**Midterm Exam**

**Louis S. Ries**

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1) Discuss the relationship between IT architecture, organizational structure and the problem issues at the Compaq and Symantec. In what ways were the problem issues affected by this interaction? Given the culture of each company, how are their IT architectures respectively strategically positioned?

An organization’s structure is the rules and policies of the organization that determine how the organization’s goals will be accomplished. “In thinking about structure, issues that must be addressed include the division of labor and decision rights, coordination mechanisms, organizational boundaries, and informal structures and processes” (Cash).

There is a large number of potentially viable organizational structures, but “in practice, three basic structural forms-functional, divisional, and matrix – describe most contemporary organizations” (Cash). The structure chosen by an organization, which is determined by the organization’s strategy, is what drives the IT architecture of the organization. “In the functional structure, common activities are grouped together” (Cash). In a divisional structure, most divisions have a functional structure.

“An IT architecture defines the policies and guidelines that govern the arrangement of IT tools and data. By establishing a logical, coherent plan, an IT architecture ensures that decisions about technology investment and use are in keeping with corporate strategy and capabilities” (Cash). In other words, an organization’s IT architecture states what investments in which technologies will be made, how those technologies will be used, the data that will be recorded, how the data will be shared, and who will be able to utilize it.

Compaq Computer Corporation was the leading industry-standard microcomputer manufacturer. The name Compaq is a portmanteau of ‘compatibility’ and ‘quality’. Compaq had a functional organizational structure and followed the differentiation strategy. “Differentiation is aimed at the broad market that involves the creation of a product or services that is perceived throughout its industry as unique. The company or business unit may then charge a premium for its product” (Porter). Their products included desktops, laptops, and notebooks. These products were released as solutions to users’ needs with the ideology of ‘no compromises.’ Compaq would not release a product if it was only barely feasible as a solution, but rather would wait until the technology had evolved to be both reliable and powerful enough to perform in a way that its users would find desirable. While Compaq’s competitors may have had a solution available sooner, Compaq believed that the components used in its products must not only provide a feasible solution for its users, but must perform faster and more reliably than their competitors’ products. Compaq’s advertising theme was ‘It simply works better.’ Compaq’s products were targeting the industry standard marketplace (i.e. the IBM PC-Compatible market).

Compaq’s culture promotes in its employees: respect, trust, open communications, candor, and team spirit. Compaq used a method called ‘The Process’ to make important decisions and determine how to do what makes sense. “The basic thrust of their thinking is captured in the idea that management is a process of planning, organization, command, coordination, and control” (Morgan). This method, ‘The Process’, combines several ideas including the rule of inclusion, teamwork, working the issue, and consensus building. The Process is designed to ensure that the concerns of everyone in a group are represented and everyone involved understands why a decision is being made, even if they do not agree with it. The open communication part of the culture emphasized the early notification of problems and the concept of ‘don’t shoot the messenger.’ Employees are expected to voice any concerns they have, however vague or uncertain, as long as there are reasons behind it.

Compaq has significant financial controls that exist to help determine (by forecasting) whether a project is worth doing. The top managers, who determine the priority of projects, each weigh the controls differently. In light of maintaining company image and continued presence in each market segment, when a project does not meet the forecasted results, lower margins are considered acceptable and are seen as an investment in the company’s long-term health. “Internal financial measures such as profitability and return on assets are indicators of organizational effectiveness” (Cash).

Symantec was a company that designed, delivered, and supported a diversified line of software. The company grew using an acquisition strategy in which acquired companies would be allowed to remain where they are to avoid interruption of its day to day operations and more so the costs to incentivize moving employees.

The company followed the differentiation strategy in a divisional structure. “The divisional structure works well when coordinated action is required to develop innovative products, satisfy client expectations, or maintain a market segment” (Cash). Since each company that has been acquired by Symantec has its own market segment, the divisional structure works well for them.

Symantec’s problem was with the ability to communicate within the company. Email and phone mail were frequently breaking down. Emails would regularly become corrupted, and the phone mail was very noise intolerant. Phones could not be used to contact people in certain divisions because the phone lines were always too busy.

Since Symantec is a divisional company, and their culture does not involve complete integration of their acquisitions, the issues with communication are not really issues. The IT architecture is being incorrectly utilized according to the company’s structure. Divisions are not expected to coordinate with each other, they are expected to duplicate work. This has higher costs, but that is how the company is structured within their culture.

Compaq’s culture meant strong involvement of upper-management in making decisions about the company’s products. Data and information flowed where it needed to go. The long and short term financial forecasting is looking good for Compaq. They are growing in sales with increasing margins. Their IT architecture is well positioned strategically.

2) Consider the following two organizations – Walmart and Netflix. Given the models and theories we have covered up to this point in the course, which company is better positioned for the near future? For the next 15 years? Why?

Walmart is best described as being a divisional organization with a matrix structure at its store level (Supercenters). The main divisions are Walmart U.S. (i.e. The division most people think of when they think of Walmart), Logistics (Transportation, Distribution Centers), Claims Management, and Vudu. Walmart follows the cost leadership generic strategy. Walmart does the majority of its business through brick and mortar supercenters. These sales are supplemented by online shopping which offers free 2-day shipping with purchases of $35 or more on eligible items (non-perishables) as well as free same-day pickup of non-perishables as well as groceries. Products include toys, furniture, electronics, office supplies, automotive parts, video games, movies, music, books, clothing, and more.

The Vudu division of Walmart is a content delivery and media technology company. Vudu distributes full-length movies over the Internet to compatible devices in the U.S. and in Mexico. Vudu is able to differentiate itself from most other media streaming services through same day release of movies on DVD as release date of films in movie theatres.

Netflix is a divisional organization (by region). Netflix specializes in and provides streaming media and video-on-demand online and DVD by mail. Services provided are available in North America, South America, Europe, Africa, Asia except in China, though Netflix is currently trying to enter the media streaming market there, as well as Crimea, North Korea and Syria due to U.S. government restrictions on American companies (Netflix.com). Netflix is differentiated from other media streaming services through exclusive access to older TV shows and movies. "Successful firms are finding ways to continuously improve the value they offer their customers" (Cash). Netflix has started up their own production studio and now offers Netflix Original TV series’ and movies as well.

Netflix operates primarily using a subscription-based model. “In the subscription-based model a company charges a flat rate on a periodic basis (such as a month) that qualifies the user for a certain amount of service. The user pays this subscription fee whether or not the service is actually used” (Afuah). They also offer DVD rental through a markup-based model.

Walmart U.S. and Vudu both operate using a markup-based model. “Markup refers to value added in sales rather than in production, and thus the markup-based model is one in which firms’ primary source of revenues is via markup” (Afuah). Because of the quantity of goods Walmart requires when they make a purchase, they are able to exert some control over the price of their supplies which gives them savings they can pass on to their customers. This allows them to regularly undercut competitors at a rate which competitors cannot sustain.

“The Internet acts as a distribution channel for products that are largely information… When the product itself cannot be distributed by means of the Internet, information on its features, pricing, delivery times, or other useful information about the product can” (Afuah). For the near future, in regard to those who shop regularly, “human beings and their organizations, smart as they can be, are still limited cognitively. They have bounded rationality” (Afuah). This bounded rationality causes people to continue to make purchases in stores that would be no different if done online (e.g. branded items, media) because it is the way they have always done it.

“[The Internet] widens the geographic scope of the network” (Afuah), and firms who have established their presence on the internet for the sale of physical goods will compete on the quickest delivery service, because lowest price is a given due to the internet behaving as an information asymmetry shrinker. “An information asymmetry exists when one party to a transaction has information that another party does not—information that is important to the transaction” (Afuah). However, in the next 15 years, new generations that were raised using technology will become a large presence in the consumer market. This new generation will be utilizing the internet to locate the lowest prices and the quickest delivery service.

In the near future, Walmart will be able to better serve more of its customer base by having both brick and mortar and online stores than Netflix. Netflix however has the IT architecture for the future. Product availability patterns held constant, the next generation of consumers will spend more on Netflix each year than they will at Walmart. They will be looking for convenient and affordable online substitutes to Walmart’s brick and mortar stores and alternatives to Walmart’s online store (e.g. Amazon for non-perishables, Kroger for groceries).

What will prevent Walmart from being as successful in their market segments as Netflix is in its own segments is its primary distribution. Walmart follows a cost leadership strategy, and to service distribution channels to customers would be contradictory to their strategy. “Technology can bring benefits if and only if it diminishes a limitation” (Goldratt). It would not be sustainable for Walmart to develop or acquire the infrastructure for same/next day shipping to customers homes that its competitors have without losing their ‘everyday low prices.’ Vudu, a division of Walmart which utilizes the IEBM, will still be able to compete in the US and Mexico regions for the content delivery and media technology industry, however Vudu has contractual obligations that prevent it from expanding to other countries.

3) In the Course Documents section of Blackboard, there is a PowerPoint presentation (in Control System Example; filename Colleague Core Competencies) from a large pharmaceutical outlining the annual results controls for the company’s sales force, which is the sole determinant of their annual bonuses. You are a consultant asked to comment on the controls. What do you report to the senior management of the drug firm?

In order to comment on these controls, I will first define the three types of management controls followed by how a management control system works.

A people control is defined as a control where “managers increase the likelihood of achieving desirable outcomes by selecting people with appropriate skills, values, and personality characteristics; training employees to strengthen skills or reinforce values; and assigning employees to positions that develop their breadth or depth of knowledge” (Cash).

An action control is defined as a control where “managers specify the decisions and behaviors that individuals and organizational subunits should take to achieve desirable outcomes. Job descriptions, policies, procedures, and codes of conduct are among the formal mechanisms of action control. Less formal means are also used to influence employees to act appropriately. These include socialization, persuasive rhetoric, and rewarding effective practices (distinct from rewarding results)” (Cash).

A results control is defined as a control where “managers compare individual and organizational performance with planned and expected performance, and make appropriate adjustments. Some managers rely heavily on a philosophy of management by exception: where results are not in line with expectations, the individual or unit is closely examined to determine the causes. Managers also choose the relevant time period for monitoring performance. While quarterly reviews are widespread, managers in some firms rely on monthly, weekly, even daily performance reviews. Determining an appropriate performance-measurement time interval is largely a function of determining (1) how long it takes for an identifiable trend to show up and (2) at what point can constructive action reasonably be taken” (Cash).

A management control system is comprised of three elements, *measures* of performance for defined entities, *criteria* for comparing measures against expectations or standards, and *processes* for obtaining and evaluating measures.

Measures are quantitative estimates of the value of some variables, which are derived from available data (e.g. first-quarter sales is a measure calculated by totaling the dollar value of all invoices of the first quarter). For measures to be both useful and structured, data is required that can be aggregated. “Perceptual measures are more difficult to develop, in part because the relationship between specific actions (such as coaching subordinates) and specific outcomes (such as customer service improvements) may not be well understood” (Cash).

Criteria are necessary for determining meaning in measures. Criteria may be a comparison of current results with the results of the previous period, actual results compared to expected or forecasted results, or subjective judgement about what the measure should be.

“Measurement processes define what data will be collected, who will collect it (and from whom), how often it will be collected, and how measures will be generated from it” (Cash).

Measurement processes often involve some form of approximation involving human judgement and are thus vulnerable to manipulation, gaming, and even fraud. Because of this, processes are needed to protect against manipulation of performance measures. Verification processes for nonfinancial measures are less well developed than those that are verified by third parties, such as auditors.

It is necessary to develop processes that will “periodically [reassess] benchmarks or yardsticks (evaluation criteria)” (Cash). Since the condition of the business is dynamic, the criteria must also be dynamic.

The colleague core competencies slide is not utilizable as a result control. It could however be used as a person control as it describes what skills, values, and personality characteristics the firm is looking for in its employees.

“Control systems are inextricably linked to organizational structure, since the measures in a control system are taken for defined entities, including organizational entities.” (Cash). “Effective control systems help direct managers’ attention to activities and results that make a difference in the organization’s performance” (Cash). The controls being examined are looking at a sales force which is a revenue center. For an effective control system, the primary performance measure of a revenue center is revenue.

The Performance Rating Scale links qualitative terminology to a numeric rating. The descriptions are subjective and not measurable. However, once paired with the Differentiators slide, the ratings have meaning. I would describe each of the differentiators as unique, measurable, and defendable, but I would also describe them as indeterminant of performance. If you want to measure the value of the results of a sales force, you should begin by providing a definition for a ‘sale’ (e.g. when an order is received or shipped, an invoice is sent, or when the customer pays) and differentiators should be related to financial values such as distinct number of sales, total price of products sold, etc. Differentiators such as magnitude of influence and consistency may be desired to be included as they provide explanation for why two sales force units have extremely different numbers (e.g. one is selling on a national magnitude while the other is limited to a single district).

Work Cited

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