

**RESEARCH, TEACHING  
AND LEARNING**



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AND LEARNING**  
**Pedagogy and Practice in the Open and  
Distance Learning Paradigm**

**Polly Kobeleva & Luke Strongman**



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Boca Raton

*Research, Teaching and Learning:  
Pedagogy and Practice in the Open and Distance Learning Paradigm*

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*To my parents, Peter and Tania, and to my brother Sasba,  
who are always close regardless of the distance*

- Polly



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# Introduction

*Research, teaching and learning in the Open and Distance Learning Paradigm* presents ten essays which explore key factors that highlight effective research teaching and learning practices. It also provides guidance for their implementation and describes their benefits to academics and students in the Open and Distance Learning (ODL) environment. The authors have written this book for the student, for the academic professional, and for organizations working in the Open and Distance Learning paradigm, from a New Zealand and international perspective.

This book provides a framework for the development and application of research, teaching and learning, both for the academic within faculty and for managers of open and distance learning tertiary organizations. Chapter one explores concepts of ‘risk mitigation’ in the ODL organization; chapter two discusses mentoring practices in tertiary education; chapter three describes the four main models of research supervision in the open and distance learning paradigm; chapter four is a discussion of research planning and online campus development for research management; chapter five argues that marking practices can be seen as an adaptation of the writing process; chapter six explores commonalities and differences in e-learning pedagogy and distance education; chapter seven discusses the pedagogy implicit in teaching with learning management systems; chapter eight describes the connections between social media, social entrepreneurship and e-learning; chapter nine explores the issue of student retentions in the distance learning organization; chapter ten discusses instructional design in relation to e-learning.

Research, teaching and learning in the distance learning environment has different operational parameters than in contact education. The modifiers of class contact are largely the online teaching infrastructure, asynchronous learning, and the use of products such as *moodle* or *blackboard* for learning management system teaching practices. There are considerable benefits such as:

- Real-time communication
- Asynchronous communication - 24/7 global environment
- ‘Virtual’ research collaboration
- Electronic publishing and dissemination of information
- Real-time access to research results and research resources
- Rapid access to external research funding information
- Blended and multimedia presentation of research results

Under Morrison’s (1993) formulation, the online campus platform [Virtual Learning Environment (VLE) or Learning Management System (LMS)] pro-

vides pathways for teachers and students that offer continuity and depth, a 'focused academic resource base', links to a community of scholars, and personalized support. Teaching in this paradigm also satisfies Law's (1997) concept of flexible learning opportunities expanding into niche areas, overcoming geographical constraints. Daniel argues (as cited in Law, 1997, p. 18) that, "Open learning is a goal or an ideal; distance education is neutral, it can be open or closed, flexible or inflexible." Despite the need for many facets of education, including research, to be focused on knowledge transfer and fact assimilation (Fox, 1983), the common international approach is the autonomous, synchronous model internal to organizations (Law, 1997). However, while 'individualized' focus may predominate on a local scale, it is not unusual for two strategies to be overlapped (Holmberg, 1985). Through its chapter discussions, this book seeks to emphasize three main factors: the centrality of the learner experience, the role that research, teaching and learning plays as core practices in the ODL paradigm, and innovations in research, teaching and learning pedagogy.

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# Chapter I

## The Distance Learning Organization and Risk Mitigation

*Luke Strongman & Polly Kobleva*

### Introduction

For any Institute of Technology, Polytechnic (ITP) or University, even those with long, established histories and relative economic viability, it is difficult to predict the future. This means it is also difficult to maximize advantage for the organization's ability to 'move ahead' or at least function optimally in a changing world. As Murgatroyd and Woudstra (1989) note, there are generally three market strategies for blended and distance learning ITPs; these are: 1) excellence as a provider, 2) being a least cost provider (operating at basement prices for mass provision), and 3) being a sole provider in a niche market (p. 12). In this respect ITPs are both 'shapers' of markets and shaped by them, quite separately from the way the public perceives these organizations.

This chapter will argue that those Institutes of Technology, Polytechnics (ITPs) or Universities with a focus on blended and distance learning who are able to adapt and remain flexible whilst delivering core educational services are those most likely to survive. The main problem that has emerged is that increasing market pressures have impacted on the way in which ITPs must integrate risk management into their planning and normal operating mandates. Distance Learning organizations have to compete with contact tertiary education providers or hybrid tertiary learning organizations in environments where aspects of their market differentiation are recognized by consumers and employers but not by central government funding agencies. This adds to risk exposure for distance learning organizations and requires careful strategic management. This discussion will focus on: the current environment for ITPs in New Zealand, arising risk management issues facing distance learning tertiary institutions globally, the differences in retention levels between distance learning and face-to-face learning, risk management, and strategies for risk mitigation.

### The current environment for Institutes of Technology and Polytechnics in New Zealand

The present tertiary employment environment in New Zealand remains influenced by the pressures for increased efficiency and competitiveness instigated by the deregulation of the economy in the mid-1980s and 1990s. This deregulation was characterized by divestment in the manufacturing industry and infrastructure. It was also accompanied by growth in service industries

and a growth of the knowledge economy in the first decade of the new millennium. While technical correspondence has long offered alternatives that support the contingencies of face-to-face tertiary education, the present volatility of the labor market and the possibility of home-study make distance education the first choice for those who seek flexible learning options, those upskilling within or between careers, or those in transitional employment between vocations. The tertiary environment in New Zealand is characterized by insufficient public funding and by the pressures to globalize, stream-line curriculum portfolios, and take increased organizational responsibility for financial and educational performance (Waring, 2002). As a result, there is strong competition within the ITP sector for available government funding.

The tertiary sector in New Zealand has eight universities and twenty polytechnics, all of which compete for funding from either the Student Achievement Component (SAC) or the Performance Based Research Fund (PBRF), both originating from the Tertiary Education Commission (TEC). However, increasingly ITPs must be run as ‘academic businesses’. Thus there is a continual pressure to maintain financial as well as educational buoyancy. Any business must operate with an awareness of external or internal threats from risks that must be balanced with efforts to achieve operational efficiencies and mitigate against them through planning. While many of the risk exposures faced by tertiary providers (contact delivery mode and distance education) are shared, there are some differences. For example, in New Zealand, the Tertiary Education Commission currently links 5% of the ITP’s Student Achievement Component Funding (supplied by Government) to the organization’s educational performance indicators (EPIs) as measures of student retention, progression and completion. However, no recognition is given to the exegesis of life-long learning, to student’s reasons for enrolment, to the impact of educational delivery modes, (contact teaching vs. online learning management systems), or indeed to measures of student grade performance. All of these factors may differentiate distance learning organizations from face-to-face organizations.

Thus the first risk that any established ITP takes is in knowing that its own educational footprint within a demanding national economy insulates it from certain benefits. As Grabowski and Roberts (1999) state, “If anonymous, geographically dispersed organizations are truly to dampen risk propensities, relationships among members and organizational structures must closely resemble alliances of collective responsibilities than hierarchies of reporting relationships” (p. 713). In the business of mitigating risk, ITPs are reluctant to adopt alliance-like organizational structures that make them vulnerable to the uncertainties of the environment, or to impact other organizations without some “assurances of shared vulnerability” (Grabowski and Roberts, 1999, p. 713).

Shared vulnerability arises from both collaboration and competition, which are not necessarily opposites. Collaboration happens in a competitive

environment. The opposite of competition is when market forces dominate as a form of central control, such as when the government defines what happens and not the market. Both conditions are possible—IITPs may compete within market conditions for government funding. No two IITPs are exactly alike; despite some commonalities, there will be differences in risk assessment between face-to-face and distance or blended-learning educational providers.

The European Foundation for Quality Management defines risk as: “The systematic use of organization-wide processes to identify, assess, manage, and monitor risks—such that aggregated information can be used to protect, release, and create value” (Williams et al., 2006, p. 68). There are generally three types of risk: manageable risks, classic risks, and operational risks. Manageable risks are mitigated by government standards and regulatory bodies and may include environmental or sustainability risks. Classic risks involve the internal and external fraud inherent in money or even informational dealings. Operational risks are manifold. They have no clear external body forcing compliance, no projected method of management, and no clear management plan because they are hitherto unthought of. Operational risks can be predictable or unpredictable. Unpredictable risks are very hard to manage without establishing either, a) default systems or reliable backups or contingencies for critical operational demands, b) contingency plans for levels of operational failure, or c) rapid deployment of alternative and adaptable operating procedures. However, operational risks may include low certainty, high-impact one-of events, termed ‘black-swans’ that have improbable or cumulative causes and exponential effects (Taleb, 2007). Operational risks can thus be distinguished from the risk-cost balance of health and safety decisions. The legal tenet of ‘so far as is reasonably practical’ which underpins health and safety is “not identical to the risk decision criteria that apply to speculative and opportunity risks, such as contracts, e-commerce, marketing, research and development, mergers and acquisitions” (Waring, 2002, p. 27). In New Zealand, health and safety is covered by an injury compensation no-fault reliability instrument administered by the Accident Compensation Corporation which provides injury cover for all New Zealand residents and visitors. However, no such guarantees apply to the operational risks of state-owned or independent tertiary providers.

### **Global challenges facing Institutes of Technology and Polytechnics**

The global challenges faced by IITPs offering blended and distance learning options are manifold. They include risk variables which may or may not be correlated, making the need for data collection and methodological validity crucial and decision-making based on accurate predictions difficult. Factors to be considered as global challenges to IITPs include both internal and external risks. For example:

- **The maintenance or growth of student populations.** Despite a predicted rise in student numbers, distance education requires careful measures of the regional and national population that an ITP serves, including the market profile and distribution of its students, the number of new students entering the market, the number of government funded places, and the adaptability of the curriculum to the student needs.
- **Industrial relations.** Industrial relations which affect staffing and educational performance of an ITP include: remuneration levels, staff retention levels, contracting new staff and employment law.
- **Funding.** Funding from government and corporate stakeholders dictates the number of subsidized student places. ITPs are also affected by the amount of external research income generated and income from donations.
- **Stability of the national society.** Risks in this area include the regulation of the economy, local government, maintenance of civic values and assets, and threats to infrastructure from attack, damage or theft.
- **Keeping pace with appropriate and innovative technological advances in key areas such as:** Student learning needs (learning management systems, access plans), Product development (curriculum and learning-technology objects), Document production (curriculum delivery and administrative support), Investment in new equipment (ICT, reliable office support technology), Physical infrastructure (campus facilities), and Repairs (time loss from equipment breakdown).
- **Responding to government performance indicators.** Educational performance indicators set by the government vary across countries. In New Zealand, government performance indicators do not currently make allowances for the distance-delivery mode of education or for implementing internal key performance indicators which are measurable, effective and reasonable in driving change and / or strategy.
- **Devaluation of capitalized intellectual property.**
- **Transitions from print-based to blended learning and/or to digital and web-based learning materials.** ITPs need to manage the transitions between print and digital materials very carefully to avoid either customer trail-off from out-dated materials or from



over-investing in new technologies that the consumer market is not yet ready to support.

There are two factors of risk which form a category of their own: a) natural disaster, and b) criminal damage. One could argue that the impact of such future challenges on blended and distance learning organizations cannot be observable and so cannot be measured. However, from inductive inference we know that there are basic constants in liberal democracies in the 21<sup>st</sup> century which can be relied upon – levels of peace, wealth, health, and law and order are in historical terms reasonably tolerable (even in the midst of recession). Thus modern liberal democratic societies have a buoyancy which is measurable in quantitative (economic) and qualitative (workplace conditions) terms. Barring the extremely improbable—what Taleb (2007) calls a ‘black swan’ event, we can reasonably predict that in first world countries, organizations with sound economic viability and sound markets will survive the decade from 2011 to 2021. Furthermore, ‘black swan’ events may be positive, (the implementation of a new global technology) or negative, such as the recent Canterbury earthquakes of September 11, 2010 and February 22, 2011 which effected approximately 1 in 7 households and disrupted services to Canterbury University and Christchurch Polytechnic Institute of Technology. Therefore, to reduce uncertainty even further, one needs to be mindful of those factors which are most likely to impact globally on ITPs.

It should be acknowledged that distance education is on the rise globally as a preferred method of learning. For example, in 2010, UK’s largest distance education provider Open University noted a 36% increase in enrollment applications from people aged between 18-24, (with up to 45,000 students studying online at any time). Up to a third of students applying for places at universities are turned down in the capped funding environment (Open University, 2011, para. 1). The United States Distance Learning Association recognized that the number of jobs requiring skilled workers rose by 20% between 2000–2005 and the US online higher education market doubled in size between 2001–2005. In this context, human capital is replacing physical capital as a primary productive asset. Furthermore, there is also recognition that custom multimedia in distance learning saves 20% in the first year of implementation and 50% in subsequent years, and that E-learning produces a 60% faster learning curve than traditional instruction (Moe, 2002).

In New Zealand, there is currently far more demand for places in tertiary education than places available. This is evidenced by the fact that the New Zealand government has planned to invest in a further 2,895 undergraduate course places in the period 2011–2012 as a drive for future economic growth (Joyce, 2010, para. 10). But tertiary leaders argue that the proportion of government funding allocated to students and the proportion of funding allocated to New Zealand tertiary organizations is out of line with the OECD average: 42%/58% vs. 20%/80% (McCormack, 2010, p. 2). While this is relatively

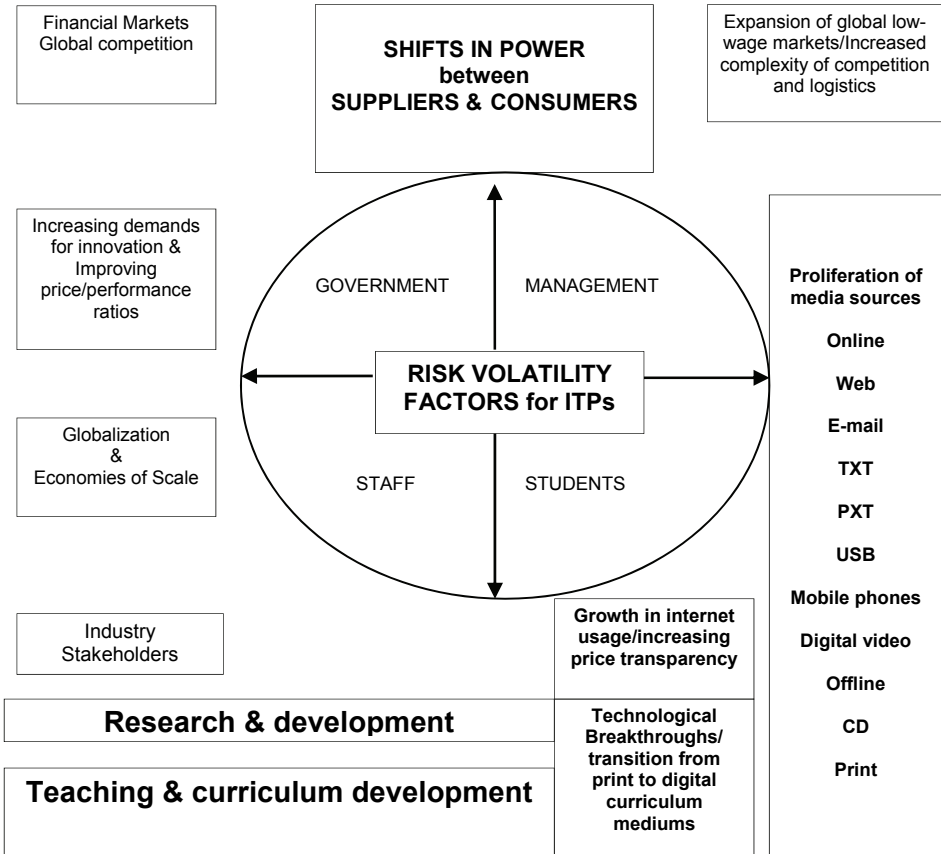
good news for students in New Zealand, a future driver for the development of tertiary organizations will be the proportion of the education dollar funded by the government for the student versus the proportion allocated to the tertiary education organization.

### **Differences in retention levels between distance learning and face-to-face learning**

It has been noted in literature that retention levels have historically differed in distance education compared with face-to-face tertiary organizations and with hybrid organizations that teach with both methodologies. Retention levels between distance learning and contact learning differ by approximately 10–20% (Rutland, 2007, p. 94). The reasons for this may be either that, a) distance education students drop out for the same reasons that face-to-face students drop out but, additionally, may also feel ‘disconnected’ in open and distance learning delivery mode (although most educators practicing in distance learning argue that multi-media and technological innovation make it easier, not more difficult to participate in education than via conventional learning), or, b) that almost all distance education students (unlike students in conventional education) have other significant commitments including work and family, and thus lead very busy lives. The student profile may also have an effect on retentions; distance education students tend to be older and a significant number in full-time employment. As Rutland (2007) explains: “Historically, the percentage of students who drop out of ‘bricks and mortar’ higher education has held constant at between 40–45% for the past 100 years . . . which indicates retentions of 55–60%, and distance education literature indicates that the completion rates in distance education courses have historically been extremely low, 40–50% at best . . .” (p. 94). In New Zealand, distance learning organizations are being asked to assume the same risk management burden of retention, progression and completion as the face-to-face tertiary organizations, despite the fact that compared to any conventionally operating ITP, there are more risk management concerns arising from teaching in a distance learning mode.

### **Distance education and risk management**

As distance learning becomes both a preferred method and a response to the increasing adoption of ICT in developed and developing countries, it is likely that the global challenges for blended and distance learning organizations will be those associated with having too many students rather than too few. This may be the consequence of a recognized shift from consumers (if not governmental funding bodies in New Zealand), towards: a) the economies of scale achievable in distance methods and b) the increasing quality of distance education delivery (both materials and tutoring).



**Fig 1.** The relationship between the volatility of economy, society and the environment in relation to global technological market changes.

Many organizations in the West have responded to market drivers and threats by downsizing and by forming new internal and external networks that are more responsive to marketplace needs. However, in doing so many organizations have reduced their power to influence their situation nationally or internationally (Williams et al., 2006). According to Helsloot and Jong (2006), higher education is faced with the same new and the same conventional security risks as other sectors because commerce, industry, employment, and living standards all have a direct influence on the continuity of higher education and research. A major threat to the distance learning environment is the integrity of its information systems, including problems encountered in normal operations and in the expansion or updating of digital

infrastructure. Risks include: threats to authenticity, data manipulation, theft, health and safety, and physical disruption (such as due to fire or flooding). All of these factors present conditions of insecurity, uncertainty and undesirability.

Thus it is difficult, but not impossible to calculate risks in education. There is a perceptual element in risk, but not all risk is perception. A distinction also needs to be made between objectified risk and corresponding organizational behavior. Risk is the possibility, with a certain degree of probability, of damage to human health, to the environment and to property, combined with the nature and extent of that damage (Gezondheidsraad, as cited in Helsloot and Jong, 2006, p. 143). According to Starr, risks taken freely by people in their everyday lives are up to a thousand times more acceptable to them than imposed risks, (Starr, as cited in Helsloot and Jong, 2006, p. 144). It is also necessary to distinguish between risks caused by chance and those which have particular causes.

According to Helsloot and Jong (2006), the risk domains present in blended and distance higher education may be a microcosm of society. Blended and distance learning providers are custodians of knowledge with vulnerable ICT infrastructures, in which loss of information is a threat to “academic, scientific, commercial and social interests” (p. 144). Risks may arise from internal and/or external causes and may be complex in terms of the impact they have, regardless of whether the institution ‘owns’ the problem (p. 145). At the external and macro level, risks may include societal aggression or violence. For example, multiculturalism and bi-culturalism can be a source of enrichment and of tension. Also at the macro level are losses in efficiency from downtime resulting from the dependency on ICT, such as viruses, hackers, power outages (p. 145). Furthermore, according to Helsloot and Jong, internal or ‘micro-trend’ risks to ITPs can include: *structural incidentalisms*, *politicization* (public accountability), *mediatisation* (the attention that media plays to crises), *mobilization* (the modern citizen is a great deal more vocal than citizens of the past), *juridification* (juridification of crises), *complexification* (each crisis uses more actors, each having role and responsibility), *internationalization* (the strong international component found in higher education and research). Other risks include: high costs of compliance to government requirements, wasteful competition, and changes in academic culture (p. 146).

As Woudstra and Powell (1989) point out, the majority of research concerning management in blended and distance learning ITPs is focused on small questions of practice of management. Value chain analysis is used to “gauge, analyze, predict organizational effects to control costs in achieving organizational objectives” (p. 8). In organizational terms, teaching is ‘simpler and less formalized’ in campus-based universities than in distance learning organizations whose teaching structures are characterized by agents who are academics, subject matter experts, editors, instructional designers, graphic

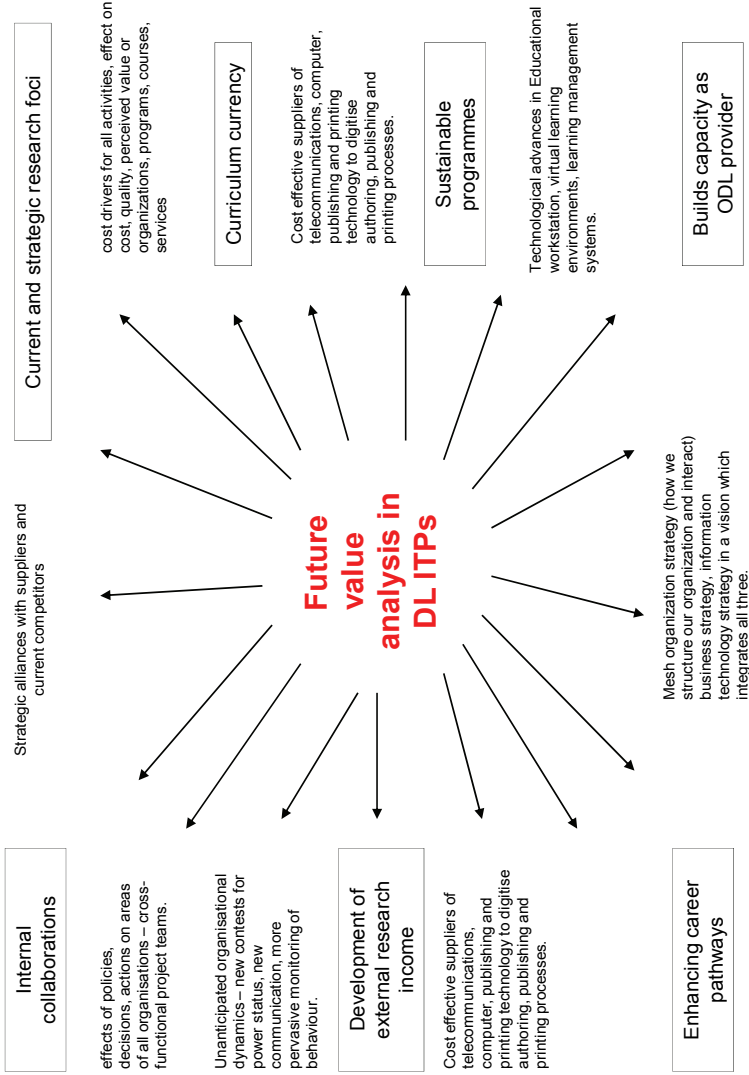
designers, technology specialists, tutors, and exam invigilators (p. 9). In campus-based contact universities, 90% of operating expenditure is locked up in salaries; however, this is not the case in blended and distance learning, where proportionally, more is invested in the capitalization of Intellectual Property and arguably less in the differential resourcing of human capital. Value chain analysis and strategic cost analysis may be completed to produce market delivery and educational product support determined either by cost effectiveness or differentiation (p. 7).

As Law (1997) notes, other shapers of future distance learning organizations include: mass participation in higher education, increased centralization of professional development funding priorities, erosion of staffing ratios, and cost effective teaching and learning strategies involving variations on self-supported study (p. 14). Here the logos of study has shifted away from the institution towards the learner (the so-called learner-centric study). However, this is largely a theoretical shift given that tutors are the immediate managers of students' learning expectations and outcomes. In this light, perhaps the concept is seen by faculty more as a vehicle for the diminution of academic autonomy across a stratified value-chain rather than as a strategy for the management objectification of academic services to students. Even for students, increasingly, degrees are seen as credentials rather than as accomplishments and competencies. In this culture of 'personal learning' education is about the management of differing individual agendas whilst satisfying institutional demands (p. 15). For the individual academic, risk is also related to concepts of comprehensibility, manageability and meaningfulness, but while the management structure may be changing, this has always been the case in tertiary education (Williams et al., 2006).

### **Strategies for risk mitigation**

What risk managers require is the reduction of uncertainty, which itself is a form of measurement and possibly worth more than the cost of achieving it. As a general rule, risk prevention is calculated by probability multiplied by a measure of the severity of the consequences. For prediction and control purposes, risk assessments need to be accurate, reliable, and meaningful to inform decision making. However, although risk can be reduced by intervention, risk assessment remains problematic for at least four reasons (Waring, 2002, p. 33):

- Factors included in a risk assessment may be too restricted, leading to a lower risk estimate.



**Fig 2.** Future internal value analysis in blended and distance learning ITPs (after Woudstra and Powell, 1989)

- Risk is a cognitive phenomenon capable of being affected by measurement biases.
- There is no conclusive evidence that heuristic approaches to risk – based on individual or group judgment – are less accurate or predictive than computer simulations or advanced mathematics.

The problematics of risk assessment may be itself mitigated by increased research about risk. Williams et al. (2006) suggest that risk identification and mitigation can be divided into four stages. These include an initial stage in which the risk context is defined: the actual risk is identified along with harms or benefits, and causes and consequences are established (p. 70). After the risk is assessed a risk profile can be determined and the problem assigned a level on a risk acceptance criterion, for example, low (tolerable), medium, and high (intolerable). Subsequently, four options can be followed: 1) Terminate – cease risk-related activities, 2) Treat – add control measures or contingency plans, identify critical points and processes to manage outcomes, 3) Tolerate – accept the risk, make the risk related activities more transparent, 4) Transfer – move the impact of risks to other entities (p. 70). According to Murgatroyd and Woudstra (1989), there are six forms of management that may mitigate future vulnerabilities (p. 11):

<b>Transition management</b>	<b>Resource management</b>	<b>Risk management</b>	<b>People management</b>	<b>Cost management</b>	<b>Environmental scanning</b>
How can operational technology and systems change without damage to organization?	How can an organization maximize value of its capital investments and maintain currency in field?	When should an organization invest in a new instructional system with minimum risk?	What training and staff development are needed to ensure climate responsive to change rather than one which rejects new technologies?	Once an investment decision is made, what systems design features that control unit costs?	What steps are taken to ensure that key managers keep abreast of developments in research development and in relation to applications?

Furthermore, Grabowski and Roberts (as cited in Williams et al., 2006, p. 79) state that management of risk involves four necessary organization behaviors:

1. Fluidity in organization structure
2. Communication
3. Willingness to learn from mistakes
4. Trust

The issue of risk mitigation in ITPs is more complex in distance education when the ITP predominantly teaches by blended learning – a mixture of media, printed, electronic and virtual delivery modes. Many independent distance tertiary providers have the provision of education through virtual media as their core service. This inevitably impacts their systems of risk management as there are risks inherent to providing services to the public through the Internet. Grabowski and Roberts (1999) define virtual organizations (VOs) as “comprised of multiple distributed members, temporarily linked together for competitive advantage, that share common value chains and business processes supported by distributed information technology” (p. 704). ITPs that provide educational services through virtual mediums are seen as being different because they transcend conventional organizational boundaries either by providing services directly into the homes of learners, or through managing physical infrastructure that supports a networked web presence. However, with increased use of technological infrastructure comes supporting requirements which must mitigate the risks, including: technological coordination that may propagate human or organizational errors, organizational structures that may encourage risky practices, such as using degraded information or procedures in reporting systems, or using standards that are hard to meet without risk taking.

As Grabowski and Roberts (1999) suggest, organizational structures in virtual organizations may make risk mitigation inherently difficult because they can reduce physical oversight and contact, as well as shared commitments to safety. Even concepts of good practice or business models may not be equally shared among members of a virtual organization. Responding to immediate market challenges may make ‘just-in-time’ delivery more prone to risk and/or market redundancy through either rapid market change or market-saturation. Organizational cultures may send contradictory or confusing messages to members about risk tolerance in the virtual organization. Organizations comprised of members with diverse, individual goals, agendas, and cultures that are bound only by temporary, project-based alliances reflecting short-term marketplace opportunities with a brief ‘shelf-life’ makes it difficult to develop shared commitments to reliability. According to Grabowski and Roberts, this may create tension through the presence of simultaneous interdependence and autonomy. According to resource dependency theory, organizations strive to buffer themselves from the environment or the market’s fluidity. This is achieved by network extension (increasing connections with other organizations) or by network consolidation (decreasing the number of organizations they are connected with). A fundamental requirement is the ability to expand or contract the network in response to market conditions and stakeholder needs.

Furthermore, Grabowski and Roberts identify four factors for the mitigation of risk that come from virtual organizational structure and design. These include: 1) network organizational forms, 2) lateral integrative organizational



forms, 3) platform organizations, and 4) fragmented and inter-twined systems which function at two levels: structural and architectural. These are identified as being suited to products, markets and technologies that rapidly change (p. 709). The overall aim is to produce fluidity in organizational structures (to respond to varied conditions and situations) and the ability to vary organizational structures to reduce uncertainty.

A shared culture of reliability is also seen as a desirable quality in mitigating risk in the virtual organization. ‘Culture’ is defined as a set of tacit assumptions that people share about the nature of the working environment and the creation of the intended work environment. It has three levels: deep tacit assumptions, espoused values (ideal and public), and day-to-day behavior involving conflict and compromise among espoused values that may determine thoughts, beliefs and behaviors (p. 711).

Communication and trust also play important risk mitigation roles. As Waring (2002) states, “the content of information on risk issues and the modes of communication may be important factors in determining perceptions of risks” (p. 27). Effective communication involves opportunities for clarification, decision making, organizational growth, suggested improvements and evaluating the impact of risks. Trust is defined by Mayer (1995) 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” (p. 712). Trust is the central value which defines an effective working organization.

### **Conclusion and recommendations for Distance Learning ITPs**

According to Murgatroyd and Woudstra (1989), there are four keys to effective strategic planning: 1) determining organizational identity, 2) sense of purpose, 3) core business, and 4) response to new opportunities (pp. 6–7). These criteria now need updating to include ‘risk management’. Addressing the issue of global challenges to ITPs requires the reduction of uncertainty. To mitigate against global challenges to the organization, accurate external monitoring of market conditions and of the variations in funding sources and opportunities, a political voice to lobby for distance education interests, internal monitoring of processes and key performance indicators, the willingness to import or export new systems according to sound business principles, and a working environment where competent staff may be recruited or retained are all necessary. The ability to ‘step outside’ the operating environment to assess likely threats and to remain flexible in the face of changes such as new technologies or curriculum changes, are now factors of routine management. Efficient and adaptable processes and systems are required, but also investment in human capital—people who are able to make useful and effective decisions about the multiple facets of the educational marketplace that