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THE IMPACT OF EFFECTIVE INTERNAL CONTROLS FOR MANAGING BUSINESS STRATEGIES AND MINIMIZING RISKS IN THE RETAIL GROCERY INDUSTRY

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ASTRACT

After the most recent economic recession that started at the end of 2008, business owners, investors, and regulators have learned a tough lesson about the importance of managing business risks. There is an increased awareness and emphasis placed on more preventative measures because the numbers on the financial statements are not the only factors in determining the financial health of a company. This thesis attempts to demonstrate that an effective set of internal controls is necessary beyond what is required for financial reporting. Companies that implement software for managing production, cross-functional unit integration, and risk management will have an advantage over competitors. The specific industry analyzed is the high-end retail grocery industry, which provides their consumers with natural and organic products on top of other products offered at regular supermarkets. Four leading public companies in the sub-industry of high-end grocery are examined. Through analysis of recent technological implementations and changes to the internal control environment, this thesis draws a conclusion on the impact of the internal controls to managing risks and improving overall company performance.

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Introduction

This thesis draws a conclusion on the effectiveness of internal controls of several public companies in the retail grocery industry, including: Whole Foods Market, Weis Markets, Safeway and Kroger. In order to narrow down the companies selected for analysis, this thesis focuses on the high-end grocery industry, meaning that the companies provide higher priced, organic and natural products. First, industry standards and expectations of internal controls are examined and measured against the integrated framework and standards set by the Committee of Sponsoring Organizations of the Treadway Commission (COSO). Then, the thesis looks at the most recent implementation of systems software by the four companies and how that impacts the internal controls system. Lastly, results indicated that companies need to do more with their internal control systems than what is expected to earn an unqualified audit opinion. Possible suggestions and areas that need management's attention is provided in the conclusion. This thesis hypothesizes that a more effective set of internal controls will help management to better identify and manage business risks, therefore, improve the overall company value in this industry.

The retail grocery industry brings in relatively low profit margins, as products are interchangeable and competition is fierce. Thus, it will be difficult to see high increases in margins, but the overall value of the company is proposed to increase with more effective internal controls and better risk management. Due to the continued effects of the recent recession, high unemployment and other economic headwinds are still tightening consumer wallets. Furthermore, the retail grocery industry faces formidable competition from huge, low-pricing rivals such as Wal-Mart and Costco. Even though an individual grocer like Whole Foods Market may expect high sales growth in fiscal 2011 of 10.7 to 12.8 percent, the industry as a whole is still struggling (Zacks Equity Research). Therefore, it is worth examining how Whole

Foods Market differs from its competitors, and what the roles of new technological systems and controls are in helping the company to pull ahead. Many companies and management oversee the importance of an effective internal controls system as the benefits of implementation can often be spread over the long run of the company's success or hidden from the financial statements. This thesis will attempt to highlight some of those benefits and warn of the dangers and negative consequences of not investing enough in a company's set of internal controls.

Emphasis on Risk Management

First, there needs to be an understanding of risk management of business strategies and how internal controls fit into that puzzle. In the most recent economic recession that started at the end of 2008, business owners, investors, and regulators have learned a tough lesson about the importance of managing business risks. There is an increased awareness and emphasis placed on more preventative measures because the numbers on the financial statements are not the only factors in determining the financial health of a company. As a result, more regulation is being proposed to put in place to help minimize business risks and help prevent another financial collapse. In July 2009, the US Securities and Exchange Commission, also known as the SEC, proposed new regulations that would require a public company's board of directors to disclose their role in managing business risks. Some examples of common business risks include credit risk, liquidity risk, and operational risk (United States Securities and Exchange Commission). Other proposals in Congress right now include "The Shareholder Bill of Rights Act of 2009," which would require public companies to establish committees for risk management ("S. 1074 [111th]: Shareholder Bill of Rights Act of 2009"). These committees, composed of independent members, will address and monitor board-level business risks for the public company. The bill is currently under consideration in a Senate Committee.

The importance of risk management not only catches the attention of United States regulators, but other analysts and investors as well. Neil Doherty was the chairman of the Insurance and Risk management Department at the Wharton School of Business. He states that "a company's value can increase anywhere from three to five percent due to a comprehensive approach to risk management" ("Leveraging Risk Management"). Standard & Poor's has stated that it is including an enterprise risk management analysis as a category for ratings process at nonfinancial companies ("Enterprise Risk Management."). There is no question that the current financial crisis brought an initiative towards more adequate risk assessment and better managing policies. Therefore, public companies must reexamine their business risks and the strategies in place to minimize and manage those risks in today's environment.

Public Companies need to have formal processes in place to assess and identify operational decisions and the risks that come inherently with those decisions because "risk management is a top priority for board members and executives" (*Internal Auditors Focused On Identifying and Managing Emerging Risks*). A company can only thrive when operational risks are identified and addressed in order to remain competitive. For example, companies should have processes in place to understand their competitor's strategies and their decisions in the industry. Companies want to react instantly to any advancement in the marketplace by their competition, or else the potential impact may be a loss in operations. Other risks in the supply chain can be reduced by being aware and informed about the company's suppliers and customers. In the global market, changes are happening at a very rapid pace, whether they are economic, political, environmental or technological. These external risks can all have an impact on operations, and materially affect the business. Companies should anticipate the likelihood of these changes happening, and be ready with plans of actions or solutions to minimize negative impacts on operations. It is important to note that not all external changes should be identified as threats; in fact businesses can use these risks as opportunities for growth and to gain a competitive advantage in the market (*The Current State of Board Risk Oversight*).

Importance of Effective Internal Controls in Risk Management

One of the most important factors in integrated business risk management is the effectiveness of the company's internal controls and their role in reducing risks. Effective internal controls "focus in part on financial statement integrity, but also more broadly on risk management in general" (Kirkpatrick). The implementation of a set of effective internal controls and their constant upgrades can be time consuming and expensive at initial glance. However, in the long term planning of a business, a set of effective internal controls easily outweighs the costs of implementation by providing more benefits at reducing business risks. Management should keep in mind that investing in internal controls will not only reduce business risks in general, but also reduce regulatory risks, improve operations, lower costs, and help attract new business partners and investors. A system of effective internal controls should not only identify problems as they occur, but also help prevent and reduce the likelihood of errors happening in the first place. Therefore, companies can be assured that a set of effective internal controls will decrease operational and financial risks, and when risks decrease, the performance of the company will increase. When the performance of the company increases, then the overall value of the business should also increases (Kirkpatrick).

While internal controls can protect the business from a wide range of business risks, many companies sometime dismiss the importance of the effectiveness of those internal controls. It is not enough that internal controls are in place, they also must be effective in performing their designated function. In fact, controls that are not functioning as designed are no better than a lack of internal controls in place. For many companies, internal controls that are in place may be informal, manual, or not functioning as management intended. Informal controls that depend heavily on people or that are not documented are not protecting against risks. Documentation is important because it ensures that one than one employee can complete the control process. Procedures on how to correctly operate the controls need to be accessible not only to the person operating the control now, but also to new employees who may be operating in this role later. Other controls might not be fully implemented or might not be initially implemented at all. Those controls that are functioning correctly might not be evaluated on a timely basis for continued compliance and effectiveness. As a consequence, the companies still run significant business risks because the internal controls are not accomplishing their purpose (Richards).

Internal controls also need to be continuously monitored by qualified individuals for evaluation of their effectiveness. Controls with regular maintenance and upkeep can increase the control risks for the company. Any deficiencies or problems must be identified and communicated to upper level management or departments in charge of taking action. Management then need to take into consideration the results of these evaluations, and to make adjustments and changes on a timely basis to ensure that the controls are functioning as designed to their maximum efficiency (Rittenberg).

The type of control is also an important factor in determining the level of business risk that internal controls can help reduce. Manual controls are sometimes less effective and more prone to errors than automatic controls. On the rather hand, IT controls require a reliable IT environment throughout the organization to ensure effectiveness. Preventative controls may provide more benefits than detective controls. Detective controls are those designed to identify problems after they have already occurred, while preventative controls are designed to avoid potential issues in the first place. For example, if more than one sales representative is extending credit to an individual customer, then a credit risk exists. A preventative control that addresses the approval structure of credit authorizations will help reduce this credit risk. Therefore, companies that only have detective controls cannot monitor their business risks as closely as those with a mix of both detective and preventative controls. After establishing the importance of effective internal controls, there needs to be an examination of the benefits that effective controls can help companies achieve (Schaefer).

Benefits of Effective Internal Controls

Effective internal controls will maximize performance while minimizing costs obtained from greater efficiency. As a result, the company will benefit from increased operations and growth. Effective controls can also increase a company's goodwill and chances of financing or major transactions. Potential investors, lenders and creditors will increase their likelihood to engage in a transaction if they rely and trust the company's internal controls. Investors and lenders understand that a strong set of internal control reduces investment and operational risks. As a result, effective controls can lower borrowing costs, and help attract new business transactions. A strong network of internal controls can also build credibility with an increasing number of regulators. More regulations mean heavier compliance throughout the entire organization. At the federal level, companies need to comply with regulations from Sarbanes-Oxley, as well as agencies like the Internal Revenue Service (IRS), the Federal Trade Commission (FTC), the U.S. Food and Drug Administration (FDA), and the Environmental Protection Agency. Management and employees need to follow the relevant policies and procedures of these regulating agencies. Focused attention on regulatory controls can facilitate easier understanding, and make operations on a daily level more efficient (Schaefer).

The benefits of effective internal controls are not limited to smoother operations; internal controls that are functioning properly also reduce the risk of intentional theft, fraud, or unauthorized business transactions that can lead to loss of revenue or potential litigation and unwanted liability. These controls are not only a check for employees at a pay clerk level, but also at upper management level in case they make inappropriate business decisions in their own interest instead of in the stakeholder's interest. For example, controls can be in place to prevent inappropriate revenue recording at the end of a quarter to meet market or analysts' expectations. Unauthorized transactions and inventory purchases can be monitored and traced using controls. The purchase of products and services at a significantly higher or lower than market costs will need to be approved and explained. Any unapproved payroll changes will be prevented by controls in place to reduce the risk of paying out excess salary or the risk of paying out to individuals who do not work for the company. Any unauthorized transfer of assets or unsuitable investments in funds will be recorded by preventative controls ("COSO Guidance").

Segregation of duties is the easiest way to avoid human errors or intentional frauds. Segregation of duties ensures that personnel only have access to parts of the system or department that they operate in, and that upper level management is involved in the approval and review process. These controls eliminate the risk of mistrusting an employee who should not have access or authorization into certain parts of the system. In short, several well designed and effectively functioning internal controls can help catch or prevent errors, irregularity or fraud at any level of the company.

Companies that implement a system of controls should also make sure to employ competent people to operate those controls. People related business risks can be reduced by encouraging an understanding of the functions of the controls, organized operations, and proper and timely communication. Sometimes, risks and errors occur simply because the employees do not understand the reason of their procedures or how to operate the controls process. Documented policies and procedures, proper training, and qualified employees will help reduce people related risks. Communication on a timely basis among departments and operating functions will also help prevent control errors made by employees (“COSO Guidance”).

Besides preventative controls for employees, internal controls can also be used to reduce information and reporting risks for operations. Information risks increases when the information used for operations is flawed or incomplete. Information risks will also increase when companies rely on data that do not have a proper source or when important information is not communicated to the right individuals. A lack of sufficient details or untimely information for reporting is inappropriate and will cause errors in the company’s financial reports. Spreadsheets and software that are accessible by multiple people are more prone to errors, especially when multiple people can work on the same sheet at the same time, causing multiple versions and discrepancies in numbers. Accidental changes to formulas or entering wrong numbers may cause a huge impact on the company’s financial information. These errors should be reduced by having proper authorization access and monitoring controls. Management also needs to be provided with accurate and reliable information in order to make the best decisions for operations. Accurate reporting information using effective internal controls can help all the stakeholders of the company, from owners and employees to vendors and customers. Reducing information and reporting risks can give a more reliable and credible representation of the company's financial health both internally and externally (Schaefer).

The next risk area that effective controls can help reduce is the company's IT risks. IT risks arises from technology: data breaches, potential systems failure, virus or spyware attacks on networks, or potential loss of historical data. IT risks do not arise only from the technology itself; IT risks can also increase with inadequate protection or limited protective measures that fail to account for possible problems. For example, a company must place adequate security about information technology assets, such as intellectual property or confidential customer information. Internal controls can help backup information into a secured storage, and limit access and authorization. A lack of technology security controls only invites potential cyber-attacks or data leaks in the future. Risks involving easy access to operational calculations for reporting, untimely systems maintenance, and inadequate backup in case of fire or natural disaster can all lead to negative financial performance or possible liabilities. Companies need to reasonable rely on their technology systems, but also need to prepare a backup plan for continuing operations and disaster recovery plans (Rittenberg).

Factors of Effective Internal Controls

The most important factor before companies try to implement an effective system of internal controls is an organization-wide understanding of the company's ethical values. Ethical values and the integrity of the people who create, monitor and operate these controls must be more important than just the effectiveness of controls. Starting with the board of directors and upper level management, and all the way down to employees and administrative personnel, everyone in the company must have a clear understanding of the company's ethical values and expected behaviors. Owners of the company should show an ethical philosophy, and management should show their compliance with the code of conduct through their daily operational style. The control environment should always start at the entity level, and it is critical that the company establishes tone at the top as an example for all of its members. If the tone at the top is not seen clearly, poorly communicated or not enforced, then there is an increased risk of employees engaging in unethical behavior ("COSO Guide").

Proper tone at the top can be established by communicating a written code of conduct, strictly enforcing and adhering to the code of conduct, management leading through example to follow ethical behavior, and providing an anonymous hotline to report unethical behaviors. Policies and procedures need to address responsibilities for operations and need to be communicated all employees. Employees have a responsibility of understanding the company's objectives, their role and responsibilities, and how those responsibilities fit in to help accomplish the company objectives. Other critical components might include a mission statement, and timely investigating into questionable behavior, and periodic confirmation of compliance surveys (Rittenburg).

A board of advisors or directors should be formed with independent individuals and the board should provide an adequate role in overseeing how management is running the company's operations. A board ensures that there is adequate governance while providing an independent view of the business and its directions. Board members may also bring other skills like industry experience, relative information, and add value to the company. The board's other responsibilities include: oversight and governance of ethical behavior and the review of the effectiveness of the internal controls. The control environment at an entity level ensures that all members of the organization are aware of the culture and expectations, and should install discipline and structure throughout the organization. A strong control environment is the building block of all other components of an effective internal control system, and should be given the highest attention (Rittenburg).

Besides setting a proper tone at the top, several other factors are important in determining the control environment for a company. The company should have an organizational structure that fits the company and the people within the company. The nature of the company's operations, its size, and industry standards can also be deciding factors on an organization structure. The organization structure should identify roles and responsibilities and provide an atmosphere for learning and advancement. With an organizational structure in place, the company then needs to invest properly in its staff. Hiring and retaining qualified, competent and trustworthy people with the knowledge and skills succeed in their role is essential for a company's overall environment. Emphasis can be placed on educational background, work experience, certifications and accomplishments, and past history of ethical behavior. A commitment to hiring these qualified individuals and to continue their development in the company is essential to lowering employee turnovers and reducing costs. Companies that survive in the long run invest heavily in recruitment, training, evaluation, employee compensation packages, and installing a system of promotion and benefits (Arnold).

After creating a reliable control environment, companies need to complete a full risk assessment in order to design effective internal controls. Risk assessment involves clarifying reporting objectives, and identifying any factors that might interfere with the reliability or accuracy of financial reports. Management should include consideration of major operating processes, IT systems, and other external risk factors. The potential for fraud is another factor of risk assessment. Management need to contemplate if there are existing pressures or incentives for fraud and what are the impacts of potential fraud on the company. In order to evaluate and provide a strong risk assessment, companies need to keep in mind the reporting objectives of accuracy, completeness, validity, and restricted access. Management need to assess areas and transactions where a lack of control will result in reporting errors, decreased performance, inefficient operations, or noncompliance with regulatory statues. Interviews with department staff and performing a personal walk through of the controls can allow a more detailed risk assessment and more room for improvement. Controls that are currently already in place should be tested and evaluated. Risk areas identified from existing controls should then be modified or enhanced as needed ("COSO Guide").

After the risk assessment, internal controls should be designed or replaced to function as precautionary measures to reduce those risks that were identified. The company should implement detective and preventative controls for operating processes and cycles, IT systems and antifraud programs with special attention on segregation of duty and authorization controls. Other IT controls should ensure the completeness and accuracy of journal entries and transactions. These control activities should incorporate approvals, verifications, reviews of operating performance, and reconciliations. General system controls must be in place to ensure the data being entered into the system is current, accurate and valid. The proper policies and procedures must be documented in a log or as flowcharts and communicated to the employees operating those controls for daily operations. Communication and understanding is very important to the staff that is operating these controls; employees need to know what their responsibilities are, why they are completing the work assigned, and comprehend the internal control process. Communication should flow two ways from management down and from employees up. Companies must also conduct information exchange on a timely basis within the different departments or functioning groups (Arnold).

The last factor that makes an effective internal control system is proper and timely monitoring and maintenance of the controls. Companies need to continuously monitor its internal control system after implementation. Controls that are defective or not functioning with their intended purpose are not reducing the business risks for the company. Management need to reevaluate the purpose and effectiveness of the internal controls on a regular basis to ensure reliability on their systems. Effective internal controls will help the companies by enhancing operations, placing more accuracy in reporting statements, and building credibility in the business community (Schaeffer).

Industry Background

The retail grocery business is one of the biggest industries in the United States. Money spent on food alone makes up 10% of the USA's GDP. However, the industry as a whole experienced a challenging retail environment in the second half of fiscal year 2008 and into 2010, due to the economic environment and decreased consumer confidence. General products sold in this industry include fresh produce, poultry, seafood, and meat, canned goods, frozen goods, and dairy products such yogurt and cheese to name a few. In recent years, fully prepared foods and delicatessen-type cafes have becoming more popular (IBISWorld).

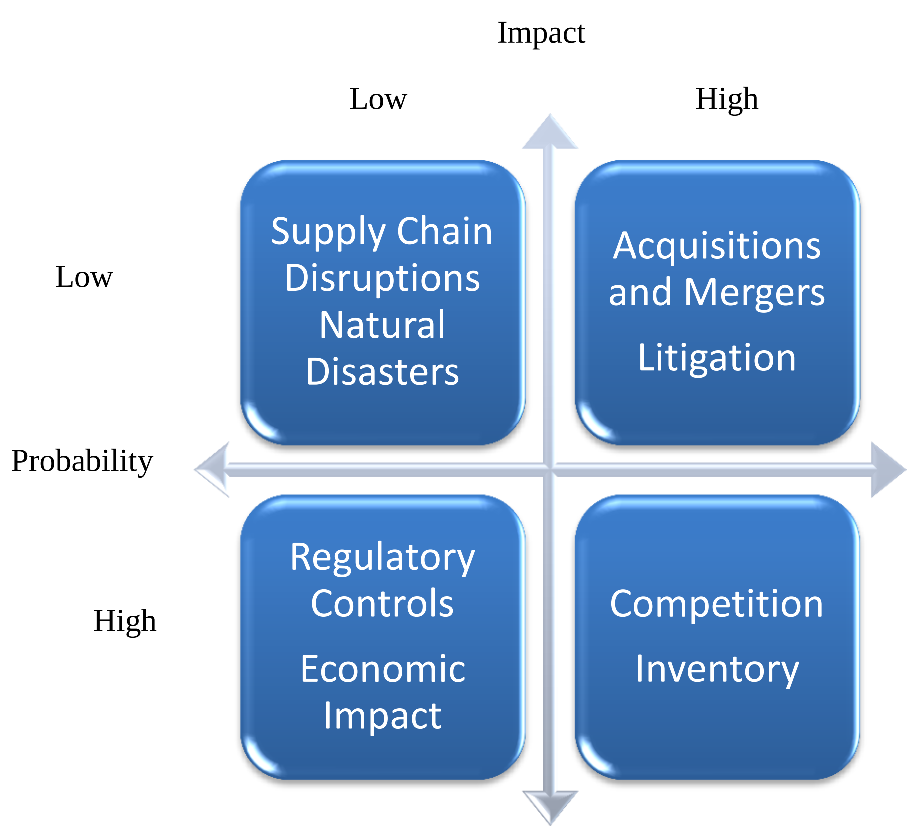
The large amount of spending accompanied with the low barriers to entry for the industry makes it very competitive as well as fairly profitable. Although there are many different companies involved in this business, the overall profit structure remains very similar across the industry. Food is relatively inexpensive to obtain and as it is a necessity for life, it is very difficult for grocers to charge high prices. Therefore, this industry is characterized by large cash flows but comparatively low margins. It is common for food sellers to only make a few cents per item sold. The overwhelming strategy is to make as many sales as possible and due to the sheer abundance of people who buy food, this makes being in the retail grocery industry profitable (Zacks Investment Research).

As product improvement is very difficult to achieve when dealing with food, increase in sales is the best way to show healthy growth as a grocer. Also, improving product mix is a great way to gain new customers, more sales, and more profit. As with any type of business, becoming more efficient will cut costs and improve inventory. An effective supply chain in the grocery industry is a very good way to improve the bottom line. From an investing standpoint, investing the grocery industry is considered to be a risk adverse action. Betas in this industry are typically found to be around .60. Some of the most recent trends in the retail grocery business have been the increasing popularity of wholesales stores (IBISWorld). Businesses like BJ’s, Sam’s Club, and Costco have been taking sales away from smaller retail grocers that offer product in smaller quantity.

As previously stated, this thesis focuses on the high-end grocery industry, meaning that the companies provide higher priced, organic and natural products. Natural foods in this industry are minimally processed, free of artificial ingredients, and grown to enhance the earth’s natural balance. The natural and organic foods industry is growing worldwide because there is a growing demand for organic products. As a result, there has also been an increasing focus on healthy food options which offers an opportunity to increase products offered and put a focus on quality. The population is becoming more health-conscious and is buying foods that are better for them; this results in an increasing demand for healthy, natural, and organic foods. This bodes extremely well for the high-end organic grocers in the United States. Even during the recent recession, sales of organic products were still growing, which is a testament to how strong the commitment that consumers are developing for the types of food offerings that high-end grocer strives on (Duff).

The main cost driver in this sub-industry is inventory, which is usual for a retailer. The competitors in this sub-industry are conventional and specialty supermarkets, natural foods stores, warehouse membership clubs, smaller specialty stores, farmers' markets, and restaurants. Companies in this industry compete on product selection, customer service, price, and quality. The following is a business risk matrix that is representative for the four companies selected for analysis and the common grocery in the industry:

Business Risk Matrix



Low Impact/Low Probability

Supply Chain Disruptions and Natural Disasters

Suppliers are an essential part of operations and smooth and timely transactions with suppliers are needed for business in the industry. However, the probability of a supplier risk damaging operations is low on the matrix due to several reasons. Both organic and inorganic food suppliers are highly concentrated, so food retailers have some power over them. All four of the food retailers may have the ability to create partnerships and joint ventures with local growers. Thus, the large number of suppliers provides a steady and reliable supply in the market. Problems for sales would only arise if there is a major unexpected disturbance in the supply chain. In very rare cases, natural disasters can present a problem to the industry and its suppliers and customers. In the case of a major earthquake in California, one of the top supplier states for groceries, products may be delayed in distribution, or destroyed in the earthquake. However, this risk is only placed at low impact because the grocery stores have a variety of suppliers at different locations within the United States, and it is highly unlikely that one disaster will stop business operations of the entire entity.

Low Impact/High Probability

Regulatory Controls and Economic Impact

Regulatory controls for the food industry have been around for years, and they continue to impact the production and distribution for grocery store, especially the ones that provide a private store brand of products like the four companies selected. With FDA guidelines and rules, there is a high possibility that tougher regulation will bring lesser choices. With organic products and high regards for healthy choices, high-end grocery stores have a disadvantage to competitors. Those who are already in the market of regular, inorganic products are held at a lower standard with less FDA requirements and regulations.

With the recent recession as an example, it is easy to see how the economy will be a major player in the industry's risk assessment. With volatile markets, unpredictable growths and rapid globalization, both the US economy and the global economy can change without a notice. Therefore, there are high possibilities of interest rates affecting the spending power of consumers. However, this risk was identified as low impact as well. Due to the nature of the industry, organic and natural products will still have a loyal base of customers that value organic foods and healthy alternatives.

High Impact/Low Probability

Acquisitions and Mergers and Litigation

There is a low probability of a major merger or acquisition for the industry in the near future, but when there is one, it will have a high impact on the risks of the companies and their financials. For example, after the last acquisition of Wild Oats, Whole Foods is unlikely to be making another big expansion any time soon. However, the impact that a major acquisition like Wild Oats is high for the company's financial, especially when the merger created an anti-trust litigation against Whole Foods. For high end grocery stores, risk of litigation is low probability, high impact. In an event of litigation, such as a situation leading to product recall, the grocery stores are still a factor in the supply chain. The manufactures are likely to take the bunk of the damages paid out to the plaintiff, but damages to brand names and public scrutiny can lower consumer confidence.

High Impact/High Probability

Competition and Inventory

Because there is a low margin in the retail grocery industry, it is critical for grocery stores to have some type of cost advantage over peers. Cost of goods sold is the largest category of expanses since the industry has such tight margins and cycles through inventory very quickly. For example, in the 2009 Letter to Stakeholders, Whole Foods claimed that product costs and occupancy took up 64% of sales. Thus, the larger chains and wholesalers such as Wal-Mart and Costco may be able to obtain easy and cheaper access to products. Labor is also a significant cost to retail grocers, representing 50% to 53% of total operating costs and 24% of sales for Whole Foods in 2009. Therefore, high-end grocery stores need to compete with its existing high competition while fending off the new entries.

Due to the nature of its industry and business, inventory is one of the high probability, high impact risks. In the grocery industry, the shelf life of inventory must be valued and monitored very carefully. There runs a big risk with overstating the existing inventory in the current year's financials, which will cause a direct overstatement in assets and net income. Another major problem with inventory and warehousing is inventory obsolescence. With the fact that most grocery store items are perishable and have a limited consumption period, high-end grocery stores need to make sure that their inventory management is advanced in order to increase their sales, margins and market share.

Key Economic Factors

Effects of the Recession

Companies in the high-end grocery industry have mixed results from major trends in the market, such as America's recent recession. In some ways it has helped this industry. American families have tighter budgets and to save money, they eat out at restaurants less often. Instead, they purchase food at grocery stores and consume meals in their own homes. Even with this increase of purchases, the industry has still been limited in its growth. Consumers are still very conservative in their spending, and with the increasing cost of products and inputs for their stores, grocers have had their margins shrink during tough economic times. Since the industry already operates on such slim margins, further shrinking of margins during tough economic times stifles this industry, as it experienced negative growth in the aggregate.

Pricing Pressure

With the advent of Wal-Mart Super Centers and wholesale establishments such as Sam's Club and Costco, the industry is having additional external competition, which is putting pressure to reduce prices across the board. Wal-Mart Super Centers offer more than just groceries; they offer a plethora of other items that consumers needs other than food at a lower cost. Wal-Mart Super Centers do not carry the same quantity of food inventory as grocers; however, they do carry popular foodstuffs and other items found at supermarkets. Consumers that go to Wal-Mart to purchase various non-food goods and due to convenience will purchase groceries as well. With the size and influence that the Wal-Mart brand has, it can negotiate prices for its food offering at rates that are typically much lower than what supermarkets have to pay their suppliers. These price savings get passed onto consumers, thus forcing supermarkets to cut deep into margins to stay competitive with regards to price.

Suppliers and Regulatory Concerns

Stable suppliers on both the international and local level are usually of little concern to this industry. However, one way in which it may have a material effect is if trade is halted or if the supply chain is disrupted, supermarkets would need to find alternative sources for their goods in a timely manner. Doing this is more difficult for the high-end groceries than it is for most of its regular grocer competitors since they carry specialty and organic foods which can come from much more limited sources. In order to carry natural and organic foods, the high-end groceries must contract with suppliers who meet the regulations necessary to apply these labels to the food. There are a lot more suppliers who carry goods that will meet competitor's standards than there are suppliers who meet the prerequisites that high-end groceries have on their products. Other regulations that the industry must face is workplace-related such as OSHA and the FDA in regards to the safety and quality of food products being sold.

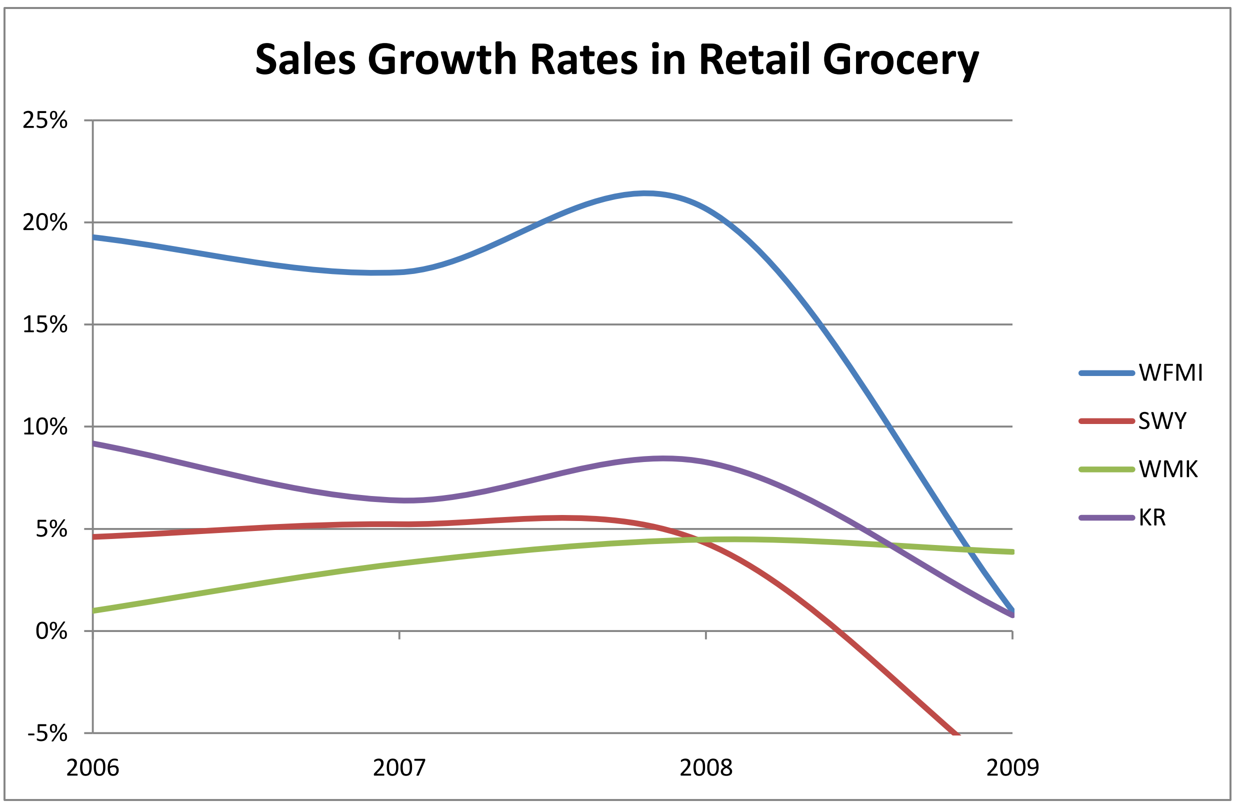
Technological Preparation

Technological preparation is also another hidden factor of concern to the industry. Although it is not an industry that relies heavily on technology, such as an R&D intensive industry like pharmaceuticals, the grocery industry is undergoing technological changes. While technologies such as self-checkout and smart carts are starting to appear in more stores throughout the industry, their use and implementation are quite embryonic in nature. There are still many concerns that need to be addressed before they become the norm. Even if they do become popular, the velocity at which a grocer will have to adopt new technologies will pale in comparison to manufacturing industries. However, in recent years, technological investments have become more necessary to compete with competition. No longer are barcode readers and traditional checkout methods the only way to process transactions with customers; many stores are implementing RFID and other point of sale technologies, which make purchasing easier for the customer while giving the grocer value information about customer preferences and tendencies. Stores without such technology will be at significant disadvantage to their competitors and given the trend of increasing the already high level of competition throughout the industry, modern technology is nearly a necessity for supermarkets. Consequently, it is even more important to ensure that the companies in this industry do not limit their investments when they implement their internal controls systems ("Food Industry Research Center.").

Company Profiles

The four high-end groceries selected for analysis are Whole Foods Market, Inc., Kroger Company, Safeway Inc., and Weis Markets, Inc. As with the entire industry, all four companies showed significant dips in sales during the recent recession. Even though this thesis focuses on the impacts of the internal controls, it is still important to get an overall idea of the past financial health history of all the companies. The following table shows the sales revenue for all four companies, as well as the percentage growth. The following chart just shows the sales growth in the high-end grocery industry. (Please note that the 2010 financial data is not available yet for the public for the companies that close on December 31. Therefore, the sales figures below are from the companies' 2006-2009 10-Ks and financial data).

	2005	2006	2007	2008	2009
WFMI Sales	$4,701,289	$5,607,376	$6,591,773	$7,953,912	$8,031,620
% Growth		19.27%	17.56%	20.66%	0.98%
SWY Sales	$38,416,000,000	$40,185,000,000	$42,286,000,000	$44,104,000,000	$40,850,000,000
% Growth		4.60%	5.23%	4.30%	-7.38%
WMK Sales	$2,222,598,000	$2,244,512,000	$2,318,551,000	$2,422,361,000	$2,516,175,000
% Growth		0.99%	3.30%	4.48%	3.87%
KR Sales	$60,553,000,000	$66,111,000,000	$70,336,000,000	$76,148,000,000	$76,733,000,000
% Growth		9.18%	6.39%	8.26%	0.77%



The graph above shows the sales growth rate as a percentage for the four companies from 2006-2009, each company is represented by their stock symbols.

The following table is taken as of March 25, 2011 from Nasdaq.com that shows the most current stock symbols, market prices and the market values of the four high-end groceries:

Company Name Symbol	Last Sale	Net Change	% Change	Share Volume	Today's High/Low	52 Week High/Low	P/E Ratio	Market Value (mil.)
Whole Foods Market, Inc. WFMI : NASDAQ-GS	$ 63.96	0.78▲	1.23%	1,345,143	$ 64.16 $ 62.95	$ 63.52 $ 33.96	39.73	10,965.84
Kroger Company (The) KR : NYSE	$ 23.70	0.17▼	0.71%	5,539,481	$ 23.81 $ 23.50	$ 24.14 $ 19.08	13.54	15,180.13
Safeway Inc. SWY : NYSE	$ 22.69	0.14▼	0.61%	4,552,270	$ 22.86 $ 22.66	$ 27.04 $ 18.73	14.45	8,406.01
Weis Markets, Inc. WMK : NYSE	$ 39.79	0.04▲	0.1%	23,418	$ 40.31 $ 39.68	$ 41.30 $ 32.56	15.67	1,069.20

Whole Foods Market, Inc.

Whole Foods Market, incorporated in 1980, is the world's leading natural and organic foods supermarket. Whole Foods Market is America's first national "Certified Organic" grocer, and has made a significant impact on the natural and organic foods movement throughout the United States. The mission of this company is to provide the well-being of all individuals by supplying the highest-quality, most wholesome foods. John Mackey was the co-founder of this company, serving as the Chairman of the Board and the Chief Executive Officer since 1980. Management at Whole Foods Market, Inc. show great leadership and responsibility at managing the business strategy and reducing risks. They marketed a plan for consumers on how to get started eating healthy, which also correlates to their business principles of whole foods and whole people. For example, they follow a "365 Everyday Value." This plan offers customers the best quality products, both natural and organic, for affordable prices. Customers want to see low prices for the products and Whole Foods has recognized this and they are willing to make every effort to satisfy their customers to stay as a supermarket power in the organic sub-industry (Whole Foods Market, Inc.).

Whole Foods Market is considered to be a new competitor in this sub-industry of high-end groceries, as its first store only opened less than thirty years ago. When comparing Whole Foods to supermarkets that have been in the business a lot longer, such as Kroger and Safeway, it is staggering to see how Whole Foods has not only entered into this business, but also became a leading force in terms of quality of food and business strategies. For Whole Foods has a higher operating margin with 4.59%, a higher gross margin by 1.72% and their earnings per share is .85 as compared to Kroger that has an earnings per share of .108. Another strategy they use to remain as a strong competitor is how they introduce exclusive foods new to the United States before any other retailer. Once they select out of the thousands of foods, they test the ones that meet the Whole Foods standards and put those on their shelves for the customers to try. This technique incorporates Whole Foods' innovation in how to market new foods before anyone else and how dedicated they are to providing the best products possible (Whole Foods Market Inc.).

The Kroger Company

Kroger is America's largest grocery store chain, with operations of over 2,470 supermarkets and multi-department stores as of 2010. About 85% of its sales are from groceries, and it has recently tried adding alternative inventory such as jewelry to its offerings. It also has a pharmacy in approximately 80% of stores. Its primary concern is competing with Wal-Mart; since Wal-Mart is currently number one above Kroger in general the retail markets. Due to the pricing pressure, it has tried to drop prices and increase service to compete with Wal-Mart's Super Centers. Like Whole Foods Markets, it has recently expanded its private label brands to try and build loyalty while catering to cost-concerned consumers. Many of the supermarkets around the country have started to incorporate an increasing variety of organic food. For example, Kroger has introduced a "Healthy Habits for Life" plan that gives fitness and nutrition tips to their customers ("Smart Fitness"). To try and capture market share away from companies such as Whole Foods Markets, Kroger has vastly expanded its natural and organic offerings. Its "Organics for Everyone" line targets ordinary consumers and offers organic products at low rates (The Kroger Company).

Safeway Inc.

Safeway is North American's third largest supermarket chain that operates across the United States under different names. These supermarkets have similar product offerings to other competitors in its industry such as Kroger, including pharmacies. During the recession, Safeway faced financial troubles as consumes curbed spending; sales decreased more than 7% and its financial statements took a big hit. Like Kroger, it faces immense pricing and competition from Wal-Mart. Safeway is converting its stores to *Lifestyle* format, which offers upscale atmosphere and increased perishable, fresh foods, similar to what Whole Foods Markets offer. This has been a very capital-intensive process and the company is viewing it as a long term business strategy. Safeway has increased its use and sale of private brands to combat consumers being conservative with their money, similar to other grocery chains. Safeway owns about 30 food processing plants for its private labels and has a line of organic products called “O Organics” to compete directly with Whole Foods Market (Safeway).

Weis Markets, Inc.

Weis Markets is mainly located in the Northeastern area of the United States. Even though its scale is nowhere as large as Safeway or Kroger, Weis Markets have established their own brand and its collection of a loyal consumer base. Weis Markets offer fresh produce and proteins from local farms for their consumers at a budget, and organic produces and products at a reasonable price. They have also started a movement for sustainable seafood, offering a selection of fish supplied from sustainable fisheries and aqua farms around the world. Weis Markets started tagging their sustainable seafood with tags for easier consumer recognition, and stopped selling other species of fish that are considered not sustainable. For example, Weis Markets recommend substituting the orange rougy with the summer flounder, the marlin with the mahi mahi, and the shark with the North Atlantic swordfish. Weis Markets promotes local produce by being one of the largest purchasers in the states that their stores operates in, and continuous investment in their own brand to lower prices and gain consumer loyalty (Weis Markets).

Current Internal Controls Data

All four companies selected are public companies, which mean that the Securities and Exchange Commission, also known as the SEC, requires the companies to comply with Section 404 of the Sarbanes-Oxley Act of 2002. Section 404 means that these companies must include a management’s report on the company’s internal controls over financial reporting in their annual reports. Management must state their responsibility and an assessment of the effectiveness of the internal controls over financial reporting in the company’s annual report. In the annual report, management must also disclose any changes in the internal controls over the reporting period and if that will materially impact the internal controls over financial reporting. The SEC also requires that a registered public accounting firm to attest management's assessment of the internal controls over financial reporting in their audit opinion ("Final Rule" SEC Standard).

According to the annual 10-K reports from all four companies from 2006 to 2009, management expressed no changes or concerns in their internal controls over financial reporting. The independent auditors for the companies are Ernst & Young for Whole Foods Markets, PricewaterhouseCoopers for Kroger Company, Deloitte & Touche for Safeway, and Grant Thornton for Weis Markets. All four independent auditors expressed an unqualified opinion for their respective companies for the years 2006-2009 in the annual 10-K. Even though all four companies have effective internal controls over financial reporting according to the SEC standards for annual reports, there are many other components that make up the entire internal controls environment. "Many businesses have viewed the assessment of internal control over financial reporting as a separate task from managing their day-to-day activities. By allowing these two areas to converge, management will attain greater efficiencies" (Rittenburg).

Recent Implementations

Whole Foods Markets, Inc. - ***Cor*Tec**

In an email to the office of secretary of the Public Company Accounting Oversight Board (PCAOB) in April 2007, Whole Foods Market's Vice President of Operation Finance, Lee Matecko, stated that "we finished our first year of the 404 audit with very high marks. Our Big 4 audit firm noted that our internal controls and compliance rated in the Top 1% of companies our size within their client base" (Matecko). Whole Foods Market is a leader in the industry when it comes to implementing and experimenting with new technological software. On September 15, 2009, Culinary Software Services announced in a press release that Whole Foods Markets will be implementing their *Cor*Tec Enterprise Software System at more than 30 Rockville, Maryland stores (Culinary Software Services, Inc.). Catherine Buresh, the Operations Manager at Culinary Software Services, states in the press release: "Whole Foods is a dynamic and powerhouse player in the grocery market segment. It is an exciting opportunity for us to partner with them as they use CorTec to refine their production and distribution systems."

Culinary Software Services has been rated by allfoodbusiness.com and lodgingmagazine.com to be a leader in providing recipe & menu costing, inventory control, purchasing, ordering, and nutritional analysis software for the foodservices and hospitality industry. Whole Foods Markets has been using another Culinary Software product, the *Chef*Tec Software, for traditional inventory costing and purchasing and ordering. According to the California Restaurant Association, Culinary Software Services won the IQ Award for Software Products & Services and *Chef*Tec twice won the Innovator's Award for Technology (Culinary Software Services, Inc.). With the new *Cor*Tec software, the Maryland locations plan to increase production management and enhance the requisitions and transfers of their prepared and packaged foods. According to the press release, Whole Foods Markets can use *Cor*Tec software to “keep productions schedules on target with par levels that are triggered by sales at individual stores. *Cor*Tec will also streamline the company's process for managing the movement of product between the commissary and the stores, creating greater control and eliminating waste” (Culinary Software Services, Inc.).

The new *Cor*Tec improves Whole Foods Markets’ internal controls in several ways. The new software is designed to integrate the multiple functioning units for easier management: this integration will enhance communications and controls across the entire enterprise; as a result, Whole Foods Markets will be increasing productivity and improving profitability. According to the order form on their home website, the *Cor*Tec Enterprise Edition costs $3,995 per installation without interfaces or sales taxes. If there are 30 Whole Foods Markets pioneering this new software, then we can assume that the rough base cost is around $119,850. An estimation of the cost of the software system is necessary since confidential client information is not disclosed to the public. There might be a discount for a large client such as Whole Foods Market, providing that the potential test stores like the software and there is a possibility that the software will be implemented to all other Whole Foods Markets in the nation. However, the discount can be outweighed by the 2.9% Colorado sales tax according to the Department of Revenue and other significant costs involving the actual implementation of the software and training of employees.

Whole Foods Markets, Inc. - Riskonnect

Besides the *Cor*Tec software for production, Whole Foods Markets also implemented a new risk management information system in 2009 from Riskonnect, Inc, an independent software company. The press release states that Riskonnect and its technology consultant partner, Shelter Island Risk Management, is making Whole Foods Markets their anchor U.S. retail Client for the new risk management product, Riskonnect RMIS. Shelter Island Risk Management is a leading technological consulting firm used by the Kroger Company for their own risk management systems. Kevin Husted, the Corporate Director of Risk Management at Kroger states, “Data integrity management is critical to effectively completing complex claims conversions from one administrator to another. Shelter Island has demonstrated their competence in this very important area. Remember, if you don't correct the data on the front-end, chances are you will get what you deserve on the back-end" (“Client Testimonials”).

As for the partnership that created the new Riskonnect RMIS system, Margot Roth, the Director of Risk Management for Whole Foods Market stated, “As a public company you only have so much time to get all your financial reports closed. Riskonnect RMIS has enabled us to cut days off our closings. The integrity of the data and the audit-ability of the data have greatly improved. We have not begun to realize the complete ROI on this” (Riskonnect). The CEO of Riskonnect, Bob Morrell, stated that Riskonnect is shifting from “stagnated technology…to products and systems that exceed all expectations around performance, technology and security, as well as client service and support…Within Whole Foods Market, our solution is already creating a bridge from risk to operations” (Riskonnect).

Within the same press release, Riskonnect, Inc. states that the RMIS system was integrated within 90 days, when traditional systems with Third Part Administrator and carrier data took 12 to 18 months for implementation (Riskonnect). According to a “Guide to Enterprise Risk Management” put out by Protiviti, an independent risk consulting firm, the average Enterprise Risk Management system takes 12 months for initial integration and concrete impact. The Chief Operating Officer of Shelter Island Risk Services at the time, Roger Dunkin, stated, “Riskonnect RMIS is raising the bar on both technology and scope of system capabilities. While managing the implementation, I witnessed immediate paybacks for Whole Foods Market. This system's highly configurable character, intuitive interfaces, and expandability allowed us to implement it within 90 days.” Since March 1, 2010, Roger Dunkin has accepted the position of Vice President of Professional Services at Riskonnect, Inc. Dunkin worked in the risk management industry for 20 years, and has 11 years of experience on evaluating and implementing risk management systems and technology ("Riskonnect Taps Roger Dunkin as Vice President of Professional Services.").

According to its website, http://www.riskonnect.com/, Riskonnect is an innovator in the ERM field that provides comprehensive software solutions that "empower executives to make forward-looking decisions based on real-time, enterprise-wide, comprehensive risk information." The company also seeks to specifically increase the performance and scalability of risk management information systems within traditional enterprise risk management. According to the Technology Association of Georgia, Riskonnect will be recognized as one of the Top 40 Innovative Technology Companies in Georgia. The Technology Association of Georgia, or TAG, is the state's leading technology association dedicated to promote and advance Georgia's technology industry. TAG will recognize Riskonnect at the 2011 Georgia Technology Summit, held on March 23, 2011 for making a "significant impact on how we live and do business through their technology innovation" ("Georgia Technology Summit.").

Even though the full impact of the RMIS system from Riskonnect may take several years for Whole Foods Market to recognize, there can be assumptions made on some of the benefits. The interface is user-friendly, with easy access and understandability. The cost of training employees to operate and to familiarize the system will be lower than traditional systems. The period of implementation is proven to be significantly shorter than other risk management systems in the industry; in fact, the system had "rapid implementation" and "users instantly adopted Riskonnect" (Whole Foods Case Study by Riskonnect). According to the product description on their website, Riskonnect's RMIS system will process data of claims, litigation, exposure, or policy management with business intelligence powered by IBM Cognos on their innovative platform.

Whole Foods Market can use their new system to not only manage traditional risk, but also as another control for operations. In a case study requested from Riskonnect, Whole Foods

Market wanted to improve its existing risk management system, even though it was a mature and functioning system with proper RMIS technology. Whole Foods Market wanted to improve its risk management technology to gain an advantage with speed and accuracy. The new Riskonnect system integrated accurate data on a real time basis. Within the case study, the new system claimed to have the response times of ¼ of a second per page, enabling faster input times, and production times of complex accounting reports. The Director of Risk Management, Margot Roth, states that "with RMIS, we cut days off the delivery of our financial reports." The new Riskonnect system also had to enforce common business processes and standards to decentralize operations. This requirement made sure that the new system enforced significant controls around departments and functional units. The result of the implementation also proved that the Riskonnect RMIS system allowed user to actively manage and document their work processes. With that, the users can benefit by configuring the system to the way that they are familiar and comfortable with, not the other way around of conforming to another new technology that they did not understand how to operate (Whole Foods Case Study by Riskonnect). The time and cost of producing and internally auditing financial data is reduced due to greater reliance on the accuracy of the new technology. Financial information is delivered to management and stakeholders at a faster and more accurate pace. With tighter control on risk management, the entire internal control environment of Whole Foods Markets can benefit and increase efficiency.

The Kroger Company - LLamasoft

As with Whole Foods, the Kroger Company knows that just maintaining an effective internal control over financial reporting is not enough to gain a competitive gain over others in the industry. Kroger seeks to improve their supply chain operations, reducing costs upstream from supplier and manufacturers all the way downstream to distribution centers and their retail stores. On October 27, 2010, the nation’s largest traditional grocery store announced a partnership with LLamasoft, Inc. for supply chain modeling and strategic planning. Plans were announced to license the Supply Chain Guru software from LLamasoft, and to use their consulting services for networking design and inventory analysis. LLamasoft Executive Vice President, Toby Brzoznowski, said, “As the largest pure grocer in the U.S., Kroger's massive scale and volume of product movement provides a unique opportunity to use their supply chain as a strategic competitive advantage." In the same press release, Paul Pridemore, the General Manager of Kroger Logistics said their new software provides them with the “most comprehensive strategic planning capability. The integration of network and inventory optimization, combined with product flow-path analysis and simulation will enable Kroger to systematically improve our total cost-to-serve for all key supply chain segments" (“Kroger Co. Selects LLamasoft”).

According to LLamasoft, Supply Chain Guru is “the leading supply chain strategic planning application available in the market today. It enables companies to model, optimize and simulate their supply chain operations, leading to major improvements in transportation, inventory, sourcing, and production.” On October 4, 2010, the company also announced that the Supply Chain Guru software achieved certified integration with the SAP Business Suite software from the SAP Integration and Certification Center. The exchange and connection of data through the two systems will provide easier performance of both supply chain and integrated business planning functions. The president of LLamasoft, Don Hicks, stated: “our SAP Guru Connector transforms ERP data into optimization models - and then into actionable business decisions." For example, John Mee is the Director of Supply Chain for Glanbia Consumer Foods, Ireland's largest distributor of dairy and chilled food products. He agrees that the intergration of Supply

Chain Guru and SAP is a transformative technology. Mee explained, "We rely on our SAP platform to provide most of the data that drives our decision making. By automating the flow of operational planning data directly into our strategic planning models…makes our supply chain strategy and planning a dynamic and proactive capability. In fast moving industries like ours, LLamasoft's SAP Guru Connector is a game changer" ("LLamasoft Supply Chain Guru"). With an innovating supply chain platform that is integrated with SAP, Kroger management will be provided with more timely and accurate information for financial decisions and to reduce costs.

The Kroger Company - IBM

In a press release in January 2007, IBM announced that Kroger is deploying their new Store Integration Framework technology throughout more than 2,470 supermarkets across the nation. IBM's Store Integration Framework plans to improve the overall shopping experience at Kroger. The Store Integration Framework is an umbrella combination of Store Integrator, Data Integration Facility, Remote Management Agent, and WebSphere Remote Server for Retail. These individual components enable real time data exchange at point of sale terminals and remote management of store devices and applications. The new Store Integration Framework is designed to "provide a complete and optimized infrastructure to enhance store-centered processes and connect them with the enterprise." The new implementation solution will also provide remote store-level configuration, monitoring, event management, asset management, inventory, and software distribution at all Kroger supermarkets ("Store Integration Framework Summary").

In the same press release, Kroger's Senior Vice President and Chief Information Officer, Chris Hjelm stated: "We intend to significantly reduce development cycle times by using the open standards and techniques available through IBM's framework." The General Manager of IBM Retail Store Solutions also expressed excitement at working with Kroger, Steve Ladwig said, "Kroger is recognized in the grocery industry as an early adopter of technologies, which not only improve efficiency but are aimed at creating new services for their customers…IBM's Store Integration Framework better enables Kroger to efficiently introduce new services to benefit their customers." Ladwig also said that Kroger has successfully integrated new technology at the store level in the past: self-checkout technology and gas pumps at store locations (IMB). Kroger can use IMB's new technology to expand store formats in their groceries and connect their individual stores at an enterprise level. Secured information can be better communicated to management at a faster pace for decision making at a much bigger entity scale.

The Kroger Company - HarvestMark

Besides supply chain systems implementation, Kroger has also made efforts in food safety and resources to attract consumers. In October 2009, Kroger announced in a press release that a new line of fresh salads includes tracing technology on its packaging so that the customers can know exactly where the produce was grown. The press release stated that Kroger has employed HarvestMark, the leading system in food traceability, to provide nutrition and origin information about the produce they purchase. The technology works like this: "Each bag carries a 16-digit code shoppers can enter at HarvestMark.com to learn more about the salad's origin, packing location, ingredients, date and time the product was packed." Joe Grieshaber, vice president of Kroger's meat, seafood, deli and produce departments said: "We look forward to continuing to offer our customers innovative and affordable food safety technology" ("Kroger's New Line of Fresh Salads").

The Kroger Company – YOU Technology

In a press release in August of 2010, Kroger launched a new Digital Coupon Center, with help from YOU Technology's digital marketing initiatives and services. The Digital Coupon Center is available to consumers through Kroger's website, and its main purpose is to allow consumers fast and convenient ways to save money on the items that they need. The consumers log in and apply the coupons that they like onto their Kroger Plus Card whenever, and the discounts are automatically deducted from their bill at checkout on their next shopping trip when they provide the card or an identification alternative like a telephone number. Evan Anthony, the vice president of corporate marketing and advertising for Kroger, said: "This new digital coupon center makes it even easier for our customers to save money…Our customers asked to make online coupons easier for them to use and we listened. The time and money they can save is just the latest way Kroger delivers more value to its customers" (YOU Technology). With the increase of online shopping and technological dependency, Kroger can not only save its consumers time and money, but also cut back on paper advisements and coupons, that will alternately drive down costs for the company.

Safeway, Inc. – Hara

In a press release in February 2010, Safeway, Inc. has announced to work with Hara, a leading provider of environmental and energy software, to reduce its energy usage. Hara plans to implement economic measures to reduce Safeway's carbon footprint. The first step is to deploy the Hara Environmental and Energy Management (EEM) to consolidate energy and environmental data onto a single platform and establish an environmental system of record. The Hara EEM solution provides a "centralized platform to collect, monitor and manage energy costs, greenhouse gas emissions, forecasting, modeling and market information across [Safeway] stores, manufacturing distribution centers and fuel stations." The technology reportedly is able to provide management with automate consolidated report on utility spending (Hara). According to Hara's official website, the Hara EEM "monitors and manages natural resource consumption and environmental impact." The technology is used by other Fortune 500 Companies such as The Coca-Cola Company, and News Corporation to save millions of dollars in energy and water costs, while reducing their carbon emissions. Hara's solution can also take the sustainable initiative from the entire organization and share best practices within the entire nation.

The senior vice president of fuel and energy at Safeway, Joe Pettus, states: "We have a long history of reducing our energy costs through innovative supply arrangements and implementation of energy efficiency projects…Hara adds value by giving us not only reliable insight into the size and makeup of our energy usage and carbon footprint, but also a solid roadmap for achieving further cost reductions and better carbon management." Safeway is joining the green initiative of being environmentally responsible. The implementation of Hara solutions may help the company boost goodwill in the industry and gain recognition and loyalty with more environmentally friendly consumers. As Amit Chatterjee, CEO and co-founder of Hara, said: "Hara gives companies and organizations the opportunity to turn carbon liability into a competitive advantage by providing a holistic look at their entire organizational metabolism… A leading retailer with operations the scale of Safeway's is poised to make a real impact across its broad footprint" (Hara).

Safeway, Inc. – Autonomy PLC

According to a new article by Forbes.com and Foxbusiness.com, there has been an announcement of Safeway entering into a "significant agreement" with Autonomy Corporation PLC. Autonomy PLC is a provider of infrastructure software, and it states that Safeway has licensed Autonomy's Intelligent Data Operating Layer software (Packham). According to Autonomy's website, the Intelligent Data Operating Layer collects "indexed data from connectors and stores it in its proprietary structure, optimized for fast processing and retrieval of data…operations including hyperlinking, agents, summarization, taxonomy generation, clustering, profiling, alerting and retrieval" ("IDOL Server"). No other details were provided.

Weis Markets – Upgraded Retalix HQ

In May 2010, Weis Markets announced that it was updating its current Retalix software in hopes of cutting costs, improving margins, and boosting its competitive advantage in the marketplace. The Relitax HQ will be implemented with new vendor web access, advanced pricing bundles, profit analyzer, category analyzer and bill back manager. The Category Analyzer provides item/profit movement analysis and the bill back manager captures earned promotional dollars from suppliers. The advanced pricing bundle automates competitive pricing philosophies to increase profits and market share (Relitax).

According to the press release, the new modules added to the HQ version will integrate automation with analysis of pricing and inventory management. According to the official Relitax website, the new HQ version is designed by Relitax to achieve the goal of improving pricing control and execution while cutting costs. The Vice President of IT at Weis Markets, Bob Mawyer, says the upgrade will "replace a number of internally developed and supported mainframe systems, as well as adding functionality we believe will give us a competitive advantage. Retalix HQ and the new modules will give us even more visibility and control over our pricing operations, data analysis, and vendor promotional monies at both the store and headquarters levels" (Relitax).

Bill Campbell, executive vice president of Retalix's U.S. Retail Division, said that, "As grocers seek to cut costs and improve efficiency in today's economic environment, technology like our Retalix HQ software can provide increased visibility and control into day-to-day operations and ultimately increase profitability." An industry leader in pricing management, Retalix serves over 100 grocery clients and over 5,000 stores. Therefore, Retalix HQ can help Weis Markets control costs and pricing strategies (Retalix).

Conclusion

All the implementations of software and leading technology are evidence that companies in the high-end grocery industry are taking necessary precautions for risk management. The companies are not only able to better protect themselves and their company's financial health, but they are also able to stay a leader in the general retail industry by investing in additional technologies that better promote their business and satisfy consumers. New regulations are highlighting the importance of risk management and tighter controls after the most recent financial collapse. The high-end grocery industry is trying to stay ahead of the game, which will save them profits in case of new regulation implementations. Companies recognize that it is not enough to just have an effective internal control for financing reporting. Management and boards are not satisfied with just scraping by with the minimum requirements; the leading companies in the high-end grocery industry are trying to invest now to save later. Whether the focus is put on better integration within existing systems or implementing new risk management software, there is no doubt that this industry is tightening on the efficiency of operations. There is a tremendous effort to expand the software and technology of Whole Foods Market, Kroger, Safeway and Weis Markets. Management and the board need to pay extreme attention to their current controls systems, especially making sure that the company has an advanced risk management system for financial decisions. As a result, the benefits for effective internal controls for operations will directly impact the financial health of the company.

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ACADEMIC VITA

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EDUCATION

The Pennsylvania State University University Park, PA
Smeal College of Business May 2011
Schreyer's Honors College
Bachelor of Science in Accounting
Minor in The Legal Environment of Business

RESEARCH

Honors Thesis: The Impact of Effective Internal Controls for Managing Business Strategies and Minimizing Risks in the Retail Grocery Industry
Thesis Advisor: Karl Muller
Honors Advisor: Orie Barron

WORK EXPERIENCE

PricewaterhouseCoopers Philadelphia, PA
Audit Intern Summer 2010

- Work as an associate auditor on four different client engagements in the private client services line of service
- Perform client inquires, documentation procedures of interim audits
- Accepted full-time offer, commencing Fall 2011

Accounting Department 2010-2011
TA for ACCGT 403W and AACGT 211H

Ernst & Young Beijing, China
Corporate Tax Intern Summer 2009

- Assess client risks and fulfill engagement requests, presentations, structure charts
- Research current tax laws and prepare consulting paperwork of International clients in the agricultural and real estate industries
- Translate and edit client proposals and billings from Mandarin to English

PricewaterhouseCoopers Philadelphia, PA
Leadership Adventure Extern May 2009

- Organize team building activities and participate in a scavenger hunt
- Experience and observe a day at an insurance client site

LEADERSHIP/ ACTIVITIES

Chinese Undergraduate Student Association, *Treasurer* 2009-2010

- Collect membership fees, maintain appropriate financial records, plan budgets, disburse money for expenses, and arrange audits if necessary
- Apply for funding from UPAC (University Park Allocation Committee)

Beta Alpha Psi Honorary Business Fraternity, *member* Aug 2008

- Fulfill membership requirements for community service, Thon canning trips, and attend professional events/meetings
- Mentor and tutor freshmen and sophomores in introductory accounting courses

Accounting Society, *member* Aug 2008

- Participate in skill building events and networking activities such as a Shell Case Study and a fieldtrip to PricewaterhouseCoopers Harrisburg Office

Springfield Thon, *member* Aug 2008
Penn State Blue and White Society, *member* Jan 2008
Doylestown Hospital, *volunteer* Sept 2007

HONORS

The President's Freshman Award March 2008
The President Sparks Award February 2009
Dean's List All Semesters

SKILLS

Fluent in Mandarin Chinese
Five Years of Spanish