



## Strategic Business Alignment: A study of role of IT in Strategic Business Alignment in Banking sector of India

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### ABSTRACT

*Business-IT strategic alignment is one of the most popular modern management concepts in business and IT management particularly in Banking sector of India. It refers to the degree of congruence between business and IT strategies. The dramatic increase in the role of IS/IT in banks lately recognized as IS/IT became an inseparable part of business and industrial organizations in all sectors including government, healthcare, and education. Ensuring that IS/IT delivers a value to the business is an important issue to the CEO and IT managers in many business firms and industrial organizations today.*

**KEYWORDS :** strategic alignment, alignment of IT with business, business-IT strategic alignment, IT management, IS strategy, IT strategy, alignment gap

### Introduction

Indian banking is increasingly becoming universal by definition and deployment rather than being built around the existing branch-zonal/regional office- head office models. In this process, the role of IT in banking and financial services will not remain a discrete, segregated strategic role but more of an integrated and intrinsic component of the operational and management fabric of these institutions. Any endeavour to analyze or facilitate IT deployment in banking should primarily focus on the "IT Banking" paradigm rather than the "IT in Banking" paradigm. It is to be clearly understood now that the core competency of banks should and will always be "banking" and NOT "technology".

The emphasis, therefore, should necessarily fall on analyzing and establishing the problems and parameters of banking in the medium term rather than on issues relating to deployment of technology within the existing banking environment. Therefore, future deployment of IT in any banking institution will have to flow from the overall structured business objectives and strategic goals of that specific institution only. An IT deployment strategy for a bank, therefore, should define clearly the performance requirements of various applications, communication and network facilities and databases etc. required by the bank to fulfill its overall business objectives and strategic goals and NOT the various technologies and solutions that are in vogue at any given point of time. Responding to the banks' IT deployment strategies, the IT industry should come out with custom-made, client-specific solutions. These solutions should use relevant packaged applications and technologies that could meet the banks' strategic requirements.

The Indian banking story is running in parallel with India's growth story. With economic growth of India expected to average at double-digit for the current decade, the banking sector is also poised for growth as the factors contributing to the growth of GDP would act as catalysts for the banking sector as well – in retail, corporate as well as rural banking. By 2017, the average consumption in rural India will be the same as of urban India in 2005, according to a McKinsey study. As a result, India's labour force will grow at a higher rate than population growth and therefore, the ratio of working age population to total population will be on the rise, and it will be more urban, rich and educated. This will result in a higher flow of savings to the banking system.

### IT in Banking

In the five decades since independence, banking in India has evolved through four distinct phases. During Fourth phase, also called as Reform Phase, Recommendations of the Narasimham Committee (1991) paved the way for the reform phase in the banking. Important initiatives with regard to the reform of the banking system were taken in this phase. Important among these have been introduction of new accounting and prudential norms relating to income recognition, provisioning and capital adequacy, deregulation of interest rates & easing of norms for entry in the field of banking.

Entry of new banks resulted in a paradigm shift in the ways of banking in India. The growing competition, growing expectations led to

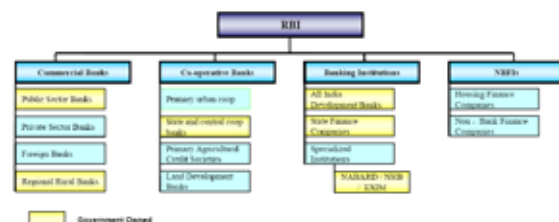
increased awareness amongst banks on the role and importance of technology in banking. The arrival of foreign and private banks with their superior state-of-the-art technology-based services pushed Indian Banks also to follow suit by going in for the latest technologies so as to meet the threat of competition and retain their customer base.

Indian banking industry, today is in the midst of an IT revolution. A combination of regulatory and competitive reasons has led to increasing importance of total banking automation in the Indian Banking Industry. Information Technology has basically been used under two different avenues in Banking. One is Communication and Connectivity and other is Business Process Reengineering. Information technology enables sophisticated product development, better market infrastructure, implementation of reliable techniques for control of risks and helps the financial intermediaries to reach geographically distant and diversified markets.

In view of this, technology has changed the contours of three major functions performed by banks, i.e., access to liquidity, transformation of assets and monitoring of risks. Further, Information technology and the communication networking systems have a crucial bearing on the efficiency of money, capital and foreign exchange markets.

Technology as the differentiator has become the driver of the Indian banking business since the past decade with the financial sector reforms providing firm foundation. The question of implementing technology has now transformed into 'how from the estimate, the cost per transaction through a branch, ATM and Internet works out to about Rs.66, Rs.22 and Rs.10 respectively, ignoring the extreme variations owing to the investment cost vis-à-vis the number and nature of the transactions. Moreover, technology has resulted in improved quality of service, any time/any where banking, focused product delivery, cross selling opportunities, multi-channel touch points for consumption of services, etc.

As the success of the banking business increasingly tends to hinge on the proper adoption and utilization of technology, IT Governance has assumed great significance. Simply put, IT Governance is nothing but a subset of Corporate Governance concerned about ensuring appropriate direction and control of IT activities to the benefit of an organization. IT Governance implies adoption of a defined framework of plan, do, check and act using performance metrics, key goal indicators and maturity models.



**Fig 1. Indian Banking Structure**

Information Technology (IT) has transformed the conduct of businesses in every sector of the economy. Financial sector is one such area where the touch of IT has completely overhauled the nature and accelerated the pace of business. IT has been instrumental in improved communication and connectivity across all segments/players of this sector as well as in enhancing the quality, efficiency and speed of delivery of financial services.

The Reserve Bank has played a pivotal role in this process of transformation of the financial sector with the use of IT. As the central bank, the Reserve Bank has strived to create a conducive environment for promoting technological adoption encompassing the financial sector. Moreover, being an important institution in the financial sector, it too has undergone the process of technological change. Finally, the Reserve Bank has endeavoured to streamline technological change in a manner that would help to enhance the inclusiveness of the financial sector.

While technology has become an integral part of conducting and managing business in the financial sector, it can hardly ever be characterised as static. It has evolved over the years and it is important, therefore, that the financial sector too reviews these developments and adapts itself to the same. It is in this context of review and adaptation to technology that the information management requires specific attention.

In the context of increased demand on IT solutions changing technology scene and gaps in adoption of technology to meet the information needs, the study has identified the specific areas that need to be addressed during the ensuing years. These issues may be addressed in the short, medium and long term.

Some of the important issues are delineated below:

- Issues in integration of information and technology
- focused approach in usage of data for MIS and Decision Support System (DSS)
- Inadequacies in information needed to take vital decisions
- Disparate IT systems at different levels of maturity
- Metadata and uniform data reporting standards
- Adoption of data mining and business analytics for information refinement
- Re-engineered business processes and delivery models
- Strategic alignment between business and IT
- Information and security policies
- Business continuity management
- Project management
- Vendor management
- Availability of trained manpower for deployment of technology

### IT Strategic Alignment

This addresses the key question—whether a bank's technology investment is aligned to its strategic business objectives, enabling the formation of capabilities necessary to deliver business value. IT strategy provides banks the opportunity to:

- Add value to products and services
- Assist in competitive positioning
- Reduce costs and improve administrative efficiency
- Increase managerial effectiveness

When formulating an IT strategy, a bank must consider:

- Business objectives and competitive environment
- Current and future technologies: costs, risks and benefits
- Capability of the IT organization and technology to deliver current and future levels of service and its implication on the bank (extent of change and investment)
- Operating cost of current IT: whether this provides sufficient value to the business
- Regulatory and compliance requirements

As IT gets more critical for a bank's survival in addition to enabling growth, IT Strategy Committees need to broaden their scope beyond offering advice on strategy, to other areas like IT risks, value and performance.

### Challenges in IT Strategy

- Identifying barriers to strategic alignment
- Evaluating effectiveness of alignment of IT and strategic business initiatives
- Ensuring business and IT goals cascade throughout the bank into roles, responsibilities and actions
- Identifying inter-dependencies of strategic initiatives and impact on value delivery and risk
- Ensuring an effective communication and engagement between business and IT management
- Monitoring and assessing current and future technology improvements

### With Respect to IT Strategic Alignment, Banks Need to, inter-alia, ensure the following

- a) Banks should have an up-to-date business strategy that sets out a clear direction for IT that is in accordance with the business objectives
- b) Major IT development projects need to be aligned with business strategy, having a business case
- c) IT investments need to be suitably balanced between maintaining the infrastructure that support the bank's "as is" operations, and the infrastructure that transforms the operations and enables the business to grow and compete in new areas
- d) IT budget reflects priorities established by the portfolio of IT-related investment programmes and includes ongoing costs of maintaining the infrastructure
- e) Board's IT Strategy Committee reviews and advises the management about IT-related investments
- f) IT Steering Committee (or equivalent) composed of executives from business and IT management have responsibility to: determining prioritization of IT-related investment; track status of projects; resolve resource conflict; monitor service levels and service improvements
- g) IT Steering Committee should assess if the IT Governance structure fosters accountability, is effective and transparent, has well-defined objectives, actions and unambiguous responsibilities for each level in the organisation structure
- h) Performance of IT management is monitored
- i) Comprehensive and ongoing due diligence and oversight process is established for managing the bank's outsourcing relationships and other third-party dependencies supporting e-banking (Also see "IT Outsourcing" in report)

### Rationale of Alignment in Indian Banking Sector

With respect to a company's strategic policies, ICT has played an important role in the organization's existence. Previous research has found that the information system strategy is now considered equal with business strategy (Hirschheim and Sabherwal 2001).

In other discussions, information systems are appreciated for making significant contributions to a company's strategic alignment (Camponovo and Pigneur 2004). Furthermore, an excellent strategic alignment of business strategy and information systems strategy will lead the information system to a crucial point, which eventually boosts business performance (Hirschheim and Sabherwal 2001).

Strategic alignment of business strategy and information technology/system strategy will respond to the challenge to the company faced with stiffer competition. Teo and King (1999) assert that the importance and integration use of business planning information system's planning (BPISP)

has been empirically proven to increase the information systems contribution to company performance. Unfortunately, the investment value of the information systems cannot be fully realized owing to the lack of strategic alignment between business strategy and information systems strategy in the company (Henderson and Venkatraman 1993). Hence, an increase in performance and competitive advantage will be difficult to accomplish.

This paper assumes that the use of information systems is a fundamental issue in every business, especially in the banking sector. Strategic alignment—which is one of the hot topics in information systems—is also new and compelling, especially in terms of its implementation in India. For that purpose, empirical evidence is required to assess the correlation of information technology/systems alignment

to business strategy and organizational performance (Sabherwal and Chan 2001). Similarly, Camponovo and Pigneur (2004) mention that analogous research on different environments and at different times is still needed to find the dynamic changes and to evaluate the general patterns that might emerge.

### Strategic Alignment Definition

The strategic alignment of information technology/systems strategy and business strategy has been discussed since the 1980s (Brancheau et al. 1996). This issue later became the main concern of every organization in the 1990s (Plowman 1998). At the 11th Annual Critical Issues of Information Systems Management Study, hosted by the Computer Sciences Corporation in 1998, 72 percent of 594 information technology/systems executives announced that aligning ICT and corporate goals was their focus.

The concept of strategic alignment has been developed from covariations in particular time, such as:

- Business strategy importance level attributes, which is the choice between partnership and/or strategic alliance,
- Information technology/systems strategy's importance level attributes, consisting of information technology/systems strategic roles, information technology systematic competence, and information technology/ systems process choices.

This approach is consistent with the basic model of Henderson and Venkatraman's (1993) which describes the strategic alignment terminology as "the emergent concept" (refer to Figure 1). The approach is also adopted from other empirical research (Croteau et al. 2001). Sabherwal and Chan (2001) summarize the concept as "the degree of congruence between business and information strategy strategic orientation" (p. 2). To help the company decide which perspective to adopt in a particular situation and condition, Luftman et al. (1993) propose a model to identify the strengths and weaknesses of the strategic alignment model: (1) the main power domain (anchor), (2) the weak spot domain (pivot), (3) the influenced domain, which is the change caused by anchor to find the solution for pivot. Meanwhile, Kefi and Kalika (2005) categorize the strategic alignment perspective into: (1) business execution, (2) competitive potential, (3) IT potential, and (4) service level. Contingency theory provides a good lens to view both the relationship between the variables defining strategic alignment and the implications of this strategic alignment on performance (Venkatraman 1989; Kefi and Kalika 2005).

Based on this approach, we examine the strategic alignment concept and demonstrate that a positive linkage exists between alignment and performance.

The term "strategic alignment" consists of the words "alignment" and "strategy." Alignment is coordination achieved when the company information technology/systems strategy is derived from the organization strategy (Lederer and Mandelov 1989), comprising:

- content linkage, referring to the consistency of business plan and information technology/systems plan,
- timing linkage, referring to whether the information technology/systems plan is developed after, along with, or before the business plan is made,
- personnel linkage, referring to different participants' involvement degree in the planning of business and information technology/systems area.

In the meantime, strategy can also represent "objectives" (Reich and Benbasat 1996), "plan" or "planning" (Teo and King 1997). In this discussion, the strategy consists of:

- Information technology/systems strategy, which is the main choice emphasizing the implementations and uses of technology-based information systems in a company (McFarlan et al. 1983; Knight and Silk 1990),
- Business strategy, which determines the company positioning in a business area (Porter 1980).

Other literature defines strategic alignment as:

- Relationship, in which the specific IS objectives need customization according to the organization objectives (Zviran 1990),

- Partnership, which is used to describe a working relationship reflecting a long-term commitment, a sense of mutual cooperation, shared risk and benefits, and other qualities consistent with concept and theories of participatory decision making (Henderson 1990),
- The degree to which the resources being directed to each of the seven dimensions of IS strategy are consistent with the strengths of the organization's emphasis on each of the corresponding seven dimension of business strategy: aggressiveness, analysis, defensiveness, futurity, innovativeness, proactiveness, and riskiness (Chan et al. 1997),
- The extent to which the IS/IT strategy supports, and is supported, by the business strategy (Luftman et al. 1993),
- The internal fit and functional integration between business strategy and IS/IT strategy and how this integration is important to gain competitive advantage (Henderson and Venkatraman 1993),
- The degree to which the IT mission, objectives, and plans support and are supported by business mission, objectives, and plans (Reich and Benbasat 1996).

### The Importance of Strategic Alignment

Literature has underlined the significance of strategic alignment. Boar (1994), for instance, claims that organizations need to build, align, and develop competitive advantage through the empowerment of information technology/ systems in response to the challenges of global competition. Khandelwal (2001) adds, "It is clear that for enterprises to achieve their corporate objectives the information systems supporting the business process have to give right management information, at the right time. To do this, IT in an enterprise must align with the organizational objectives" (p. 23). According to Premkumar and King (1992), strategic alignment is the linkage of information systems planning with business planning. Ideally, business plan and information systems plan – either product or corporate planning function – should be linked through the direct mapping of information systems strategy to one or more business strategies (Calhoun and Lederer 1990). Through the alignment of information systems plan and business plan, information resources will support the business goals, and reap the advantage of information systems strategic utilization (Premkumar and King 1991). Therefore, an increase in performance can be achieved and competitive advantage will be attained, leading the banking sector to survive and thrive despite fierce competition.

### The Effect of Strategic Alignment on Organizational Performance

Much literature has also emphasized the effect of strategic alignment on organizational performance. Chan et al. (1997) states that "Companies that appear to perform best are companies in which there is alignment between realized business strategy and realized information systems strategy" (p. 142). Luftman and Brier (1999) similarly declares, "Companies that have achieved alignment can build a strategic competitive advantage that will provide them with increased visibility, efficiency, and profitability to compete in today's changing markets" (p. 121).

Unfortunately, a positive correlation between strategic alignment and organizational performance tends to be diverse. Sabherwal and Chan (2001) point out, "Empirical research on the performance implications of this alignment has been sparse and fragmented" (p. 21). Likewise, Brynjolfsson and Hitt (1998) claim, "While the average returns to IT investment are solidly positive, there are huge variations across organizations, some have spent vast sums on IT with little benefit, while others have spent similar amounts with tremendous success" (p. 50).

Therefore, evaluations on the effect of strategic alignment on organizational performance are still needed. Bruce (1998) asks, "If alignment is needed to facilitate optimum business benefit, how do we know when we have it? It is important to look at the impact IT is having on business results" (P. 17). Delone and McLean (1992) add that an evaluation on information technology/ systems performance in organization is still one of the pivotal topics in the field of information systems.

### Alignment: Answer to Indian Banking Sector IT and Business Strategy paradox

**Strategic alignment theory and practice should be in sync** With strategic alignment, most banks will foster in ways we had expected. There will be little conventional academic wisdom to challenge; except for the need to document IS strategy and plans, and to have

IS personnel participate actively in the development of new products and services. In short, the literature and practice generally seemed to be in sync.

### **Structural alignment varied by organization; there was no one right way.**

With structural alignment, though, there was more to dispute, especially with respect to the preconditions. IS organizations did not always manifest strong business skills and a customer orientation, and CIOs were not always powerful members of senior management teams. IS steering committees were not always necessary, and partnerships with external IS consultants/service providers were not always utilized. Structural alignment could possibly be achieved in more ways than past research had uncovered. And different banks might successfully achieve structural alignment in different ways. At any given point in time, we found no "one right way" to promote structural alignment. In fact, viewing alignment from such a rigid standpoint was potentially detrimental. Banks are, after all, as unique as the individuals they employ; they cannot be forced into standard, straightforward molds.

### **IS strategic alignment mattered more than formal IS structural alignment.**

Also, because some preconditions for strategic and structural alignment consistently existed in all banks, while others existed only in several of them, we considered that this might indicate possible differences in importance. Some alignment factors might be preferable but not essential, while others might be both preferable and essential. Using these criteria, we found that preconditions for alignment of organizational strategy were generally essential, while those for alignment of the formal organization structure were generally merely preferable. Does this indicate that, for consistent overall IS alignment, the strategic alignment factors are critical, compared to those of formal structural alignment? Taking this one step further, could one go as far as to suggest that IS strategic alignment is more important to overall IS alignment than IS structural alignment? Even more thought provoking, is it possible that managerial practice in certain organizations transcends our traditional understanding of alignment and performance? Some organizations seem to have the "juggling act" mastered, putting just the right emphasis on strategy, structure, culture, staff, and skills.

### **Some other factors are:**

- Flexibility of IS structures was important
- Structure is a means to an end.
- Firm wide active involvement;
- Long term focus and Meeting of the minds;
- Clarity and consistency;
- Corporate Contribution, User Orientation, Operational Excellence and Future Orientation
- Management skill and capability;
- Alignment facilitating processes;
- Organizational structure, culture;
- Communication;
- IT as an organizational tool.
- The informal organizational structure is more important to IS alignment than commonly recognized
- Strong company culture may be a precondition to an informal structure that fosters alignment.

### **Conclusion**

This discussion has shown that there is a clear need for further research into alignment, especially the practicalities of its achievement in Indian Banking Sector. Banks are often involved in IT projects and management of these projects (or programmes of projects). They increasingly get questions about the performance of the portfolio of IT projects of a company, which is accordance with literature findings described before.

Do projects in banks actually contribute to the business? Are (internal) IT customers satisfied with projects delivered? Is money invested in the right projects (risk vs. return) in the right areas (aligned with business objectives)? And how can the performance be improved? This is where further research comes in sight and fills in the gap with a focus on the performance measurement of IT investments. Having provided an overview of alignment, drawing attention to gaps in the research, there is a need to develop a model of alignment and will research in many banks. This will enable banks to demonstrate a practical framework to determine current alignment levels in firms and to monitor and change future alignment as required. Through the use of this framework, alignment is more likely to be achieved in practice. Further research should try to focus on Indian Banking and seeks to test if this type of enterprise could achieve best performance levels by aligning strategy, structure and IT.

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