 1% of the total variance. This difference in means was, perhaps, not surprising given the adjustments that were likely in the integration of the two sets of staff. Pritchett, Robinson and Clarkson (1997, p. 100) state that newly acquired staff are affected by the 'widespread turmoil created by change'. However, there could be other explanations which would account for the difference so we cannot be prescriptive here.

An ANOVA analysis was undertaken to examine differences in means between the different age groups and staff view of management disclosure. These revealed that there were no significant differences between any of the five staff age groups (20 to 29, 30 to 39, 40 to 49, 50

to 59 and 60 to 69) and $F(4, 95) = 1.78, p > 0.05$ and $w^2 = 0.03$ (a very small effect size (Kirk, 1996)). We now move on to examine reliability and reliance.

6.5.2 Reliability and reliance

The survey data provided us with two way data; managers' trust of their staff and staff trust in their immediate management, both based on the element of reliance. On the managers side (manager's view of staff reliance) differences were found between the two companies, similar to managers' views on staff disclosure discussed above. Differences were also discovered between newly acquired and established staff.

Average management participants in Canada ($M = 5.85, SE = 0.34$) had a greater view of the reliance of their staff than the US company ($M = 4.71, SE = 0.24$), $t(26) = 4.43, p < 0.05, r = 0.44$. Here, the effect size was medium accounting for $> 9\%$ of the total variance. This is of interest as it reflects the manager's view of reliance of staff and is orientated towards the higher trust element being in Canada.

The acquired managers ($M = 5.6, SE = .51$) had a greater view of the reliance of staff compared to established managers ($M = 4.87, SE = .24$), $t(26) = 1.29$. However, $p > 0.05$ and $r = 0.25$ (small) accounting for only 1% of the total variance.

Examining the staff view of the reliance of management, we see that there are differences between companies, new starters and established staff, acquired staff and pre-acquisition staff and between age groups.

The staff view of management reliance in Canada ($M = 5.13$, $SE = .25$) is slightly higher than the US staff ($M = 4.73$, $SE = .15$), $t(98) = 1.24$. However, $p > 0.05$ and effect size $r = 0.12$ (small) accounting for only 1% of the total variance.

Of greater interest, perhaps, are the differences between new starters ($M = 5.33$, $SE = .33$) who viewed managers reliance slightly higher than the established staff ($M = 4.70$, $SE = .14$), $t(98) = 1.84$. However, again, $p < 0.05$, and $r = 0.18$ (small) accounting for only 1% of total variance. This was a similar result to that found for the view of new starter staff concerning their managers' disclosure, as shown above, and may indicate an effect whereby new starters were willing to, or found in practice, their managers were more likely to, exercise disclosure, perhaps as a result of no 'previous history'.

Existing staff ($M = 5.2$, $SE = .17$) perceived the reliance of managers higher than the acquired staff ($M = 4.34$, $SE = .18$), $t(98) = -3.47$, $p < 0.05$ and $r = 0.33$ (medium) accounting for greater than 9% of the total variance. This is a similar finding to that above where the view of the established staff concerning their managers' disclosure was noted to be greater than the acquired staff. This result is the reverse of that noted on the management view of staff reliance above.

An ANOVA analysis was undertaken to examine differences in means between the different age groups and managers' perception of staff reliance. These revealed that there were no significant differences between any of the three management age groups (30 to 39, 40 to 49 and 50 to 59) with $F(4, 108) = 1.842$, $p > 0.05$ and $w^2 = 0.02$; a very small effect size (Kirk, 1996).

Similarly, an ANOVA analysis was also undertaken to examine differences in means between the different age groups and the staff view of the managers' reliance. This revealed that

there was one significant difference between the staff age groups 20 to 29 ($M = 5.52$, $SD = 0.91$) and 40 to 49 ($M = 5.06$, $SD = 1.52$) and $F(4, 99) = 3.502$, $p < 0.05$ and $w^2 = 0.09$ indicating a medium effect size (Kirk, 1996). This significant difference between the age groups could be due to a number of possible causes. Mowday, Porter and Steers (1982), Mathieu and Zajac (1990) and Beck and Wilson (2000) highlight reducing organizational commitment with tenure. Liu and Wilson (2001) in their study of perception of women managers describe a younger age group (17 to 28 years) as 'single minded, independent and more confident...care-free and spontaneous' but who at 30 plus, were 'anxious about their future, their job' (p.170). This could be suggestive in explaining the higher means of the youngest 20 to 29 with respect to the older 40 to 49 age group in that there might exist a greater willingness to trust at a younger age and with less tenure and experience.

Finally we examined the differences between measurement points T1 and T2 for the US company. This repeated measurement was carried out for both staff and managers at two instances separated by almost exactly one year.

Starting with the staff view of management reliance we found the means had dropped slightly between the first and the second measurement ($M1 = 5.05$, $SD = 1.09$ v $M2 = 4.85$, $SD = 1.37$). However, running a general linear model we found that $F(1, 30) = 0.47$, $p > 0.05$ and $w^2 = 0.015$ (small effect size) indicating a non-significant difference in means, implying no change in staff view of management reliance at time T2 with respect to time T1.

This result was repeated for staff view of management disclosure ($M1 = 4.00$, $SD = 1.57$ v $M2 = 3.99$, $SD = 1.21$). However, $F(1, 28) = 0.01$, $p > 0.05$ and $w^2 = 0$ suggesting no change in staff view of management openness at time T2 with respect to time T1.

Switching to management view of staff reliance we found that the mean rose slightly at time T2 (M1 = 4.67, SD = 1.00 v M2 = 4.89, SD = 1.17). However, with $F(1, 8) = 0.12$, $p > 0.05$ and $w^2 = 0.015$, this gave a small effect size indicating no change in management view of staff reliance between times T1 and T2.

Turning to management view of staff disclosure the mean rises slightly between time T1 and T2 (M1 = 4.44, SD = 0.61 v M2 = 4.87, SD = 1.00). $F(1, 8) = 0.976$, $p > 0.05$ and $w^2 = 0.109$ (moderate effect size), again pointing to the management view of staff disclosure not changing significantly between time T1 and T2. The analysis should also address our findings regarding retention.

6.6 Retention

The research aims have been to explore aspects of trust, its definition, development and role in the post-acquisition integration context of the high-tech electronics area and to determine whether trust was one of the factors which influenced key staff to remain with the acquired company in two different geographic locations. It was not possible to measure staff retention at the Canadian division due to having only a single measurement point. In the case of the US division, given two measurement points, it was. The US division was attractive in that it had recently performed an acquisition and both measurement points fell in the integration period. However, examination of the data revealed that of 86 staff sampled at T1 only 3 were not retained at T2. Using a t-test to examine the trust elements of reliance and disclosure of leavers and staff who remained it was found that, unsurprisingly given so few leavers, that $t(84) = -0.084$ and $p > 0.05$ which represented a very small effect (r) of 0.009 explaining less than 1%

(Cohen, 1992) of the total variance. Thus, it was not possible to determine whether trust was a factor in influencing the staff to remain in this particular section of the analysis.

6.7 Discussion

There were several issues with the analysis, even before analysis of the data. Initially, having too few leavers to allow the original dependent variable to be analysed was problematic. This led to having to dispense with this variable and look to the factor analysis to provide a 'best second' option. After issues with the small sample size, which were overcome, we were left with the option to run 't tests' to establish differences between two group means and ANOVA tests to determine differences between the T1 and T2 US measured data.

We found three emergent themes from the analysis. The first theme that emerged on a repetitive basis was the clear differences between the Canadian and US case study companies. This was particularly noticeable in the managers' results, where the management view of staff reliance and disclosure was more pronounced in Canada than the US. Given the relative consistency of the analysis results we can, perhaps, tentatively speculate that Canadian managers were more likely to trust their staff than their US counterparts. However, this was a difference only and does not imply that there was little or no trust in the US case study; indeed, both reliance and disclosure were reflected in the US results, particularly bearing in mind the findings of the previous chapter. One possible reason for this greater trust in one country compared to the other could be caused by a number of contextual and cultural factors. One example offered by the author is the argument of Trompenaars and Hampden-Turner (1997, p. 175) who state that Canadian culture (on average) is person-based and is classified as an incubator culture 'where if

organisations are to be tolerated at all they should be there to serve as incubators for self-expression and self-fulfillment'. This culture often operates 'in an environment of intense emotional commitment' (Trompenaars and Hampden-Turner, 1997, p.176). This person-based culture might be one reason why Canadian managers are more aware of their staffs' trust elements (disclosure and reliance). The US organizational context, in contrast, is defined by Trompenaars and Hampden-Turner (1997, p. 172) as a guided missile culture, where that 'culture is orientated to tasks, typically undertaken by teams or project groups... must do 'whatever it takes' to complete a task, and what is needed is often unclear and may have to be discovered'. This task-based culture, if indeed this is a correct definition, is less personal than the Canadian organizational culture.

The second theme that emerged from the results was that of the staff view of managers' reliance being significant both for new starters and acquired employees. Although the means were quite different for the new starters (higher) versus the existing staff and $p < 0.05$ nonetheless the effect size was only small. This result may indicate (Mowday, Porter & Steers (1982), Mathieu & Zajac (1990), Beck & Wilson (2000), Liu & Wilson (2001)) that new starters were simply more ready to invest in the trust elements initially in their engagement with the new company. It is interesting to note the view of the new starter staff of their managers' disclosure also demonstrated similar results to staff reliability with higher means for the new starters but with $p > 0.05$ and, again, only a small effect size. The acquired staff view of manager reliability contrasts with the new starter view, in that the established staff had a higher mean for reliability than the acquired employees (with $p < 0.05$ and a medium effect size) and this difference was also reflected in the staff view of managers' disclosure (but with $p > 0.005$ and a small effect size). This seems to suggest a slightly higher level of trust of managers by existing employees

than newly acquired staff. This might be a plausible result given the large amount of change that is experienced by an acquired staff member who then has to relate to new managers (Searle and Ball, 2004).

The third theme worthy of discussion is the differences between the staff age groups with respect to their view of managers' reliance. One notable difference in means was seen between staff age groups concerning perceived managers' reliance. The 20 to 29 age group had a much higher mean than the 40 to 49 age group with $p < 0.05$ and a medium effect size. It is difficult to speculate as to the cause of this difference as there are many potential contextual and personal factors. However, we can point to shortness of tenure (Mowday, Porter & Steers (1982), Mathieu & Zajac (1990)) as one possibility.

It is of interest to note that testing for gender differences did not reveal any significant results in any of the discussed analyses. This may be useful for the ongoing research, post thesis, for seeking to achieve a higher level of generalisability.

It is also interesting to speculate on the potential reasons for the lack of differences between the repeated measurements at time T1 and T2 for both staff and management.

This chapter has addressed the quantitative research findings based on data gathered from the two quantitative surveys outlined in the methodology chapter.

Normality and data integrity were addressed, followed by a section that described the factor analysis performed. This was followed by a brief consideration of the multilevel analysis exploration carried out, followed by the analysis of the trust elements of openness and disclosure and reliability and reliance. Analysis of retention findings and a broad discussion of the overall quantitative results close the chapter.

Chapter 7 Conclusions and recommendations

The objective and aim of this DBA thesis was to explore aspects of trust, its definition, development and role in the post-acquisition integration context of the high-tech electronics area and to determine whether trust was one of the factors which influenced key staff to remain with the acquired company in two different geographic locations.

The practical outcome was the development and production of a number of trust measurement tools which were first utilised and then supplied to the case study companies for ongoing use for both post-acquisition integration and also general monitoring.

This chapter draws together the findings into conclusions and recommendations and is presented in three sections. The first section discusses conclusions based on the findings of the preceding chapters and includes an assessment of contribution to new knowledge and the limitations of this work. The second section identifies the stakeholders in the research study and addresses the outcomes for each in turn. The third section explores the dissemination of the knowledge gained during the research period and its impact on interested parties, in particular the sponsoring company. The fourth section covers recommendations for the practitioner that have been highlighted as a result of the research. The final section concludes the thesis with a summary quotation.

7.1 Concluding discussion

Initially, then, we commence with an examination of what we can ascertain from our trust explorations in a post-acquisition context. As ‘mixed method’ has been used, we have a

somewhat more complex set of findings encompassing the different levels of staff and management in two separate companies than a single method approach. However, the compensation is the mixture of results whereby one augments the other and 'fills the gaps', together with offering triangulation (Bryman & Bell, 2003). This more complete picture, in particular the two way management view of staff trust and staff view of management trust, forms the core of the contribution to knowledge. As acquisitions have a failure rate approaching two thirds (Marks & Mirvis, 2001) it is extremely relevant to research and offer new knowledge that may assist in facilitating an improvement in this statistic. The author has chosen trust dyads of key staff and management to explore the role of trust in the post-acquisition integration phase. We have also examined trust as a possible element in the likelihood of retention, retention being one of the needed factors if the acquisition is to succeed. Without the key staff who hold much implicit knowledge the prospects of success for the acquisition are diminished. This could lead to devaluation and loss of synergies at best and outright failure and divestiture at worst for the acquiring company (Krug, 2003). The success of the acquisition is thus important, both from a human resource and from a financial viewpoint and, the author argues, this makes the subject of this paper highly relevant given the ongoing acquisitions experienced in the high-tech industry. As part of our examination of trust development we have considered disclosure as a common element in this work and it is here that there is a large body of evidence in the data to suggest that mutual management and staff disclosure or openness is a key factor for trust building. The means utilised, particularly in the US company, are worthy of note with an early and repeated CEO visit, 'all hands' meetings, one-on-one interviews, group meetings, newsletters, 'open door' policy and email question and answer facility. The effort expended in the US company was significant but, even considering other factors, the reward was a retention of all bar three staff in

a geographical context of very high competitor technical employment prospects. We should seriously consider a communication plan as part of any integration plan. Frequent and open briefings would appear to be a prerequisite for engendering trust from the key employees. However, we also found that there is a danger of 'over-briefing' (Ray, 1991, Bartoo & Sias, 2004) and so a carefully planned communication plan taking this into account should be considered.

Continuing our exploration of trust development we also examined reliance or reliability of the trustee, either manager or staff, as a trust factor (Spreitzer & Mishra, 1999). There were no direct references to reliability in the qualitative data and we looked for references, instead, to consistency (Oxford English Dictionary, 2007). There is some reference to consistency by the interviewed managers citing the CEO, once more, and the suggestion that the displayed consistency resulted in building trust. In several cases the managers believed that this was one of the required behaviours they needed with the goal of increasing the trust of the staff for which they were responsible. We should consider including this consistency and reliability in aspects of integration from staff selection for management roles to communications to behavioural models. In the words of one manager it is a case of 'matching words and actions'. The quantitative data revealed more information on reliance and this is discussed in the following pages. This is one practical example where 'mixed method' can 'plug gaps' (Bryman & Bell, 2003) in the research. Analysis of the qualitative data also revealed some information with regard to trust being a factor in staff retention. There appeared to be two primary factors influencing staff decisions to stay within each studied company, firstly, due to the initial care and attention to staff by the management as part of the integration process. This was noted by interviewees as communication and openness (disclosure) by the managers and senior managers involved in

delivering on communication statements with action follow-through; again 'matching words and actions'. Openness is one of the four trust elements identified initially by Mayer et al, (1995). This openness/disclosure when balanced with confirmatory actions can assist with employee satisfaction (Douglas, 1990, Kramer, 1994).

As an example, particular comments were made by the interviewees concerning the impact of the early visit of the CEO to brief the newly acquired staff. The objective here was inspirational vision-building which was to be transmitted in an uplifting and 'people friendly' manner.

Many different media were used to communicate, particularly in the case of the US company, and these should also be selected and deployed in such a way as to not 'over-communicate' should the culture being communicated to be used to a lower communication level. These communication means could include 'all hands' meetings, where both good and bad news is provided, being careful not to filter out bad news – reality appropriate to the situation and context is key here, as revealed by the qualitative data. Other means of communication such as team or group meetings with managers, one-on-one meetings, senior managers walking the site, newsletters, social occasions appropriate to the context and anonymous email integration question mailboxes are among some of the others that could be deployed. The underlining factors here are disclosure and reliance which offer a means of maintaining or, possibly, building trust.

The second element emerging from the findings was the context of local employment on retention. Here we found that different constraints in each case study company had contributed to the lack of leavers. In the case of the Canadian company, it was the niche high-tech skills of the key staff, meaning that the nearest employer (if they wished to remain in that engineering discipline) was not geographically adjacent or local causing the staff to have to relocate families

in order to leave. This was noted by several key managers at interview and appeared to be a real factor. There was also some element of altruism, in that some managers felt they were 'making a contribution' and remaining would foster that contribution. This fits with the knowledge worker concepts advanced by Benson & Brown, (2007).

In the case of the US case study company a different context exists locally. Here the company is literally surrounded by similar high-tech companies which contrasts dramatically with the more isolated Canadian situation. Why should retention be high (only 1.5% leavers in one year) in this context? The answer could lie in a number of factors, one being the nearness of some of the key staff to retirement (in this case a well-provisioned pension scheme ported from previous companies) which could be considered as 'golden handcuffs'. Morrow (1993) cites age as a factor in job commitment. The second factor could be the active rewards and recognition programme initiated by the acquiring company (Milne, 2007) and the third, somewhat surprisingly, simply 'habit' i.e. the comfort of a regular and known environment even if the environment is not to the liking of the individual, possibly hinting at a workaholic tendency (Porter, (2004). The fourth factor is effort made to foster staff development on the part of the management. This involved the use of trust elements (Mayer et al, 1995) to build staff trust in management as well as providing recognition (Milne, 2007). These four would appear to be the major influencers on staff to remain and thus are worthy of consideration when formulating an acquisition and integration strategy.

We should not leave the issue of retention without mentioning the extension to knowledge gained in this study to the work of Krug (2003). Krug proposed a post-acquisition peaking in management leavers but it would appear from the findings that senior people will also leave *prior* to acquisition, leading to a potential double peak both pre- and post-acquisition. This

poses real challenges for the acquiring company as there is some evidence in the US case of key managers and technical staff leaving the organisation pre-acquisition, thus weakening the acquired company. One possible solution, in the face of somewhat constrictive legislation, would be to form a wider integration team with identified key staff and managers (Marks & Mirvis, 2001). Ideally, this team could be widened to encompass key staff from the target company. This would have the effect of fully briefing those individuals most valuable to the acquiring company and also offering early social and professional interaction between the two companies employees as well as addressing the task of building the integration plan.

It was also noted that there were some issues concerning managers, in particular, the serial appointment of senior managers in the Canadian company. It can be seen from the data that from a trust-building point of view the managers were much more trusting when the senior manager was seen to 'commit' to the local site rather than being sent in on a part-time basis from head office. Management presence (commitment) and key openness/disclosure skills (Chia, 2005) are key building blocks for trust in integration. It would seem prudent, therefore to consider carefully both the context of previous management (is there a history of 'parachuted in' managers?) and the need for the newly appointed senior manager to be in post for enough time to exercise disclosure skills. Tansky and Cohen (2001) found that the manager's level of communication and disclosure had a direct impact on the staff commitment.

In a related point worthy of note from the US company data, is the need for managers, where they are leading a staff team, to possess people leadership skills in addition to any required technical skills – this was evidenced in the case of the one management leaver who was extremely capable technically but did not have the people leadership skills (Chia, 2005) needed for the role as head of engineering. So when selecting managers, especially in the sensitive post-

acquisition integration period, we should also consider their people skills in addition to the required business or technical skills.

We are able, given the repeated references to trust and retention, to be able to say that trust can be one element in keeping staff from leaving. Not only that, but there appears to be a clear recognition of the importance of trust in the integration period by the interviewees. Looking at the quantitative findings, we faced the challenge of the very small sample size of the management teams in both subject organisations. Through reference works and subsequent analysis it was possible, nonetheless, to perform a meaningful factor analysis which both confirmed the reference works (Spreitzer & Mishra, 1999, Gillespie, 2003) were in alignment with the factors so extracted and, through use of the past tense (indicating trust actions that were experienced), broadened the original work of Spreitzer and Mishra (1999) to produce a questionnaire that can be used going forward to measure management trust of staff. The small sample size factor analysis was particularly important given the need for the study to consider trust building both from a management and a staff viewpoint. Having established the factor analysis and confirmed its validity against statistical criteria (for example the Pearson correlation co-efficient > 0.3 and < 0.9) it became clear that a classic multilevel analysis would not be possible, given the small number of level 2 groups (representing the management). This difficulty was further augmented by the very low level of leavers in the US company. It was not possible to establish a link between trust and retention, in this case, from the quantitative data. However, despite these initial difficulties, subsequent analysis of the data revealed some interesting results. Firstly, some differences emerged between the Canadian and US companies in terms of how the managers trusted the staff. The Canadian managers had a consistently higher regard for their staff in terms of reliance and disclosure trust elements. It is of import to note the

constancy of the difference between the countries across both reliance and disclosure trust elements which would seem to rule out 'noisy' variables. The corresponding quantitative data for the staff (their view of managers' disclosure and reliance), however, does not reflect this country difference, with only managers' reliance indicating a small difference and small effect.

One area that did emerge from the staff data was the confirmation of the willingness of new starters to invest initial trust with the new company compared to the existing staff or acquired staff. This high initial trust level immediately post-acquisition is highlighted by Papaalexandris and Bourantas (2000).

It was also noted that there were differences between staff age groups in terms of perceived managers' reliance. The 20 to 29 age group, the author argues, has less experience (de facto) than the 40 to 49 age group and this shortness of tenure (Mowday, Porter and Steers (1982), Mathieu and Zajac (1990)) offers one possible explanation for the younger age group to having a higher view of their managers' reliance.

Other examined factors such as gender and the US repeated measurements at T1 and T2 did not yield any significant differences in trust elements. This absence of differences opens up potential lines of future enquiry. Here the need for further measurement at T3 and onward would be useful to determine the trend in trust and to verify that trust changes can be determined, albeit relative to the previous measurements. Examination of why the genders do not 'see' trust differently from each other is also worthy of further work. Could trust be a universal factor which bridges the gender gap?

7.2 Limitations and further study

There are a number of limitations with this study that should be highlighted. The study set out to explore aspects of trust, its definition, development and role in the post-acquisition integration context of the high-tech electronics area and to determine whether trust was one of the factors which influenced key staff to remain with the acquired company in two different geographic locations. The initial research design was based on a longitudinal study with three measurement points on at least two companies. This was not achieved due to access to companies being limited (two visits to the US and one to the Canadian company) partly due to geographical and cost reasons on one hand and limitations of when the visited companies had completed the acquisitions on the other. The Canadian company completed the acquisition in 2005 and hence by 2008 was some three years into integration whilst the US company was measured at six and eighteen months after acquisition. Thus the measurements, whilst yielding rich data, were curtailed and did not allow for research of more than an exploratory nature.

A further limitation, related to that above, was the inability to run the multilevel analysis due to inadequate level 2 groups (company level). This was compounded by the relatively small number of leavers in the target companies making the quantitative analysis difficult and less than conclusive regarding trust as one factor in retaining staff. It was somewhat fortunate that a mixed method approach was chosen such that the qualitative findings could augment the quantitative data to achieve some level of triangulation.

There has been one final limitation to the research in that the sponsoring company has not been able to continue to employ the author due to a friendly take-over of the author's department.

This has meant that the trust guidelines and measurement tools developed to-date cannot be further built on by the author and so others must continue the work in that organisation.

Addressing the generalisability of the findings we have to state that they must be open to question given the limited case studies, based as they are in North America. Both companies are in the same high-tech business area and this context may also impact the generalisability. Broadening the research by including a larger number of case study companies would be worthwhile to establish whether the conclusions of this work can be generalised.

There are several other areas which are potentially interesting areas for further study. We have already highlighted the broadening of Krug's (2003) work to include the pre-acquisition as well as the post-acquisition peak of leavers (not only executives but also key staff). Another area worthy of research would be the findings that the Canadian managers had a higher regard for their staff in areas of openness, reliability and competence than their US counterparts. Is this a cultural effect? The differences in age group trust levels and willingness to trust is also of interest. It would be very interesting to research the apparent lack of difference between genders in the trust measured. A few further areas might also merit further work namely, the increasing trust of staff for the senior manager as they 'educate' him/her (see chapter 5), over-briefing and its effect on trust and, finally, exploring the boundaries of trust where pre-conditioning of staff has resulted in a lowering of willingness to trust based on poor experiences – can this reluctance to trust be overcome and if so, how?

7.3 Stakeholder outcomes

There are a number of key stakeholders connected to this research both at organisational and individual level. In particular, the key organisations are the two case study companies, the company headquarters and the university. At individual level the major stakeholders are the author, his family and both University tutors.

There are several key sponsors at company headquarters who have been very supportive and without whom the research could not have been undertaken namely, the Chief Financial Officer and a Head of Department. The Canadian company General Manager and the US company President were also critical in that they enthusiastically championed the research and ensured that employees were encouraged to participate in interviews and on-line surveys. The study has provided each stakeholder with a slightly different outcome. The university, through the two tutors guiding, has the first year of graduating DBA students. The two case study companies and the company headquarters have a number of tools and guidelines for future acquisitions which can be incorporated into an overall acquisition and integration guideline procedure. The questionnaires have already been adopted by the company and a further UK site has requested use of the surveys. The author has greatly deepened his reflective and critical skills and become addicted to research with a practioner bias. The author's family whilst valuing the learning and growing experience, on the part of the author, are, nonetheless, glad that the DBA journey is completing.

7.4 Dissemination of knowledge gained

Dissemination of the research has been achieved through a number of different means. This has included giving papers, tutorials, critical discussions with colleagues in academia, briefings and conversations with many individuals at senior level in the sponsoring company and the US and Canadian companies. The author has written a paper as principal author, which was presented at ELASM Trust conference in March 2010, with Dr. Andreas Hoecht and Dr. Birgit Schyns titled 'The role of trust in the retention of key staff in a high-tech industry acquisition context' (refer to Appendix X for an overview). The author has attended the annual Academy of Management conference and has participated in a number of Portsmouth University research and doctoral conferences with two papers presented (refer to Appendix C). The author has also provided the sponsoring company executive management team with detailed briefings on development of the research, overviews of survey results and feedback of guidelines for incorporation into post-acquisition integration guidelines documents.

7.5 Practitioner recommendations

This study has explored the definition, development and role of trust in two organisations located in two different geographical locations and examined whether trust is an element in retention of key staff. The findings indicate a number of practitioner recommendations that should be considered whilst planning and carrying out an acquisition and, subsequently, in the post-acquisition integration period.

The first issue to consider prior to acquisition is the development of an integration plan. Integral to the integration plan is the assessment of how the integration will proceed and, in particular, if we accept that we wish to retain the key staff, we need to have identified those employees. It is recommended that a survey is performed with the target company prior to acquisition to assess this. This can be carried out, initially, through interviews with senior staff and reviews of staff organograms. The thesis has indicated great care should be taken in ensuring that as wide as possible number of key employees should be taken into confidence regarding the intention of the acquisition occurring – this is critical for key knowledge workers, and thus we should attempt to identify these workers well in advance of the acquisition. Care should be taken that, particularly as highlighted in this research, local laws are observed; the example being the USA case study company that was subject to laws regarding dissemination of acquisition intentions as a publically quoted company. However, having proper regard for legal aspects should not prevent disclosure subject to appropriate agreements with key knowledge workers. A further aspect of the integration plan that should be considered is the culture of the to-be-acquired company. Whilst culture is not a major area of this research nonetheless its impact especially in the case of the acquiring company imposing its culture on the purchased company (see Chapter 5) can have an effect on trust levels and hence could affect retention. Imposition of very different working patterns and procedures tends to heighten the ‘shock’ of acquisition and may lead to loss of staff. This assessment could be assisted through use of a cultural survey prior to the purchase. Consideration should be given to assessing the evolution of the acquired company’s culture. Is there a reason they carry out business and react in particular ways? Perhaps the processes and procedures in use at the company are better suited to their business than the acquiring company’s ones? Here, awareness and sensitivity of potential cultural clashes

are worthy of consideration. The integration plan should also include those aspects such as financial, schedule, facility, order and product plans together with staff package details including pensions and other benefits.

It is important to adjust the integration plan such that the retention of the key knowledge workers can be optimized both prior to acquisition and in the integration period and beyond. This thesis has found that key knowledge workers may leave on news of an intended acquisition abandoning potentially huge benefits making attention to both pre-acquisition and post-acquisition periods critical for similar high technology organisations.

We should aim to take advantage of the initial willingness to trust that may exist at acquisition and set our plans in place for building the initial trust. One major means of achieving this is through use of communication. Communication (openness) emerged strongly from the findings as an essential facilitator of trust building. Here the need is for not only transmission of good news but also openness about set-backs and problems that face the new integrated business. It is here that it is pertinent to mention the selection of the leader for the acquisition and integration. This thesis has found that the trust is indeed an indicator for retention and if we aim to retain the key knowledge workers then we should appoint a leader who is capable of clear communication, is open, and displays concern, reliability and competence. Here it should be emphasised that the trust building qualities of the leader are critical and thus careful selection needs to be made of the leader elected to the post of senior manager in the acquired company. The Canadian company examples where the leadership was only resolved on the third attempt shows the loss of trust that can occur if the leadership issue is not addressed mindful of these elements. The issue of reliability emerged strongly from the data and even if communication skills of the leader are good there is still a requirement for actions to match words. This lends

strength to the need for an assessment of possible leaders in terms of their ability to communicate openly, carry through on promises, show care and concern for the newly acquired staff and be seen as competent in their role. This can be contrasted with the Canadian manager 'turnover' of 14 managers in the space of 11 years – making the trust building progressively more difficult and posing a risk to loss of key knowledge workers.

The leader should also 'commit' to the acquisition in terms of strongly identifying with the new company in the same manner as the Canadian case study manager highlighted in the findings. It is not a sign of commitment to 'parachute in' a manager who is based away from the new company. Commitment in this sense is likely to mean colocation to the new company.

It is also worthy of note, regarding commitment, to find ways of showing the purchasing company's commitment to the new company. The example discussed in this thesis is the visit of the Chief Executive Officer to the acquired company and a communication session where he or she can 'envision' the new staff. This is partly dependent on the charisma and presentation skills of the CEO but, in the case some attempt at an early visit and presentation by a senior member of the acquiring company is indicated as worthwhile by this study (mentioned in both case study companies' findings).

It is also worthwhile considering local employment contexts as part of the acquisition planning. We have found that older employees can be mindful of their approaching retirement and opt for stability in employment but we also noted, surprisingly, that some key employees would abandon these same secure pension schemes through distrust of the acquiring company. The results of the research would seem to indicate that it is not enough just to rely on key workers being retained through pension plan continuity, terms and conditions or 'habit'. It was also found that there was a positive impact on retention and trust by the rewards and recognition

of individual staff members together with staff development plans. Elements of management concern, reliability and competence are involved in these aspects as perceived by the staff.

A further action that could be contemplated by the practitioner should be to measure, using a reliable tool, the trust levels of the staff. This would allow trending of the trust and provide some indications that further trust building would be of benefit to the organisation.

Finally, it is pertinent to point out that these practitioner recommendations are not intended to be prescriptive in any way. One should be mindful that the findings from this research are based on relatively short studies of two specialist high technology companies and, given the lack of generalisability, caution should be employed in applying any recommendations. It is worth noting, however, that building trust in an newly acquired organisation is a worthwhile endeavour and worthy of investment of care and attention to increase the acquisition chance of success and retain key knowledge workers.

7.6 And finally...

How can we draw this research together and summarise what is a complex subject? What have we learned from this exploration of trust in the post-acquisition integration context? We conclude with a quotation from one manager who states that, “Trust is the most important key to the whole thing. If you don’t have trust with the people before the sale it could all fall apart. If you don’t trust afterwards then no-one will work together to make it successful. That’s the summary’.

Bibliography

(2000). *Collins English Dictionary*, Harper Collins.

(2007). *Oxford English Dictionary*. Oxford, Oxford University Press.

(2009). *Index of leadership trust 2009*, Institute of Leadership and Management.

Ahmed, A. M. and O. Salas (2008). Trust in India and Sweden: An Experimental Examination of the Fukuyama Conjecture. *Cross-Cultural Research* 42, (4): 420-429.

Albrecht, S. and A. Travaglione (2003). Trust in public-sector senior management. *International Journal of Human Resource Management* 14, (1): 76-92.

Argyris, C., R. Putnam, et al. (1985). *Action science: Concepts, methods and skills for research and intervention*. San Francisco, CA, Josey-Bass.

Ashkenas, R. N., L. J. DeMonaco, et al. (1998). Making the deal real: how GE Capital integrates acquisitions. *Harvard Business Review* 76,(1): 165-178.

Atkinson, C. (2006). Trust and the psychological contract. *Employee Relations* 29, (3): 227 - 246.

Bachmann, R. and A. Zaheer, Eds. (2006). *Handbook of Trust Research*, Edward Elgar Publishing.

Bambacas, M. and M. Patrickson (2008). Interpersonal communication skills that enhance organisational commitment. *Journal of Communication Management* 12, (1): 51-72.

Barber, B. (1983). *The logic and limits of trust*. New Brunswick, Rutgers University Press.

Barnett, T. and E. Schubert (2002). Perceptions of the ethical climate and covenantal relationships. *Journal of Business Ethics* 36: 279-291.

Bartoo, H. and P. Sias (2004). When enough is too much: Communication apprehension and employee information experiences. *Communication Quarterly* 52, (1): 15-26.

Beardwell, I. and L. Holden (2001). *Human Resource Management*. (3rd Ed.). Harlow, Pearson Education.

Beatty, P.T. and L. Burroughs (1999). Preparing for an ageing workforce: the role of higher education. *Educational Gerontology* 25, (6): 595-611

Beck, K. and C. Wilson (2000). Development of affective organisational commitment: a cross-sequential examination of change with tenure. *Journal of Vocational Behavior* 56, (1): 114-136.

- Benson, J. and M. Brown (2007). Knowledge workers: what keeps them committed; what turns them away. *Work, employment and society* 21, (1): 121-141.
- Bhaskar, R. (1989). *Reclaiming reality: A critical introduction to contemporary philosophy*. London, Verso.
- Bijlsma, K. and G. van de Bunt (2003). Antecedents of trust in managers: a "bottom up" approach. *Personnel Review* 32, (5).
- Bijlsma-Frankema, K. (2004). Dilemmas of managerial control in post-acquisition processes. *Journal of Managerial Psychology* 19, (3): 252-268.
- Bijlsma-Frankema, K., B. de Jong, et al. (2008). Heed, a missing link between trust, monitoring and performance in knowledge intensive teams. *The International Journal of Human Resource Management* 19, (1): 19-40.
- Binstead, D. S. (1980). Design for learning in management training and development: a view. *Journal of European Industrial Training* 4, (8): Whole issue.
- Birkinshaw, J. (1999). Acquiring intellect: Managing the integration of knowledge-intensive acquisitions. *Business Horizons* 42, (3): 33-40.
- Birkinshaw, J., H. Bresman, et al. (2000). Managing the post-acquisition integration process: How the human integration and task integration processes interact to foster value creation. *Journal of Management Studies* 37, (3): 395-425.
- Blaikie, N. (2000). *Designing social research: The logic of anticipation*. Cambridge, Polity Press.
- Bleeke, J. and D. Ernst (1995). Is your strategic alliance really a sale? *Harvard Business Review* 73, (1): 97-105.
- Bolton, G. (2005). *Reflective practice*. (2nd Ed.). London, Sage Publications.
- Boomsma, A. (1983). *On the robustness of LISREL (maximum likelihood estimation) against small sample size and non-normality*. Amsterdam, Sociometric Research Foundation.
- Boostrom, R. (1994). *Developing creative and critical thinking*. New York, Freeman.
- Boyd, R. D. and J. W. Apps (1980). *Redefining the discipline of adult education*. San Francisco, Josey-Bass.
- Brewer, A. and D. Hensher (1998). The importance of organizational commitment in managing change: Experience of the NSW private bus industry. *Logistic and Transport Review* 34, (2): 117-130.

Brewer, J. and A. Hunter (1989). *Multimethod research: A synthesis of styles*. Newbury Park, Sage.

Brewer, R. (2007). *Your PhD thesis*. Abergele, Studymates.

Brower, H. H., S. W. Lester, et al. (2009). A Closer Look at Trust Between Managers and Subordinates: Understanding the Effects of Both Trusting and Being Trusted on Subordinate Outcomes. *Journal of Management* 35: 327-347.

Bryman, A. and E. Bell (2003). *Business research methods*. Oxford, Oxford University Press.

Burke Johnson, R. and A. J. Onwuegbuzie (2004). Mixed methods research: A research paradigm whose time has come. *Educational Researcher* 33, (7): 14-26.

Butler, J. K. (1983). Reciprocity of trust between professionals and their secretaries. *Psychological Reports* 53: 411-416.

Butler, J. K. (1991). Toward understanding and measuring conditions of trust: Evolution of a conditions of trust inventory. *Journal of Management* 17: 643-663.

Caldwell, C. and L. A. Hayes (2007). Leadership, trustworthiness and the mediating lens. *Journal of Management Development* 26, (3): 261-281.

Cartwright, S. and C. L. Cooper (1990). The impact of mergers and acquisitions on people at work: existing research and issues. *British Journal of Management* 1: 65-76.

Cartwright, S. and C. L. Cooper (1993). The role of culture compatibility in successful organisational marriage. *Academy of Management Executive* 7, (2): 57-70.

Cartwright, S. and C. L. Cooper (1995). Organizational marriage: 'hard' versus 'soft' issues? *Personnel Review* 24, (3): 32-42.

Cartwright, S. and C. L. Cooper (1996). *Managing mergers acquisitions and strategic alliances: integrating people and cultures*. Oxford, Butterworth-Heinemann.

Casson, M. (1991). *The economics of business culture*. Oxford, Clarendon Press.

Casson, M. (1995). *Entrepreneurship and Business Culture*. Aldershot, Edward Elgar Publishing.

Casson, M. and M. D. Giusta (2006). The economics of trust. In R. Bachmann and A. Zaheer. *Handbook of Trust*. (pp. 332-354). Cheltenham, Edward Elgar Publishing.

Cattell, R. B. (1966). The scree test for the number of factors. *Multivariate Behavioral Research* 1: 245-276.

- Chalmers, A. F. (1999). *What is this thing called science?* Buckingham, Open University Press.
- Charmaz, K., Ed. (2000). *Handbook of qualitative research*. Thousand Oaks, CA, Sage.
- Chaudhuri, S. and B. Tabrizi (1999). Capturing the real value in high-tech acquisitions. *Harvard Business Review* 77, (5): 123-130.
- Chia, J. (2005). Is trust a necessary component of relationship management. *Journal of Communication Management* 9, (3): 277-285.
- Child, J. and G. Mollering (2003). Contextual confidence and active trust development in the Chinese business environment. *Organizational Science* 14, (1): 69-80.
- Chow, S. and R. Holden (1997). Toward an understanding of loyalty: The moderating role of trust. *Journal of Managerial Issues* 9, (3): 275-298.
- Chowdhury, S. (2005). The role of affect and cognition-based trust in complex knowledge sharing. *Journal of Managerial Issues* 17, (3): 310–26.
- Chrystal, K. A. and R. G. Lipsey (1997). *Economics for business and management*. Oxford, Oxford University Press.
- Clark, C. (2009). Paths between Positivism and Interpretivism: An Appraisal of Hay's Via Media. *Politics* 29, (1): 28-36.
- Clark, M. and R. Payne (2006). Character-based determinants of trust in leaders. *Risk Analysis* 26,(5): 1161–1173
- Coffield, F., D. Moseley, Hall, D. and Ecclestone, K. (2004). *Learning styles and pedagogy in post-16 learning. A systematic and critical review*. London, Learning Skills Research Centre.
- Cohen, J. (1992). Statistical power analysis. *Current directions in Psychological Science* 1(3): 98-101.
- Colquitt, J. A., B. A. Scott, et al. (2007). Trust, trustworthiness, and trust propensity: A meta-analytic test of their unique relationships with risk taking and job performance. *Journal of Applied Psychology* 92: 902-927.
- Comrey, A. L. and H. B. Lee (1992). *A first course in factor analysis*. Hillsdale, NJ, Erlbaum.
- Cools, W., W. I. M. Van Den Noortgate and Onghena, P. (2008). ML-DEs: *A program for designing efficient multilevel studies*. 40: 236-249.
- Costa, A. C. (2003). Work team trust and effectiveness. *Personnel Review* 32, (5): 605-622.

Cottrell, S. (2003). *The Personal Development Planning Handbook*. Basingstoke, Palgrave Macmillan.

Cress, U. (2008). The need for considering multilevel analysis in CSCL research: An appeal for the use of more advanced statistical methods. *International Journal of Computer-Supported Collaborative Learning* 3(1): 69-84.

Cummings, L. L. and P. Bromiley (1996). The Organizational Trust Inventory (OTI): development and validation. In R. M. Kramer and T. R. Tyler. *Trust in organizations*. (pp. 302-330). Thousand Oaks, Sage Publications.

Cunningham, J. B. (1995). Strategic considerations in using action research for improving personnel practices. *Public Personnel Management* 24, (2): 515-529.

Cunningham, J. B. and J. McGregor (2000). Trust and the design of work: complementary constructs in satisfaction and performance. *Human Relations* 53, (12): 1575-1591.

Curwin, J. and R. Slater (1994). *Quantitative methods for business decisions*. (3rd Ed.) London, Chapman and Hall.

Czarniawska, B. (1998). *A narrative approach to organizational studies*. Thousand Oaks, CA, Sage Publications.

Das, T. K. and B. Teng (2001). Trust, control and risk in strategic alliances: an integrated framework. *Organizational Studies* 22, (2): 251-283.

Davy, J. A., A. Kinicki, et al. (1988). After the merger: dealing with people's uncertainty. *Training and Development Journal* 12: 281-297.

de Winter, J. C. F., D. Dodou, and Wieringa, P.A. (2009). Exploratory factor analysis with small sample sizes. *Multivariate Behavioral Research* 44: 147-181.

Dekker, H. C. (2004). Control of inter-organisational relationships: evidence on appropriation concerns and coordination requirements. *Accounting, Organizations and Society* 29, (1): 27-49.

Derbyshire, E. (2005). *The roles of trust, risk and control in successful post-acquisition integration in the space industry*, Postgraduate Conference. University of Portsmouth. Unpublished conference paper.

Derbyshire, E. (2006). *The roles of trust, risk and control in successful post-acquisition integration in the space industry*, MBA dissertation. University of Portsmouth.

Derbyshire, E., A. Hoecht, B. Schyns. (2010). *The role of trust in retention of key staff – a high technology application*. EIASM 5th Workshop on trust within and between organisations. Madrid.

- Deutsch, M. (1958). Trust and suspicion. *Journal of Conflict Resolution* 2: 265-279.
- Deutsch, M. (1962). *Cooperation and trust: Some theoretical notes*. Nebraska Symposium on Motivation, Lincoln, NE, University of Nebraska Press.
- Dietz, G. and D. N. Den Hartog (2006). Measuring trust inside organisations. *Personnel Review* 35, (5): 557-588.
- Dirks, K. T. (2000). Trust in leadership and team performance: Evidence from NCAA basketball. *Journal of Applied Psychology* 85: 1004-1013.
- Dirks, K. T. and D. L. Ferrin (2002). Trust in leadership: Meta-analytic finding and implications for research and practice. *Journal of Applied Psychology* 87: 611-628.
- Dooley, K. J. and B. J. Zimmerman (2003). Merger as marriage: Communication issues in postmerger integration. *Healthcare Management Review* 28, (1): 55-67.
- Douglas, W. (1990). Uncertainty, information-seeking, and liking during initial interaction. *Journal of Speech Communication* 54: 66-81.
- Dretzke, B. J. (2005). *Statistics with Microsoft Excel*. (3rd Ed.) Upper Saddle River, Pearson Education.
- Driscoll, J. W. (1978). Trust and participation if organizational decision making as predictors of satisfaction. *Academy of Management Journal* 21: 44-56.
- Drucker, P. (1993). *Managing for the future: the 1990s and beyond*. New York, Penguin.
- Dunn, R. (1984). Matching teaching and learning styles. *Theory into Practice* 23, (1): 10-19.
- Eden, C. and C. Huxham (1996). Action research for management research. *British Journal of Management* 7, (1): 75-86.
- Field, A. (2009). *Discovering statistics using SPSS*. London, Sage.
- Fryxell, G. E., R. S. Dooley, and Vryza, M. (2002). After the ink dries: The interaction of trust and control in US-based international joint ventures. *Journal of Management Studies* 39: 865-886.
- Fukuyama, F. (1995). *Trust: The social virtues and the creation of prosperity*. London, Penguin Books.
- Gabarro, J. J. (1978). The development of trust, influence and expectations. Interpersonal behaviour: In A. G. Athos and J. J. Gabarro. *Communication and understanding in relationships*. Englewood Cliffs, NJ, Prentice-Hall: 290-304.

Galford, R. and A. S. Drapeau (2003). The enemies of trust. *Harvard Business Review* 81, (2): 88-95.

Gambetta, D., Ed. (1988). *Trust - making and breaking cooperative relationships*. Oxford, Basil Blackwell.

Gardner, H. (1983). *Frames of mind*. New York, Basic Books.

Gill, G. and P. Johnson (1997). *Research methods for managers*. London, Paul Chapman Publishing.

Gillespie, N. (2003). Measuring trust in working relationships: the behavioural trust inventory. *Academy of Management Meeting*. Seattle.

Gillespie, N. and L. Mann (2004). Transformational leadership and shared values: the building blocks of trust. *Journal of Managerial Psychology* 19, (6): 588-607.

Glaser, B. and A. Strauss (1967). *The discovery of grounded theory*. Chicago, Aldine.

Goldstein, H. and J. Rasbash (1996). Improved approximations for multilevel models with binary responses. 159: 505-513.

Gomez, R. and E. Santor (2001). Membership has its privileges: the effect of social capital and neighbourhood characteristics on the earnings of microfinance borrowers. *Canadian Journal of Economics* 34, (4): 943-966.

Gopinath, C. (2003). When acquisitions go awry: pitfalls in executing corporate strategy. *Journal of Business Strategy* 24, (5): 22-26.

Govier, T. (1994). *Is it a jungle out there? Trust, distrust and construction of social reality*. Cambridge, Cambridge University Press.

Graebner, M. E. (2004). Momentum and serendipity: How acquired leaders create value in the integration of technology firms. *Strategic Management Journal* 25: 751-777.

Green, S. B. (1991). How many subjects does it take to do a regression analysis. *Multivariate Behavioral Research* 26: 499-510.

Greene, J. C., V. J. Caracelli, and Graham, W.F. (1989). Toward a Conceptual Framework for Mixed-Method Evaluation Designs. *Educational Evaluation and Policy Analysis* 11,(3): 255-274.

Greenland, S., J. A. Schwartzbaum, and Finkle, W.D. (2000). Problems due to Small Samples and Sparse Data in Conditional Logistic Regression Analysis. *American Journal of Epidemiology* 151, (5): 531-539.

- Grint, K. (2000). *The arts of leadership*. Oxford, Oxford University Press.
- Hacker, C. A. (2003). Turnover: a silent profit killer (staff turnover). *Information Systems Management* 20, (2): 14-18.
- Hancock, D. R. and B. Algozzine (2006). *Doing case study research*. New York, Teachers College Press.
- Hantrais, L. (1995). Comparative research methods. Social Research Update 13. Retrieved October 3rd 2009 from <http://sru.soc.surrey.ac.uk/SRU13.html>
- Harris, S. and M. Dibben (1999). Trust and Co-operation in Business Relationship Development: Exploring the Influence of National Values. *Journal of Marketing Management* 15: 463-483.
- Haspeslagh, P. and D. B. Jemison (1991). *Managing acquisitions: Creating value through corporate renewal*. New York, Free Press.
- Hay, C. (2002). *Political analysis: A critical introduction*. Basingstoke, Palgrave.
- Henson, R. K. and J. K. Roberts (2006). Use of exploratory factor analysis in published research. *Educational and Psychological Measurement* 66, (3): 393-416.
- Hoecht, A. (2004). Control in collaborative research and technology development: a case study in the chemical industry. *Journal of Managerial Psychology* 19, (3): 218-234.
- Hoecht, A. and P. Trott (1999). Trust, risk and control in the management of collaborative technology development. *International Journal of Innovation Management* 3, (3): 257-270.
- Honey, P. and A. Mumford (1992). *Manual of learning style*. (3rd Ed.) London, Peter Honey.
- Hooghe, M. (2003). Why should we be bowling alone? Results from a Belgian survey on civic participation. *Voluntas: International Journal of Voluntary and Nonprofit Organisations* 14, 1: 41 - 59.
- Howe, K. R. (1988). Against the Quantitative-Qualitative Incompatibility Thesis or Dogmas Die Hard. *Educational Researcher* 17, (8): 10-16.
- Howe, K. R. (2004). A Critique of Experimentalism. *Qualitative Inquiry* 10, (1): 42-61.
- Hox, J. J. and C. J. M. Maas (2001). The Accuracy of Multilevel Structural Equation Modeling With Pseudobalanced Groups and Small Samples, *Psychology Press*. 8: 157 - 174.
- Hsieh, F. Y., D. A. Bloch, and Larsen, M.D. (1998). A simple method of sample size calculation for linear and logistic regression. *Statistics in Medicine* 17, (14): 1623-1634.

- Huff, L. and Kelley, L. (2003). Levels of organisational trust in individualistic versus collectivist societies: A seven-nation study. *Organizational Science* 14, (1): 81-90
- Hutcheson, G. and N. Sofroniou (1999). *The multivariate social scientist*. London, Sage.
- Inkpen, A. C. and S. C. Currall (2004). The co-evolution of trust, control, and learning in joint ventures. *Organizational Science* 15, (5): 586-599.
- Jarillo, J. C. (1990). Comments on 'transaction costs and networks'. *Strategic Management Journal* 11, (6): 497-499.
- Jeffrey, A. S. (2007). Psychological Foundations of Trust. 16: 264-268.
- Jennings, E. E. (1971). *Routes to the executive suite*. New York, NY, McGraw Hill.
- Johnson, G., K. Scholes, and Whittington, R. (2006). *Exploring corporate strategy*. (7th Ed.) London, Prentice Hall.
- Johnson, R. B. and L. A. Turner (2003). Data collection strategies in mixed methods research. In A. Tashakorri and C. Teddlie. *Handbook of mixed methods in social and behavioral research*: (pp. 297-319). Thousand Oaks, Sage
- Jones, G. R. and J. M. George (1998). The experience and evolution of trust: Implications for cooperation and teamwork. *Academy of Management Review* 23, (3): 531-546.
- Khalil, E., Ed. (2003). *Trust*. Cheltenham, Edward Elgar Publishing.
- Kilmann, R., Saxton, M. and Serpa, R. (1985). Five key issues in understanding and changing culture. In Kilmann, R. Saxton, M. and Serpa, R. (Eds.) *Gaining control of the corporate culture*. Oxford, Jossey-Bass.
- Kim, P. H., K. T. Dirks, and Cooper, C.D. (2009). The repair of trust: a dynamic bilateral perspective and multilevel conceptualization. *Academy of Management Review* 34, (3): 401-422.
- Kirk, R. E. (1996). Practical significance: a concept whose time has come. *Educational and Psychological Measurement* 56, (5): 746-759.
- Knack, S. (2003). Groups, growth and trust: Cross-country evidence on the Olson and Putnam hypotheses. *Public Choice* 117, (3): 341 - 355.
- Knowles, M. S., E. F. Holton III, and Swanson, R.A. (2005). *The adult learner*. (6th Ed.) Burlington, Elsevier.
- Kolb, D. A. (1983). *Experiential learning*. New York, Prentice Hall.

Kramer, M. W. (1994). Uncertainty reduction during job transitions: An exploratory study of the communication experience of newcomers and transferees. *Management Communication Quarterly* 7: 384-412.

Kramer, M. W. (1996). Divergent realities and convergent disappointments in the hierarchical relation: Trust and the intuitive author at work. In M. W. Kramer and T. R. Tyler. (Eds.) *Trust in Organizations*. (pp. 216-245). Thousand Oaks, Sage.

Kramer, R. M. and T. R. Tyler, Eds. (1996). *Trust in organizations*. Thousand Oaks, CA, Sage.

Krug, J. and D. Nigh (2001). Executive Perceptions in Foreign and Domestic Acquisitions: An Analysis of Foreign Ownership and its Effect on Executive Fate. *Journal of World Business* 36, (1): 85-105.

Krug, J. A. (2003). Why do they keep leaving? *Harvard Business Review* 81, (2): 14-15.

Kvale, S. and S. Brinkmann (2009). *Interviews: Learning the craft of qualitative research interviewing*. Thousand Oaks, Sage Publishing.

Lane, C. and R. Bachmann (1996). The social constitution of trust: Supplier relationships in Britain and Germany. *Organizational Studies* 17, (3): 365-396.

Lane, C. and R. Bachmann, Eds. (1998). *Trust within and between organisations*. New York, Oxford University Press.

Langfield-Smith, K. and D. Smith (2003). Management control systems and trust in outsourcing relationships. *Management Accounting Research* 14, (3): 281-307.

Lazaric, N. (2003). Trust building inside the 'Epistemic Community': Some investigation with an empirical case study. In B. Nooteboom and F. Six. (Eds.), *The trust process in organizations*. (pp. 147-167). Cheltenham, Edward Elgar.

Lee, T. and T. Mitchell (1994). An alternative approach: The unfolding model of employee turnover. *Academy of Management Review* 19: 51-89.

Lewicki, R. J. and B. B. Bunker (1995). Trust in relationships: A model of trust development and decline. In B. B. Bunker and J. Z. Rubin. *Conflict, cooperation and justice*. (pp. 146-161). San Francisco, CA, Josey-Bass.

Lewicki, R. J. and B. B. Bunker (1996). Developing and maintaining trust in work relationships. In R. M. Kramer and T. R. Tyler. *Trust in organizations*. (pp. 114-139). Thousand Oaks, CA, Sage Publications.

Lewicki, R. J., D. J. McAllister, and Bies, R.J. (1998). Trust and distrust: New relationships and realities. *Academy of Management Review* 23, (3): 438-458.

- Lewicki, R. J. and M. A. Stevenson (1998). Trust development in negotiation: Proposed actions and a research agenda. *Journal of Business and Professional Ethics* 16, 1-3.
- Lewicki, R. J., E. C. Tomlinson, and Gillespie, N. (2006). Models of Interpersonal Trust Development: Theoretical Approaches, Empirical Evidence, and Future Directions. *Journal of Management* 32, (6): 991-1022.
- Lewin, K. (1946). Action research and minority problems. *Journal of Social Issues* 2, (4): 34-46.
- Lewis, C. S. (1950). *The Lion, the Witch and the Wardrobe*. London, Collins.
- Lewis, C. S. (1956). *The Last Battle*. London, Collins.
- Lewis, J. D. and A. Weigert (1985). Trust as a social reality. *Social Forces* 63, (4): 967-985.
- Linz, S. J. (2004). Motivating Russian workers: analysis of age and gender differences. *Journal of Socio-Economics* 33, (3): 261-289.
- Liu, J. and D. Wilson (2001). The unchanging perception of women as managers. *Women in Management Review* 16, (4): 163-173.
- Long, C. P. and S. B. Sitkin (2006). Trust in the balance: how managers integrate trust-building and task control. In R. Bachmann and A. Zaheer. *Handbook of Trust Research*. (pp. 87-106). Cheltenham, Edward Elgar Publishing.
- Luhmann, N. (1979). *Trust and power*. Chichester, Wiley.
- Maas, C. J. M. and J. J. Hox (2005). Sufficient sample sizes for multilevel modelling. *Methodology* 1, (3): 86-92.
- Market Research Society (2006). Conducting research with employees. Retrieved January 16th 2007, from http://www.mrs.org.uk/standards/downloads/revised/active/employee_mar06.pdf.
- Marks, M. L. and P. H. Mirvis (2001). Making mergers and acquisitions work: Strategic and psychological preparation. *Academy of Management Executive* 15, (2): 80-92.
- Mathieu, J. E. and D. M. Zajac (1990). A review and meta-analysis of the antecedents, correlates and consequences of organizational commitment. *Psychological Bulletin* 108: 171-194.
- Maxcy, S. J. (2003). Pragmatic threads in mixed methods research in the social sciences: The search for multiple modes of inquiry and the end of the philosophy of formalism. In A. Tashakkori and C. Teddlie. *Handbook of mixed methods in social and behavioral research*. (pp. 51-90). Thousand Oaks, CA, Sage.
- Mayer, R. C. and J. H. Davis (1999). The effect of the performance appraisal system on trust for management: a field quasi-experiment. *Academy of Management Review* 24, (1): 123-136.

- Mayer, R. C., J. H. Davis, and Schoorman, F.D. (1995). An integrative model of organisational trust. *Academy of Management Review* 20, (3): 709-734.
- Mayer, R. C. and M. B. Gavin (2005). Trust in management and performance: who minds the shop while the employees watch the boss? *Academy of Management Journal* 48, (5): 874-888.
- McAllister, D. J. (1995). Affect and cognition based trust as foundations for interpersonal cooperation in organizations. *Academy of Management Journal* 38, (1): 24-59.
- McAllister, D. J., R. J. Lewicki, and Bies, R.J. (2000). *Hardball: How trust and distrust interact to predict hard influence tactic use*. Academy of Management Conference. Toronto, Canada.
- McAllister, D. J., R. J. Lewicki, et al. (2006). *Trust in developing relationships: From theory to measurement*. Academy of Management meetings, Atlanta, GA.
- McEvily, B., V. Perrone, and Zaheer, A. (2003). Trust as an organising principle. *Organizational Science* 14, (1): 91-103.
- McEvily, B. and M. Tortoriello (2007). Measuring trust in organizational research: Review and recommendations, *Working paper*. Rotman School of Management, University of Toronto.
- McKnight, D. H., L. L. Cummings, Chervany, N.L. (1998). Initial trust formation in new organisational relationships. *Academy of management Review*, 23, (3): 473-490.
- McNair, S. (1997). Is there a crisis? Does it matter? In Barnett, R. and Griffin, A. (Eds). *The end of knowledge in higher education*. (pp. 27-38). London: Cassell.
- Meer, D. (2005). Enter the "chief growth officer": searching for organic growth. *Journal of Business Strategy* 26, (1): 13-17.
- Miles, J. N. V. and M. Shevlin (2001). *Applying regression and correlation: a guide for students and researchers*. London, Sage.
- Milne, P. (2007). Motivation, incentives and organisational culture. *Journal of Knowledge Management* 11, (6): 28-38.
- Milton, S. (1986). A Sample Size Formula for Multiple Regression Studies. *Public Opinion Quarterly* 50, (1): 112-118.
- Mirjam, M. and W. Weng Kee (2008). Sample size formulae for trials comparing group and individual treatments in a multilevel model. *Statistics in medicine*, 27: 2850-2864.
- Mishra, A. and K. Mishra (2008). *Trust is everything*. Lansing, Aneil K. Mishra and Karen E. Mishra.

- Mishra, A. K., G. M. Schwarz, and Mishra, K.E. (2008). The co-evolution of trust and control when organisations grow. *Academy of management Annual Meeting*. Anaheim, California.
- Moerbeek, M. and C. Maas (2005). Optimal Experimental Designs for Multilevel Logistic Models with Two Binary Predictors. *Communications in Statistics: Theory and Methods* 34, (5): 1151-1167.
- Moerbeek, M., G. Van Breukelen, Berger, M. and Ausems, M. (2003). Optimal Sample Sizes in Experimental Designs With Individuals Nested Within Clusters. *Understanding Statistics* 2, (3): 151-175.
- Moineddin, R., F. I. Matheson, and Glazier, R.H. (2007). A simulation study for sample size for multilevel logistic regression models. *BMC Medical Research Methodology* 7, (34): 34-44.
- Mollering, G. (2006). Trust, institutions, agency: towards neoinstitutional theory of trust. In R. Bachmann and A. Zaheer. *Handbook of Trust*. (pp. 355-376). Cheltenham, Edward Elgar Publishing.
- Morgan, R. M. and S. Hunt (1994). The commitment-trust theory of relational marketing. *Journal of Marketing* 58, (3): 20-39.
- Morrow, J. L., M. H. Hansen, and Pearson, A.W. (2004). The cognitive and affective antecedents of general trust within cooperative organizations. *Journal of Managerial Issues* 16, (1): 48-64.
- Morrow, P. (1993). *The theory and measurement of work commitment*. Greenwich, JAI Press.
- Mowday, R. T., L. W. Porter, and Steers, R.M. (1982). *Employee-organization linkages: the psychology of commitment, absenteeism, and turnover*. New York, Academic Press.
- Mowday, R. T., R. M. Steers, and Porter, L.W. (1979). The measurement of organizational commitment. *Journal of Vocational Behavior* 14, (2): 224-247.
- Mussen, P. H. and M. C. Jones (1957). Self-conceptions, Motivations and Interpersonal Attitudes of Late and Early-Maturing Boys. *Child Development* 28, (2): 243-256.
- Nikandrou, I., N. Papalexandris, and Bourantas, D. (2000). Gaining employee trust after acquisition: Implications for management action. *Employee Relations* 22, (4): 334-355.
- Nooteboom, B. and F. Six, Eds. (2003). *The trust process in organizations*. Cheltenham, Edward Elgar Publishing.
- North, D. (1990). *Institutions, Institutional Change and Economic Performance*. Cambridge, MA, Cambridge University Press.
- Nyham, R. C. (1999). Increasing affective organisational commitment in public organizations: The key role of interpersonal trust. *Review of Public Personnel Administration* 19: 58-70.

- O' Brian, R. C. (2001). *Trust: Releasing the energy to succeed*. Chichester, John Wiley.
- Pallant, J. (2005). *SPSS Survival Manual*. (2nd Ed.) Maidenhead, Open University Press.
- Pava, C. (1983). *Managing new office technology: An organizational strategy*. New York, Free Press.
- Pearce, W. B. (1974). Trust in interpersonal communication. *Communication Monographs* 41, (3): 236-244.
- Pettigrew, A. (1990). Longitudinal field research on change: Theory and practice. *Organizational Science* 1, (3): 267-292.
- Pierce, C. A., R. A. Block, and Aguinis, H. (2004). Cautionary note on reporting eta-squared values from multifactor anova designs. *Educational and Psychological Measurement* 64, (6): 916-924.
- Pilotte, W. J. and R. K. Gable (1990). The impact of positive and negative item stems on the validity of a computer anxiety scale. *Educational and Psychological Measurement* 50: 603-609.
- Piske, R. (2002). German acquisitions in Poland: An empirical study on integration management and integration success. *Human Resource Development International* 5, (3): 295-312.
- Porter, G. (2004). Work, work ethic, work excess. *Journal of Organizational Change Management* 17, (5): 424-439.
- Porter, L., R. Steers, Mowday, R. and Boulian, P. (1974). Organizational commitment, job satisfaction, and turnover among Psychiatric Technicians. *Journal of Applied Psychology* 59, (5): 603-609.
- Porter, L. W., E. E. Lawler, and Hackman, J.R. (1975). *Behavior in organizations*, New York: McGraw-Hill.
- Porter, M. E. (1980). *Competitive Strategy*. New York, The Free Press.
- Porter, M. E. (1987). From competitive advantage to corporate strategy. *Harvard Business Review* 65, (3): 43-60.
- Potter, S. (2006). *Doing Postgraduate Research*. Milton Keynes, Open University.
- Preacher, K. J. and R. C. MacCallum (2002). Exploratory factor analysis in behavior genetics research: Factor recovery with small sample sizes. *Behavior Genetics* 32: 153-161.
- Pritchett, P., D. Robinson, and Clarkson, R. (1997). *After the merger: the authoritative guide to integration success*. New York, McGraw-Hill.

- Puranam, P. and B. S. Vanneste (2009). Trust and governance: untangling a tangled web. *Academy of Management Review* 34, (1): 11-31.
- Rasbash, J. (2010). *What are multilevel models and why should I use them?* University of Bristol; Centre for Multilevel Modelling. Retrieved 12th December 2009 from <http://www.cmm.bristol.ac.uk/learning-training/multilevel-models/what-why.shtml>
- Raspe, O. and F. Van Oort (2006). The knowledge economy and urban economic growth. *European Planning Studies* 14, (9): 1209-1234.
- Ray, E. B. (1991). The relationship among communication network roles, job stress and burn-out in educational organizations. *Communication Quarterly* 39: 91-102.
- Reed, I. (2008). Social Theory, Post-Post-Positivism and the Question of Interpretation. *International Sociology* 23, (5): 665-675.
- Reed, M. (1996). Expert power and control in late modernity: An empirical review and theoretical synthesis. *Organization Studies* 17, (4): 573-597.
- Ring, P. S. and A. H. Van de Ven (1994). Developmental processes of co-operative interorganizational relationships. *Academy of Management Review* 19, (1): 90-118.
- Robinson, M. A., P. R. Sparrow, Clegg, C. and Birdi, K. (2007). Forecasting future competency requirements: a three-phase methodology. *Personnel Review* 36, (1): 65-90.
- Robson, C. (2002). *Real World Research*. (2nd ed.), Oxford, Blackwell.
- Ross, W. and J. LaCroix (1996). Multiple meanings of trust in negotiation theory and research: a literature review and integrative model. *International Journal of Conflict Management* 7, (4): 314-360.
- Rotter, J. (1967). A new scale for the measurement of interpersonal trust. *Journal of Personality* 35, (4): 651-665.
- Rousseau, D., S. B. Sitkin, Burt, R.S. and Camerer, C. (1998). Not so different after all: a cross discipline view of trust. *Academy of Management Review* 23, (3): 393-404.
- Sako, M., Ed. (1998). *Does trust improve business performance? Trust within and between organisations*. New York, Oxford University Press.
- Saunders, M., P. Lewis, and Thornhill, A. (2003). *Research methods for business students*. (4th Ed.) Harlow, Pearson Education.
- Saunders, M., P. Lewis, and Thornhill, A. (2000). *Research Methods for Business Students*. (3rd Ed.) Harlow, Pearson.

Saunders, M. and A. Thornhill (2004). Trust and mistrust in organizations: an exploration using an organizational justice framework. *European Journal of Work and Organizational Psychology* 13, (4): 493-515.

Saunders, M. and A. Thornhill (2007). *Conceptualising trust and distrust and the role of boundaries: an organisationally based exploration*. EIASM 4th Workshop on trust and boundaries. Amsterdam, The Netherlands.

Schafer, J. L. and M. K. Olsen (1998). Multiple Imputation for Multivariate Missing-Data Problems: A Data Analyst's Perspective. *Multivariate Behavioral Research* 33,(4): 545 - 571.

Schockley-Zalabak, P., K. Ellis, and Winograd, G. (2000). Organisational trust: what it means, why it matters. *Organizational Development Journal* 18, (4): 35-48.

Schon, D. A. (1987). *Educating the reflective practitioner*. San Francisco, Josey-Bass.

Schoorman, F. D., R. C. Mayer, and Davis, J.H. (2007). An integrative model of organizational trust: Past, present, and future. *Academy of Management Review* 32, (2): 344-354.

Schriesheim, C. A., R. J. Eisenbach, and Hill, K.D. (1991). The effects of negation and polar opposite items reversals on questionnaire reliability and validity: an experimental investigation. *Educational and Psychological Measurement* 51, (1): 67-78.

Schutz, A. (1962). *Collected papers, I. The problem of social reality*. The Hague, Martinus Nijhof.

Scott, D. (1980). The causal relationship between trust and the assessed value of management by objectives. *Journal of Management* 6, 157-175.

Scott, D., A. Brown, Lunt, I. and Thorne, L. (2004). *Professional Doctorates: Integrating Professional and Academic Knowledge*. Maidenhead, Open University Press.

Searle, R. H. and K. S. Ball (2004). The development of trust and distrust in a merger. *Journal of Managerial Psychology* 19, (7): 708-721.

Senior, B. (2002). *Organisational change*. (2nd ed.). Harlow: Pearson Education.

Shakespeare, W. (c. 1595). *A Midsummer Night's Dream*.

Shamir, B. and Y. Lapidot (2003). Trust in organisational superiors: Systematic and collective considerations. *Organizational Studies* 24: 463-491.

Shapiro, D., B. H. Sheppard, Cheraskin, L. (1992). Business on a handshake. *Negotiation Journal* 8, (4): 365-377.

- Shrivastava, P. (1986). Post-merger integration. *Journal of Business Strategy* 7: 65-76.
- Silverman, D. (2005). *Doing qualitative research*. London, Sage.
- Simpson, J. A. (2007). Foundations of interpersonal trust. In A. W. Kruglanski & E. T. Higgins (Eds.), *Social psychology: Handbook of basic principles* (2nd ed.). New York: Guilford.
- Sin-Ho, J., K. Seung-Ho, and Chul, A. (2001). Sample size calculations for clustered binary data. *Statistics in Medicine* 20, (13): 1971-1982.
- Smith, J. K. (1983). Quantitative Versus Qualitative Research: An Attempt to Clarify the Issue. *Educational Researcher* 12, (3): 6-13.
- Smith, R. M. (1982). *Learning how to learn*. New Jersey, Cambridge.
- Snijders, T. A. B. and R. J. Bosker (1993). Standard errors and sample sizes for two-level research. *Journal of Educational Statistics* 18: 237-259.
- Snijders, T. A. B. and R. J. Bosker (1999). *Multilevel Analysis: An introduction to basic and advanced multilevel modelling*. London, Sage.
- Speed, R. (1994). Regression Type Techniques and Small Samples: A Guide to Good Practice. *Journal of Marketing Management* 10, (1): 89-104.
- Spreitzer, G. M. and A. K. Mishra (1999). Giving up without losing control: trust and its substitutes' effects on managers' involving employees in decision-making. *Group and Organizational Management* 24, (2): 155-187.
- Stahl, G., C. H. Chua, and Pablo, A. (2003). *Trust following acquisitions: A three country comparative study of employee reactions to takeovers*. Academy of Management Conference. Toronto.
- Stevens, J. P. (2002). *Applied multivariate statistics for the social sciences*. Hillsdale, NJ, Erlbaum.
- Steyerberg, E. W., Ewout, W., M. J. C. Eijkemans, Marinus J. C., Habbema, J. and Dik F. (1999). Stepwise Selection in Small Data Sets: A Simulation Study of Bias in Logistic Regression Analysis. *Journal of Clinical Epidemiology* 52, (10): 935-942.
- Strauss, A. and J. M. Corbin (1998). *Basics of qualitative research: Techniques and procedures for developing grounded theory*. Newbury Park, Sage.
- Tam, M., M. Korczynski, and Frenkel, S. (2002). Organizational and occupational commitment: Knowledge workers in large corporations. *Journal of Management Studies* 39, (6): 775-801.

- Tansky, J. W. and D. J. Cohen (2001). The relationship between organizations; support, employee development, and organizational commitment: an empirical study. *Human Resource Development Quarterly* 12, (3): 285-300.
- Taylor, P. and A. Walker (1998). Employers and older workers: attitudes and employment practices. *Ageing & Society* 18, (06): 641-658.
- Thomas, R. (1997). *Quantitative methods for business studies*. Harlow, Pearson Education.
- Trompenaars, F. and C. Hampden-Turner (1997). *Riding the waves of culture*. London, Nicholas Brealey.
- Twisk, J. W. R. (2006). *Applied Multilevel Analysis*. New York, Cambridge University Press.
- Tyler, T. R. (1990). *Why people obey the law*. New Haven, Yale University Press.
- Tyler, T. R. (2003). Trust within organisations. *Personnel Review* 32, (5): 556-568.
- Tzafrir, S. S. and S. L. Dolan (2004). Trust me: a scale for measuring manager-employee trust. *Management Research* 2, (2): 115-132.
- Unknown. (2005). Extended DISC test.
- Unknown. (2006). IWAM test.
- Unknown. (2005). Free visual, auditory, kinesthetic - learning styles model and free self test. Retrieved January 19th 2007 from <http://www.businessballs.com/vaklearningstylestest.htm>
- Valle Santos, M. and M. Teresa Garcia (2006). Managers' opinions: reality or fiction. *Management Decision* 44, (6): 752-770.
- Van de Ven, A. H. and P. S. Ring (2006). Relying on trust in co-operative inter-organizational relationships. In R. Bachmann and A. Zaheer. *Handbook of Trust Research*. (pp. 144-161). Cheltenham, Edward Elgar Publishing.
- Vanson, S., L. Howe-Walsh, Corkhill, D & Derbyshire, E. (2007). Pioneers or Mavericks - Do DBAs add value? *Portsmouth Business School Research Conference*. University of Portsmouth, Unpublished conference paper.
- Velicer, W. F. and J. L. Fava (1998). Effects of variable and subject sampling on factor pattern recovery. *Psychological Methods* 3: 231-251.
- Weber, M. (1947). *The theory of social and economic organization*. New York, Free Press.

Whitener, E. M., S. E. Brodt, Korsgaard, M.A., and Werner, J.M. (1998). Managers as initiators of trust: an exchange relationship framework for understanding managerial trustworthy behavior. *Academy of Management Review* 23, (3): 513-530.

Williams, M. (2001). In whom we trust: group membership as an affective content for trust development. *Academy of Management Review* 26, (3): 377-396.

Williamson, O. E. (1996). *The mechanisms of governance*. Oxford, Oxford University Press.

Wisniewski, M. (1997). *Quantitative methods for decision makers*. (2nd Ed.) Harlow, Pearson Education.

Wlodkowski, R. J. (1999). *Enhancing adult motivation to learn*. San Francisco, Josey-Bass.

Wood, M. (2003). *Making sense of statistics*. Basingstoke, Palgrave Macmillan.

Wooldridge, A. (2006). The battle for brainpower. *The Economist* 381, (8498): 3-16.

Yigitcanlar, T., S. Baum, and Horton, S. (2007). Attracting and retaining knowledge workers in knowledge cities. *Journal of Knowledge Management* 11, (5): 6-17.

Yin, R. K. (2003). *Case study research*. (4th ed.). Thousand Oaks, CA, Sage Publications.

Young, L. and K. Daniel (2003). Affectual trust in the workplace. *International Journal of Resource Management* 14, (1): 139-155.

Zand, D. E. (1972). Trust and managerial problem solving. *Administrative Science Quarterly* 17: 229-239.

Zucker, L. G. (1986). Production of trust: Institutional sources of economic structure. In B. M. Staw and L. L. Cummings. (Eds.), *Research in organizational behavior Vol. 8*. (pp. 53-111). Greenwich, JAI Press.

Appendix A. Personal learning and development

1.0 Introduction

This appendix has been written with several aims in mind. Firstly, the writer aimed to discover and subsequently record an understanding of his personal strengths and weaknesses, learning ability and preferences and motives for undertaking the study. Secondly, to record personal, in some cases revelatory, discovery and learning events over the duration of the four years and, thirdly, to critically reflect and evaluate the growth that has occurred. Fourthly, to develop and describe a forward-looking vision for on-going growth throughout the years beyond the DBA. The final, almost incidental, aim is to complete the University requirement to produce such a piece of work.

This learning and growing journey leads to an increased level of wisdom where wisdom can be defined as “capacity of judging rightly in matters relating to life and conduct; soundness of judgment in the choice of means and ends; sometimes, less strictly, sound sense, esp. in practical affairs” (Oxford English Dictionary, 2007). And what benefit is there in the journey towards wisdom? “Blessed is the man who finds wisdom, the man who gains understanding, for she is more profitable than silver and yields better returns than gold” (Holy Bible New International Version, 1979). Let the journey commence!

2.0 Setting the scene

The author has arrived at the DBA by a somewhat irregular route; certainly as far as formal education is concerned. Home background was strongly academic with both parents' graduates and the author's father (PhD) working in a University. Despite, and perhaps because of, the strong academic background and firm parenting, motivation to learn during the secondary years was lacking. This could possibly have been due to the late development of the author. Mussen and Jones (1957), in their study of self-conception, motivation and interpersonal attitudes in late and early maturing boys, argue that late developing boys are "more attention getting, more restless, more bossy and less grown-up". They continue stating that late developing boys "acquire different patterns of overt social behaviour". This certainly matched key characteristics of the author in early to mid-teens. In consequence, the author's experience of secondary school was unhappy and certainly contributed the desire to leave school at the earliest opportunity for greener, as yet unknown, fields.

However, motivation was discovered late in secondary school attendance through a careers evening that highlighted the possibility of employment in the Merchant Navy as a ship's Radio Officer. The post offered travel, independence and a chance to study electronics that was an appealing mix to the author. Three 'O' levels (Mathematics, English Language and Physics) were required for entry to the two and a half year training programme. Now having the motivation to achieve the author was able to obtain the necessary 'O' levels, leave school at 16 (1975) and progress to R.M.S. Wray Castle, a Merchant Navy training college located near Ambleside in the Lake District.

Successful studies and increased maturity saw the author leave college in 1978. The shrinking Merchant Navy did not offer many positions to Junior Radio Officers and whilst the author kept applying for posts he worked in a local electronics firm, Matthey Printed Products, testing video correction units for the BBC. A year later, in 1979, an application was successful and the author commenced a six-year spell as a Radio Officer, with International Marine Radio. In 1983 the author was in turn, engaged and then married to Jane. The couple then spent the remainder of 1983 and 1984 sailing the seven seas.

At this point the career limitations of the post became clearer as well as the limited future need for a dedicated electronics specialist aboard commercial ships. Given that the qualifications required to join the Merchant Navy were particular to that industry, it was imperative to obtain, through further study, a qualification that was recognised 'ashore'. An HND in Marine Electronics (but with a broad transferable electronics base) was successfully undertaken in 1983 at Plymouth Polytechnic (now University of Plymouth) to allow transition to a 'shore-based' role. It is interesting to reflect that the author was, by this point in time, very open to using studying as a means to further career progress. Breen and Lindsey (1999) describe extrinsic learner motivation for study as the 'process of satisfying a need that is related to the learning activity, but is not satisfied by the learning itself'.

The post obtained was based in southern England commencing in 1984. The company produced large high technology elements, which was of interest due to the rigorous technical standards, and linked, with the author's experience of ship-based high technology provided a satisfying and challenging second career. This role was the first of many within the high technology industry.

1987 saw the birth of a daughter who has continued to delight (most of the time) and exasperate (on occasion) both her parents to this day...and not to embark on this adventure would have been unthinkable.

Development in seniority continued through the eighties and into the nineties with the roles undertaken in engineering management.

1991 was a significant year in that the author was invited to move to Canada to work with a sub-contractor on one particular high technology programme. This, in many ways, proved to be one of the author's pivotal experiences. Moving with a wife and three year old daughter to another continent with a different culture posed some significant challenges. However, these challenges were faced and overcome and some three and a half years were spent in Canada. The immersion in a different culture, albeit with a broadly similar language, was highly educational and enjoyable. During 1992 another high technology-related company, aware of the role being carried out by the author in Canada, offered the author employment transferring from the original company but still resident in Canada at the same sub-contractor site performing a slightly more responsible role.

The contract was completed and the mid-nineties saw a return to England. The sub-contracting Canadian company offered a post resident in Canada but the time was not right - this was partly driven by aging relatives and partly that the author and his wife who felt that they had thoroughly explored Canada and would like to come 'home'.

After a few years work in England a position was offered by another company that the author accepted. The senior management role involved harmonising three departments with a total headcount of fifty-five. This was accomplished and a transfer saw a further department being rejuvenated.

Over the intervening years, from 1995 onward, the Canadian company had regularly approached the author regarding various positions based in Canada. For the reasons stated above such a move was not feasible, however, in 2001 a position opened based in the UK and the author accepted the offer. Based at home, the role involved developing business for the Canadian headquarters in Europe.

2003 saw a new opportunity to develop a high-tech engineering business based in England. In order to take on this effective 'green field' opportunity, given that it would be a complete business start-up requiring staff, facilities etc. the company felt it was vital that the author undertook some formal level of study to prepare for the many business aspects that the start-up would involve.

Due to a strong sponsor within the organisation the author was offered the opportunity to be funded to study a part-time MBA over three years. Portsmouth University was selected on the basis of a good business school and short travel distance from the author's home. Somewhat to the surprise of the author he was accepted and commenced studies in 2003. Having left school at sixteen and studied electronics at Merchant Navy college and, subsequently, Plymouth Polytechnic to HND level the challenge was significant. It is of interest to reflect that prior to commencing the MBA the author's motivation was still largely extrinsic as described by Scott, Brown, Lunt and Thorne (2004). With some trepidation the author embarked on a more mainstream academic learning journey which became, after a somewhat traumatic start, hugely enjoyable and fulfilling. Here a transition appeared to have taken place in the learning motivation from a more extrinsic form (learning a gateway to a more senior role) to that of internal (or intrinsic) motivation. Knowles, Holton III & Swanson (2005) state that 'the most potent motivators are internal pressures (the desire for increased job satisfaction, self-esteem, quality of

life and the like)'. With a high level of internal motivation, based on the discovery of enjoyment in studying (with side effects of self-esteem and quality of life), having successfully completed the MBA (summer 2006), the author applied to the company for sponsoring to undertake the new part-time DBA commencing in October 2006. This application was successful and so the next part of the journey of learning and life began. Figure 1 below illustrates the journey towards the DBA.

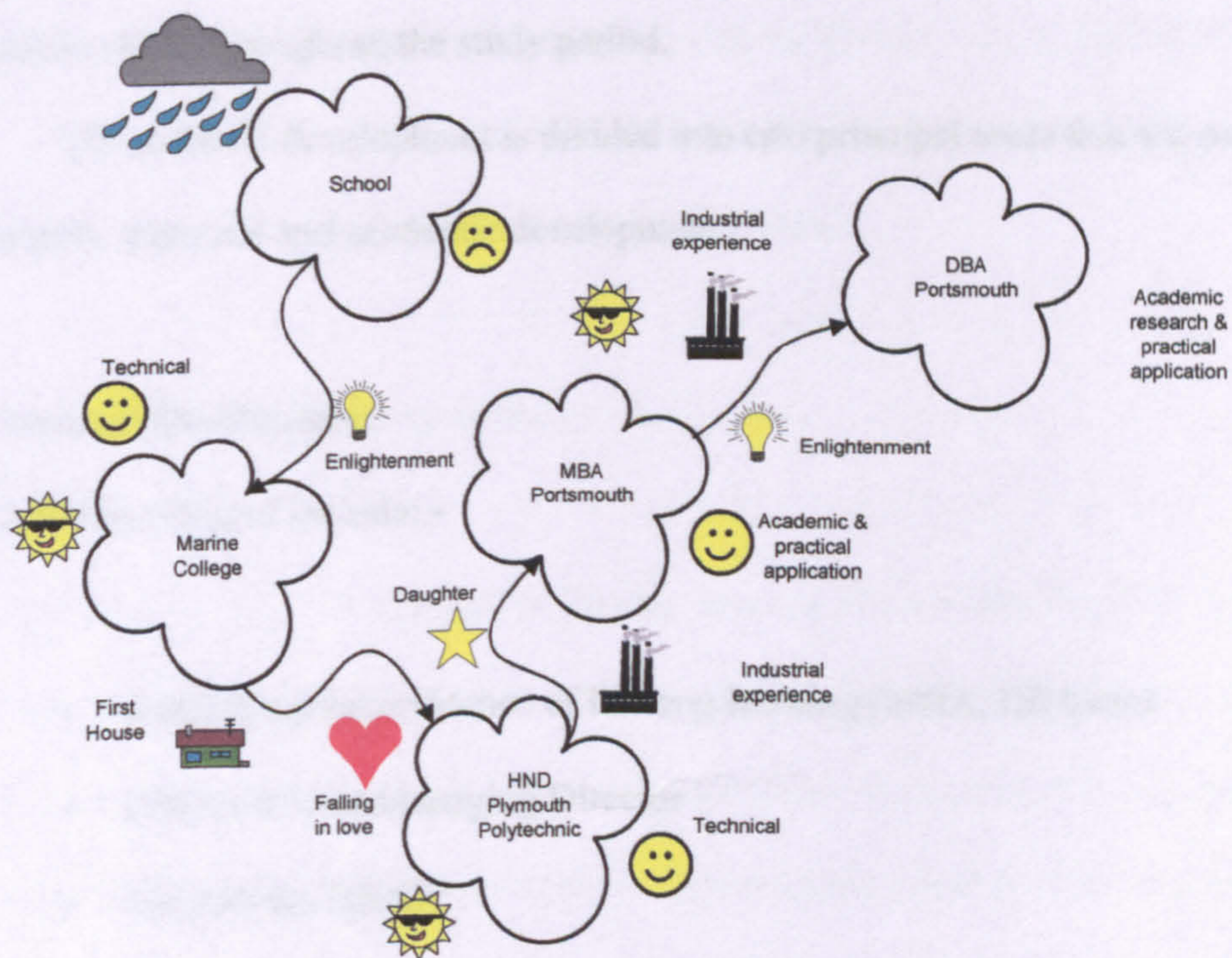


Figure 1. The journey towards the DBA

3.0 The journey so far...

Section 2.0 above illustrates the development of the author up to the point of commencement of studying towards the DBA. This section takes this point as the 'baseline' from which further development can be measured and reflected upon. In order to be able to document the learning achieved during the DBA and understand the author's motives in undertaking the DBA it is necessary to provide more thorough evidence of the personal development and academic status throughout the study period.

The author's development is divided into two principal areas that are considered separately: personal and academic development.

3.1 Personal Development

Major items covered include: -

- Importance and evidence of lifelong learning (MBA, DBA etc)
- Present role as Managing Director
- Why do the DBA?
- Personal traits
- Theories of learning, learning style
- Mentoring structure

The candidate's current role is examined to explore the links between development to-date and the on-going development the role requires.

Given the above, a summary of the reasons for the course being undertaken is offered.

Having established the background and underlying motivation the personal development framework is augmented by analysis of the candidate's strengths, weaknesses, opportunities and threats via the familiar SWOT analysis via self-assessment. This is balanced by the inclusion a number of 180-degree feedback inputs given by individuals who have a good knowledge of the candidate over a number of years, both within the industrial and the 'home' environment.

Theories of learning are briefly discussed and the learning styles of the candidate are reviewed with a view to understanding the learning experience through the 'preferred style'.

Finally, selection of the mentoring framework is considered, taking into account both industrial, academic and personal developmental needs.

3.1.1 Importance of lifelong learning

People who can be defined as lifelong learners are described by Wlodkowski (1999) as 'people who eventually find reading, writing, calculating, and expanding their knowledge and skills an interesting and satisfying way'. McNair (1997) states that lifelong learning is 'characterised by an emphasis on the development of experiential knowledge; the dissolution of boundaries between formal and informal schooling; the designation of the life course as a continuous and never-ending opportunity for learning; and the development of the continually changing self in response to ever changing environments'. The author came to more serious academic study in his mid forties through undertaking the MBA. Thus it is easy for him to identify with the 'eventually' wording of Wlodkowski above. In addition, Wlodkowski's words

‘interesting’ and ‘satisfying’ resonate strongly being an accurate description of the experience of the MBA and DBA learning.

McNair’s description of the lifelong learner is, for the author, a statement of belief. The author’s credo is exactly that life is a ‘never ending opportunity for learning’.

However, the interesting discovery for the author was that although the credo was consciously acknowledged it was the impact of the academic learning initiated with the MBA and followed by the DBA that has raised the level of individual change and accelerated and deepened the learning. This has served to emphasise the importance to the author of the vitality and richness that can be experienced in life’s situations where serious efforts are made to facilitate lifelong learning.

Evidence for the author’s lifelong learning can be determined through academic studies (HND, MBA and DBA) and through development of the individual’s skills and ability to creatively contribute to family, social and work-based environments. Highlights, used here as examples are:-

- i) a happy settled marriage of some 27 years**
- ii) bringing up a child through to adulthood**
- iii) leading and participating in church, sports teams, friendship circles**
- iv) improved skills capability leading to career progression**
- v) multi-cultural exposure**

3.1.2 Present role as Managing Director

The author's current role as Managing Director is a senior management position within the current company. Based in southern England, the individual has responsibility for development of a new business in Europe (and India) in the high-tech engineering industry. This has involved establishing a new company facility, recruiting suitably qualified staff and building the order book for high-tech engineering through business development and marketing. This responsibility called for a substantial degree of learning to be undertaken in order to augment the existing individual's skill base developing from a more engineering based level to a whole business development and management level. Note that the previous role (Director) with the Canadian company was a slightly lower level of responsibility but similar content to that described above. The employment with the Canadian company came to a close due to the friendly takeover of a company originating in the Netherlands at the end of the fourth year of DBA study.

3.1.3 Why undertake the DBA?

Given the entrepreneurial nature of the role described above continual professional development is essential in order for the author to have the skills base, understanding and reflective and analytical capability to be able to grow the business in a very competitive market. The author understood that the DBA offered an excellent opportunity to continue to develop the knowledge and skills acquired during the MBA. The immersion in the enjoyment of learning was also a motivation. It became clear, during the first few months of the first year that these reasons,

though correct were not the major motivation. Scott, Brown, Lunt and Thorne (2004) examine the motivations for undertaking the DBA broadly splitting the reasons into extrinsic (career driven) and intrinsic (professional affirmation). The author was able to identify strongly with the intrinsic motivation, being part of a highly academic family, who left school early to develop vocational skills in electronics. Here, personal fulfilment is key. The author found himself, after some period of reflection able to arrive at the major reason for doing the DBA as 'to prove to myself that I can reach the highest academic level'. It is interesting to reflect on *why* proving to oneself is so important in this case. Scott, Brown, Lunt and Thorne (2004) offer a view that 'research on an individual may be undertaken to achieve professional affirmation. This apparent need for some learners to gain recognition for their professional excellence from an external, validating source (in this case the university) may stem in some cases from negative past educational experiences and therefore result in a perceived need to prove their own professional and personal self-worth'. Thus one possible reason could be connected with the fact that the author did not attend follow the conventional route of A levels then University, despite his parents and many of his colleagues following the more usual academic road. In other words, the motivation could possibly be summarised as 'see – I *can* do this'.

3.1.4 Personal traits

In order to evaluate the learning experience offered by the DBA it is important to understand oneself. This section brings together a number of sources to form a composite analysis of the author.

The first of these are a number of 180-degree feedback results from a work colleague, a fellow student and a family member. This is augmented by two personality tests examining personal traits and likely performance, Extended DISC and iWAM Profile Management. These contribute the external evaluation, which is augmented by an analysis by the author of his personal traits in the familiar SWOT format. This exercise is important in allowing a reference point for future personal development.

3.1.4.1 Personal feedback summary

Feedback was sought from three areas: family, work manager and fellow student. These individuals were chosen to allow for good knowledge of the author balanced against a non-emotive assessment. In reality, of course, it is almost impossible to avoid bias however, there are some interesting correlations revealed from the feedback. A composite diagram of the result is presented in Figure 2 below.

The strengths appear to centre on interpersonal skills including empathy and listening/learning ability (3 of 3 identified) with a level of enthusiasm (2 of 3 identified). The weaknesses appear to be in three main areas: risk aversion, number of options considered and poor self-esteem/low self-confidence. At this stage this analysis correlates with the author's

perceptions of his strengths but was somewhat surprising with respect to the identified weaknesses of risk aversion (2 of 3 identified) and numbers of options considered (3 of 3 identified).

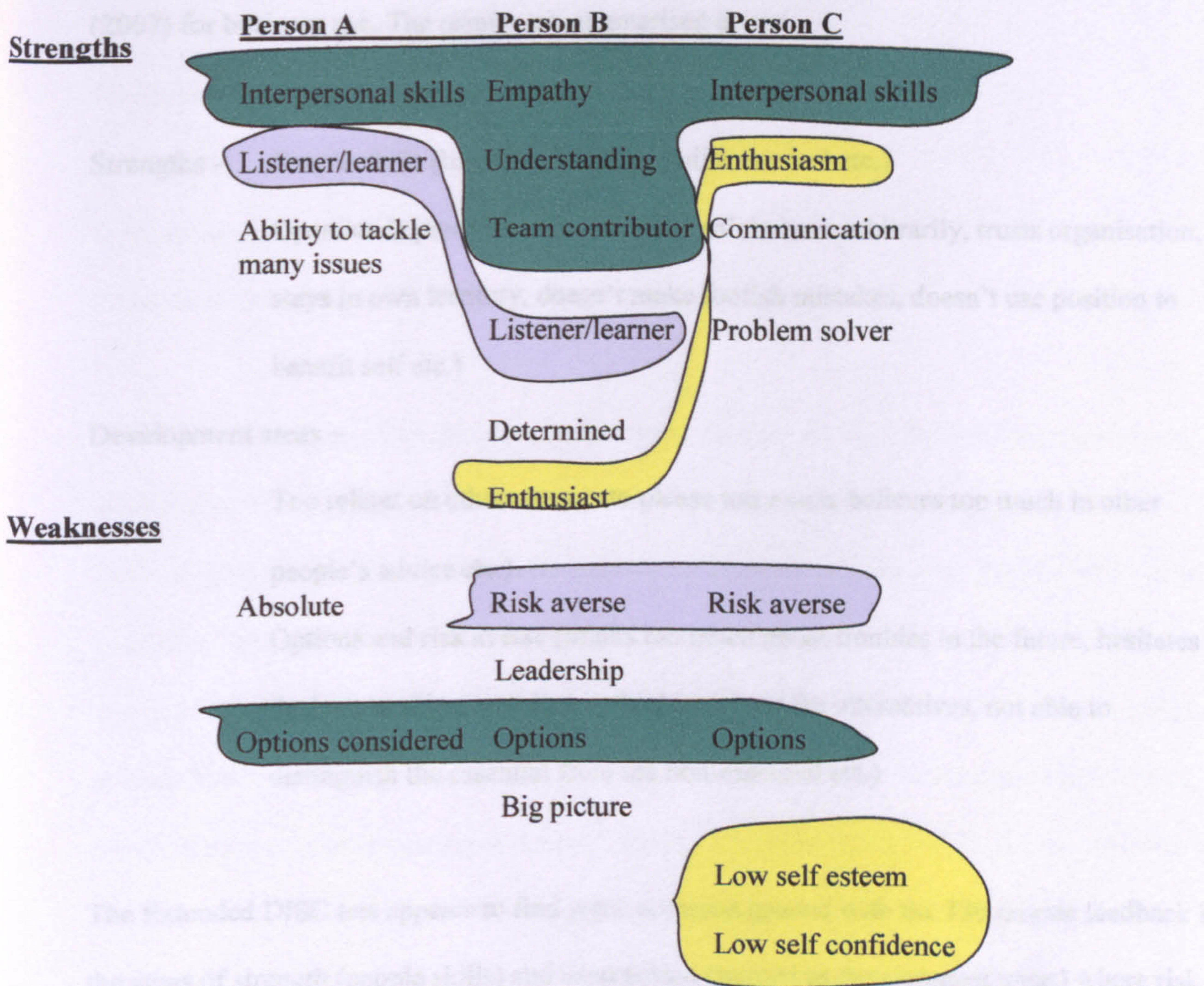


Figure 2. 180-degree feedback summary

3.1.4.2 Personality tests

The next stage was to undertake two personality tests to cross correlate with the 180-degree feedback results.

The first test was Extended DISC which is a personality test developed by Goldsmith (2007) for business use. The results are summarised below.

Strengths - People skills (listening, friendly, polite, modest etc.)

Operates in predictable manner (doesn't behave arbitrarily, trusts organisation, stays in own territory, doesn't make foolish mistakes, doesn't use position to benefit self etc.)

Development areas –

Too reliant on others (wants to please too much, believes too much in other people's advice etc.)

Options and risk averse (thinks too much about troubles in the future, hesitates in decision making, gets lost in thinking about the alternatives, not able to distinguish the essential from the non-essential etc.)

The Extended DISC test appears to find some common ground with the 180-degree feedback in the areas of strength (people skills) and weaknesses (termed as development areas) where risk aversion and options choice is highlighted.

The third element undertaken was the iWAM test developed by Harshman (2007). This test examines motivation and work organisation. A summary of the test results is displayed below.

Analysed aspects: -

Highly external (needs approval, popularity etc)

Low power need

Options (big picture) weakness

Delegation needs improvement

The iWAM test again picks out a number of common themes; namely need for approval and choice of options. In fact, it ties in very well with the 180-degree feedback results.

Reflecting on the results was somewhat painful for the author as one who has low levels of self-confidence and self-esteem. The tendency was to focus on the weaknesses and ignore the strengths and this produced an imbalanced outlook. Further reflection saw the author starting to analyse how the strengths and weaknesses could fit into the whole. At the heart is the lack of self-confidence and self-esteem. It is likely that this occurred during childhood, in particular with the dissonance of a vocational career being selected in a strongly academic background – resident on University campus. The sense of not quite fitting in may have contributed to a lower confidence in the author that was then ‘carried’ through adult life. The low self-esteem and confidence could also be the precursor and cause of the development of ‘people skills’ where,

due to the strongly felt need to please others, 'reading people', detecting opinions and attitudes and listening skills are used to satisfy this need.

3.1.4.3 SWOT

Bringing the various personality tools and tests together allows the creation of a SWOT diagram (Figure 3 below). It is this diagram that has been used as a fulcrum from which further development can be focused and measured.

INTERNAL	EXTERNAL
<p><u>STRENGTHS</u></p> <ul style="list-style-type: none"> • Interpersonal skills • Listening • Enthusiasm • Operates in a predictable manner 	<p><u>OPPORTUNITIES</u></p> <ul style="list-style-type: none"> • Academic development • Career development • Build self esteem • Build self confidence • Reduce reliance on others • Develop a less risk averse approach • Operate in a 'big picture' mode
<p><u>WEAKNESSES</u></p> <ul style="list-style-type: none"> • Risk averse • Options • Low self esteem • Low self confidence • Too reliant on others 	<p><u>THREATS</u></p> <ul style="list-style-type: none"> • Retreat under stress • Lack of proactive development • Work, other priorities • Fail to apply lessons learned

Figure 3 Personal SWOT assessment

Key issues: -

The challenge of working with the weaknesses to minimize them

Grasping the opportunities

Managing the threats to avoid missing opportunities

3.1.5 Theories of learning and learning style

The DBA offers a clear opportunity to undertake significant learning. However, there is a need for a clear definition of what learning is prior to any exploration of learning styles.

Literature offers many definitions but most are grouped around personal 'change'. Boyd and Apps (1980) state that 'learning is the act or process by which behavioural change, knowledge, skills and attitudes are acquired'.

It is informative to examine models for learning. One such model was developed by Smith (1982) and is presented overleaf in Figure 4.

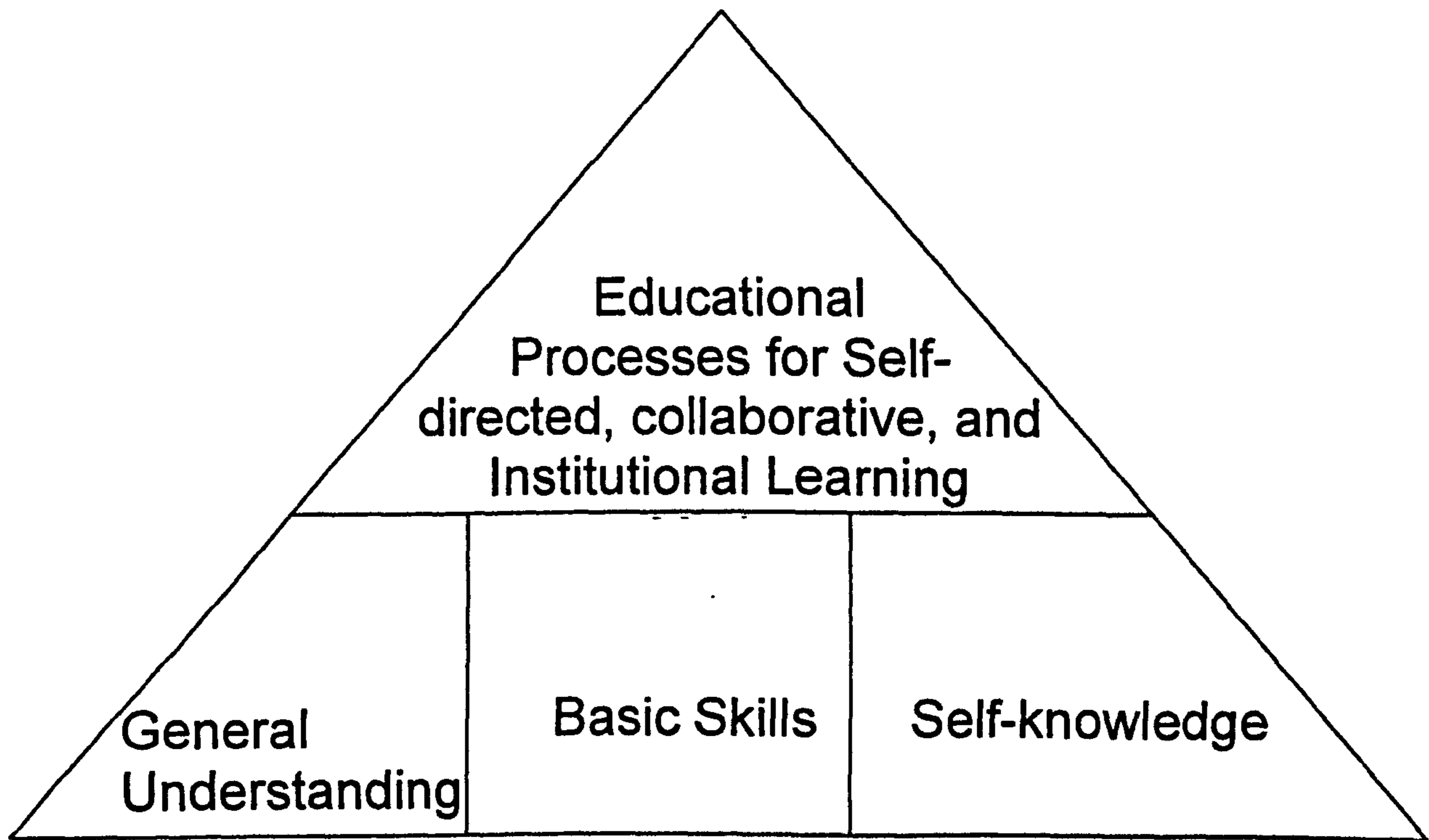


Figure 4. Learning model (Smith R.M., 1982)

Smith's model is useful as it illustrates the necessary precursors of self-directed learning (the essence of the DBA) are general understanding, basic skills and self-knowledge. The analysis of one's personality and learning styles can be considered as vital steps toward the self-directed learning.

Having established that learning can be represented as change within the individual it is useful to examine learning styles.

Perhaps the best-known model was developed by Kolb (1983). He argues that learning is a cyclical process starting with concrete experience, moving to reflective observation, through abstract conceptualisation, to active experimentation and, thus, back to concrete experience.

Honey and Mumford (1992) have developed a model similar to Kolb identifying four learning

styles; activists (optimum learning when doing concrete actions), reflectors (optimum learning when reflecting on what has occurred and what they have done), theorists (optimum learning when aligning theories to new information) and pragmatists (optimum learning when linking real-life problems with current information). Binstead (1980) postulates the Lancaster learning cycle model that identifies three different forms of learning; reception of input from the external world, internal reflection, followed by external world activity and discovery returning feedback to the internal world of the learner. Another well-known model is the VAK model developed by Dunn (1984). This model supposes that an individual's learning is likely to be best facilitated by visual, auditory or kinaesthetic stimuli with one of the three methods dominant.

However, whilst many see these models as seminal, there are critics; Coffield, Moseley, Hall and Ecclestone (2004) argue that the state of play of research into learning styles by 'researchers and users alike will continue groping like the five blind men in the fable about the elephant, each with a part of the whole but none with full understanding'.

We should therefore be somewhat cautious necessarily adopting one particular model or another. Perhaps the best path is to take elements of several and apply them to one's own learning experience.

Relating to the models described above it was discovered that visual learning methods were the natural style for the author, with an activist approach and, using the Gardener (1983) model of three styles (Spatial-visual, bodily-kinaesthetic and logical-mathematical), mostly spatial-visual.

3.1.6 Mentoring structure

The mentor's place in the learning experience is critical as he/she 'stimulates, encourages, guides, supports and cautions, acts as a role model, nurtures learning to learn, and encourages the adoption of future orientation' (Beardwell and Holden, 2001). Putting in place a mentoring structure can therefore be seen as critical, particularly given the somewhat solitary nature of the latter stages of the DBA.

The author has addressed this by developing a mentoring structure that encompasses the key areas of his life's journey, namely academic, industrial and family. The tutor is the principal mentor backed up by a second tutor in the academic area. In the industrial area, the Chief Financial Officer of the author's previous company filled the role for all bar the last three months. In the family area, the author is fortunate to have an academic father who is an excellent sounding board. The richness of the experience of the mentors selected offered a significant resource to the learner that ran throughout the course of the DBA.

3.2 Academic development

Major items covered include: -

- Current skills inventory
- Required skills
- Gap analysis
- Academic development plan
- Stakeholder analysis

The academic development has run parallel to the personal development over the duration of the course.

The candidate's existing skills inventory has been assessed based on sections 2 and 3.1 above and is further discussed below.

A further section considers some of the skills that were required through the course towards completion of the DBA. Some examples are provided. Finally, a stakeholder analysis is undertaken to ensure that the principal stakeholders can be monitored and involved.

3.2.1 Current skills inventory

Based on the SWOT analysis produced above the personal strengths are augmented by the academic skills. The author, as previously noted above, completed the MBA in 2006 and this served as an excellent platform for continuing academic development into and throughout the DBA.

The academic skills of the author can be found in writing ability, a wide vocabulary and an eagerness to learn. People skills (listening, empathy etc.) and preferred learning styles have facilitated data gathering and research based on an interpretivist philosophy, an inductive approach together with a qualitative strategy with recent experience augmented by a quantitative strategy in a mixed method approach. Widely read in the proposed subject area (principally that of organisational trust between individuals) and with recent academic experience the author was expecting to be able to continue along a pleasant learning trajectory at the commencement of the DBA.

However, with the skills base accumulated prior to the DBA, this proved insufficient to progress with the DBA.

3.2.2 Required skills

In order to complete the DBA it was clear that there was a significant step-up required in academic skills and learning. This became apparent over the initial year through both lectures and background reading. The MBA research undertaken can be seen, in the light of further experience, to be somewhat single dimensioned and be potentially weak regarding both generalisability and triangulation. This led the author towards a more multi-method research strategy utilising the more natural, known and comfortable qualitative strategy together with the relatively unknown, unnatural and uncomfortable quantitative strategy.

Given the author's experience of qualitative strategy utilised previously it was clear that vulnerability existed for the author's DBA research in its utilisation of a quantitative strategy. The acquisition of some quantitative skills was mandatory. This presented a significant learning challenge to the author, especially given a non-logical mathematical learning style (Gardener, 1983).

The acquisition of the required skills in quantitative strategy was encouraged through deliberate selection of the Advanced Research Technique quantitative assignment during Year 1. The software application SPSS was the proscribed tool for the analysis. This proved an extremely arduous but ultimately rewarding assignment. Although the assignment was aimed at pushing the students to answer some fairly straightforward questions based on some provided sample data, the author decided to amplify the aim of the assignment in order to supplement

skills in this area. In order to provide a reference that would be useful in on-going studies the author, using SPSS and appropriate academic references (Pallant, 2005, Curwin and Slater, 1994, Wisniewski, 1997, Thomas, 1997, Wood, 2003, Dretzke, 2005), wrote the assignment with the aim of producing a document that would explain the significance and importance of aspects of quantitative analysis together with how to perform the analysis using SPSS. The learning was augmented through further contact with the subject tutor and reflected into the document. The quantitative skills were further augmented during the data gathering and analysis stages of the DBA.

One further early example of skills required has been the use of a software application called 'Endnote'. This software package allows the management of academic references such that they may be imported into the author's thesis. This is advantageous in terms of the software's ability to present a consistent style and provides a 'capture' method for the large number of references that are inevitably part of the DBA research. The learning opportunity was met through a combination of attending a short 'how to use 'Endnote' course' run by the Portsmouth University library team and use of the manual together with the software to build upon the knowledge gained.

Further software applications have been learned and utilised such as Nvivo (for qualitative analysis) and MLWin for multilevel quantitative analysis. The author has learned to utilise these applications through manuals and on-line learning plus sharing with other users.

3.2.3 Stakeholder feedback

The previous sections have addressed the acquisition of skills; however, participating in the DBA learning experience has been reliant on the continuing sponsorship of the key stakeholders. A stakeholder can be defined as 'one who has a stake in something especially business' (Oxford English Dictionary, 2007).

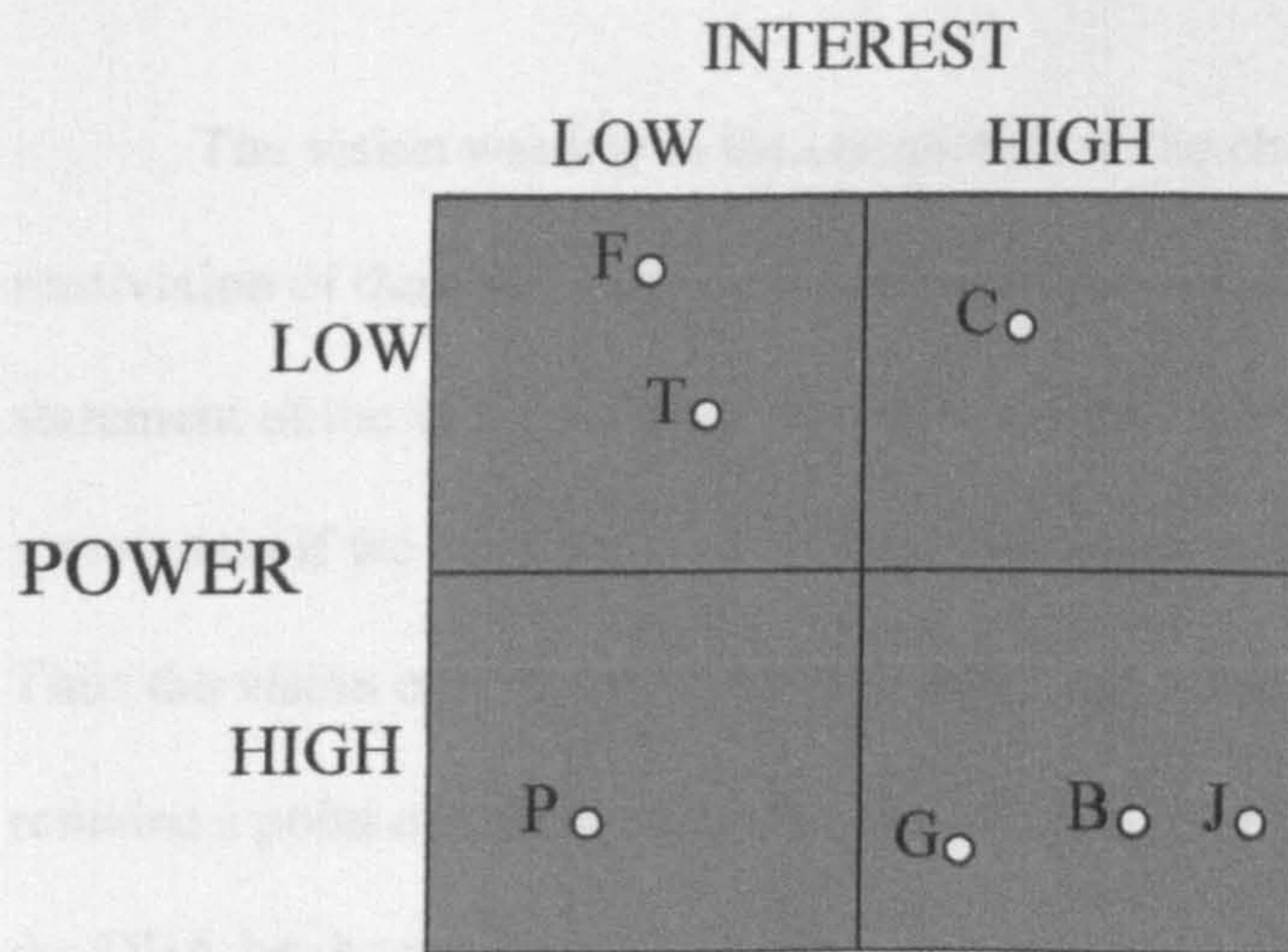
There are a number of major stakeholders that need to be considered both within the previous sponsoring company and without. If we accept, as argued by Chrystal and Lipsey (1997), that firms 'contain many individuals each with a different role and each with their own personal agenda and goals' the author needed to be mindful of those agendas and adjust his strategy accordingly. This was necessary in order for the goal of achieving the learning goals and ensuring that the needed support was obtained. Outside the firm there were other key stakeholders; not least family and friends. The demands of study time over a period of four years' placed extra demands on those stakeholders and they deserved careful consideration. In the family case an example was agreeing study times and scheduling a pleasant family activity periodically. In the author's experience this 'management' of key stakeholders is vital in generating a clear understanding of the aims and goals of the studying and ensures that support is available and on-going. The stakeholder model shown in Figure 5 below is based on the power-interest matrix (Johnson, Scholes and Whittington, 2006) and serves to highlight the importance of each key stakeholder.

		INTEREST	
		LOW	HIGH
POWER	LOW	Minimal effort	Keep informed
	HIGH	Keep satisfied	Key players

Figure 5. Power-interest matrix (Johnson, G., Scholes, K. and Whittington, R., 2006)

The author carried out a careful analysis of each of the major stakeholders prior to populating the matrix. A periodic reassessment was made as stakeholders did change position on the grid e.g. a new key stakeholder was promoted to an influential position within the sponsoring organisation.

The populated grid is presented below in Figure 6.



KEY J = Family
 B = Manager
 P = Manager's manager
 C = Church
 T = Work team
 F = Friends
 G = Senior mentor

Figure 6. Populated power-interest matrix

This matrix represents the situation during the final year of study and does not reflect the very late changes in employment mentioned above.

4.0 The road goes ever on and on...

This section of the personal development portfolio lays out the following key items: -

- The vision – learning goals (DBA and beyond)
- Development plans – timescale, specific tasks/milestones, risks etc.

4.1 The vision – learning goals (DBA and beyond)

The vision was key to the completion of the challenge. Without that driving vision the motivation of the candidate could have decreased or even stopped altogether. Thus, a clear statement of the vision of the candidate was fundamental to success. ‘It helps to get to the top of a mountain if we have seen the pinnacle and know where we are headed’ argues Cottrell (2003). Thus the vision encompassed the aims and goals beyond the DBA itself toward a new future and remains a point of reference for the years ahead. In order to achieve the vision the completion of the DBA has been a necessary step. The completion of the DBA was reliant on both personal and academic development.

The author’s vision remains that of a senior knowledgeable individual able to teach and inspire people and organisations to develop positive relationships that, within the business world, add to the enjoyment of each person and are profitable to the business. Within the academic world, the role of an inspiring teacher who encourages individuals to discover for themselves the excitement and fulfilment of adding a grain to the sands of knowledge. McNair (1997) argues that learning is a lifelong activity. The author is able to identify strongly with this viewpoint; in that all experiences have something to teach and lessons can be learned and applied for future benefit.

4.2 Development plans

The DBA activity, being of four year’s duration, required careful planning in order that the objective of submitting a valid and relevant thesis of the requisite quality could be achieved.

The plan had many constituent parts ranging from the identification of personal and academic skills required, skills augmentation courses, refining and submitting the research proposal, research planning and implementation, research execution, data analysis and writing up etc.; all with the support of timescales, budget and major milestones. The risks were also assessed, as were mitigation plans.

The DBA thesis was due to commence in November 2007. The objective to complete in November 2009 ready for the viva no later than end of 2009 was over-optimistic. In reality the DBA draft was not completed until August 2010 with a target date for completion by the middle of October 2010 with the viva by December 2010.

The budget required for the DBA was significant. The following spreadsheet represents the final estimate. No estimate had been made to cover the labour hours of those staff in the companies who supported the author's efforts. The budget is presented in Table 1 below.

DBA outline budget

Activity	£
Canada visit 1	1200
Canada visit 2	1200
Canada visit 3	1200
Academy of Mgt	2000
Transcription of interviews	600
UK travel	300
Meals & subsistence	1000
Year 2 fee	4000
Year 3 fee	4000
Secretarial support	400
Printing	200
Binding	100
Contingency	2000
Total	18200

Table 1 DBA Outline budget

Risk issues loomed large in such a compacted academic programme. The principal cause was the drive to obtain satisfactory primary data that, in the case of the author's thesis, would come from the companies in Canada and the US. As the thesis drew upon individual's experiences of post-acquisition integration and the merger and acquisition process it was mandatory that a reasonable number of case studies were available. To be valid the acquisitions needed to be completed to the point of at least three months post-acquisition closing. There were two cases that more than met these criteria in the previous company and these were utilised for the research.

Access to the data was another risk issue. Access internally was assured through powerful sponsorship within the company but required extensive lobbying and frequent briefings to maintain the sources. Unfortunately this did not cover data from previous acquired companies. Due to the nature of the research area the schedule as originally planned was changed on a number of occasions. This required agile project planning reviews to be carried out regularly. One other possible risk considered was the access to the tutor throughout the project. To mitigate this risk a second tutor was appointed. The second tutor was skilled in quantitative analysis around leadership issues whilst the primary tutor was an authority in trust, the subject area. Use was also made of other expertise resident in Portsmouth University as well as mentors in the sponsoring company and family. Setting up a network of knowledgeable tutors and contacts, augmented by conferences and meetings, provided a solid platform on which the research has been built.

5.0 So what? Critical reflection and evaluation

- Reflective approaches
- Measurement techniques – before and after thesis – reflection
- Reflection on the DBA

5.1 Reflective approaches

If we took the initial state of the author's academic approach on day one of the DBA we could make an interesting contrast with his position at the completion of the fourth year. A number of changes have occurred and it is interesting to reflect on what development strategies were put in place to facilitate the learning and growing experience.

Reflection is defined by Boostrom (1994) as 'a special kind of thinking. In the first place, it's both active controlled. When ideas pass aimlessly through your head, that is not reflecting. Reflecting means focussing your attention. It means weighing, considering, choosing'. So, if we accept the definition of reflection why is it so important a part of the Professional Doctorate? Brewer (2007) states that 'the learning of the professional skills required by a PhD student also has to be accompanied by the supremely important ability (which may have to be acquired) to continuously reassess the value of the work he or she has done in the light of the work that is being done by others'. It seems that the ability to be able to reflect and critique the research and learning process is integral the personal development. Cottrell (2003) underlines the importance of reflection arguing that 'students are expected to develop into independent thinkers, capable of evaluating their own performance, drawing conclusions about what they did well, what went

wrong, and how to improve'. She continues, however, with a warning that 'when it works well, we discover things that make us uncomfortable. Our natural reaction is to pretend they do not really matter, or look for an excuse, or to blame someone else. The things we most need to know can be the hardest to hear'. So the author set out on the road to reflective practice with some trepidation. What would it reveal?

We had some idea of the nature of reflection and its definition. So how could we set about it – was there a simple model we could utilise to get us started? Schon (1987) offers a useful description of how reflection can work as a type of ladder. 'To move 'up' in this sense, is to move from an activity to reflection *on* that activity; to move down is to move from reflection to an action that enacts reflection. The levels of action and reflection on action can be seen as a ladder. Climbing up the ladder, one makes what has happened at the rung below into an object of reflection'.

5.2 Measurement techniques

The section addresses aspects of measurement techniques that could be applied to the DBA requirements, such that the value of the learning undertaken could be considered in a reflective manner to test for 'added value' and appropriateness to the task in hand. In particular, the relevance to the doctoral thesis was examined. During the course of the DBA many different learning avenues were explored. Some of these avenues were relevant and productive for the purposes of the DBA whilst some were not. A means of checking on a regular basis for relevance therefore seemed both useful and helpful in keeping the learning process 'on track'.

The method for making measurement was based on feedback from a number of sources: -

- 1.1 family
- 1.2 tutors
- 1.3 work colleagues
- 1.4 study group
- 1.5 fellow students
- 1.6 close friends
- 1.7 mentor network (industry senior manager, university tutors, academic parent)
- 1.8 assignment feedback
- 1.9 personal reflection

Using these multipoint references allowed for a real measure of progress achieved. Monitoring the development was achieved through use of feedback from all sources (to standard, below standard, above standard) on a periodic basis.

5.3 Reflection on the DBA

The section considers the impact of the DBA course, the author's associated learning and development and the likely impact on future professional development and practice. The 'so what' question offers a useful means of encouraging meaningful critical reflection on the direction, content and value of the development undertaken. What can we make of the learning achieved during the DBA?

It is true to say that the author had very little idea of the level of intellectual engagement that would be needed for the DBA at the start. Indeed, the author was expecting little difference (perhaps a little higher academic level) to the MBA recently completed. He certainly had no idea that the development of a reflective and analytical approach would lead to an extremely uncomfortable first half of the DBA followed by a challenging second half. Previous experience of the demands of part-time higher education had prepared the ground for the inevitable (seemingly, based on feedback from many students) 'can I do this' and 'I want my life back' periods. However, this was not sufficient preparation for the challenges presented. As mentioned previously, after revisiting the master's dissertation (at distinction level), it seemed suddenly facile and single dimensioned – not to doctoral level at all!

So one major realisation was that the level of academic and intellectual thought had to go up considerably – the step! Having climbed that initial step, there were many more to be surmounted.

Secondly, the discovery of personal development and the impact it has had on the author's approach and life experiences. Cottrell (2003) mentions that for reflection to be effective it needs to be uncomfortable. It was the case that a high level of discomfort was reached at several times during the DBA. This was especially true in personality analysis. The author did not like what he discovered at all. It seemed a confirmation of some of the weaknesses known to him but with the addition of a number of others that were previously unknown. The compilation of the psychometric tests and 180-degree feedback painted an initially depressing picture. Imagine the effect of discovering that one was not the most effective leader (Extended DISC) when in the process of setting up a new company location and recruiting staff! But given the lack of comfort, what was the next step? Reflection proved an invaluable tool as it transformed what

was, in the author's poor self-esteem, a series of weaknesses into a more balanced view of strengths and areas for improvement. Revisiting and reflecting on the analysis has been helpful in altering the individual's behaviour. This has been measurable in verbal feedback from the support team and in positive actions that have been undertaken (confidence building reading as an example). The loss of a close personal friend has also contributed to the process of growing and learning. Why get upset over some small issues when, looking at the big picture (one of the weaknesses identified in the analysis), they are not worth getting upset over. Here it is appropriate to illustrate the changes for good that have been reflected into the author's personal life where he is noticeably more considerate and analytical than prior to undertaking the course. The author can now strongly identify with C.S. Lewis's description of a new king in the Lion, Witch and Wardrobe (1950). 'Edmund was graver and quieter'.

Appendix B Questionnaire and survey tools

C is committed to growth. Growth can be achieved through developing our products internally through research and development. This tends to be a slower method of growth. A faster method is to acquire similar companies to C who bring new products and existing order books into the company.

However, acquiring companies is expensive and brings some risks along with the obvious gains in expertise, experience, products, order books and markets. It is not easy to bring two separate companies together under one roof and make the integration effective such that all the stakeholders (employees, management, shareholders, customers etc.) can see benefits and growth within a short timescale.

C senior management have commissioned a study of the company's integration experience and methods. The aim is to discover what works and what doesn't in the integration processes going on at US and Canada and any future acquisitions undertaken.

Your experiences here at US and Canada are therefore vital in helping us to understand how to make the best integration possible such that all the stakeholders (you and me etc.) benefit. A successfully integrated company provides a solid basis on which to build the business further and also aids the development of the joint staff teams.

A researcher, Ed Derbyshire, who is a C member of staff, is leading the study and will be visiting US and Canada in week commencing 10th November 2008. He is studying, with Portsmouth University in the UK, what factors help make successful company integrations.

To gather data he needs to have everyone's input, if at all possible, such that all staff contribute to this vital study for the company, both today and for the future. The data will be gathered by a short 20 question staff survey (on-line) and a series of interviews with Senior Manager and the first line management.

No one has to contribute, nothing is compulsory, but the more people that do the better the information will be. All inputs will be confidentially treated and anonymity is guaranteed for all staff members.

Please could we ask you to participate fully in order to further improve how we deal with new acquisitions and on-going integration, both here at US and Canada, and elsewhere in the C organisation.

Powerpoint slides from 'all hands' presentation encouraging participation.

Integration Study

- Key corporate initiative is growth of the company
 - Double/Double every 5 years
- How do we grow?
 - Organic growth of existing businesses (new customers and products)
 - Acquisitions – acquire similar companies who bring new products and existing book of business
- Acquisitions are expensive, difficult and can be risky but also bring many positives
- Successful integration is critical to growth strategy of company
- C senior management have commissioned a study of the company's integration experiences and methods.
 - Goal is to understand what works and what doesn't and to apply this learning to future acquisitions of the company

241

Integration Survey

- Data collection
 - Employees are not required to participate, however, everyone's input is valued and vital to the success of this important company study
 - Survey – short 20 question staff survey administered on-line
 - Interviews – a series of interviews are being scheduled with Senior Manager's direct reports
 - **All responses will be treated as confidential and anonymity is guaranteed for all employees**
- Timing / Logistics
 - Staff survey will be administered on-line with invitations sent out via email during the week of November 10th (Survey Monkey)
 - Interviews will be conducted on-site during the week of November

242

Manager Questionnaire

Thank you for participating in this questionnaire. Your input will be completely anonymous and all information submitted on this form will be kept confidential.

There are no right or wrong answers.

Please consider each question carefully.

Please circle your answer to the following questions

Gender: Male/Female

Age: 20 to 29/30-39/40-49/50-59/60-69

Have you joined COMPANY as part of a company acquisition? Yes/No

Please indicate whether you expect any of the following behaviours of your employees by circling a number from 1 to 7.

Employees....

		Not at all						Completely
1.	...are completely honest with me.	1	2	3	4	5	6	7
2.	...place our organisation's interests above their own.	1	2	3	4	5	6	7
3.	...will keep the promises they make.	1	2	3	4	5	6	7
4.	...are competent in performing their jobs.	1	2	3	4	5	6	7
5.	...express their true feelings about important issues.	1	2	3	4	5	6	7
6.	...care about my well being.	1	2	3	4	5	6	7
7.	...can contribute to our organisation's success.	1	2	3	4	5	6	7
8.	...take actions that are consistent with their words.	1	2	3	4	5	6	7
9.	...share important information with me.	1	2	3	4	5	6	7
10.	...care about the future of our organisation.	1	2	3	4	5	6	7
11.	...can help solve important problems in our organisation.	1	2	3	4	5	6	7
12.	...have consistent expectations of me.	1	2	3	4	5	6	7
13.	...would make personal sacrifices for our organisation.	1	2	3	4	5	6	7
14.	...would acknowledge their own mistakes.	1	2	3	4	5	6	7
15.	...can help our organisation survive (through the noughties)	1	2	3	4	5	6	7
16.	...can be relied on.	1	2	3	4	5	6	7

Copyright Spreitzer and Mishra (1999) ©

Employees....

Please indicate whether you have experienced any of the following behaviours of your employees by circling a number from 1 to 7		Not at all						Completely
1.	...have been completely honest with me.	1	2	3	4	5	6	7
2.	...have placed our organisation's interests above their own.	1	2	3	4	5	6	7
3.	...have kept the promises they made.	1	2	3	4	5	6	7
4.	...were competent in performing their jobs.	1	2	3	4	5	6	7
5.	...have expressed their true feelings about important issues.	1	2	3	4	5	6	7
6.	...have cared about my well being.	1	2	3	4	5	6	7
7.	...have contributed to our organisation's success.	1	2	3	4	5	6	7
8.	...have taken actions that were consistent with their words.	1	2	3	4	5	6	7
9.	...have shared important information with me.	1	2	3	4	5	6	7
10.	...have cared about the future of our organisation.	1	2	3	4	5	6	7
11.	...have helped solve important problems in our organisation.	1	2	3	4	5	6	7
12.	...have demonstrated consistent expectations of me.	1	2	3	4	5	6	7
13.	...have made personal sacrifices for our organisation.	1	2	3	4	5	6	7
14.	...have acknowledged their own mistakes.	1	2	3	4	5	6	7
15.	...have helped our organisation survive (through the tough times)	1	2	3	4	5	6	7
16.	...have been able to be relied on.	1	2	3	4	5	6	7

Copyright Spreitzer and Mishra (1999) © amended by E. Derbyshire

Staff questionnaire

Thank you for participating in this questionnaire. Your input will be completely anonymous and all information submitted on this form will be kept confidential.

There are no right or wrong answers.

Please consider each question carefully.

Please circle your answer to the following questions

Gender: Male/Female

Age: 20 to 29/30-39/40-49/50-59/60-69

Have you joined COMPANY as part of a company acquisition? Yes/No

Please indicate how willing you are to engage in each of the following behaviours with your Manager, by circling a number from 1 to 7.

How willing you are to do the following with <u>your Manager</u> ?		Never						Very often
1.	Rely on your manager's task related skills and abilities.	1	2	3	4	5	6	7
2.	Depend on your manager to handle an important issue on your behalf.	1	2	3	4	5	6	7
3.	Rely on your manager to represent your work accurately to others.	1	2	3	4	5	6	7
4.	Depend on your manager to back you up in difficult situations.	1	2	3	4	5	6	7
5.	Rely on your manager's work-related judgements.	1	2	3	4	5	6	7
6.	Share your personal feelings with your manager.	1	2	3	4	5	6	7
7.	Discuss work-related problems or difficulties with your manager that could potentially be used to disadvantage you.	1	2	3	4	5	6	7
8.	Confide in your manager about personal issues that are affecting your work.	1	2	3	4	5	6	7
9.	Discuss how you honestly feel about your work, even negative feelings and frustration.	1	2	3	4	5	6	7
10.	Share your personal beliefs with your manager.	1	2	3	4	5	6	7

Please indicate if you have been able to engage in each of the following behaviours with your Manager, by circling a number from 1 to 7.

Have you done the following with <u>your Manager</u> ?		Never						Very often
1.	I was able to rely on my manager's task related skills and abilities.	1	2	3	4	5	6	7
2.	I was able to depend on my manager to handle an important issue on my behalf.	1	2	3	4	5	6	7
3.	I was able to rely on my manager to represent my work accurately to others.	1	2	3	4	5	6	7
4.	I was able to depend on my manager to back me up in difficult situations.	1	2	3	4	5	6	7
5.	I was able to rely on my manager's work-related judgements.	1	2	3	4	5	6	7
6.	I was able to share my personal feelings with my manager.	1	2	3	4	5	6	7
7.	I was able to discuss work-related problems or difficulties with my manager that could potentially be used to disadvantage me.	1	2	3	4	5	6	7
8.	I was able to confide in my manager about personal issues that were affecting my work.	1	2	3	4	5	6	7
9.	I was able to discuss how I honestly felt about my work, even negative feelings and frustration.	1	2	3	4	5	6	7
10.	I was able to share my personal beliefs with my manager.	1	2	3	4	5	6	7

Managers' semi-structured qualitative questionnaire.

Questions to COMPANY senior staff regarding company integration

Introduction.

Thank you for agreeing to this interview

Introduce research

– Research project (Year 3) of part-time DBA with University of Portsmouth, UK.

Funding

- provided by COMPANY

The research

- the role of trust, its value for successful company acquisitions and retention of key staff with an end goal of producing a procedural framework incorporating useful and relevant practical guidelines for building and maintaining trust in future COMPANY acquisitions. The results of the research and the practical tools developed as a result will be presented to senior management. I am collecting information from the COMPANY acquisition experience to-date using interviews and questionnaires at senior management level and questionnaires for staff. This interview forms part of the research project.

- Selection of respondent** – you have been selected due to your role as a senior manager in the organisation.
- Confidentiality** - all information will be treated in the strictest confidence. All data that is not directly applicable to the research will be destroyed. The research findings will be shared only with the University tutor and marking staff and COMPANY senior management. Do you give permission to record the interview (recordings to aid accurate information)? I will inform you when the recorder is started and when it is stopped.
- Participation** - strictly voluntary, you may choose not to answer any question – you may stop the recording or interview at any point
- Identification** - you will not be identified as a specific individual – a term will be used ‘senior manager’ for all respondents
- Format** - you will be asked 13 questions
- Questions** - do you have any questions?

Questions to COMPANY senior staff regarding company acquisitions.

- 1. What are COMPANY's objectives for acquisition?**

- 2. How do you feel the integration has progressed to-date?**

- 3. What methods of communication have been utilised in the integrated organisation?**

- 4. How would you describe your experience of participating in the company integration process?**

- 5. What was/will be the process followed?**

- 6. What measures are in place to monitor the success of the acquisition?**

- 7. Can you identify any cultural differences between COMPANY and the acquired company?**

- 8. How do you plan to ensure the retention of your staff?**

- 9. Describe the involvement of your immediate manager in the integration.**

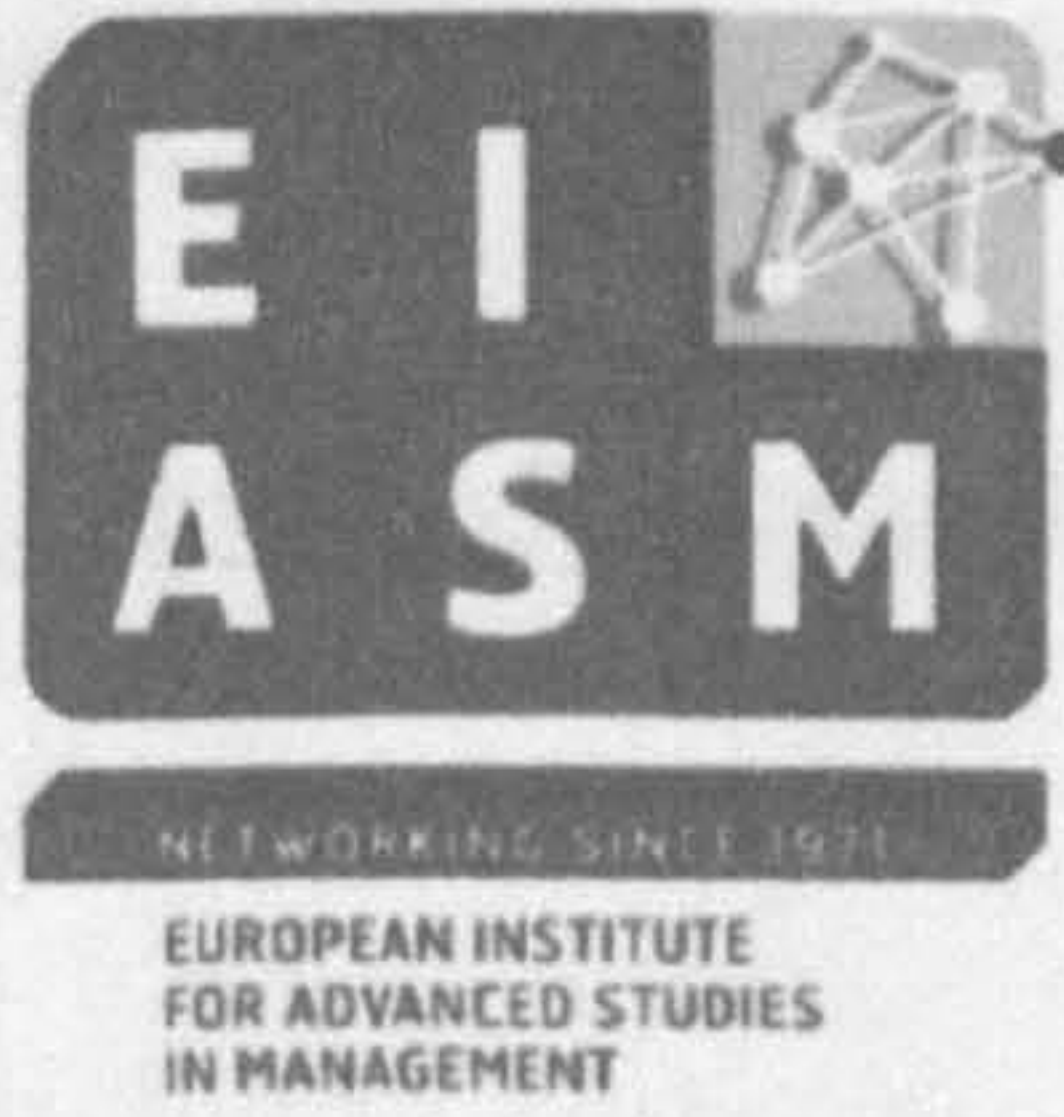
- 10. What role do you see for trust in the integration process?**

- 11. What actions have been undertaken in the integration process to build or maintain trust?**

- 12. Would you say these actions have been effective or ineffective?**

- 13. Can you think of anything else that could have been done to improve trust in your organisation after the acquisition?**

Appendix C. Publications and dissemination



Fundación BBVA

5th WORKSHOP ON TRUST WITHIN AND BETWEEN ORGANIZATIONS

January 28-29 2010, Madrid, NH Eurobuilding Madrid

CHAIRS:

KATINKA BIJLSMA-FRANKEMA, *Associate Professor of Organization Theory, VU University Amsterdam, Professor of Organization Sciences at EIASM*

SIM SITKIN, *Professor of Management, Faculty Director Center of Leadership and Ethics, Fuqua School of Business, Duke University, Durham, NC, USA, Professor of Organization Science, VU University Amsterdam*

LOCAL HOST:

JOSE MARIA PEIRO, *Professor of Work and Organizational Psychology, University of Valencia, Spain,*

KEY NOTE SPEAKERS

DENISE ROUSSEAU, *H.J.Heinz II Professor of Organizational Behaviour and Public Policy, Director Project on Evidence-based Organizational Practices, Carnegie Mellon University, Pittsburgh, USA*

SIRKKA JARVENPAA, *Bayless/Rauscher Pierce Refnes Chair in Business Administration, Information, Risk and Operational Management, University of Texas at Austin, USA*

RANJAY GULATI, *Jaime and Josefina Chua Tiampo Professor of Business Administration Harvard Business School, USA*

Title: The role of trust in retention of key staff – a high-tech application

Authors: E. Derbyshire, A. Hoecht, B. Schyns – Portsmouth University, United Kingdom

Email: ed_derbyshire@yahoo.com

5th Workshop on trust within and between organisations

Special session IX: When trust makes sense in inter-firm relations (and when not)

Abstract

The acquisition and successful integration strategies of companies is of particular interest given the significant numbers of acquisition failures: over 65% of acquired companies are either sold or divested within the first two years of new ownership. The cost of a failed acquisition can run into tens of millions of euros. Acquisition fails in a significant number of cases due to key newly acquired staff leaving the new company taking their critical intrinsic knowledge with them. The author proposes use of trust level measurement as one of the key potential predictors of retention of critical staff members.

The paper gives a brief overview of the trust literature, describes the reasons for choice of the methodology and reports results of an initial analysis on the data collected to-date. Some preliminary conclusions will be drawn.

The paper concludes with discussion of the potential contingencies that can be undertaken by management in order to both monitor and maintain trust levels.

Background

Given the substantial investment of time and money that is required for an acquisition or merger, the integration of the different company or organisational elements that come together to form the new collective identity is of primary importance. The investment in the integration phase is critical in order to achieve the merger or acquisition goals. These goals might be, among many possibilities, to achieve a broader portfolio of products, increased market sector share, adjacent

market access or absorption of a potential or current competitor – in short to achieve strategic goals more quickly and inexpensively than if the company acted on its own (Marks and Mirvis, 2001). The integration normally involves several principal elements; the facilities and products and the staff. The integration of the staff is dependent on many factors and variables (Shrivastava, 1986; Cartwright and Cooper, 1990; Birkinshaw, Bresman and Hakanson, 2000; Dooley and Zimmerman, 2003). The knowledge that is required to successfully develop new products, or to manufacture or improve existing products is resident with the staff (Graebner, 2004). A number of key staff members are likely to be instrumental in the success of the organisation or company (Wooldridge, 2006) and it is these staff, in particular, and their retention within the new identity, that are of critical importance to the acquisition or merger. Loss of these key staff members involves loss of valuable intellectual property (Hacker, 2003), particularly critical for high-technology companies, which may render the merger or acquisition less profitable and even, in the extreme, cause failure. Krug (2003) mapped executive turnover in over 450 merged and non-merged companies to determine the levels of executive turnover. The results are shown below in figure 1.

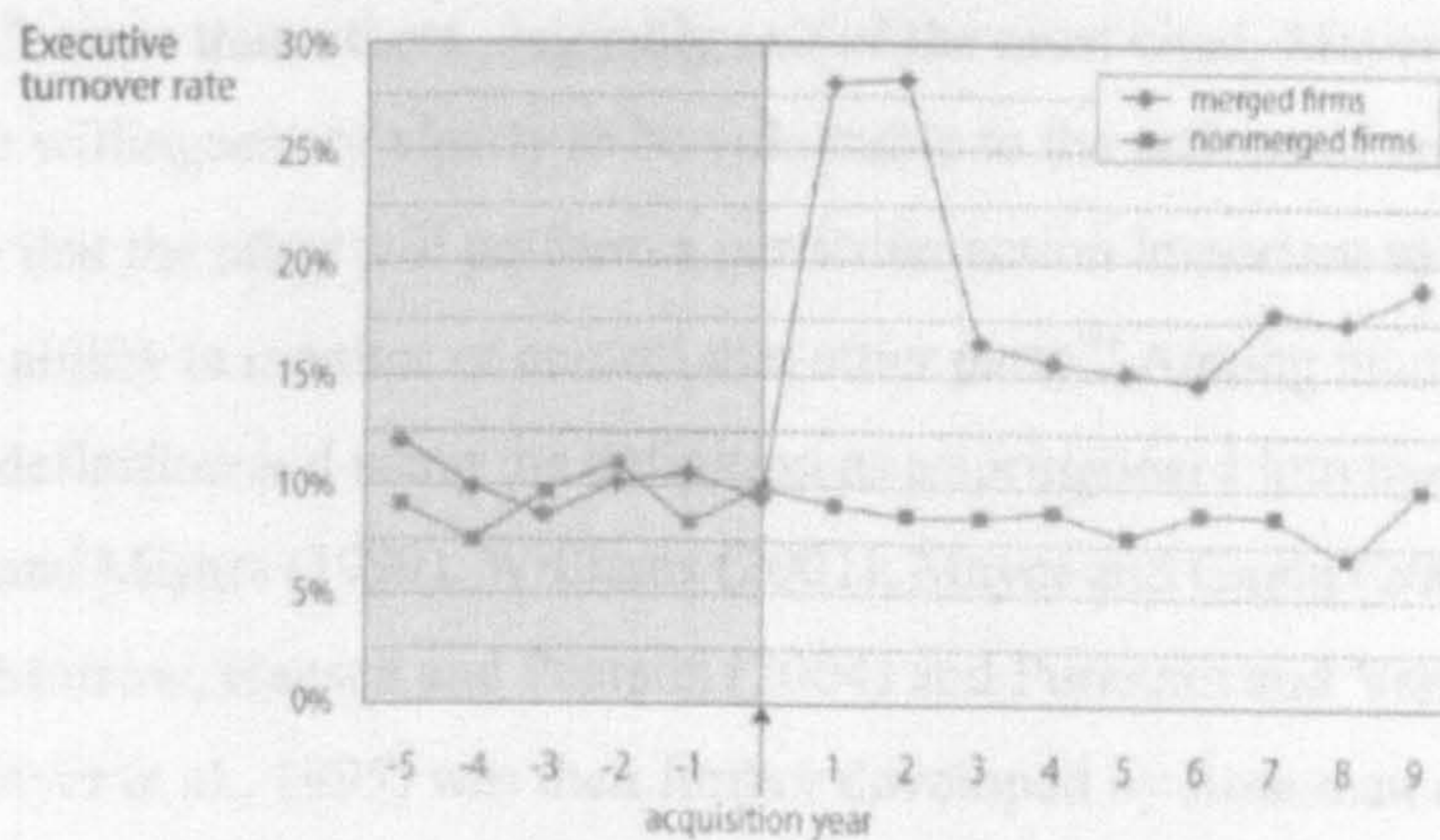


Figure 1. Executive turnover rate (Krug, 2003)

If the loss of key staff (which will include executive staff) follows these findings we should carefully consider what preventative actions and strategies are open to companies contemplating merger or acquisition. It is therefore important that we determine what parameters regarding the key staff members could be measured in order to determine how the integration process is progressing. One such parameter or element that has been much discussed and researched is trust. So what do we mean by trust?

Defining trust and its role in company integration

Defining trust

Trust can be seen, from examination of the literature, in its definition, modeling, empirical measurement, discussion and conclusions to be both an extremely diverse and multi-dimensional. The literature has matured considerably as the many facets have been explored but there still exists considerable fragmentation (McEvily, Perrone and Zaheer, 2003) and despite its perceived importance there is still no clear 'one size fits all' definition of trust (Costa (2003), Morrow, Hansen and Pearson (2004)). Some evidence of this fragmentation can be seen in the different definitions offered by researchers (Zand (1972), Lewis and Weigert (1985), McAllister (1995), Mayer, Davis and Schoorman (1995) and Rousseau, Sitkin, Burt and Camerer (1998)). The literature cites many different trust definitions, with researchers selecting the definition that meets the authors' criteria for applicability to their chosen area of study and the subject area (psychological, sociological etc).

A review of trust definition citations reveals several trust definitions that have significantly higher levels of reference than others. Arguably one of the most cited, Mayer et al., (1995) p712, define trust as "the willingness of a party to be vulnerable to the actions of another party based on the expectation that the other will perform a particular action important to the trustor, irrespective of the ability to monitor or control that other party." Among many currently active writers citing this definition and using the definition as a springboard into their trust research area are Spreitzer and Mishra (1999), Williams (2001), Mayer and Gavin (2005), Saunders and Thornhill (2004), Morrow, Hansen and Pearson (2004) and Puranam and Vanneste (2009). This definition (Mayer et al., 1995) was then further developed by Rousseau et al (1998) p395 to define trust as "a psychological state comprising the intention to accept vulnerability based on positive expectations of the intentions or behaviour of another."

Again, this definition is cited by a number of researchers (Gillespie (2003), Long and Sitkin (2006) and Van de Ven and Ring (2006).

The common theme of these definitions centres on the willingness to become vulnerable to another party where risk exists that another party will perform an action important to the trustor without monitoring or control and this is the definition of trust that has been adopted by the

authors. The risk exists then, that our trust may be misplaced, and we may therefore be in a vulnerable position as we place our expectations of a positive outcome in another party (Rousseau et al (1998) p395).

Trust literature

Lewicki, Tomlinson and Gillespie (2006) are one of a number of authors who have tried to draw elements of the trust field together to illustrate potential gaps in the knowledge and point out where future research could be of value. In their paper the authors focus on behavioural and psychological trust over time in inter-personal relationships and examine the subject areas using a standard set of questions; how is trust defined, where does the level of trust begin and what causes trust to change over time?

Behavioural trust is traditionally observed under a simulation or game environment in a laboratory situation. As such this is not the selected focus of this research and so we move on to look at the authors' study of psychological trust. Lewicki et al argue for three conceptualisations of psychological trust; namely uni-directional, two dimensional and transformational models. The uni-dimensional model accepts that trust, although consisting of many components (cognitive, affective or emotional, behavioural intention) is, in effect, a single construct. Interestingly trust in this model is seen as a single continuum ranging from high trust to high distrust. Answering the first definition and measurement question the authors utilise the trust definition provided by Rousseau et al (1998). They state that interpersonal trust (in this conceptual model) begins either at a zero level (e.g. Jones and George (1998)), moderate to high trust (see McKnight, Cummings and Chervany (1998)) or distrust (highlighted by Mayer, Davis and Schoorman (1995)) and argue that trust or distrust change over time due to a large number of identified antecedents, trustworthiness of the trustee, the trustor's disposition to trust and the implication of affect.

The two dimensional model, by contrast, includes the same components (cognitive, affect and behavioural elements) but separates trust and distrust into two distinctly different constructs (Lewicki, McAllister and Bies (1998)). This is illustrated by the model shown below in Figure 2.

Integrating Trust and Distrust: Alternative Social Realities

High Trust Characterized by: Hope Faith Confidence Assurance Initiative	High value congruence Interdependence promoted Opportunities pursued New initiatives	Trust but verify Relationships highly segmented and bounded Opportunities pursued and downside risks/vulnerabilities continually monitored			
	<table border="1"> <tr> <td>2</td> <td>4</td> </tr> <tr> <td>1</td> <td>3</td> </tr> </table>	2	4	1	3
2	4				
1	3				
Low Trust Characterized by: No Hope No Faith No Confidence Passivity Hesitance	Casual acquaintances Limited interdependence Bounded, "arms-length" transactions Professional courtesy	Undesirable eventualities expected and feared Harmful motives assumed Interdependence managed Preemption. Best offense is a good defense Paranoia			
	Low Distrust Characterized by: No Fear Absence of Skepticism Absence of Cynicism Low Monitoring Nonvigilance	High Distrust Characterized by: Fear Skepticism Cynicism Wariness and Watchfulness Vigilance			

Figure 2 Integrating trust and distrust: Alternative social realities
 Lewicki, Tomlinson and Gillespie (2006)

However, the authors point out that, having defined the two dimensional conceptual model, there exist significant challenges as “the implications for measurement are complex and yet to be tackled. Further measurement work is required to identify the facets and interdependencies underlying the constructs of trust and distrust and test if these distinctions hold empirically” (Lewicki, Tomlinson and Gillespie, 2006, p. 1004).

This tends to support an argument that there are a number of gaps in the interpersonal psychological trust area remaining to be explored and measured. This two dimensional approach conceptualises that trust starts at a level of low trust and low distrust (see Figure 9 above) but allows for prior information (reputation, personalities, social make-up of the trustee) provided to the trustor to move the starting point into one of the other three block squares. Trust or distrust changes over time, according to the authors, as a “function of frequency, duration, and diversity of experiences that either affirms confidence in positive expectations (trust) or confidence in

negative expectations (distrust)” (Lewicki, Tomlinson and Gillespie, 2006, p. 1005); this is reflected in Figure 2 above.

Another model examined is the transformational trust model. Here Lewicki et al draw on earlier work by Lewicki and Bunker (1995) that postulates three different levels of trust; calculus-based trust, knowledge-based trust and identification-based trust. Only two attempts have been made to measure these trust types; in both cases the original author was involved and no independent measurement has been undertaken (Lewicki and Stevenson (1998), and McAllister, Lewicki and Chaturvedi (2006)).

Lewicki et al argue that trust starts at zero or very close to zero at the calculus level (typically in organisations) where the trustor assesses the value and benefits of maintaining the trust relationship versus the likely risks of defaulting on the relationship.

Over time calculus-based trust can develop into knowledge-based trust as the actors increase their mutual level of understanding and interaction. Knowledge-based trust forms the end of trust development between the actors in many cases with only a small subset of relationships progressing to the final identification-based trust. Identification-based trust is based on deep knowledge of the trustee and presence of a high level of affect where the individual has a high regard to seek common goals with the trustee whilst retaining a sense of individual identity.

Lewicki et al conclude by pointing out that there is a growing agreement regarding the definition of trust (citing Rousseau et al (1998) among others). However, they indicate that gaps exist in trust measurement as there is “very little consistency or overlap in the use of trust measures” (p.1014) leading to fragmentation and are inconsistent in that the measures do not correlate with the full definition of trust that the authors have chosen. The authors also raise the issue of construct validity for existing trust measures. In proposing the way ahead for researchers Lewicki et al argue that a mixed approach is required utilising both quantitative and qualitative methods with a longitudinal basis with an emphasis on qualitative elements such as in-depth interviews. Strong support is given to field-based case studies as a basis for measuring trust models. This paper, then, would highlight potential research possibilities utilising consistent measures, applied in a manner that ensures the measure is aligned to the trust condition it is attempting to assess. The authors call for consistency and overlap with other trust research is also worthy of consideration as is their argument that a mixed method approach is required with on a longitudinal study basis. Our research in the field of post-acquisition or merger integration

should address these concerns to ensure validity and ‘wholeness’ of any potential research findings.

Dietz and Den Hartog (2006), in their critique and review of major intra-organisational trust measures, add further dimensions to the shaping of post-acquisition or merger trust research through their detailed assessment of whether the existing trust measures match the definition of trust in the workplace that they are attempting to measure. The authors argue that knowledge of trust must be based on the validity of the measures developed in its study. Based on review of a number of the most cited definitions of trust from Zand (1972) to Rousseau et al (1998) they state that trust is constituted of three principal elements; namely ‘belief’, ‘decision’ and ‘action’. This is based on the work of McEvily, Perrone and Zaheer (2003) who produced a three part definition of trust; expectation (aligned to Dietz and Den Hartog (2006) belief element), willingness to make oneself vulnerable (the authors decision element) and taking risk (the action element).

The belief element is held by the trustor and is based on a subjective and confident number of beliefs about the trustee and the trustor’s relationship with the trustee. It could also be defined as, the authors argue, an assessment of the level of trustworthiness of the trustee, although they do differentiate trust and trustworthiness as two separate constructs.

The decision element is where the trustor, building on a set of beliefs, now decides that trust can be placed in the trustee; in essence the trustor believes the trustee to be trustworthy and is ready to commit to trusting (making oneself vulnerable (Mayer et al (1995)) with an expectation of a favourable as opposed to an unfavourable outcome. The trustor is thus intending to take trusting action(s).

The action element involves the trustor taking risk bearing actions on the basis of belief and decision to trust. The authors point out that the risk bearing action undertaken by the trustor is quite separate from the trustworthiness of the trustor as viewed by the trustee and the action element is “at best only a *likely* consequence of the decision to trust; it is by no means guaranteed”(p.560). Drawing on earlier research the authors have produced two useful models that incorporate, at a summary level, a number of significant elements drawn from the trust literature. These models can be seen as important in that they attempt to draw together multiple models and theories toward a more cohesive whole that can then be used to assess the applicability and validity of already developed trust measures as well as potential yet to be

developed future measures. The authors approach is thus useful for this research in the examination of post-acquisition or merger trust where use of existing measures and development of measures is required. Dietz and Den Hartog (2006) illustrate the linkage of trust concepts as shown in Figure 3 below.

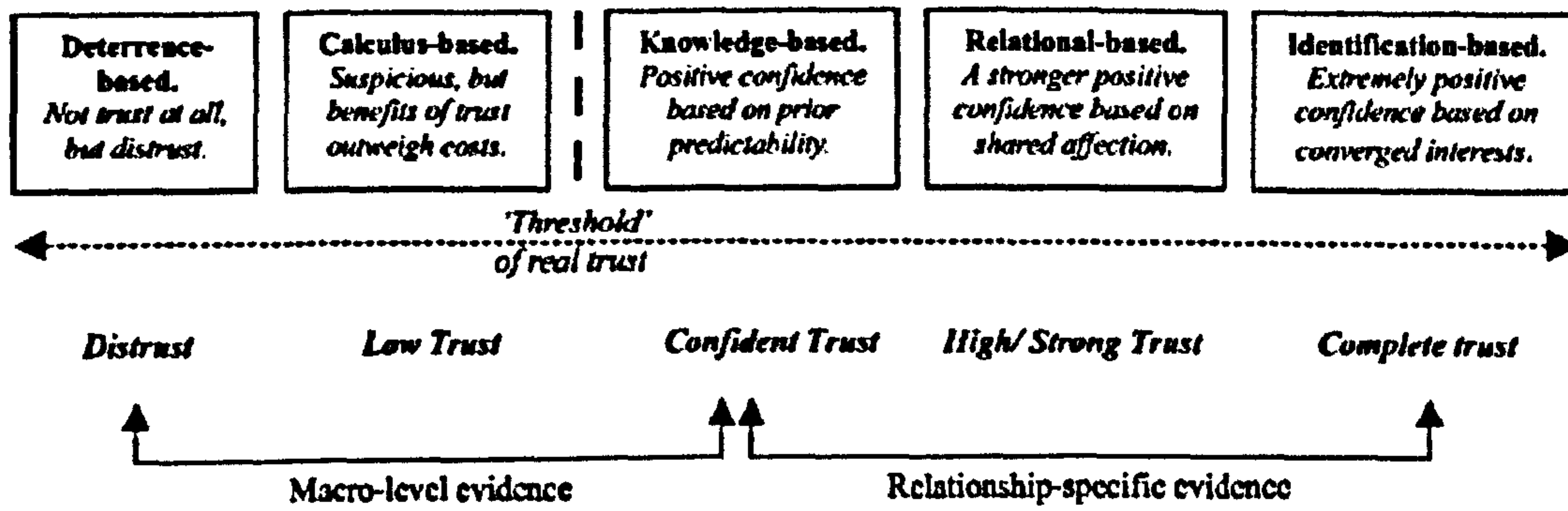


Figure 3 The continuum of degrees of intra-organisational trust.
Dietz and Den Hartog (2006)

It could be argued that cognitive and affective trust could be mapped against this model where affective trust commences at the relational level and above whilst cognitive trust operates at the calculus or knowledge-based levels.

The authors also offer a multi-dimensional integrated trust model building on the earlier work of Mayer et al (1995) and Ross and LeCroix (1996) shown below in Figure 4.

This model is based on the open systems model concept and incorporates the important feedback loop.

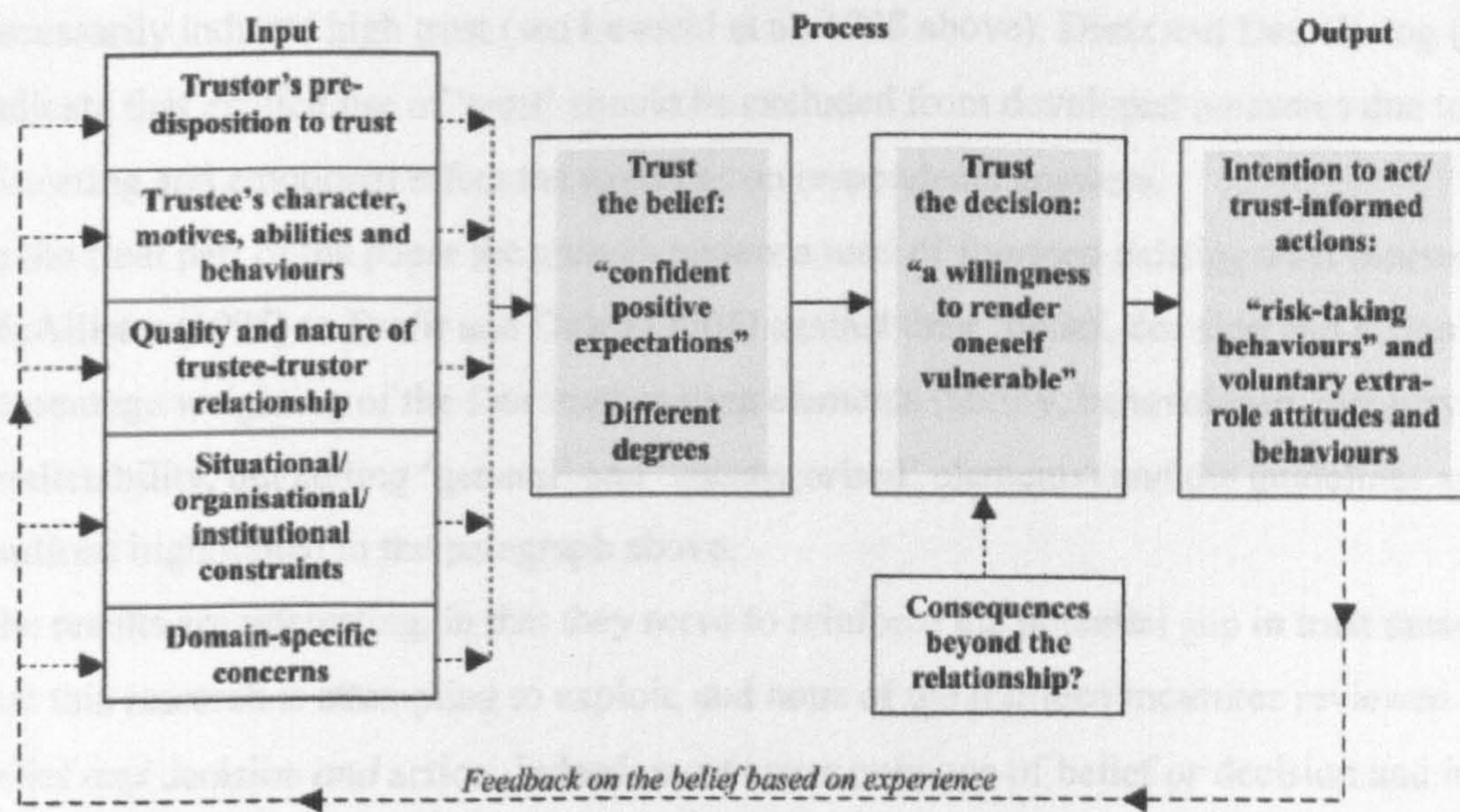


Figure 4 A depiction of the trust process.

Dietz and Den Hartog (2006)

The authors continue, arguing that the trust process model (shown above in Figure 4) requires the proposed measure of trust to include all elements identified: belief, decision and action. The measure should also include four trust components; namely, ability, benevolence, integrity and predictability that are required for the trustor to form belief and decision elements about the trustee. Also highlighted by the authors is the need for a trust measure to consider the source or sources of evidence in a trustor's decision to trust and the fact that trust levels will potentially have an imbalance in that one party will trust the other differently (or more than the other) according to the nature of their organisational relationship; an example of this possible trust imbalance is given of management and staff (with trust decreasing towards the bottom of the organisational hierarchy – note here this could be an argument for 'flatter' organisations). Before commencing a detailed review of the trust measures available, the authors recommend that the questions incorporated in the measures address the overall assessment of the trustee by the trustor utilising the four trust components mentioned above rather than focus on specific situational contexts given the broad bandwidth of the intra-organisational trust field. They also recommend the use of positively worded items as more reliable and accurate basing this on prior research that shows the effect of negative items on the response (Pilotte and Gable (1990)) and suggest that a result of low distrust gained as a result of a negatively worded item does not

necessarily indicate high trust (see Lewicki et al, 1998 above). Dietz and Den Hartog (2006) indicate that explicit use of 'trust' should be excluded from developed measures due to the distorting and emotional effect the word has on respondents answers.

In the final part of the paper the authors review a total of fourteen existing trust measures from McAllister (1995) to Tzafir and Dolan (2004) against their 'belief, decision and action' process, percentage weighting of the four trust content elements (ability, benevolence, integrity and predictability, but adding 'general' and 'uncategorised' elements) and the guidelines and cautions highlighted in the paragraph above.

The results are interesting, in that they serve to reinforce the potential gap in trust measurement that this research is attempting to exploit, and none of the fourteen measures reviewed covers belief *and* decision *and* action. Indeed, most cover only one of belief *or* decision and in a few cases both belief and decision. Two measures (Mayer and Davis, 1999) have possible actions implied in some items. Several measures have a good percentage share of the four trust content elements, in particular Spreitzer and Mishra (1999) and Gillespie (2003). Seven of the fourteen measures reviewed include negatively worded items whilst only two address the organisation (of which one uses negative items and the other does not have a balanced percentage of the four trust content measures and uses the word 'trust' in the measure) with the vast majority focussing on a uni-dimensional approach (e.g. supervisor trust in staff).

The most balanced outcomes against these multiple criteria are provided by two reviewed measures. Firstly, Spreitzer and Mishra (1999) who focus on belief, have a balanced percentage spread against the four trust content elements with no negatively worded items and no use of the word 'trust'. Secondly, Gillespie (2003) who focuses on decision again has a balanced percentage spread against the four trust content elements, no negatively worded items and no use of the word 'trust'.

These two measures have been selected as the basis for further development in the setting of trust measurement in post-acquisition or merger integration. Development of the selected measures is required, as highlighted in this chapter, to encompass the three elements of Dietz and Den Hartog's trust process, whilst maintaining the even percentage spread against the four trust content elements and ensuring that the research includes a multi-dimensional assessment of trust levels within the examined organisation from senior management to local management to staff and vice versa. Building on Dietz and Den Hartog's work, and adding constructive comments by

Lewicki et al (2006), this research will utilise a mixed method quantitative and qualitative research approach using longitudinal field-based case studies as a basis for multiple use of trust measures. Research validity can be augmented, as indicated by Lewicki et al (2006), by utilising consistent measures, applied in a manner that ensures the measure is aligned to the trust condition, with attention to consistency and overlap.

Exploiting the gaps outlined by the existing research offers the authors a means of extending the knowledge of trust and its role in the post-acquisition or merger integration; and, thus, potentially increasing the possibility of ensuring retention of key staff and the chances of a successful acquisition or merger.

The research approach

Selection of the research method was based on the opportunities identified in the research literature, as outlined above, and the company structure and context under study. Figure 5 below shows the multiple layers of the organisation to be researched.

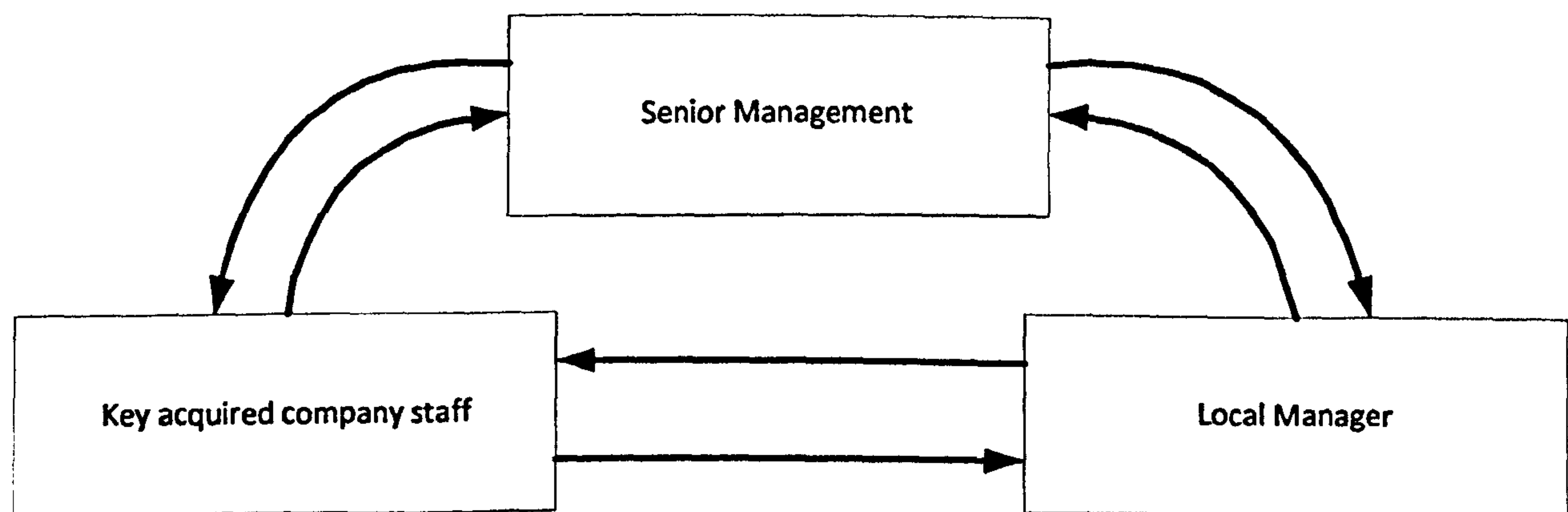


Figure 5 Generic company structure. Derbyshire (2009)

The company studied was located in a number of separate locations across North America and Europe. The head office is located in North America.

One company division (approximately twenty staff) acquired a further approximately eighty staff making a total of roughly one hundred staff. The division is managed by a first line team of managers reporting to the division president. The divisional president reports to the senior management team located at the head office in North America.

Similarly, another company was acquired in North America by the parent company that was physically remote from headquarters. There was no company presence at the location of the acquired company prior to the acquisition. A new local manager was appointed by the senior management team to run the newly acquired site. The initial staff numbers acquired was about twenty six at this location.

We therefore have a number of layers of staff in these two organisations from the larger staff numbers, smaller first line management teams, the local manager (all at a remote from head office location) and, finally, the headquarter-based senior management team. This is illustrated below in Figure 6.

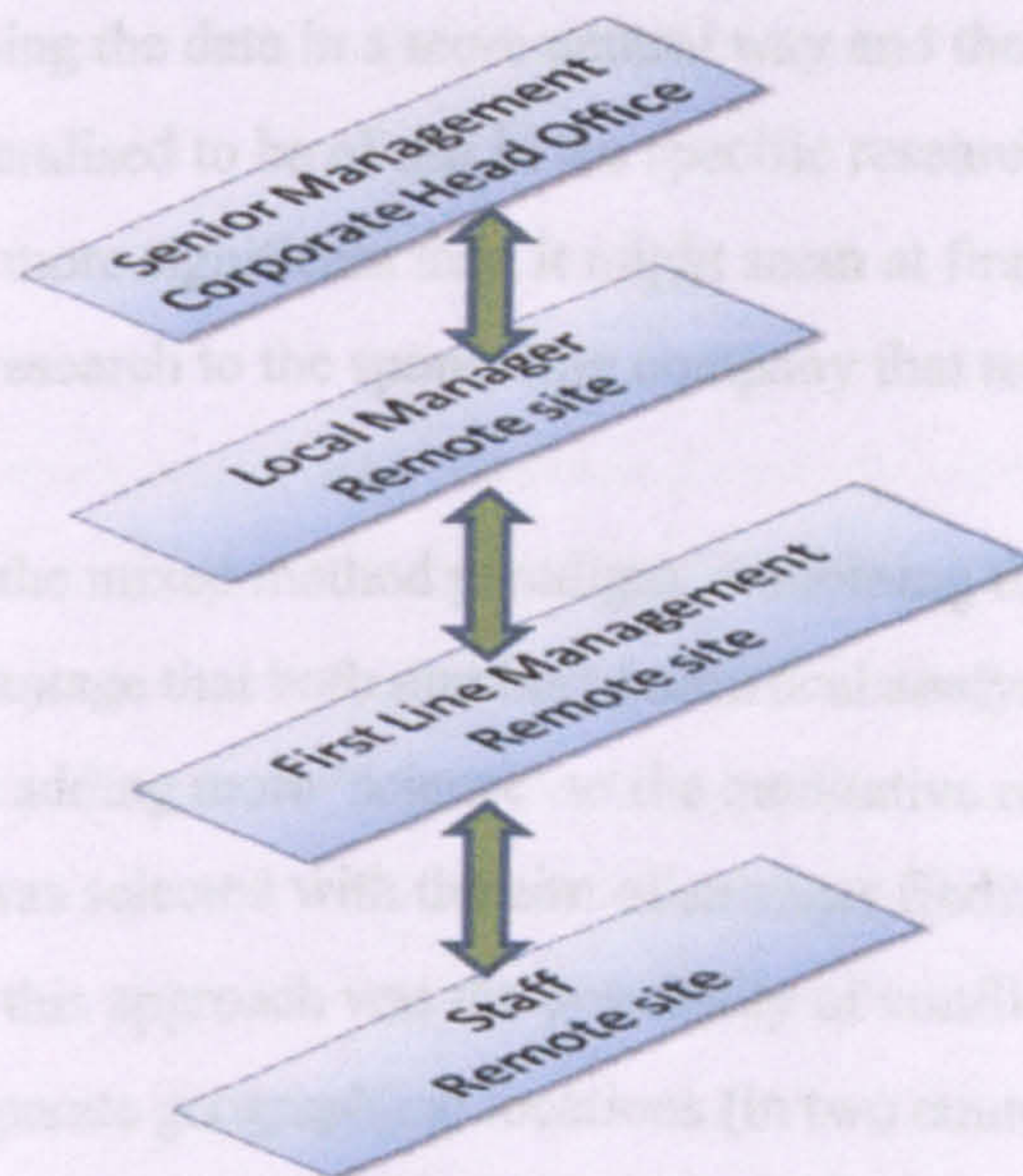


Figure 6 Company management and staff structure. Derbyshire (2009)

In the company used as the basis for this research the numbers of staff range, as described above, from approximately thirty to over one hundred. The first line management typically number between eight and sixteen with the local manager bearing responsibility for the entire remote site operation and performance. The senior management team located at the corporate head office numbers eleven.

Three research paradigms were considered.

The advantage of utilising the qualitative paradigm was its ability to elicit detailed descriptive data from participants, without the 'tighter' confines of a set questionnaire, which offered potentially rich results. This was of interest given the small number of senior staff and first line

managers. However, the disadvantages associated with this paradigm, such as generalisability, the difficulty in testing theories or hypotheses, the potential volume of data and the risk of biases on the part of the researchers led to the desire to produce a more 'balanced' research approach. The quantitative paradigm offered speed of data gathering, relative ease in covering the reasonably large number of staff in the company under study, facilitation of understanding of cause and effect relationships by removal of variables influence, wider acceptance in the business community ('science' as opposed to 'emotions') and a better position on generalisability. The disadvantages were selection of the variable(s) under study not reflecting the cause of effects under research, the risk of the researcher seeking for confirmation in the data gathered rather than assessing the data in a more neutral way and the risk that the outcome of the research would be too generalised to be of use in the specific research scenario being examined. This latter disadvantage is more significant than it might seem at first in that the researchers needed to supply specific research to the sponsoring company that took account of its unique culture and context.

The researchers settled on the mixed method paradigm, combining the other two principal paradigms, due to the advantage that both numbers (statistical analysis) and detail can co-exist with the statistical element adding more 'science' to the qualitative results. This broadened the range of the research and was selected with the aim of stronger findings and resulting conclusions. The risk with this approach was the possibility of conflicting findings.

Two case studies at two separate geographical locations (in two countries) within the company under study were undertaken. The studies were both designed to be longitudinal and multilevel in nature, encompassing both the relationship from staff to management and from management to staff. A further aspect that has been explored is the relationship between 'head office' senior management and the geographically remote acquired company management. Full access was been granted to all staff and management constituting an excellent data gathering opportunity. This paper focuses on preliminary findings from one of the two locations studied. This is driven by data availability.

A number of trust measurement tools were been reviewed and several selected for use. The two measures that were selected (with permission of the authors) were Spreitzer and Mishra (1999) for manager's trust of staff and Gillespie (2003) for staff trust in managers. However, examination of the literature concerning trust measurement indicated there was some absence of

suitable tools that could measure trust spanning from a belief trust base (where the trustor *believes* he/she can trust the trustee) through to trust informed actions. This lack of appropriate means of measurement led to development of two further trust measurement tools that will augment the measures used by Spreitzer and Mishra (1999) and Gillespie (2003) to attempt to span this range of trust. Longitudinal trust measurement was selected on the basis of seeking to establish trust trends that could be linked with key staff retention and possibly related management actions. Due to time restrictions two discrete measurements were undertaken with 12 months spacing to form longitudinal measurement. Data was gathered through questionnaires and semi-structured interviews in accordance with the mixed method approach selected. Both sets of questionnaires were piloted with feedback being used to further refine the questions.

Preliminary findings

Careful assessment of the structures of both companies was carried out to ensure that the appropriate surveys (staff or manager) were administered to the correct individuals. This required an in depth review of the organisational structure involving discussions with the personnel managers in both companies to agree the 'manager' and 'staff' levels. Further work was carried out to assess who should participate in the semi-structured managers' interviews. The criterion for selection was the seniority of the individual within the organisation such that the level of influence and clear association with 'management' was established in the organisational role. The initial measurement of trust levels of managers and staff was carried out in October 2008. Surveys were distributed electronically, after suitable staff and management briefings by senior management.

Considering, firstly, staff trust in managers 83 questionnaires were sent with a 55.4% response rate. This response is interesting in itself, as although statistically significant, could have reflected the uncertainties of the newly acquired staff despite the comprehensive briefing provided regarding the purpose and intent of the survey. Most staff were relocated on acquisition closure to the new facility in May 2008. Of the respondees 52.2% were acquired staff with 60.9% male and 39.1% female. This was broadly representative of the overall male/female composition of the company. The age range of the respondees ranged from 8.7% for between 20

and 29, 15.2% for between 30 and 39, 37% between 40 and 49, 23.9% between 50 and 59 and 15.2% between 60 and 69.

Figure 7 below shows a typical response from the initial survey. As can be seen there is a positive skew to the results that was fairly typical of most of the initial staff results.

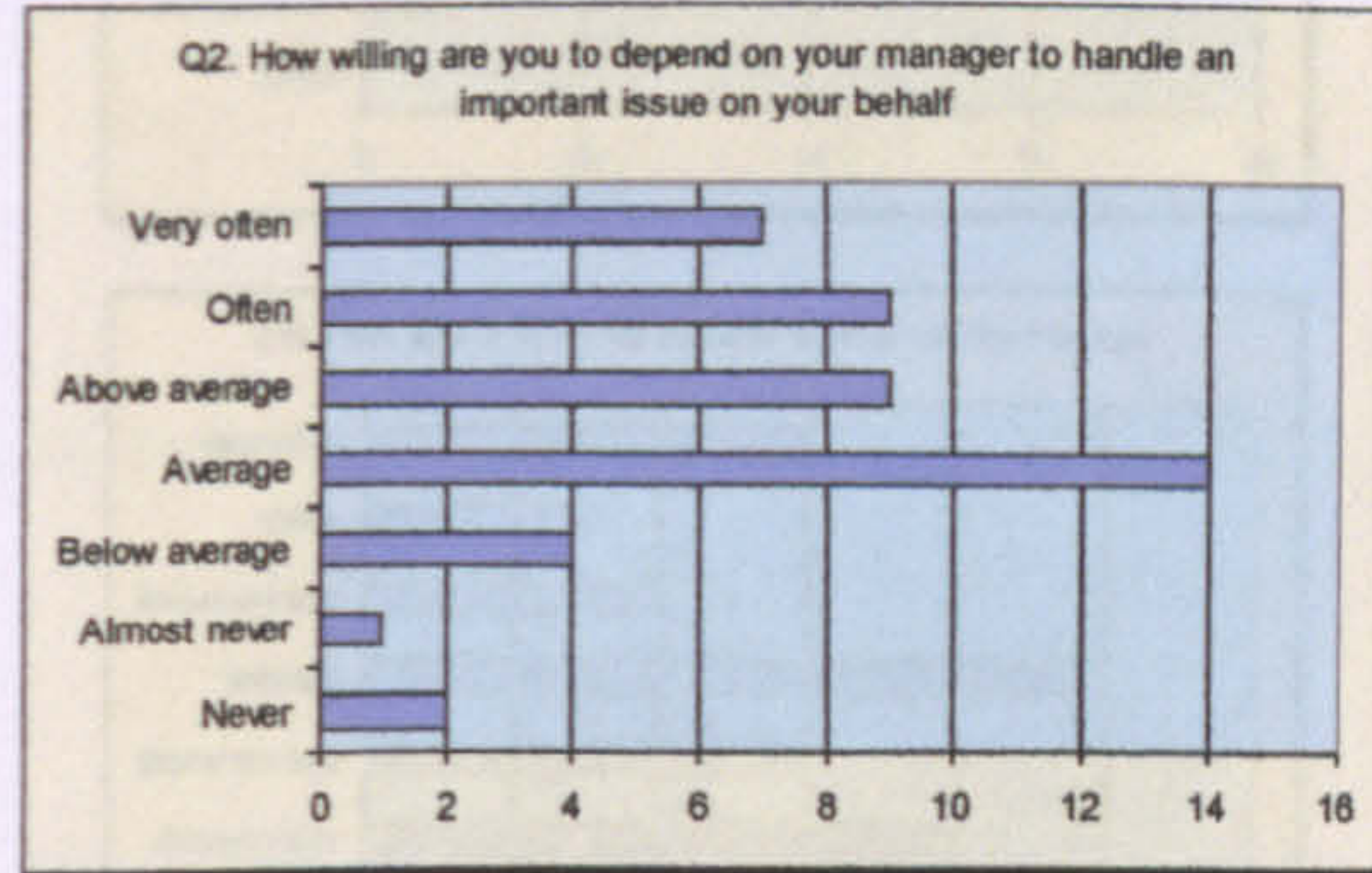


Figure 7 Example staff result showing positive skew. Derbyshire (2009).

It is interesting to speculate as to the cause of the skewing possibly reflecting a high level of initial trust given the relatively recent acquisition; however, examination of a further result shown below in Figure 8 shows that this may not be correct (slightly negative skew).

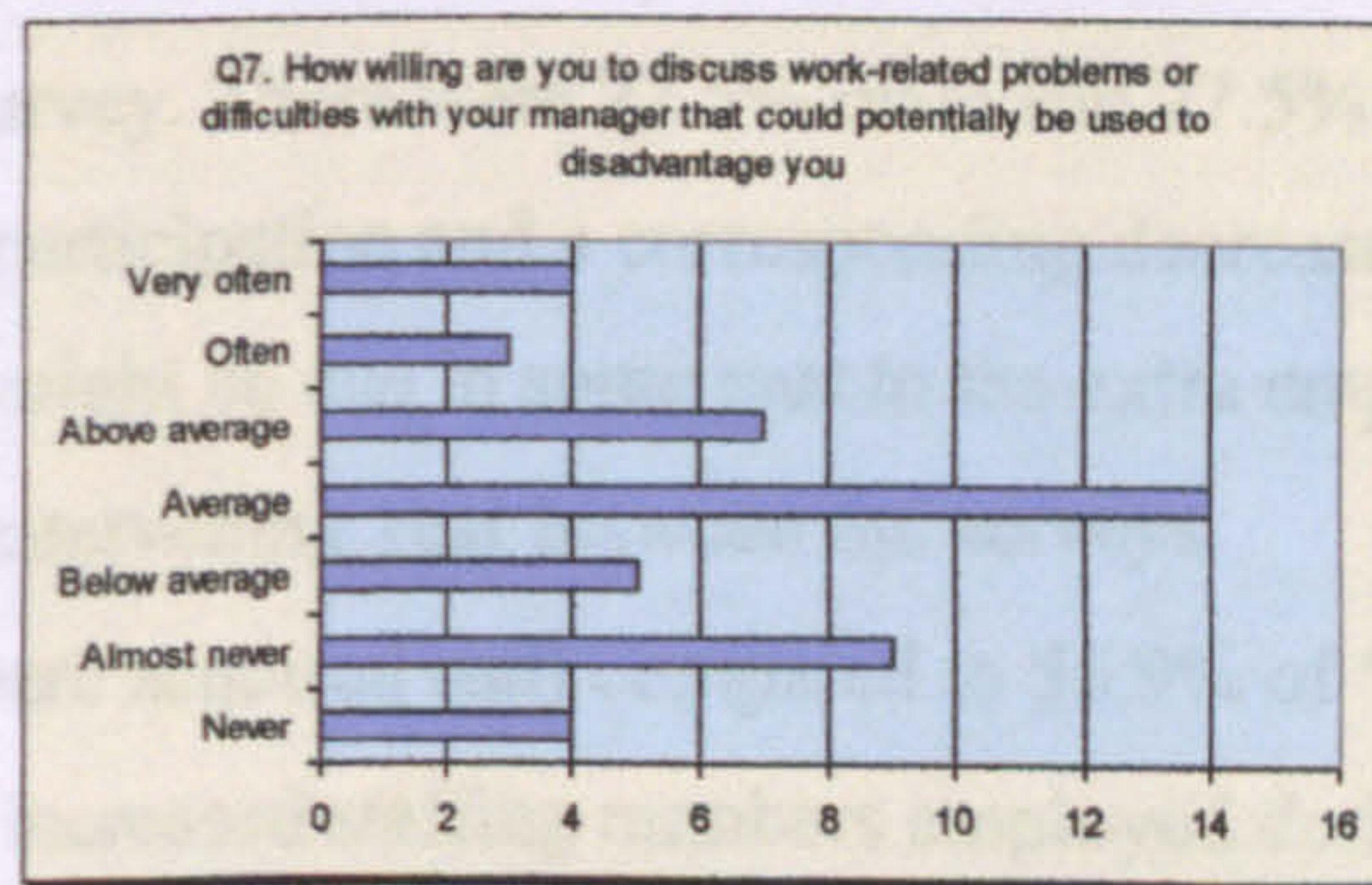


Figure 8 Example staff result showing slightly negative skew. Derbyshire (2009)

A further area of interest is contrasting the 'belief' element with the 'action' element of trust. The questionnaires are specifically designed to attempt to elicit this information. Thus it is instructive to examine the contrast between a willingness to undertake an action and reflection on an action undertaken. An example result can be seen below in Figure 9.

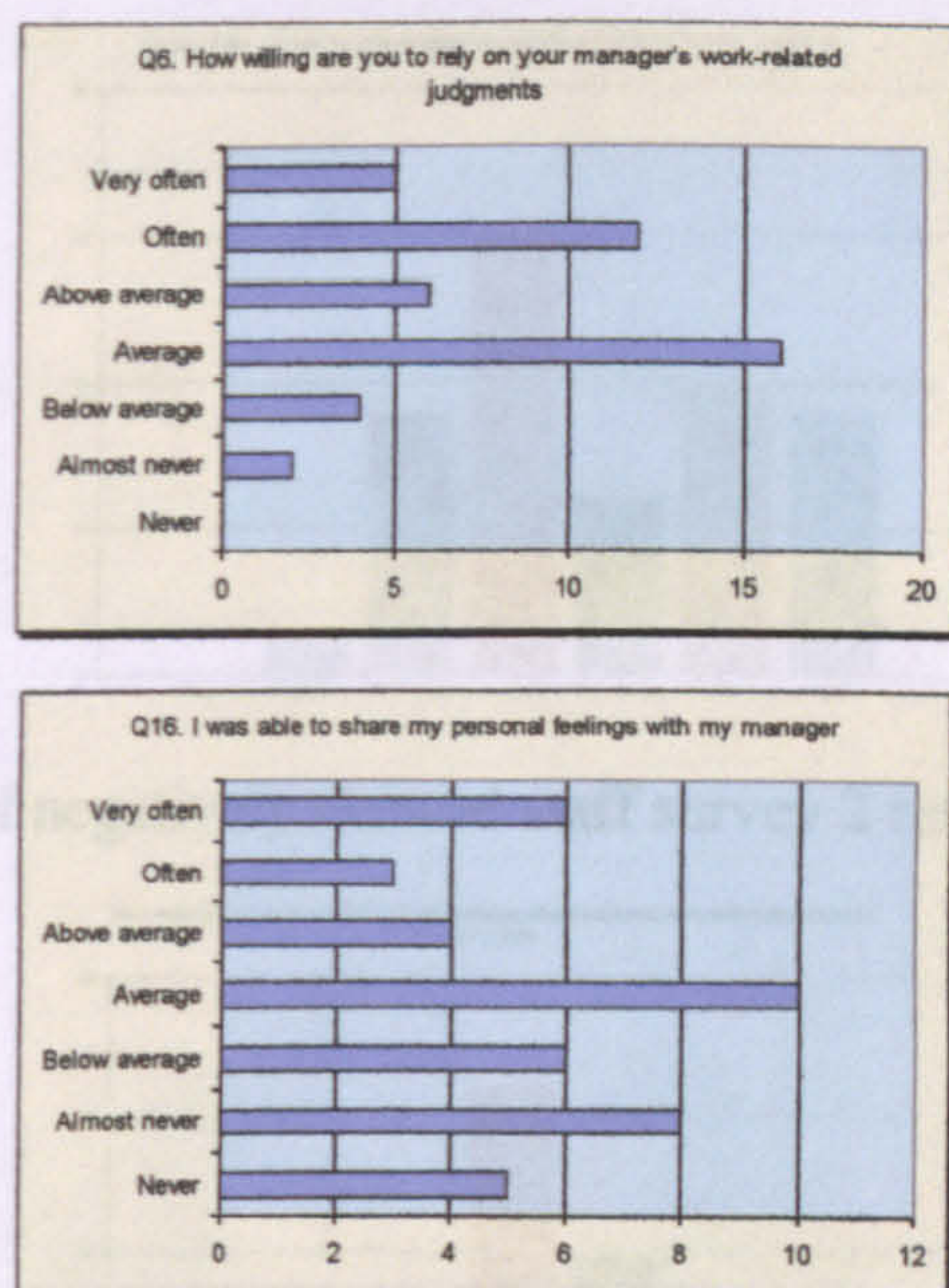


Figure 9 Example comparison of belief and action-based trust. Derbyshire (2009)

We should now examine the preliminary findings of the second staff survey. The second survey was administered in October of 2009. 90 surveys were sent with a response rate of 56.6% comparable with the first survey. There were 72.5% male and 27.5% female respondees. This shows an increase of male participation and a corresponding decrease of female participation since the first survey. This might be due in some part to the extra employees (predominantly male) recruited during the intervening year between the surveys.

Of the respondees 43.1% were acquired staff compared to 56.9% of 'original' employees. This broadly correlates with the increased staffing numbers employed during the year between the surveys. The age range of the respondees ranged from 5.9% for between 20 and 29, 21.6% for between 30 and 39, 21.6% between 40 and 49, 41.2% between 50 and 59 and 9.8% between 60 and 69.

The second staff survey again exhibited a primarily negatively skewed trend in responses of which Figure 10 shown below is broadly indicative. There were no positively skewed results in this survey with the emergence of a more classically normal distribution in some cases as shown in Figure 11 below.

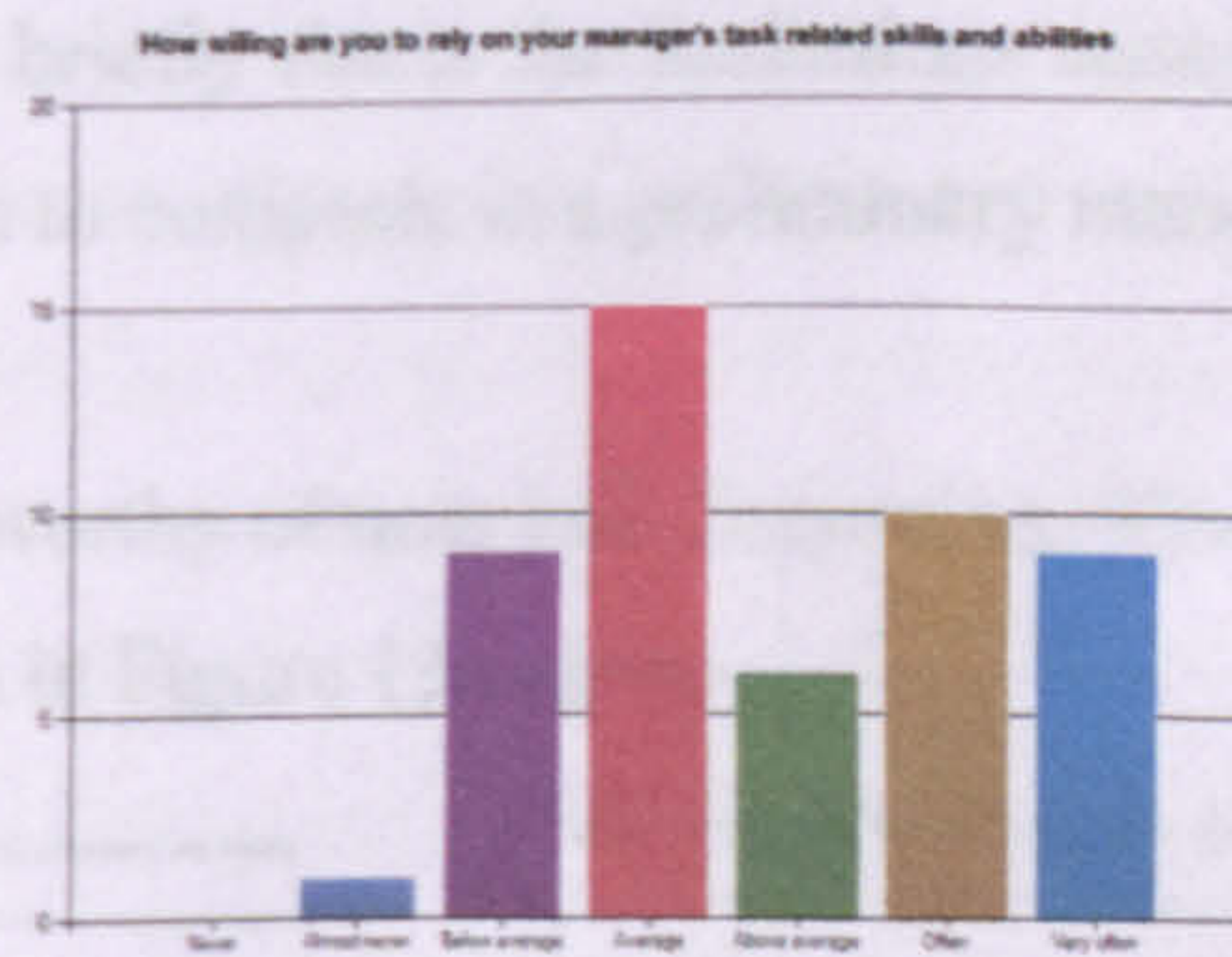


Figure 10 Example of negatively skewed staff survey 2 result. Derbyshire (2009)



Figure 11 Example of normal staff survey 2 result. Derbyshire (2009)

The interesting factor that emerges from an initial analysis of the second staff survey (undertaken October 2009) is the remarkable similarity between the belief and action responses. This is illustrated by example results below shown in Figure 12. This opens up a potential area of research, as, compared to the first survey one year earlier which showed some significant levels of difference between belief and action, the second survey broadly tracks between belief and action with smaller differences. As will be seen this is an interesting comparison with the results obtained from the managers.



Figure 12 Comparison of belief and action staff survey 2 result. Derbyshire (2009).

Thus we have examined, albeit briefly due to the limitations stated previously, the individual staff surveys. Now we move on to compare, in a preliminary manner, the two surveys with each other.

Here there are some examples worthy of note and discussion. One comparison between two action trust responses as shown in Figure 13 below.

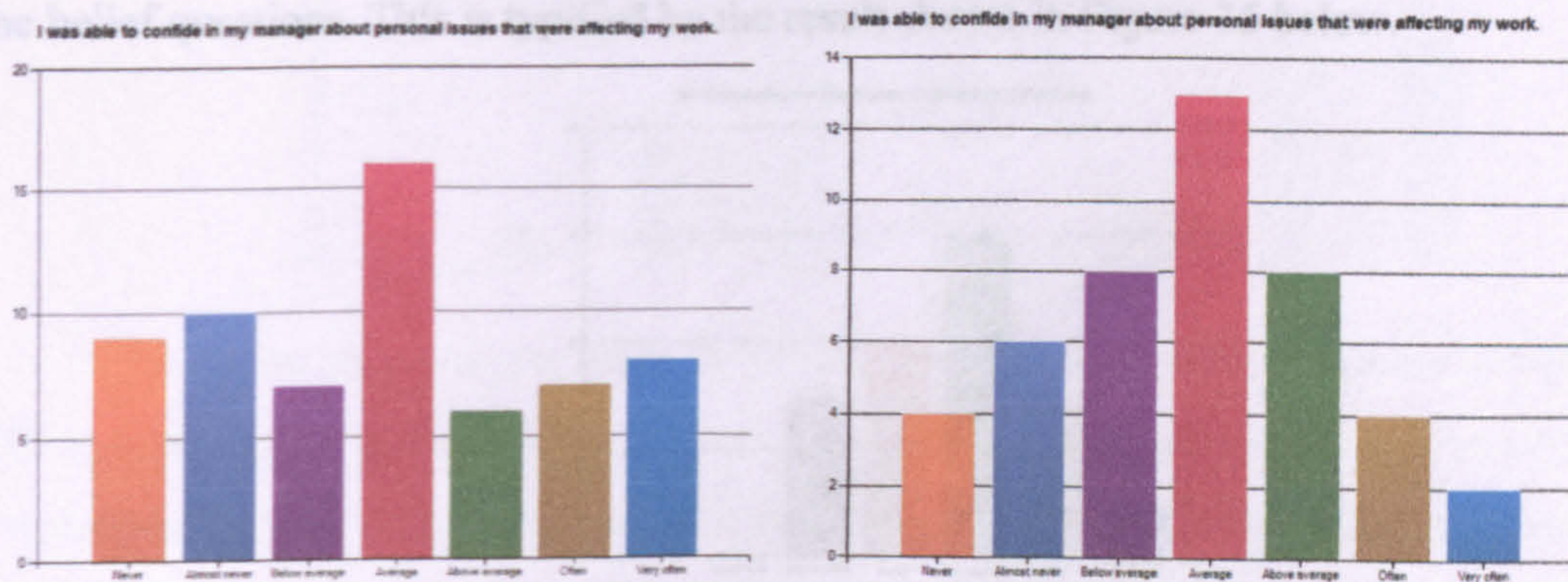


Figure 13 Contrast between two staff survey action trust results. Derbyshire (2009).

This comparison reflects, perhaps, a wider range of views in 2008 than subsequently in 2009 with a tendency towards a more normal distribution. The level of respondees against the total number of staff surveyed was similar in both cases indicating genuine change in opinion, potentially based on a year of further experience of management. The 2009 result could be seen as somewhat satisfactory if we align with the concept, postulated in this paper, that employee retention is more likely where trust levels between managers and staff are both reciprocated and are high. Although the high end of scale shows a small drop there is also a corresponding drop in the low (low trust indicator) end of the scale. However, further analysis is required to attempt to understand in a more detailed level the potential implications of these results.

We now turn our attention to a preliminary review of the managers' results. Here there are data from two surveys and semi-structured interviews. Again, as the staff surveys reviewed above, the managers' surveys and interviews were carried out in October 2008 and October 2009.

22 questionnaires were sent with a 72.8% response rate. Of the respondees 22.2% were acquired staff with 83.3% male and 16.7% female. This was broadly representative of the overall male/female composition of the management tier of the company. However, although this is a somewhat disappointing response rate the data is augmented through use of semi-structured interviews which elicited an 85.6% response rate. This response rate was further improved in the

second survey and interview stage. The age range of the respondees ranged from 0% for between 20 and 29, 11.1% for between 30 and 39, 61.1% between 40 and 49, 27.8% between 50 and 59 and 0% between 60 and 69 reflecting the age range of the management team.

The first managers' trust in staff survey revealed a disparity of results, with some normal distributions as shown in Figure 14 below, but a large number of negatively skewed results from the belief questions. This is typified by the result shown in Figure 15 below.



Figure 14 Manager trust example of normal distribution. Derbyshire (2009).

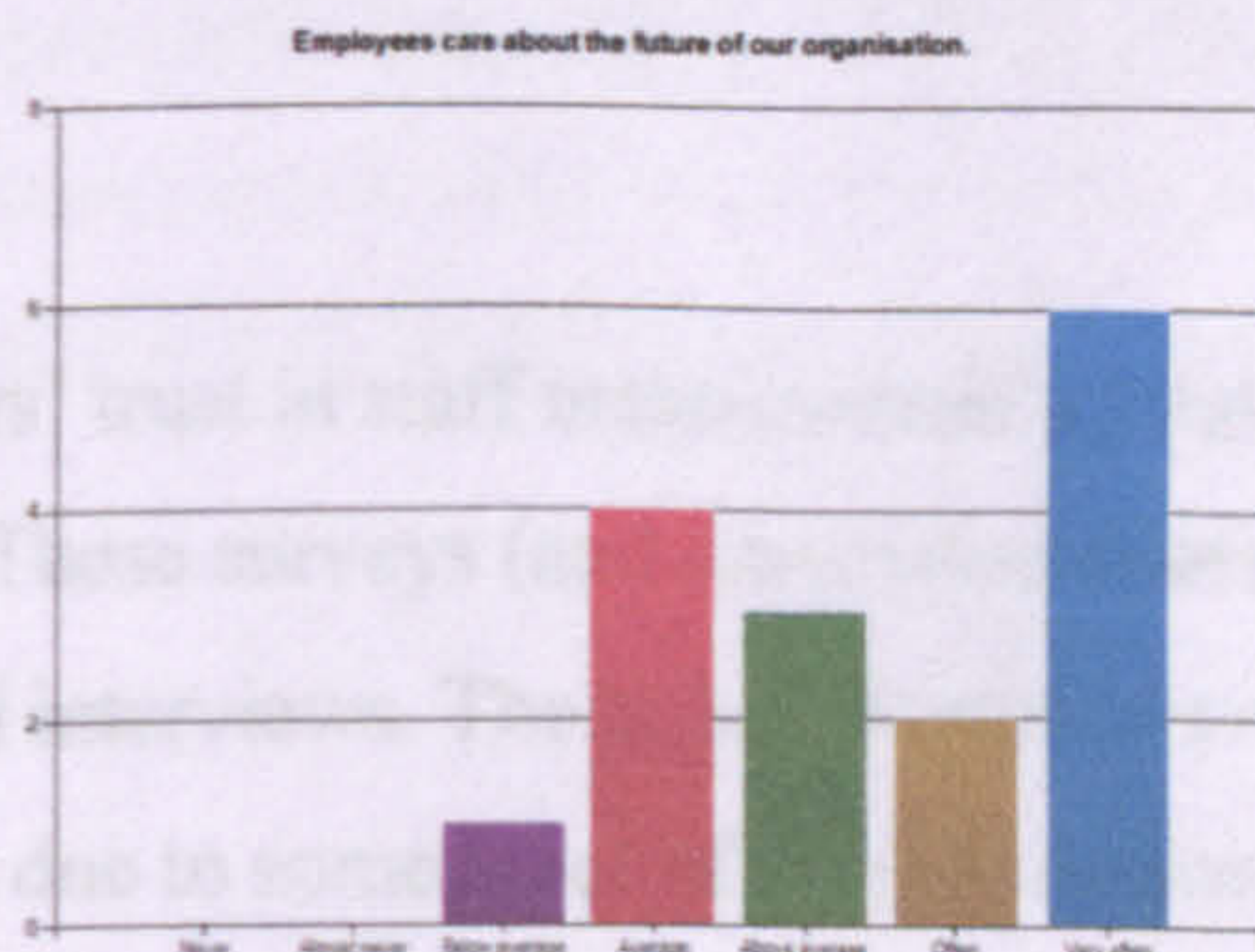


Figure 15 Manager trust example showing negative skewing. Derbyshire (2009).

It is interesting to reflect on this strong tendency toward a negative skew in the managers' belief trust of staff. Examining the qualitative interview data there are some indications of the possible source.

“Everyone here and I think the team selected before we were here did a very nice job. The ones that were here, they were very well experienced, very focused. So that was well done. I think he got his managers to carry the mantra down. This is what the philosophy is, this is what we are going to go do, and you need to get on board.”

Examination of the relative data between belief and action trust of this first manager survey reveals some very similar results and also several disparities. One such disparity is shown below in Figure 16.



Figure 16 Managers belief versus action example result. Derbyshire (2009).

This might suggest, given that the management is overwhelmingly staffed by ‘non-acquired’ employees, that the original philosophies that are illustrated in the negatively skewed results in the belief section are not reflected as strongly when it comes to experience (action-based trust) with the staff but it is worth noting that there is still some retained evidence of very positive experience.

Turning to the second managers’ trust in staff measurement a total of 13 surveys were distributed with a response rate of 100%. These surveys (and associated interviews) were carried out a full year after the initial survey and interviews. The reduced numbers of this second survey, compared to the first (22), was due to some level of reorganisation and a smaller number of staff that matched the ‘manager’ classification. Of the respondees 7.7% were acquired staff with 92.3% male and 7.7% female. The age range of the respondees ranged from 0% for between 20 and 29, 7.7% for between 30 and 39, 38.5% between 40 and 49, 53.8% between 50 and 59 and 0% between 60 and 69.

These results are particularly interesting in that any potential ‘honeymoon period’ was well and truly over and the business was having to grapple with the hard aspects of commercial reality. This leads to a range of belief-based trust results that show classic normal distribution, as shown in Figure 17 below, and both positively and negatively skewed results such as those shown in Figure 18.

Comparing belief-based with action-based trust results with the evidence of distribution skewed or normal distribution in the results of normal results with an example shown below in Figure 17.

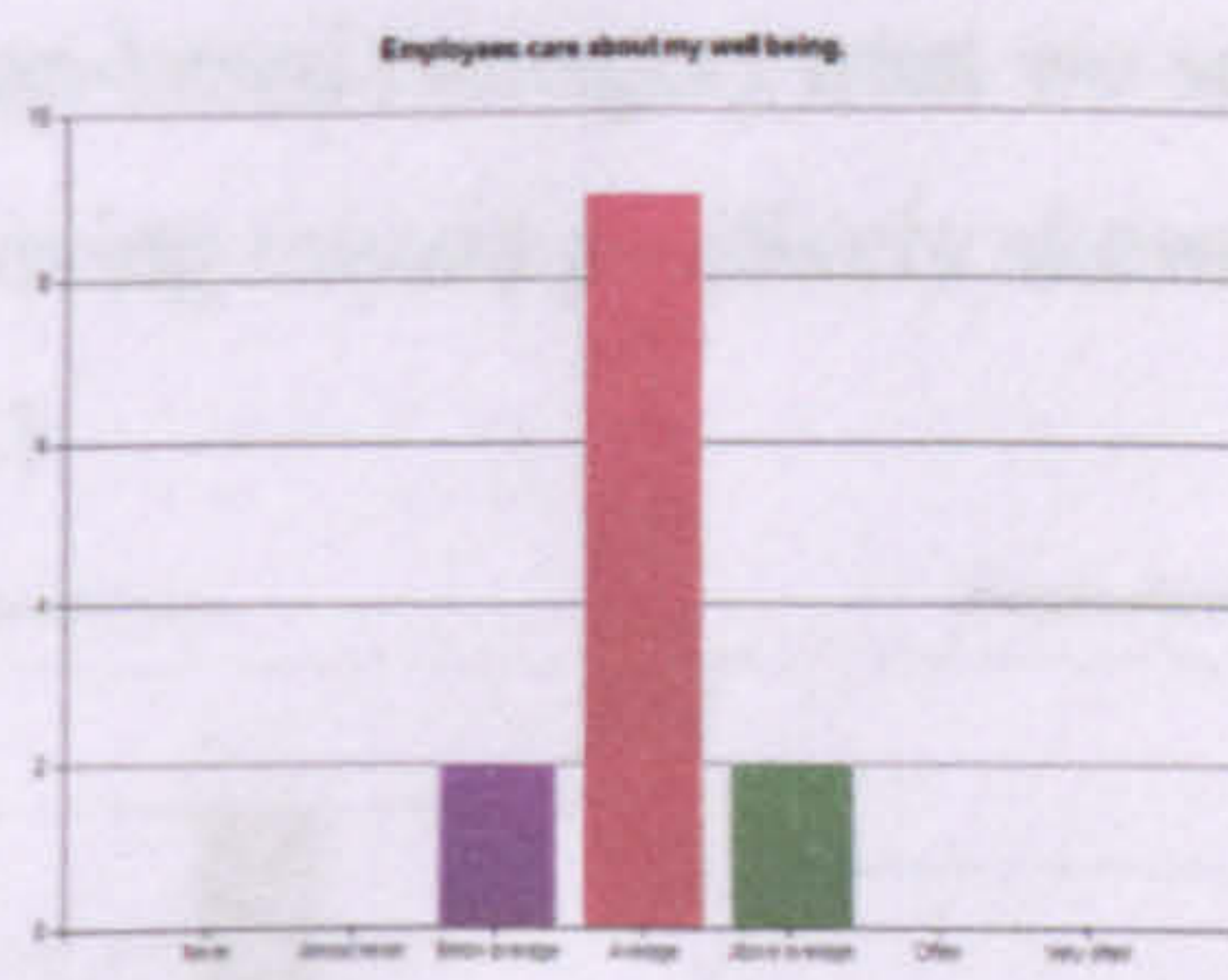


Figure 17 Manager belief-based trust example. Derbyshire (2009).



Figure 18 Manager belief-based trust example showing skewing. Derbyshire (2009).

The action-based manager trust in staff results show some normal distribution but is dominated by positively skewed results, one example of which is shown below in Figure 19 below. A further result of note is the emergence of double peak action-based trust results as shown in Figure 20.

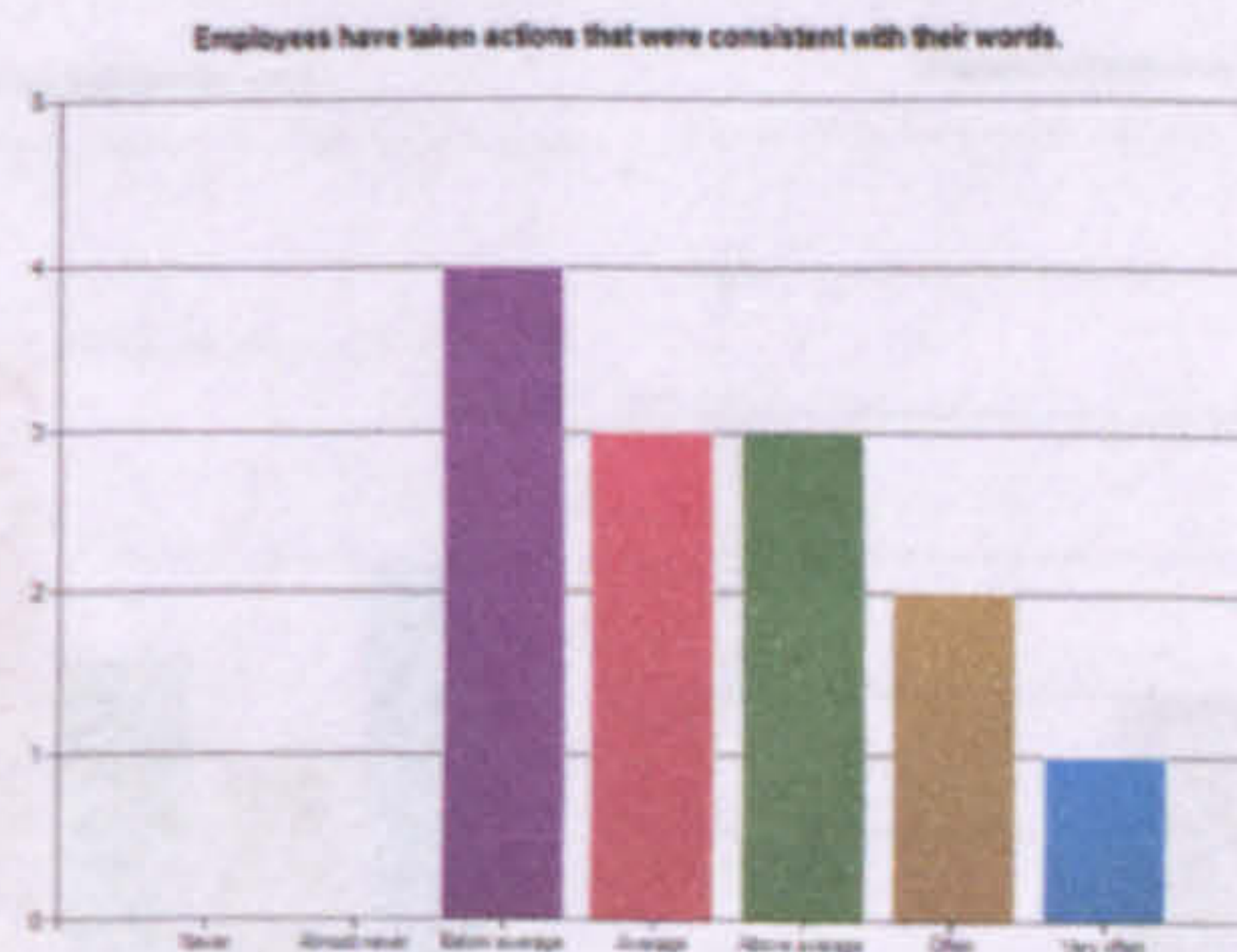


Figure 19 Positively skewed manager action-based trust example. Derbyshire (2009).

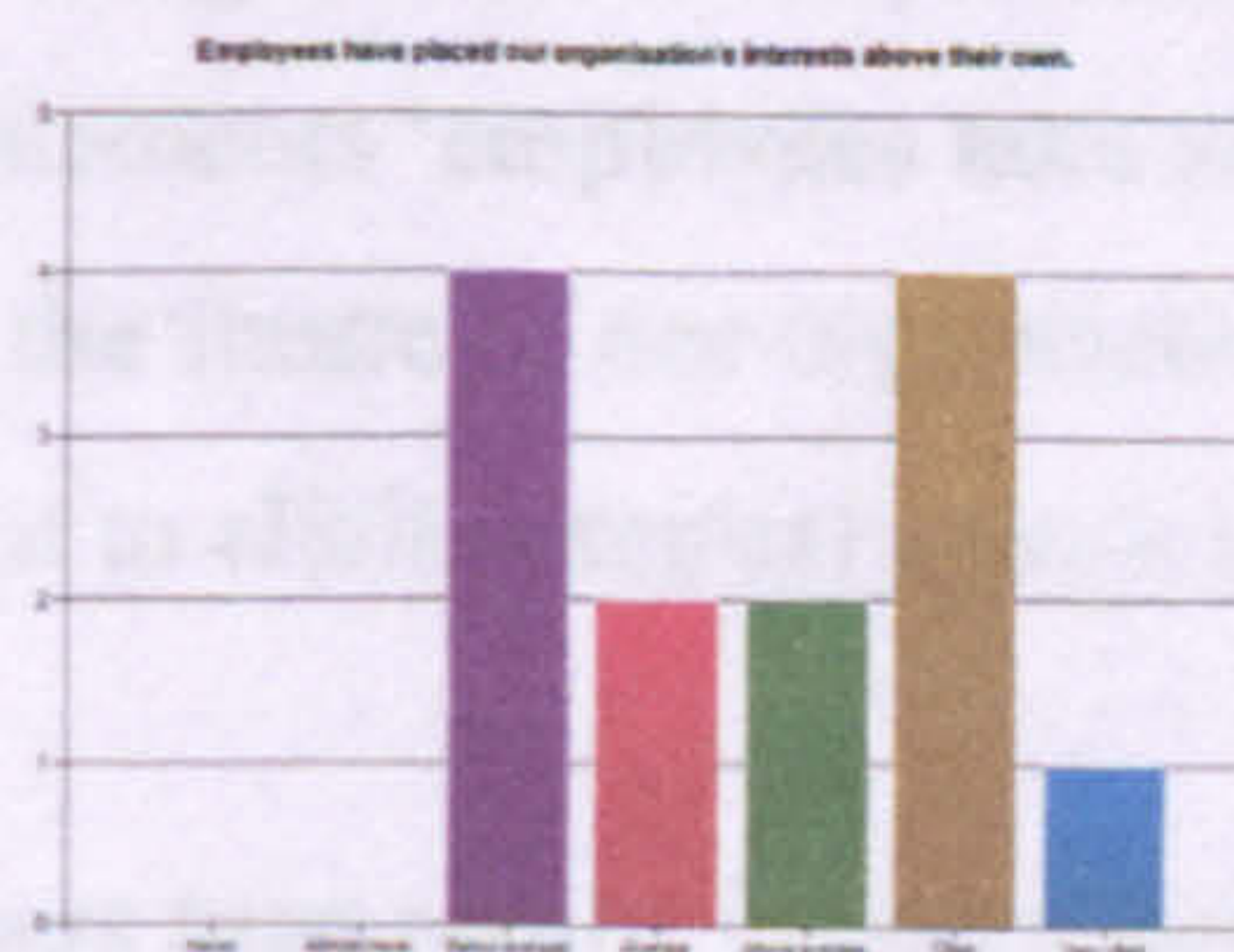


Figure 20 Double peaked manager action-based trust example. Derbyshire (2009).

Comparing belief-based with action-based managers trust we see some evidence of negatively skewed or normal distributions moving toward positively skewed or normal results with an example shown below in Figure 21.

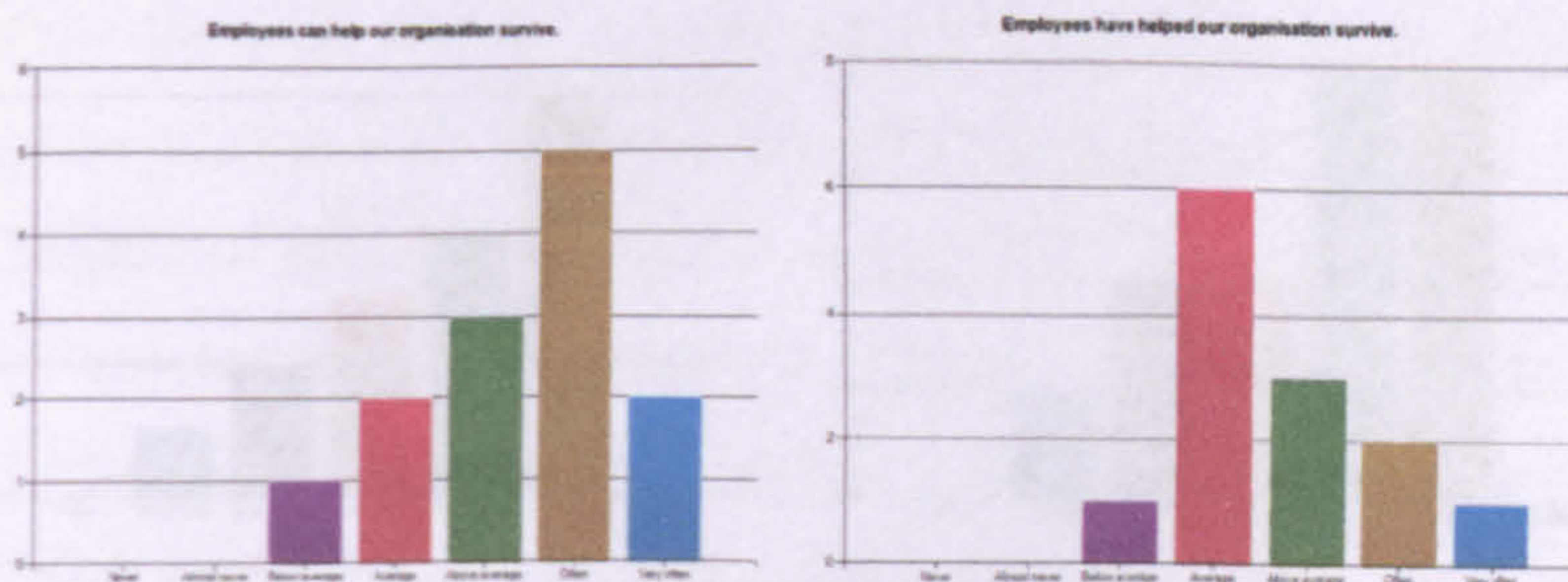


Figure 21 Contrast of belief-based versus action-based managers' trust. Derbyshire (2009). Further analysis of the managers' second interview data is required to attempt to understand how this apparent reversal is explained; however, there is at least partial evidence, at this stage in the preliminary analysis, to support the hypothesis that manager experience of trust is somewhat different from the belief-based starting point.

Finally, we should compare the belief-based and action-based trust results between the two surveys.

The belief-based trust results show remarkable similarity between the first and second surveys with two principle exceptions, one example of which is shown below in Figure 22.

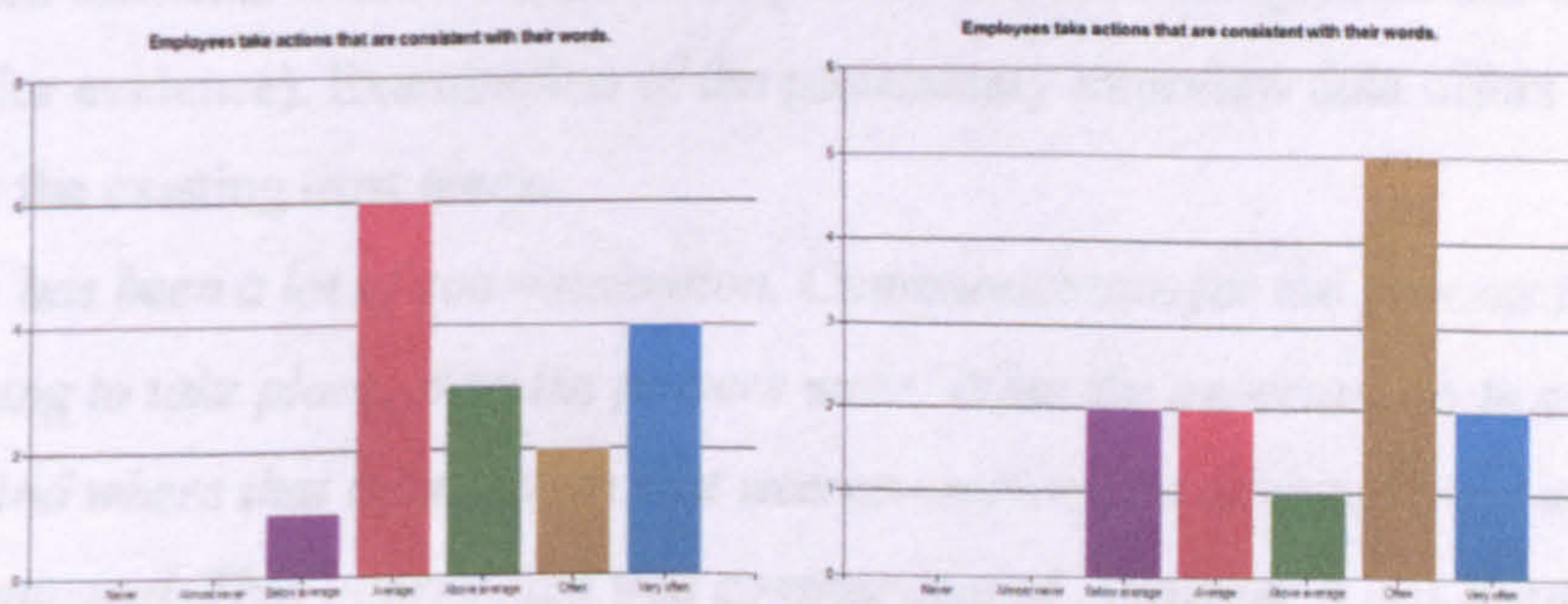


Figure 22 Belief-based managers' trust exceptional result. Derbyshire (2009).

The two exceptions concern the statements 'employees take actions that are consistent with their words' and 'employees care about the future of our organisation'. Further examination of interview data is required to attempt to elicit potential causes for these apparently out of family results.

Turning to the action-based managers trust results between surveys, similar to the belief-based trust results mentioned above, there is good evidence of similar results. One such example of

similarity is in response to the statement 'employees have made personal sacrifices for our organisation' as shown below in Figure 23.

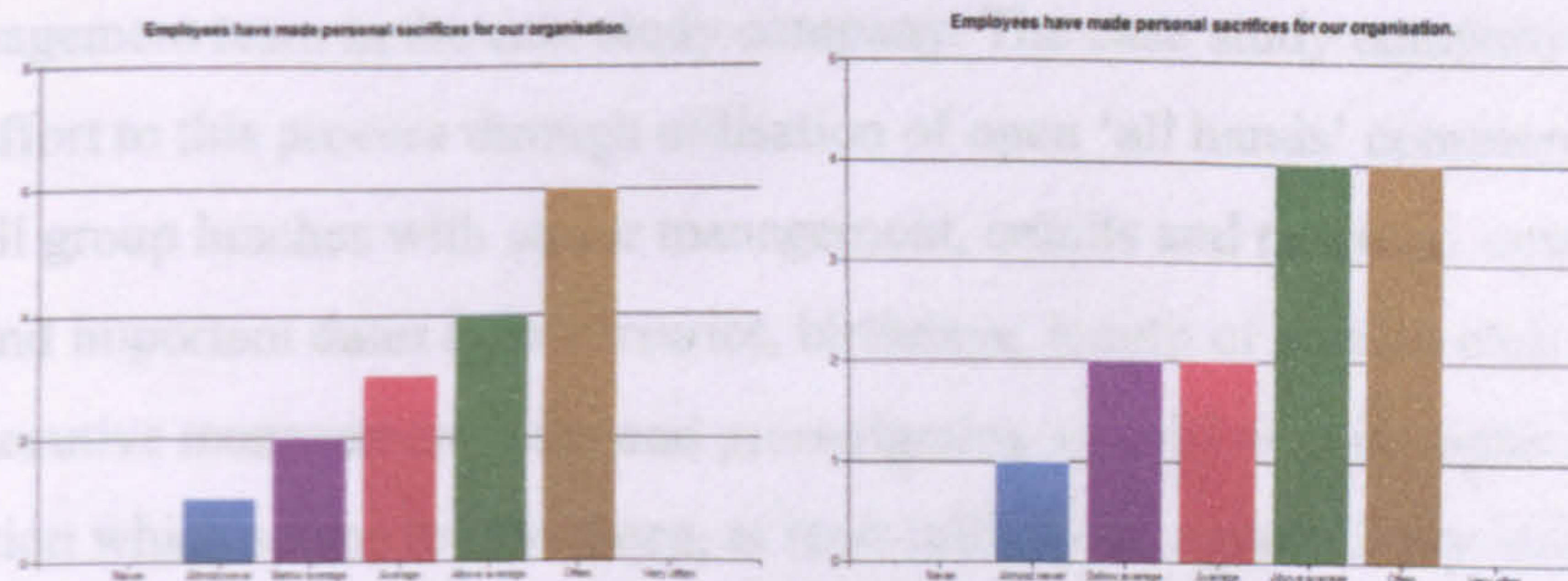


Figure 23 Typical action-based managers' trust example. Derbyshire (2009).

This would seem to provide some initial evidence that the managers' perception of staff is such that their trust levels are reasonably constant over the 12 months of the research. This is potentially interesting as it supports stabilisation of trust between the management and staff at whatever state the individual has reported. It will be important to cross check the interview results across the 12 months to add further dimensions to the emerging trust status.

If we accept that trust levels are broadly at average or slight above average levels it is useful to understand how this has been effected by the case study company management. This is not to discount the need for further work in the trust building within the company as there are clearly some disaffected elements with low trust levels present in both management and staff (refer to above figures for evidence). Examination of the preliminary interview data offers some clues on the reasons for the existing trust levels.

"There has been a lot of communication. Communication for the process itself. How it was going to take place. Who the players were. What the expectations to some extent were. And where that information that was communicated deviated from what had been communicated. That information was communicated. Manager B has been very open and honest as has his team I think." Manager A, October 2008.

"You know one thing to build trust is like I said these all hands meetings where you tell it how it is. You tell that we won something but you also tell that you lost something. Which we didn't win you know. I think communication in general should be open and forthcoming and telling what's going on. And not hiding any bad things- that's very positive for building trust." Manager C, October 2008

Clearly good communication would appear to have some value in building trust between management and staff and within the management structure upward to the headquarters executive management team in the case study company. The case study company has applied considerable effort to this process through utilisation of open 'all hands' communication meetings, small group lunches with senior management, emails and postings, celebrations of achievement and important dates (anniversaries, birthdays, length of service etc), in-depth briefings to executive management team and promulgating a positive philosophy throughout the company location which seems to have been, at least initially at a preliminary level, mainly successful. More work is required to ascertain whether the open communication policy is a principle contributor to staff retention.

Conclusion

Given the preliminary status of the data obtained during this research activity there is, nevertheless, some indications that trust within the case study company is at a level that tends towards either 'average' or 'above average'. There appears some differences between belief-based and action based trust in some cases possibly hinting at experience not matching initial beliefs in a few cases and this might be cause for concern and merits further monitoring. The retention level has been very good within the case study company with only one manager and few staff leaving the company as of October 2009 from the original management and staff numbers at acquisition close in May 2008. The nucleus of the management team is thus unaltered and this offers potentially fruitful data in terms of replicability and repeatability and a chance to analyse trust level changes between 2008 and 2009 and examine potential causes. The staff has grown in number since the acquisition and now 'new or original' staff outnumbered acquired staff. This causes us some issues with a changing population but it should be borne in mind that the numbers have mainly been augmented rather than staff exiting and being replaced. Thus the original members are mostly still present and are represented in the survey data.

Adoption of a vigorous and courageous communication policy should be considered central to maintaining or building trust levels. Further work is required to ensure triangulation and validity. This will be achieved through examination of a second case study company at a different location. This research, it should be stressed, is at a preliminary level and much work remains to

be done. However, some interesting data has been collected and, subject to further analysis, it is expected to yield a contribution to trust knowledge, addressing as it does a high-tech company multi-level, longitudinal approach to trust and its role in retention post acquisition that is relatively unexplored to-date.

Bibliography

Birkinshaw, J., H. Bresman and Hakanson, L. (2000). "Managing the post-acquisition integration process: How the human integration and task integration processes interact to foster value creation." Journal of Management Studies 37, (3): 395-425.

Cartwright, S. and Cooper, C.L. (1990). "The impact of mergers and acquisitions on people at work: existing research and issues." British Journal of Management 1: 65-76.

Costa, A. C. (2003). "Work team trust and effectiveness." Personnel Review 32, (5): 605-622.

Dietz, G. and Den Hartog, D.N. (2006). "Measuring trust inside organisations." Personnel Review 35, 5: 557-588.

Dooley, K. J. and Zimmerman, B.J. (2003). "Merger as marriage: Communication issues in postmerger integration." Healthcare management Review 28, (1): 55-67.

Gillespie, N. (2003). Measuring trust in working relationships: the behavioural trust inventory. Academy of Management Meeting. Seattle.

Graebner, M. E. (2004). "Momentum and serendipity: How acquired leaders create value in the integration of technology firms." Strategic Management Journal 25: 751-777.

Hacker, C. A. (2003). "Turnover: a silent profit killer (staff turnover)." Information Systems Management 20, (2): 14-18.

Jones, G. R. and George, J.M. (1998). "The experience and evolution of trust: Implications for cooperation and teamwork." Academy of Management Review 23, (3): 531-546.

Krug, J. A. (2003). "Why do they keep leaving?" Harvard Business Review 81, (2): 14-15.

Lewicki, R. J. and Bunker, B.B. (1995). Trust in relationships: A model of trust development and decline. Conflict, cooperation and justice. B. B. Bunker and J. Z. Rubin. San Francisco, CA, Josey-Bass.

Lewicki, R. J., McAllister, D.J. and Bies, R.J. (1998). "Trust and distrust: New relationships and realities." Academy of Management Review 23, (3): 438-458.

Lewicki, R. J. and Stevenson, M.A. (1998). "Trust development in negotiation: Proposed actions and a research agenda." Journal of Business and Professional Ethics 16, 1-3.

Lewicki, R. J., Tomlinson, E.C. and Gillespie, N. (2006). "Models of Interpersonal Trust Development: Theoretical Approaches, Empirical Evidence, and Future Directions." Journal of Management 32, (6): 991-1022.

Lewis, J. D. and Weigert, A. (1985). "Trust as a social reality." Social Forces 63, (4): 967-985.

Long, C. P. and Sitkin, S.B. (2006). Trust in the balance: how managers integrate trust-building and task control. Handbook of Trust Research. R. Bachmann and A. Zaheer. Cheltenham, Edward Elgar Publishing.

Marks, M. L. and Mirvis, P.H. (2001). "Making mergers and acquisitions work: Strategic and psychological preparation." Academy of Management Executive 15, (2): 80-92.

Mayer, R. C. and Davis, J.H. (1999). "The effect of the performance appraisal system on trust for management: a field quasi-experiment." Academy of Management Review 84, (1): 123-136.

Mayer, R. C., Davis, J.H. and Schoorman, F.D. (1995). "An integrative model of organisational trust." Academy of Management Review 20, (3): 709-734.

Mayer, R. C. and Gavin, M.D. (2005). "Trust in management and performance: who minds the shop while the employees watch the boss?" Academy of Management Journal 48, (5): 874-888.

McAllister, D. J. (1995). "Affect and cognition based trust as foundations for interpersonal cooperation in organizations." Academy of Management Journal 38, (1): 24-59.

McAllister, D. J., Lewicki, R.J. and Chaturvedi, S. (2006). Trust in developing relationships: From theory to measurement. Academy of Management meetings, Atlanta, GA.

McEvily, B., Perrone, V. and Zaheer, A. (2003). "Trust as an organising principle." Organizational Science 14, (1): 91-103.

McKnight, D. H., Cummings, L.L. and Chervany, N.L. (1998). "Initial trust formation in new organisational relationships." 23, (3): 473-490.

Morrow, J. L., Hansen, M.H. and Pearson, A.W. (2004). "The cognitive and affective antecedents of general trust within cooperative organizations." Journal of Managerial Issues 16, (1): 48-64.

Pilote, W. J. and Gable, R.K. (1990). "The impact of positive and negative item stems on the validity of a computer anxiety scale." Educational and Psychological Measurement 50: 603-609.

Puranam, P. and Vanneste, B.S. (2009). "Trust and governance: untangling a tangled web." Academy of Management Review 34, (1): 11-31.

Ross, W. and LaCroix, J. (1996). "Multiple meanings of trust in negotiation theory and research: a literature review and integrative model." International Journal of Conflict Management 7, (4): 314-360.

Rousseau, D., Sitkin, S.B., Burt, R.S. and Camerer, C. (1998). "Not so different after all: a cross discipline view of trust." Academy of Management Review 23, (3): 393-404.

Saunders, M. and Thornhill, A. (2004). "Trust and mistrust in organizations: an exploration using an organizational justice framework." European Journal of Work and Organizational Psychology 13, (4): 493-515.

Shrivastava, P. (1986). "Post-merger integration." Journal of Business Strategy 7: 65-76.

Spreitzer, G. M. and Mishra, A.K. (1999). "Giving up without losing control: trust and its substitutes' effects on managers' involving employees in decision-making." Group and Organizational Management 24, (2): 155-187.

Tsafir, S. S. and Dolan, S.L. (2004). "Trust me: a scale for measuring manager-employee trust." Management Research 2, (2): 115-132.

Van de Ven, A. H. and Ring, P.S. (2006). Relying on trust in co-operative inter-organizational relationships. Handbook of Trust Research. R. Bachmann and A. Zaheer. Cheltenham, Edward Elgar Publishing.

Williams, M. (2001). "In whom we trust: group membership as an affective content for trust development." Academy of Management Review 26, (3): 377-396.

Wooldridge, A. (2006). "The battle for brainpower." The Economist 381, (8498): 3-16.

Zand, D. E. (1972). "Trust and managerial problem solving." Administrative Science Quarterly 17(229-239).

Appendix D – Ethical approval for research

Ethics Approval Form - Students

This form should be completed by the student and passed to the supervisor prior to a review of the possible ethical implications of the proposed dissertation or project.

No primary data collection can be undertaken before the supervisor has approved the plan.

If, following review of this form, amendments to the proposals are agreed to be necessary, the student should provide the supervisor with an amended version for endorsement.

The final signed and dated version of this form must be handed in with the dissertation. Failure to provide a signed and dated form on hand-in will be treated as if the dissertation itself was not submitted.

1. What are the objectives of the dissertation / research project?

The objectives are to develop models that will assist in increasing the staff retention of newly acquired companies. This is based largely on understanding issues around trust and trust building that need to be undertaken before, during and after the acquisition.

Does the research involve NHS patients, resources or staff? YES/NO (please circle).

If YES, it is likely that full ethical review must be obtained from the NHS process before the research can start.

2. Do you intend to collect *primary data* from human subjects or data that are identifiable with individuals? (This includes, for example, questionnaires and interviews.) YES/NO (please circle)

If you do not intend to collect such primary data then please go to question 14.

If you do intend to collect such primary data then please respond to ALL the questions 4 through 13. If you feel a question does not apply then please respond with n/a (for not applicable).

3. What is the *purpose* of the primary data in the dissertation / research project?

To support the objectives of the research project – in other words, to determine the level of trust existing and to monitor its growth or decline. Opinions and more general information will be sought concerning culture of the company acquired, culture of the acquiring company and other associated issues.

4. What is/are the *survey population(s)*?

The survey population will be approximately 900 individuals.

5. How big is the *sample* for each of the survey populations and how was this sample arrived at?

The sample size is likely to be in the region of 60 to 100 individuals. This limited number is due to the involvement of limited numbers of staff in the company acquisition and the likelihood that the new staff of the acquired company will be numerically few. One example is 26 staff.

6. How will respondents be *selected and recruited*?

The respondents will be selected on the basis of involvement in the acquisition process. This will necessarily limit the numbers available. It will include senior staff and 'key staff' where identified (the key staff will be leading managers and engineers).

Respondents will be recruited through senior management sponsorship internally in the sponsoring company and externally through approaches to senior staff known to the researcher.

7. What steps are proposed to ensure that the requirements of *informed consent* will be met for those taking part in the research? If an Information Sheet for participants is to be used,

please attach it to this form. If not, please explain how you will be able to demonstrate that informed consent has been gained from participants.

Informed consent will be met in all cases. An example of the form to be used is attached with some representative questions from previous research.

8. How will *data* be collected from each of the sample groups?

Data will be collected via semi-structured interviews and questionnaires. The questionnaires will be distributed electronically with an accompanying letter explaining the reasons for research, anonymity etc. The semi-structured interviews will be with senior staff members and will be recorded for later analysis. Consent for this will be required.

9. How will *data* be stored and what will happen to the data at the end of the research?

Data will be stored electronically in a spreadsheet for the questionnaires. The questionnaires themselves will be in electronic format and will also be stored. The recorded interviews will also be stored electronically. At the conclusion of the research the data will continue to be stored by the researcher (in suitably anonymised form) whilst a copy will be made available to the sponsoring company.

10. How will *confidentiality* be assured for respondents?

Confidentiality will be assured for the respondents through rigorous control of the recorded interview files (electronic) with no disclosure to any third party in any form other than a totally anonymised version.

11. What steps are proposed to safeguard the *anonymity* of the respondents?

Questionnaires will be anonymous with no identification of the individual or department involved. There will be an indication of the geographical location to be able to differentiate between the acquiring company and the acquired company.

For the interviewees references will be made, for example, in any written or textual analysis to 'Manager G' to protect the individual.

12. Are there any *risks* (physical or other, including reputational) to respondents that may result from taking part in this research? YES / NO (please circle).

If YES, please specify and state what measures are proposed to deal with these risks.

Very low risk of reputational risk for the questionnaire respondents – this is the case due to the anonymisation of the questionnaire.

The risk is somewhat higher for the interviewees as they are responsible for defining the policies and strategies of the company including all aspects of acquisition. The measures intended to protect these individuals is to anonymised the data through use of 'Manager G' in any written research, careful anonymisation of the company itself in the writings, careful storage of the electronic recordings of the interviews and any transcripts etc.

13. Are there any *risks* (physical or other, including reputational) to the researcher or to the University that may result from conducting this research? YES / NO (please circle).

If YES, please specify and state what measures are proposed to manage these risks.²

Subject to careful management of the primary data there is little to no risk to the researcher or the University.

14. Will any *data* be obtained from a company or other organisation. YES / NO (please circle)
For example, information provided by an employer or its employees.

If NO, then please go to question 18.

15. What steps are proposed to ensure that the requirements of *informed consent* will be met for that organisation? How will *confidentiality* be assured for the organisation?

See answers to questions 4 through 13.

16. Does the organisation have its own ethics procedure relating to the research you intend to carry out? YES / NO (please circle).

If YES, the University will require written evidence from the organisation that they have approved the research.

17. Will the proposed research involve any of the following (please put a \checkmark next to 'yes' or 'no'; consult your supervisor if you are unsure):

• Vulnerable groups (e.g. children) ?	YES	<input type="checkbox"/>	NO	<input checked="" type="checkbox"/>
• Particularly sensitive topics ?	YES	<input checked="" type="checkbox"/>	NO	<input type="checkbox"/>
• Access to respondents via 'gatekeepers' ?	YES	<input type="checkbox"/>	NO	<input checked="" type="checkbox"/>
• Use of deception ?	YES	<input type="checkbox"/>	NO	<input checked="" type="checkbox"/>
• Access to confidential personal data ?	YES	<input type="checkbox"/>	NO	<input checked="" type="checkbox"/>
• Psychological stress, anxiety etc ?	YES	<input type="checkbox"/>	NO	<input checked="" type="checkbox"/>
• Intrusive interventions ?	YES	<input type="checkbox"/>	NO	<input checked="" type="checkbox"/>


18. Are there any other ethical issues that may arise from the proposed research?

Company acquisition is a particularly sensitive area due to the significant investment in time and monies required. A careful approach is called for from the researcher with especial attention to the anonymisation of all respondents. Data storage and management also calls for a diligent and sensible approach.

² Risk evaluation should take account of the broad liberty of expression provided by the principle of academic freedom. The university's conduct with respect to academic freedom is set out in section 9.2 of the Articles of Government and its commitment to academic freedom is in section 1.2 of the Strategic Plan 2004-2008.

Please print the name of:

I/We grant Ethical Approval

student  supervisor _____
Signed:

(student) E. Derbyshire (supervisor) Andreas Hoecht

Date 24/1/08 Date 24/1/08

AMENDMENTS

If you need to make changes please ensure you have permission before the primary data collection. If there are major changes, fill in a new form if that will make it easier for everyone. If there are minor changes then fill in the amendments (next page) and get them signed before the primary data collection begins.

Email confirming ethical approval of above form:-

Forwarded Message: Fwd: Re: Ethics Application ref E44 - Ed Derbyshire

Fwd: Re: Ethics Application ref E44 - Ed Derbyshire

Thursday, 16 September, 2010 16:44

"Sharman Rogers" <Sharman.Rogers@port.ac.uk>

From:

"Andreas Hoecht" <Andr.Hoecht@port.ac.uk>

To:

** High Priority **

Hi Andreas

- confirmation of approval was sent direct to Ed and copied to Emily Parry on 29th January 2008 [see email below] Best wishes, Sharman

>>> Sharman Rogers 29/01/2008 10:04 >>>

Dear Ed

Following resubmission, your application has now been approved.

Best wishes,

Sharman Rogers
Faculty Office

Appendix E Major trust disciplines

Major trust disciplines

Examining the different trust disciplines let us first consider the economic. The economists 'raison d'être' is concerned with scarcity. They state that trust is important to ensure efficient allocation of scarce resources. An individual may promote himself/herself as trustworthy and this characteristic will allow access to scarce resources. However, the economists argue that the presence of trust is limited due to other values that can be used to obtain scarce resources (e.g. aggression) and therefore trust itself is a scarce commodity. The need for trust, they indicate, is to assist with the co-ordination of economic activity in a number of different contexts (e.g. breaking of contractual terms, failure of provided goods etc). Two major but separate schools of economic theory exist; the neoclassical approach and the institutional approach. The neoclassical approach defines the individual as selfish and determined to maximise material gains (Williamson, 1996). Trust in this approach 'fills the gaps' in contractual commitments where lack of information about the trustee would otherwise result in more and more enveloping contractual terms. Trust, in fact, becomes a commodity that is needed for acquisition of material goods (Gambetta, 1988). The institutional approach argues that the individual is not selfish, in comparison to the neoclassical approach, and that the emotional dimensions of trust should be considered. The recognition of emotions, where emotions are considered as types of utility (Casson, 1991, 1995), forms the basis of this approach. It is argued that as the individual takes account of the impact of his/her actions on others this builds trustworthiness and thus trust, as a commodity, is established. By harnessing 'good' emotions that facilitate trustworthiness trust levels are built. This approach recognises the role of 'bad' emotions in reducing trust and hence the establishment of trust, again, as a scarce commodity.

Fukuyama argues, in his seminal and controversial work (1995), that economists have not modeled trust. This is challenged as erroneous by Casson and Della Guista (2006) who state that a number of researchers had clearly modeled economic trust (Gambetta, 1988; North, 1990 and Casson, 1991) by the time Fukuyama was writing. Casson and Della Guista (2006) also argue that Fukuyama ignores the economic distinction between a trust form mediated by legal aspects and trust based on moral and social mechanisms (neoclassical and institutional approaches described above) and inconsistently moves between the two trust aspects creating confusion. Ahmed and Salas (2008) point out that Fukuyama does not discriminate between trust and co-operation and this is seemingly supported by Fukuyama himself who states that his examples of trust in quoted case studies were “formed not on the basis of explicit rules and regulations but out of a set of ethical habits and reciprocal moral obligations internalized by each of the communities members” (Fukuyama, 1995, p. 9). It is possible to argue that these ethical habits and moral obligations are the basis of co-operation rather than trust per se. This aside, it could be interesting to relate the economists view of trust as a commodity with the author’s post-acquisition or post-merger integration research area. Economic trust could be seen to have applicability in the case where there may have been a failure by the acquirer in honouring the contractual terms between the key acquired staff and the parent organisation at commencement of employment or during the subsequent integration phase. Such a level of trust could increase the chances of retention of these staff offering ‘bottom line’ benefit to the organisation.

Sociological trust is mainly concerned with groups and society. Early authors such as Luhmann (1979), Barber (1983) and Lewis and Weigert (1985) brought trust into the sociological arena. They argue that trust is a multidimensional social reality belonging to groups

and not the individual. Trust is seen as a prerequisite for the possibility of society with chaotic society as an alternative.

Lewis and Weigert (1985) summarise the three sociological aspects of trust as cognitive, emotional and behavioural. The cognitive element of trust is based on discrimination between groups and institutions that are deemed trustworthy based on good reasoning. The cognitive content of trust is stated to be a collective cognitive reality belonging to the group or institution. This aspect of trust is shown when social actors no longer need or want further evidence or rational reasons for their confidence in the trusted object. It is possible to offer criticism of this evidence of cognitive trust as trust could be as a result of another form of trust other than cognitive or even due to the propensity of the trustor(s) to trust. Lewis and Weigert (1985) argue that where there is total ignorance of the trusted object it is not possible to trust cognitively. Emotional trust is defined as the emotional bond that exists among the social group members or institutions. It is seen complementary to the cognitive aspect and again, can be considered the trust glue *between* actors.

Lastly, behavioural trust is defined as taking onboard risky action(s) in the belief that all actors involved will act competently and dutifully. The mixture of belief with risk and therefore vulnerability is very close to the definition of trust provided by Rousseau et al (1998) p395. Bachmann and Zaheer (2006) explore trust between social actors and argue that trust is a fundamental social mechanism that allows for co-ordinated interactions and, following on, the potential for the emergence of highly differentiated social systems. Another frequently cited author in this discipline is Mollering (2006) who posits the 'leap of faith' as an essential element of trust. He defines trust as a positive decision which goes beyond that which can be justified in any terms by the trustor with associated acceptance of uncertainty and vulnerability. In effect,

Mollering is arguing that trust is based on a willing suspension of disbelief and trusting based on faith. The sociological view of trust as a potential generator of society with the postulated alternative of chaos would appear to have applicability to post-acquisition or post-merger integration. The sociological understanding of cognitive, emotional and behavioural and 'leap of faith' trust definitions between groups or institutions could open up interesting possibilities for exploring how teams within the integration process were interacting during the integration phase.

Turning to the socio-psychological trust area; this is clearly related to both the sociological and psychological areas. In contrast with sociological trust studies that are primarily focused on groups or societies, the socio-psychological area links the social sciences with psychiatry exploring how psychological studies (primarily centred around the individual and occasionally a group) are influenced by the social factors. One influential trust researcher who has addressed this area is Luhmann (1979) who argues that trust cannot be fully understood in either the psychological or sociological disciplines alone but that one should consider both disciplines in order to produce understanding and meaningful research on trust. He proposes bridging the gap between the psychological interpersonal trust level and the sociological systemic trust level and thus argues for a socio-psychological approach to trust studies. Lewicki, McAllister and Bies (1998) argue that scholars have given limited attention to the role of social context in trust studies (which have centred on mainly the psychological discipline) and that socio-psychological scholars have accredited the organisational context as greater importance than the social relational elements of a trust relationship. More recently, Young and Daniel (2003) attempt to capture Luhmann's approach incorporating both the psychological and sociological aspects in their study on trust in the workplace. In their developed model concerning affective trust they integrate the external social factors with the individual internal psychological

factors. This 'wider' approach would seem well rounded in that it attempts to capture all possible influences on the individual from the personal inclinations and experience to the immersion in the societal aspects of the surrounding group(s). One issue, however, is the relatively lower smaller published research base available in this area, compared to that of the sociological or psychological areas. A further issue could be the depth of the available research, as integrating the two 'schools' of trust places difficult demands on researcher in terms of knowledge spanning both disciplines. These issues aside, given the area of study as trust and its efficacy at predicting the likelihood of retaining key staff post-merger or acquisition, it would seem that the discipline of socio-psychology would have applicability to the research.