SONY CORPORATION

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Executive Summary

Sony Corporation, a leading Japanese manufacturer of electronics, game, and entertainment products, has reported losses for four consecutive years. The company announced a record annual net loss of 520 billion yen ($6.4 billion) for the year ends in March 2012. Sony's main strategic problem lies in its numerous product lines that serve too many parts of the entertainment value chain. The "empire-building" strategy not only caused the company's innovation and operation to slow down, but also impaired their competitiveness in all of the market segments they are engaged in. In addition to the problem of dis-synergies among Sony's product lines, they also face other external and internal challenges. Externally, the appreciation of the Japanese Yen adversely affected the purchasing power of Sony products by non-Japanese consumers, and thus reduced the overall demand for Sony. The global economic crisis starting in 2008 further aggravated Sony's profitability as consumer spending dropped significantly during the recession. Sony also experienced bad luck with the Great East Japan Earthquake. The initial calamity and its aftermath disturbed Sony's operations and caused excessive restoration costs. Within the electronics and game industry, increasing competition made it difficult for Sony to retain market share. Facing these external challenges, Sony's management team was relatively conservative. Restructurings were done on a small scale, and mergers and acquisitions were rarely conducted. Finally, Sony's technological innovation gradually lost their edge against their competitors. All of the above factors caused investor confidence in the company to drop dramatically, with Sony's stock price falling by more than half in 2011.

After reviewing Sony's business model, history and financials, and conducting a Porter's Five Forces Analysis and a SWOT analysis, we propose some strategic recommendations for Sony. We first recommend Sony's management team to find a market segment to focus on and develop their competitive advantage within that segment. In addition, we recommend that Sony acquire more aggressively within that segment to increase market share, reduce manufacturing costs, and access new technologies and patents. Furthermore, we recommend that Sony refine their quality control system in response to their recent quality scandals and increasing reliance on

external business partners. Lastly, we suggest that the financial services division hedge the macroeconomic risks that Sony Corporation as a whole is facing.

COMPANY OVERVIEW AND HISTORY

Sony Corporation is engaged in the development, design, manufacture, and sale of electronic equipment and devices, as well as game consoles and software. It is also engaged in the production and distribution of motion picture, home entertainment, television products, and recorded music. Further, Sony is also engaged in the financial services businesses, including insurance operations through their Japanese insurance subsidiaries and banking operations through a Japanese Internet-based banking subsidiary. [1] Sony's primary manufacturing facilities are located in Asia. They have a broad sales network, registered in approximately 200 countries and territories.[2] Primarily, Sony's products are marketed in Japan, the United States, and Europe.[3]

Sony has a history of more than 60 years. In 1946 in Nihonbashi, Tokyo, Masuru Ibaka and Akio Morita founded a company called Tokyo Telecommunications Engineering Corporation, also known as Totsuko, with start-up capital of 190,000 yen for the research and manufacture of telecommunications and measuring equipment.[4] After moving their head office and factory to Shinagawa, Tokyo, they successfully produced and launched a power megaphone and completed the first magnetic tape recorder prototype that was produced and launched in early 1950 and called the G-Type. In the early 1950's Ibaka traveled to the United States and came across Bell Labs' invention of the transistor. He negotiated with Bell to license the transistor technology to his company intending to apply it to communications, while most American companies were looking for military applications. In 1955 they launched Japan's first transistor radio, the TR-55. While they were not the first to produce the transistor radio, they were the first to make it commercially successful as the product took off in Canada, Australia, the Netherlands and Germany as well as within Japan and continued to be a good seller till the sixties. In 1957 Totsuko produced the TR-63 model, the smallest transistor radio in commercial production at the time, which was a worldwide success, ultimately cracking open the American market and launching the new industry of consumer electronics. One year later, in January of 1958, they changed the company name to Sony Corporation. The name Sony was chosen as a mix of two words. One, the Latin word "Sonus", the root of sonic and sound, and the other "Sonny" the familiar colloquial term used in America at the time to call a boy. The Sony Corporation of America (SONAM) was established in the United States in 1960, and they became the first Japanese company to offer shares in the United States in the form of American Depository Receipts on the OTC market of the New York Stock Exchange in 1961. Their shares became listed on the NYSE in 1970.

Over the years Sony has become a worldwide industry leader in technology, releasing many iconic products along the way. Throughout their history Sony tends to create their own in-house standards for technology rather than copying the standards of other manufacturers. An infamous example is the videotape format war in the 80's, in which Sony introduced the Betamax system for VCR's in opposition to JVC's VHS format. Unfortunately, VHS gained critical market share and Sony lost the battle. There have been many victories for Sony, however, and many of the products we take for granted today can be traced back to Sony. In the mid-60's they branched out their product line from transistor radios and tape recorders in to television. They received the first Emmy ever awarded to a Japanese company in 1973 for developing the Trinitron color TV system. Sony released the famous "Walkman" in 1979, which was a worldwide success. In 1982, they introduced the world's first CD player, soon followed by a portable version called the "Discman". They began foraying in to cameras in the 1980s producing a wide variety of consumer-use still cameras and camcorders. In the 1990's they began producing home-use PC's launching their "VAIO" series. Around the same time they launched their wildly popular PlayStation gaming consoles, originally in a joint venture with Nintendo but eventually spinning it off in to a product of their own. Today Sony is a well-known technology company with a very diverse product line ranging from their original line of products, home audio, to recording media to robots.

Sony as a corporation has grown dramatically over the years. Not all this growth has been organic; they have undertaken a variety of joint ventures and acquisitions and have accumulated a number of subsidiaries around the globe over the years. In 1968 CBS/Sony Records Inc., a 50-50 joint venture with CBS Inc. of the U.S., was established. It became a wholly owned Sony subsidiary in 1988 and was renamed Sony Music

Entertainment Inc. in 1991. Sony acquired Columbia Pictures Entertainment, Inc. in 1989, later renamed Sony Pictures Entertainment Inc. They created Sony Computer Entertainment Inc. and Sony Communication Network Corporation in 1993 and 1995 respectively. In 2004, Sony Financial Holdings Inc. and Sony BMG Music Entertainment were established. Sony was part of a consortium that acquired Metro-Goldwyn Mayer (MGM) of the United States in 2005. Sony and Samsung entered a joint venture on manufacturing TFT LCD panels at S-LCD Corporation in 2006 and they entered another joint venture with Sharp in 2009 to sell these LCD panels. These major corporate movements have allowed Sony to become the major player they are today in the global technology sector.

In their most recent corporate history Nobuyuki Idei stepped down as Sony Corp. Chairman and Group CEO and was replaced by Howard Stringer, marking the first time that a foreigner has run a major Japanese electronics firm. The last few years have been tough for Sony, as they have been losing money due mainly to increased fierce competition with Apple Inc. and Samsung Electronics Inc. to the tune of about $5 billion over the last three years. In May 2011, Sony expected to lose a total of $3.2 billion for the year due to the effects of the Japanese earthquake, forecasted downwards from their earlier projection of $857 million profit for the year. In September of 2000 Sony had a net worth of $100 billion but by December of 2011 it had plunged to $18 billion. Sony's attempts at responding to these losses, through joint ventures and outsourcing, have yet to pay tangible dividends leaving the technology giant feeling unwary about their growth and sustainability moving forward.

FINANCIAL ANALYSIS

In this section, we first evaluate the overall financial strength of Sony by analyzing their liquidity, profitability, operational efficiency, and stock performance. Then, we analyze Sony's financial data in more detail based on market segments and geographic locations.

LIQUIDITY

Before we look at Sony's profitability, it is important to determine whether Sony is facing solvency risks. Severe liquidity problems may lead to bankruptcy.

Sony's Liquidity Ratios (2002-2011)[5]

	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011
Current Ratio	1.30	1.30	1.13	1.27	1.18	1.28	1.25	0.95	1.02	0.93
Quick Ratio	0.82	0.85	0.75	0.84	0.7	0.75	0.67	0.53	0.66	0.58
Leverage	3.45	3.67	3.82	3.31	3.31	3.48	3.62	4.05	4.34	5.07
LT D/E	0.35	0.35	0.33	0.24	0.24	0.3	0.21	0.22	0.31	0.32

Data Source: Morningstar

The table illustrates whether or not Sony would have enough asset reserves to pay off their liabilities. The current ratio compares a firm's current assets to their current liabilities. Traditionally, a current ratio of 2 indicates good financial health. Sony's current ratio has decreased since 2002, and fell below 1 in 2009. This means Sony's asset resources that are immediately cashable did not suffice to pay off their short-term debts. In that case, Sony would either default or borrow more debt to cover the current obligations. As we see from the financial leverage figures, Sony has increased their debt with respect to their equity overtime. An increased leverage is typically a signal of a company's confidence in their profit-generating mechanism or demand for extra capital to be used for R&D or new market entries. Sony's increasing leverage, however, is not consistent with their decreasing net income and relatively plain technological innovations in the past few years. We, therefore, suspect that it might have to do with Sony's low current ratio; that is, Sony might be borrowing more debt to cover their current liabilities. The higher leverage ratio might further increase the liquidity risk of the firm in the future, unless Sony shows a sign of recovery in their net income.

Profitability

Since Sony's financial health needs to be improved, more importance has been placed on the profitability of their business. In other words, it is critical that Sony increase their sales and profits to obtain more current assets. Sony's profitability indicators, however, show little sign of recovery over the past few years.

Sony's Profitability Ratios (2007-2011)[6]

(In JPY Mil)	2007	2008	2009	2010	2011
Revenue	8,314,133	8,830,148	7,729,993	7,213,998	7,181,273
Operating Income	71,908	372,759	-227,783	31,772	199,821

Net Income	126,576	367,682	-98,938	-40,802	-259,585
Operating Cash Flow	562,273	754,177	407,153	912,907	616,245

Data Source: Morningstar

As the table shows, Sony's sales declined almost 20% in 2009, and continued to slide thereafter. This decline in sales, as we discuss in the competitive analysis section, can be attributed to a combination of external factors (the Yen appreciation and the economic downturn) and internal factors (the increasing competition in the industry). While Sony's revenue has been declining, their operating income has recovered since 2009. This can be attributed to their restructuring plan[7] that effectively reduced their manufacturing overhead and SG&A costs. We should note that while the net income in 2011, -259 billion yen, seems to be far lower than zero, it is actually because Sony recorded 425.3 billion yen of income taxes, primarily resulting from recording a non-cash charge to establish a valuation allowance of 362.3 billion yen against deferred tax assets. [8]The earnings-before-tax figure for 2011 is positive, shown in the table below. Their cash flow from operating has recovered to the pre-crisis level.

Percentage-of-Sales Analysis of Income Statements (2007-2011)

% of sales	2007	2008	2009	2010	2011
Revenue	100	100	100	100	100
COGS	71	76.88	80.31	77.13	67.28
Gross Margin	29	23.12	19.69	22.87	32.72
SG& A	28.07	19.33	21.81	21.42	20.91
Other	0.07	-0.43	0.5	0.18	9.22
Operating Margin	0.86	4.22	-2.95	0.44	2.78
Interest Income & other	0.36	1.03	0.68	-0.07	0.07
EBT Margin	1.23	5.26	-2.26	0.37	2.85

Data Source: Morningstar

The table above[9] is a percentage-of-sales analysis of their income statement. As we have expected, the cost of goods sold decreased with respect to sales after 2009. Since it is unlikely that labor and material costs would decrease over time, we claim that the decrease in COGS has to do with a reduction of manufacturing overhead costs. Gross margin has recovered to its peak in the early 2000s. Fixed selling costs remain relatively stable with respect to sales, and before-tax profit has recovered since 2009.

OPERATING EFFICIENCY

Operating efficiency measures how well the company does in utilizing their resources to generate profits. The efficiency ratios are usually constructed by dividing the revenue by the asset accounts that we are interested in. The table below summarizes some efficiency ratios that are often used by financial analysts:[10]

SONY'S OPERATING EFFICIENCY RATIOS (2002-2011)

Ratios	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011
Receivables Turnover	5.96	6.35	6.68	6.4	7.14	7.04	6.92	13.12		
Inventory Turnover	6.47	8.44	7.82	7.71	7.19	6.75	6.93	6.79	7.63	7.16
Fixed Assets Turnover	5.32	5.57	5.66	5.23	5.43	5.9	6.63	6.41	6.61	7.43
Asset Turnover	0.94	0.9	0.86	0.77	0.75	0.74	0.73	0.63	0.58	0.56

Data Source: Morningstar

As is shown in the table, Sony's total asset turnover ratio decreased over time, meaning overall, the increase in their sales did not match the increase in their total assets. As we discussed above, Sony has issued more debt in the past few years, but they did not seem to have efficiently used the additional capital to generate revenues. Since we know that Sony's sales were declining in the past few years, an increase in fixed asset turnover ratio could only be achieved if Sony sold or depreciated some fixed assets. This makes sense since developments in the internet allowed Sony to shift their selling activities towards internet-based. The inventory turnover ratio was low in 2007-2009, indicating that Sony sold fewer products from their inventory during those years.

STOCK PERFORMANCE

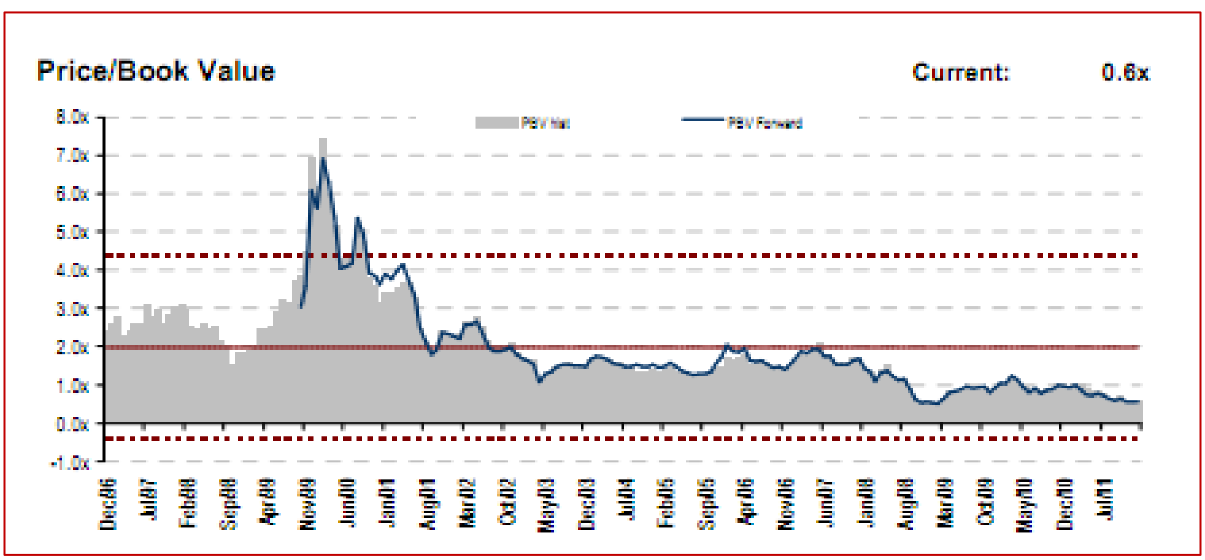
As of March 21, 2012, Sony's stocks are sold at JPY 1,734 at the Tokyo Stock Exchange and USD 20.72 in the New York Stock Exchange as an ADR.[11]

SONY'S STOCK PRICES AGAINST NIKKEI 225 (2007-2011) [12]

Source: Google Finance

The Sony stock plunged in mid-2008, and has constantly underperformed the benchmark index ever since. In 2011, Sony's stock price declined by 54%. A Beta statistic of 1.47 against the US stock market[i] is consistent with the expectation that tech companies are more volatile than average. In order to determine whether the price is high or low, we need a ratio that compares the stock price and some fundamental indicator of the company's financial strength. Due to Sony's negative net income, price/earnings ratio is not applicable. Therefore, we look at the following price/book graph instead:[13]

SONY'S PRICE/BOOK VALUE (1997-2011)



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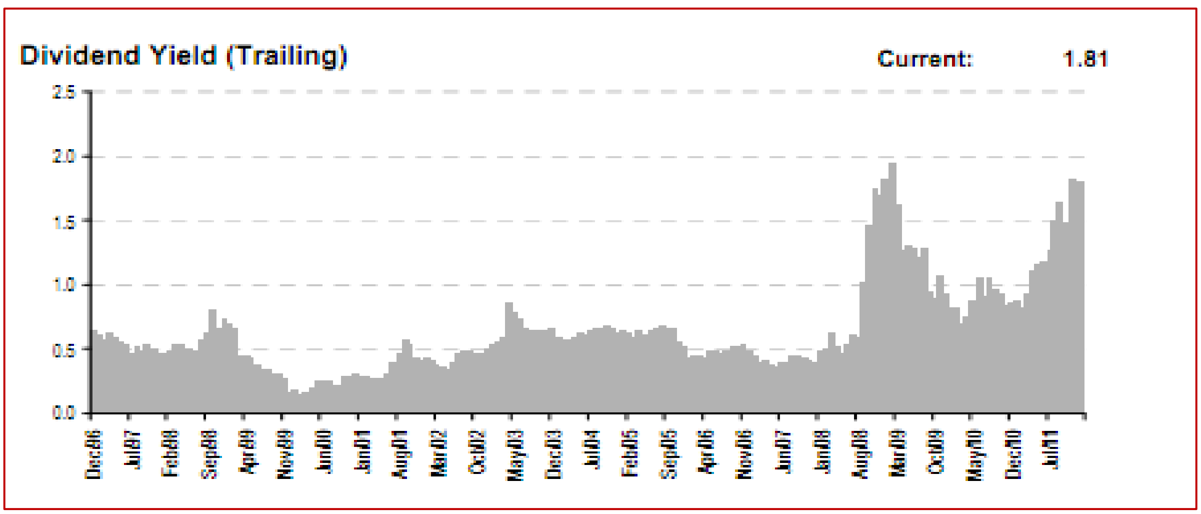
[i] Beta statistics against most Asian markets are not publicly available. Therefore, we compare the volatility of SNE (ADR) and S&P 500 instead.

The price/book ratio of Sony peaked in the late 90s. The ratio decreased almost constantly in the 2000s, and went below 1 in 2002. This shows that the market has not been willing to pay a high price for each unit of book value. In other words, the market does not have confidence in the future growth of the company's equity value. The most recent return on equity ratio is -13.67%, which echoes the pessimism by investors.

Dividend investors may want to look at Sony's dividend payout records. The graph below[14] shows the dividend yield trend of Sony. While Sony's dividend payments with respect to price fluctuate over time, it demonstrates a general increasing trend. This means that investors' return on investment other than capital gains has increased over time. Thus, in market turbulence, Sony stock would still be attractive to value investors, but not necessarily to speculators. This dividend yield trend also indicates that the company has passed the growth stage where they reinvested most of their profits.

SONY'S DIVIDEND YIELD TREND (1997-2011)



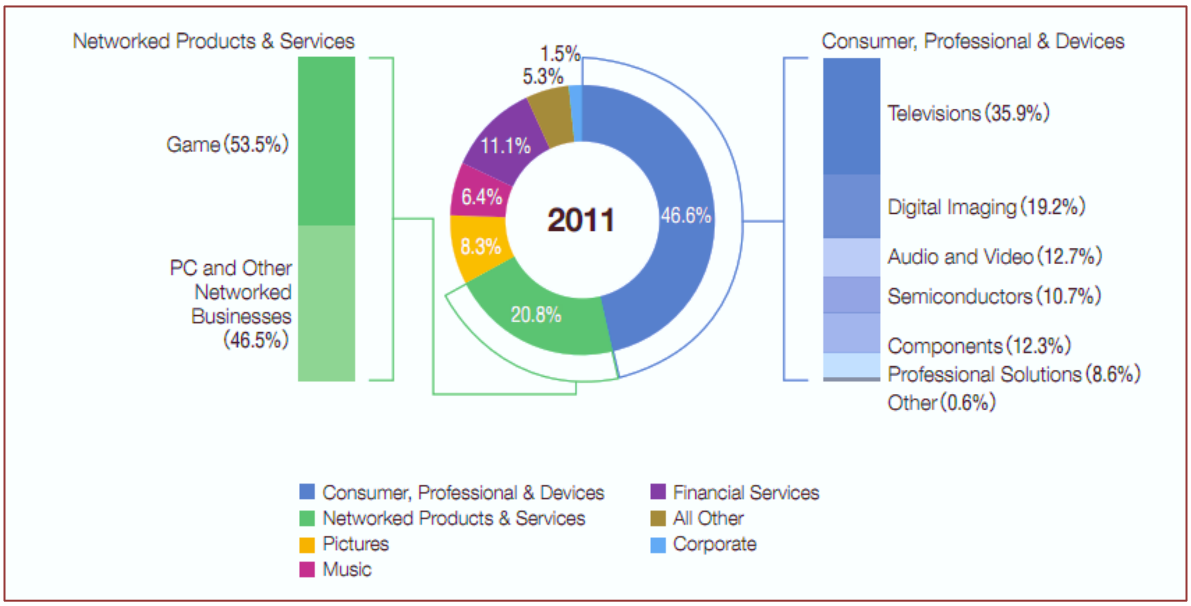
Data Source: JP Morgan Analytics

So far, we have concluded Sony's financial results demonstrate high liquidity risks, decreasing sales, slowly recovering profitability, low operating efficiency, underperforming stocks, and low investor confidence. The bright spot is the increasing return on investment excluding capital gains. Now, we move onto Sony's financial results based on their product segments and operating geographic locations. These data allow us to examine Sony's financial strength in more detail.

Segments and Locations

The graph below shows a breakdown of sales by division. The Consumer, Professional & Devices (CPD) Division remains the biggest in sales, with television sales leading in the spectrum. On the other hand, the Networked Products & Services (NPS) division, which consists of Game and PC, comes in the second on the rank. Sales in the Pictures, Music, and Financial Services segment are comparable, with 11.1% of Financial Services, 6.4% of Music, and 8.3% of Pictures.

Sony's Sales by Segment (2011)



Source: Sony Annual Report 2011

In 2010 and 2011, the Financial Services segment generated the highest operating income. Pictures and Music both demonstrated relatively strong operating results. CPD, NPS, and Sony Ericsson suffered a loss in 2010, but were able to turn the negative operating income positive in the second year. Since sales in those segments decreased in 2011, they must have reduced their COGS and/or SG&A costs. [15]

Lastly, we look at Sony's sales by location. According to the table[16] below, Sony has seen some of their sales revenue shifted from Europe and the United States to Japan and other Asia-Pacific areas. This shift is probably due to the appreciation of the Japanese Yen, which lowered the overall demand from buyers in western countries.

Sony's Sales by Location

JPY in Millions	2009	2010	2011
Japan	1,873,219 (24.2%)	2,099,297 (29.1%)	2,152,552 (30.0%)
United States	1,827,812 (23.6%)	1,595,016 (22.1%)	1,443,693 (20.1%)
Europe	1,987,692 (25.7%)	1,644,698 (22.8%)	1,539,432 (21.4%)
Asia Pacific	1,285,551 (16.6%)	1,193,573 (16.6%)	1,288,412 (17.9%)
Other Areas	755,719 (9.9%)	681,414 (9.4%)	757,184 (10.6%)
Total	7,729,993	7,213,998	7,181,273

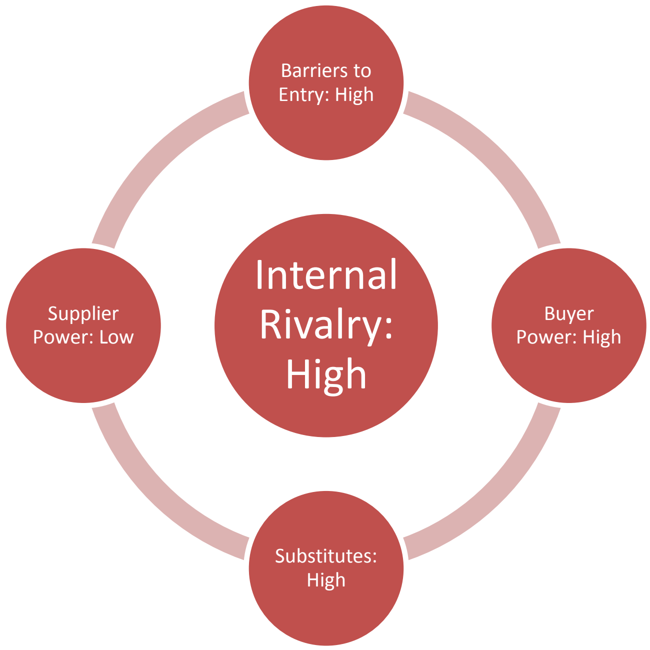
Source: 2011 Sony 10-K

What Sony's Financials Tell Us about Their Strategies

- Sony must immediately focus on increasing sales in order to meet their short-term liabilities. While we recommend restructurings among Sony's product lines, the company must first ensure stable cash flows to avoid more severe liquidity problems.
- Sony has effectively reduced its COGS as a percentage of sales in the past few years. They should continue to make efforts to increase gross margins in the coming years by reducing manufacturing costs and generating synergies among their product lines.
- Sony must find ways to utilize their increased leverage and other asset items more efficiently to generate sales.
- Sony's stock prices demonstrate low investor confidence. Although this is causing frustration among the current shareholders, Sony should regard this as an opportunity. When expectations are low, it would be easier for the company to outperform.
- Sony's increasing reliance on international consumers made their operating results very sensitive to exchange rates and the global economy. They should find ways to hedge these macroeconomic risks.

COMPETITIVE ANALYSIS

PORTER'S FIVE FORCES ANALYSIS CHART



In this section, we use Porter's Five Forces to conduct an industry and competition analysis for Sony. We discover that Sony faces high internal rivalry, high buyer power, low supplier power, and high threat from substitutes. The electronics and game industry has high barriers to entry.

INTERNAL RIVALRY:

Sony operates in several industries, and thus faces intense competition across sectors. Sony's main market segments include Electronics, Game, Pictures, Financial Services and Joint Ventures. [17]While no other business deals with all five segments, the most prevalent competitors in these industries are Apple, Samsung, Canon, Microsoft and LG Electronics. The table below shows the income statistics for these major competitors.

Income Statistics of Sony's Competitors

Apple Inc. (AAPL)					
USD in millions	2007-09	2008-09	2009-09	2010-09	2011-09
Revenue	24006	32479	42905	65225	108249
Gross profit	8154	11145	17222	25684	43818
Net income	3496	4834	8235	14013	25922
Earnings Per Share	4.04	5.48	9.22	15.41	28.05

Samsung Electronics Co Ltd (SMSD)					
USD in millions	2006-12	2007-12	2008-12	2009-12	2010-12
Revenue	92467	104433	95887	116465	138137
Gross profit	92467	104433	95887	116465	138137
Net income	8539	7867	4368	8177	14114

Canon Inc. ADR (CAJ)					
JPY in millions	2006-12	2007-12	2008-12	2009-12	2010-12
Revenue	4160535	4494183	4082876	3209201	3706901
Gross profit	2062335	2253403	1932658	1427393	1783088
Net income	455768	489759	308301	131647	246603
Earnings Per Share	341.95	377.59	246.21	106.64	199.71

Microsoft Corporation (MSFT)					
USD in millions	2007-06	2008-06	2009-06	2010-06	2011-06
Revenue	51122	60420	58437	62484	69943
Gross profit	40429	48822	46282	50089	54366
Net income	14065	17681	14569	18760	23150
Earnings Per Share	1.44	1.9	1.63	2.13	2.73

LG Electronics Inc (XLON:LGLD)					
USD in millions	2006-12	2007-12	2008-12	2009-12	2010-12
Revenue		56640	50025	47407	49807

Gross profit	56640	50025	47407	49807
Net income	1303	347	1745	978

Data Source: Morningstar

Among Sony's major competitors, American firms, Apple and Microsoft, demonstrated stronger financial results over past five years. Apple Inc.'s profitability growth was almost not affected by the recent economic crisis at all. Asian firms, on the other hand, were obviously affected by the economic crisis. Samsung, Canon, and LG show decreased revenue and profit in 2008 and/or 2009. They, however, recovered at different paces. Samsung's profitability bounced back very quickly after the crisis, and their net income reached the peak level in Fiscal Year 2010. LG and Canon, however, showed slow recovery.

Sony's operating results were adversely affected by their ample competitors. A competitive breakdown of Sony's segments illustrates this woe:

ELECTRONICS:

Within the Electronics segment, Sony has lost much of their market share in the audio division. MP3 players and iPods have replaced Sony's Walkman, as detailed further in the substitutes section below. At the same time, however, Sony BMG remains one of the top four recording groups along with Universal Music Group, EMI Group and Warner Music Group.

Sony competes in the video business through digital camera and DVD player sales. Until 2006, Sony focused their camera sales on the consumer market but then shifted into the professional market as well, debuting Blu-ray technology. Blu-ray competes directly with HD-DVD technology, but while Blu-ray offers a crisper picture and more storage capacity, the technology is also almost twice as expensive as HD-DVD technology.

Television is a key component of Sony Electronics. The TV industry consists of sales of flat screen and high-definition LCD TV's. Sony leads the market with their Bravia line of LCD televisions. Sony holds a competitive cost advantage over others in the rest of the television market. Through The S-LCD Corporation, a joint venture with Samsung, Sony receives LCD panels at manufacturing cost.

Within information and communication, Sony's VAIO line of laptops represents 5% of the market, and sales numbers surpass the industry average, likely due to the growing popularity of Microsoft's Windows 7 operating system.

Games:

While Sony's PlayStation 2 has a record-breaking installment of over 120 million units, their newer gaming product sales have lagged behind expectations. The problem lies in cost. Sony's PlayStation 3, though offering superior graphics and more computational power than competitive gaming devices, cost twice as much for its debut. As such, Nintendo has witnessed faster sales than Sony's PlayStation 3.

Pictures:

Sony faces several competitors including 20th Century Fox, Buena Vista, Paramount, Universal Studios and Warner Brothers. As successful movies are often hard to predict beforehand, it is difficult to assess Sony's place in the industry, though Sony's hits include Capote, Crouching Tiger Hidden Dragon, Spiderman and The Da Vinci Code.

Segment analysis indicates that Sony will suffer a loss in market share and profit as the competitive landscape intensifies. There are no indications that the competitive landscape will weaken in the near future, as the demand for new, innovative products remains high. With the market not yet saturated due to their ever-evolving product lines, Sony needs to focus on technological innovation and product differentiation to stand apart from rivals. Sony must also look for ways to cut costs, such as what they have done in their television division through S-LCD Corporation, in order to gain a broader customer base. Forming joint ventures is a smart way to deter the intensity of internal rivalry. Sony must also continue to develop superior technology at low costs that keeps pace with evolving consumer taste preferences. With the short product cycles facing Sony, the company has no choice but to anticipate price decreases in the industry while reducing manufacturing costs. Sony has created or marketed groundbreaking products in the past, such as the Walkman or Blu-ray, but the company needs to continue to innovate aggressively now, and do so at a lower cost.

Another setback for Sony is their lack of consumer brand loyalty compared to other competitors like Apple. Sony has a diverse product line, but consumers do not buy uniformly Sony across segments. Instead, they pick which Sony product is superior, cheaper or cooler at that time.

The economic crises of recent years have influenced consumer behavior, as people have less money to spend on high-end, nonessential goods. Yet, as people regain their spending habits, Sony has potential to regain market share if they are able to produce products with superior technology at lower costs.

Entry

Entry divides the market demand amongst more sellers and decreases each company's share. Fortunately for Sony, the threat of new entrants is relatively low. Economies of scale, product differentiation, capital requirements, technology knowledge and government policy all play a role in protecting Sony from new entrants. Economies of scale indicate that companies can decrease costs when increasing output, which new entrants cannot accomplish without years of experience. Sony, on the other hand, has already gained this advantage. Capital requirements to enter are high, as these products are high-end, expensive luxury goods. Again, Sony has already raised the capital required to innovate. Those entering Sony's industries need a complex set of technological skills. Sony's team of experts has acquired this knowledge through years of production and innovation. Finally, patent protection and government regulation keeps the threat of new entrants low. If new entrants were to make it, Sony's share of the market would certainly drop, especially because the company does not possess the customer loyalty needed to ensure consumers continue to buy Sony products in the face of new competition.

Substitutes and Complements

Sony targets high-end customers with their high-priced product line. Though Sony tries to differentiate their products through unique designs and superior technology, in reality their products face many substitutes.

As mentioned above, there are many substitutable products for Sony's line, and several of these competitors offer items at a lower cost. While Sony may try to differentiate themselves with high quality graphics and technology, a consumer sees the price tag first and perhaps will not spend twice as much for a Blu-ray over a DVD or a

Walkman over an iPod. The price elasticity of demand is high, as increases in price of a Sony product will lead to consumers switching to close substitutes. Price elasticity is also high because Sony does not experience the same brand loyalty as some of their competitors, such as Apple.

Supplier Power

Supplier power is relatively low. Sony manufactures their products in myriad places around the world; this global supply chain means suppliers are not concentrated, and Sony can move around to the supplier who will offer the best deal; suppliers are forced to cut prices or find a new buyer.

Sony aims to choose parts and materials from various suppliers to produce with "high quality, competitive prices, and a stable supply".[18] As such, Sony's basic philosophy of supply chain management focuses on "fair business practice, transparency and equal opportunity"; collaborative relationships with suppliers; and maintaining a green supply chain. In choosing suppliers, Sony looks to maintain sound financial and operating bases, develop new technologies to supply new and exciting products to customers, keeping prices low, utilizing e-commerce and retaining a competitive edge. On the software side, Sony takes software security violations seriously and does everything possible to prevent security vulnerabilities from occurring in their software.

As mentioned above, Sony partakes in a joint venture with Samsung in order to keep input costs to a minimum for their television segment. This arrangement gives Sony bargaining power to keep input prices low, and due to their global supply chain, Sony can bargain with supplier to ensure the best price.

Buyer Power

Buyers in these industries have substantial power. A potential buyer's ability to gain information is very easy with online reviews of products. With this information, a buyer can switch from one brand to another without high switching or transaction costs. Especially if consumers buy online, which is becoming increasingly popular, transaction costs practically drop to zero. While the size of each individual order may not be substantial, price sensitivity is high, as buyers have the ability to influence companies by choosing a better-priced substitute. Sony tries to separate their product with better technology and graphics, but in general, products in these industries are fairly undifferentiated. This difficulty in differentiation leaves price elasticity high and buyer power high. [19]

Further, Sony sells across the globe, and therefore exchange rates become an important factor in analyzing buyer power. The appreciating Yen causes prices to increase for Sony, which does much of their business abroad and therefore experiences reduced profits.

SWOT Analysis

Strengths:	Weaknesses:
♦ **Mature Value Chain** ♦ **Good Brand Name** ♦ **Intellectual Properties Holdings**	♦ **Weak Financials** ♦ **Lack of Focus** ♦ **Conservative Management**
Opportunities:	**Threats:**
♦ **New CEO** ♦ **Economic Recovery** ♦ **Industry Integration**	♦ **Competition** ♦ **Macroeconomic Factors** ♦ **Partnerships**

Strengths:

- Sony has established a mature supplier management system.[20]
  - They select suppliers that comply with laws, maintain solid financials, innovate technologically, protect the environment, offer competitive prices and control component qualities.
  - They emphasize on the frequent exchange of information with suppliers via E-commerce throughout the standardized procurement process.
- The company has established a broad sales network, registered in approximately 200 countries and territories.[21]
- Sony provides good after-sales service.[22]
  - Almost all of Sony's consumer-use products carry a warranty.
  - The company maintains support contracts with customers in addition to warranties.

- They also maintain customer information centers in their principal markets.

- Sony has a strong brand name. Their products are generally considered to have high quality and good design.[ii]
- Sony has a number of Japanese and foreign patents, and is licensed to use a number of patents owned by others. Sony considers their overall license position beneficial to their operations. [23]

WEAKNESSES:

- Sony operates numerous product lines that serve too many parts of the entertainment value chain. They serve as a content provider, content aggregator, broadcaster, hardware producer, and manufacturer of "value-added products"[iii]. The "empire-building" strategy not only caused the company's innovation and operation to slow down, but also impaired their competitiveness in any of the market segments they are engaged in. Further, the product lines have few connections among themselves, and therefore do not generate many network externalities or cost advantages.
- The current financial results are weak, showing high liquidity risks, decreasing sales, slowly recovering profitability, low operating efficiency, underperforming stocks, and low investor confidence.
- The current management team has been relatively conservative. While restructuring has frequently been implemented, it was usually done on a small scale. Strategically significant mergers and acquisitions were seldom conducted.
- As Sony expanded into more segments and geographic locations, they became more sensitive to exchange rates and interest rates that are exogenous factors out of Sony's control.

OPPORTUNITIES

- Kazuo Hirai, appointed CEO of Sony in February 2012, might bring changes to the company. His expertise in computer entertainment and PlayStation might bring more focus to the firm's product lines[24].
- Since Sony's operating results are very sensitive to economic and employment

[ii] See appendix 3 for information regarding Sony's reputation.
[iii] These products include games, Mobile TV, interactive TV, VOD, etc.

conditions, the business is likely to benefit from a recovery from the recent economic crisis.

- Sony's stock price is possibly undervalued after its decline by more than 50% in 2011, which might attract more equity investments in the firm in the near future. [iv]
- The significant competition from Apple and Google could result in more integration within the electronics and software industry. Sony may take this opportunity to acquire more aggressively in order to drive down their manufacturing and intellectual property costs.

THREATS:

- The Great East Japan Earthquake and its aftermath may continue to adversely affect Sony's operating results and financial condition by[25]:
  - incurring excessive restoration costs that exceed their insurance policies.
  - causing energy supply shortages that may lead to a reduction or suspension of production.
  - product quality degradation caused by using replacement components
  - reducing overall demand by consumers and businesses.
- Sony must overcome increasingly intense competition from firms that may be more specialized or have greater resources.
- Foreign exchange rate fluctuations can affect financial results because a large portion of Sony's sales and assets (more than 75%) are denominated in currencies other than the Yen.[v]
- Sony's business restructuring and transformation efforts are costly and may not attain their objectives.
- Increased reliance on external business partners may increase the possibility that:
  - Sony may incorporate defective or inferior third party components or software.
  - Third party components may be subject to copyright or patent infringement claims.
  - Sony's operations may be affected if the external partners are subject to business or service interruption caused by accidents or bankruptcies.

[iv] While it is difficult to argue Sony's stock price is undervalued, we do believe most investors considered a 50% drop of price to be dramatic.

[v] See appendix 1 for more information on exchange rate.

- When raw materials, parts and components become scarce, the cost of production rises.

Strategic Recommendations

Based on our analysis, the most significant challenges for Sony are competition and macro-risks, including currency, disaster, and economic downturn. In this section, we propose four strategic recommendations for Sony. The first two aim to develop Sony's competitive advantage. The third recommendation tries to maintain Sony's reputation and control lawsuit damages. The last recommendation targets at the macro-risks mentioned above.

Finding a Segment Focus

Since their foundation in 1946 as a telecommunication company, Sony has successfully expanded into various business segments, including Electronics, Game, Pictures, Music, and Financial Services. While the variety of segments has increased Sony's recognition and diversified their product lines, it has also scattered Sony's resources, such as R&D, marketing, and customer service into unrelated areas. Facing highly specialized competitors within each segment, Sony has not been able to establish their competitive advantage in any segment. Therefore, we propose that Sony find a segment focus and restructure the company around the focused segment.

Sony will benefit from this restructuring because it allows the company to apply most of their resources in the most productive segment. The least profitable segments will either be shut down or integrated into the main segment. The restructuring will also propel the company to develop a proprietary product collection, or rather, an exclusive group of Sony hardware and software products that are to be used together, much like the current Apple products. The main segment will be the centerpiece of that collection. Sony will then have an advantage over their competitors because no other firms have comparable experience in the variety of segments in which Sony currently operates. Moreover, the restructuring will be a strong signal to the market, hopefully reversing the current downward trend in consumer and investor confidence.

The focused segment should have the certain features. It has to be currently one of the main segments, namely either the Consumer, Professional & Devices segment or the Networked Products & Services segment. It should also have the potential to integrate most of the remaining segments so that Sony can leverage most of their current resources. Competition should be moderate in this market segment. Lastly, Sony should already have a relatively big market share in this segment so that their subsequent strategies can be implemented more easily.

CASE STUDY: HIRAI'S REVIVAL PLAN

"Sony's chief executive, Kazuo Hirai, detailed on Thursday a revival plan that included a shift away from the company's unprofitable television business and a plan to cut 10,000 jobs. 'The time for Sony to change is now,' Mr. Hirai said during a news conference, his first since he succeeded Howard Stringer as chief. 'Sony will change.'"

- *By Hiroko Tabuchi and Bettina Wassener, The New York Times, April 12, 2012*[26]

Mr. Hirai's recent restructuring plans coincide with our recommendation. Specifically, Mr. Hirai said he would concentrate on three businesses: mobile devices, including smartphones and tablets; cameras and camcorders; and games.

Based on the criteria we propose before, mobile devices is a desirable segment to focus on. In 2011, a series of Sony Ericsson smartphones are launched with the Xperia brand. They operate on Android, a platform that is gaining more and more platform market share. The Xperia smartphones can be integrated with Sony tablets, personal computers and game consoles. The integration will likely bring cost advantages and boost market demand for Sony products. The only concern is the ample competition in the smartphones and tablets markets.

Games is another desirable segment to focus on. As one of Sony's main segments with competitive market share, the Games business can create synergies among Sony's product lines. For example, Sony intends to expand its PlayStation game network to offer music and video, replacing the disjointed lineup of content delivery platforms it now operates. Competition in the games market is also not as intense as in the other market segments.

While Mr. Hirai gave bold goals for Sony's digital imaging business, which includes digital cameras and camcorders, we do not recommend that Sony focus on digital imaging. Within this segment, Sony is not only facing intense competition from Canon, Nikon, and Olympus, but is also facing threats from substitutes such as tablet computers equipped with advanced digital imaging functions. It would also be very difficult to integrate the remaining Sony businesses with digital imaging.

Lastly, we agree that it is a wise decision to shrink the TV business. The fierce competition from Samsung and LG, the lack of synergy potentials, and the relatively low market share (9% vs. 20% for Samsung in 2011[27]) have made it extremely difficult for Sony to maintain its competitive advantage.

Acquiring Aggressively

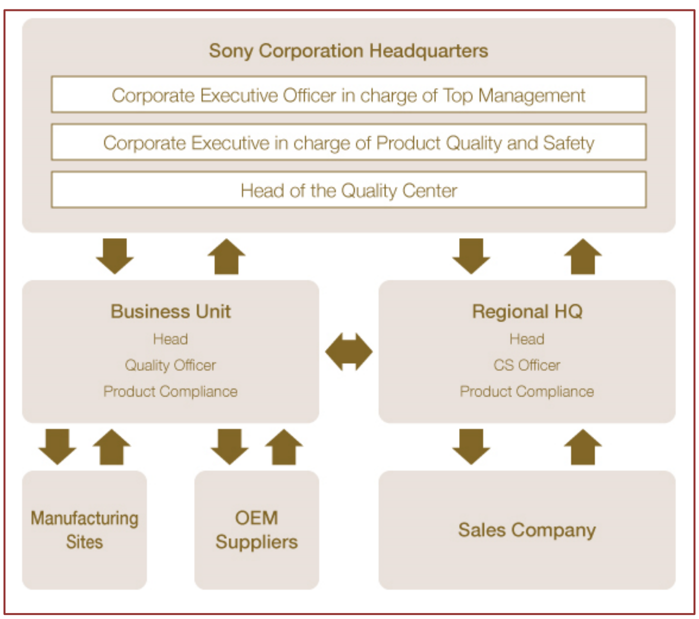
Once Sony has established a segment focus, they should start to acquire aggressively within that segment. Acquisitions will allow Sony to gain market share, to have economies of scale, reduce manufacturing costs, and have access to new technologies and patents. A higher market share would provide Sony with higher pricing power; economies of scale would raise productivity; reduced manufacturing cost would benefit Sony in a price competition; technologies and patents would enable Sony to accelerate their innovation progress, which would otherwise slow down. Given Sony's current financials, Sony should start by acquiring smaller companies within the focused market segment, and try not to overpay premiums for the expected synergies.

Refining Quality Control

One of Sony's strengths is their brand name. Consumers generally believe Sony products are reliable and have good quality. However, Sony's product quality has been questioned over the past few years. For example, in 2010, Sony announced that around 535,000 of their VAIO laptops might be in danger of overheating after discovering a temperature gauge error. In 2006, Sony had to announce a recall of eight models of Sony digital cameras due to "problems with the image pick-up", shortly after their multiple delays in launching PlayStation3. Quality problems would not only cost lawsuit expenses, but would also severely damage the corporate image.

While Sony has paid more attention to quality control after the above incidents, we predict that they would face more quality control challenges as they increasingly rely on external business partners. Furthermore, if they start to acquire aggressively in the near future as we suggested, quality control would become even more difficult. Sony refined their quality control system in 2011. The current centralized quality control authority is shown in the graph below. Although Sony has already made significant improvement for the system, we would suggest a more decentralized monitoring and evaluation mechanism at each stage of the manufacturing process. Since almost all the quality problems so far were caused by small components, it would be more effective to distribute most of the effort to the "component level". A more decentralized system would be beneficial because it allows more specialized scrutiny of the components. The quality of the assembling process should also be controlled, but it should not take the attention away from the components. A decentralized system also made it easier to track the problem in the case of a callback.

SONY'S CURRENT QUALITY CONTROL SYSTEM[28]



Hedging Macroeconomic Risks

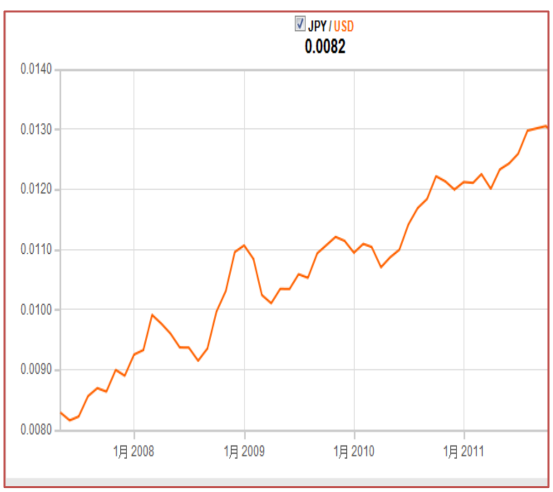
As we have discussed above, Sony's international presence has increased their sensitivity to exchange rates and local economies. While Sony does not have direct control over those factors, they might be able to utilize their Financial Services segment to reduce the risk exposure. Sony can implement this strategy either by entering in derivatives contracts, such as currency swaps and interest rate swaps, or simply by taking short positions in certain securities as long as these practices comply with laws and regulation. The difficult part is "goal congruence", that is, to align the division manager's incentives with the overall firm, since such hedging measures may affect the profitability of the Financial Services division.

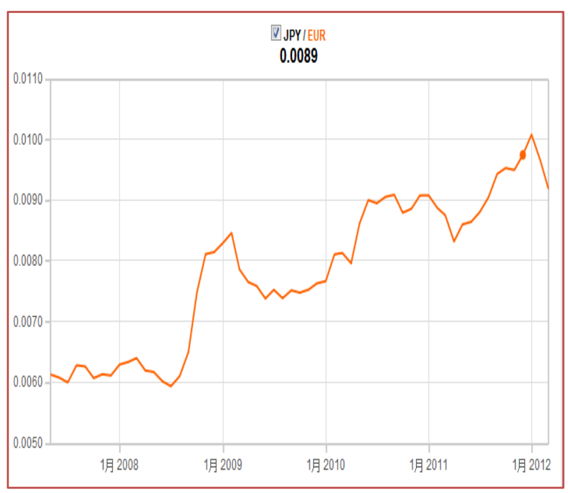
Appendix

The appendix section contains evidence of some our arguments in the report and conveys information that we believe might be useful to the reader.

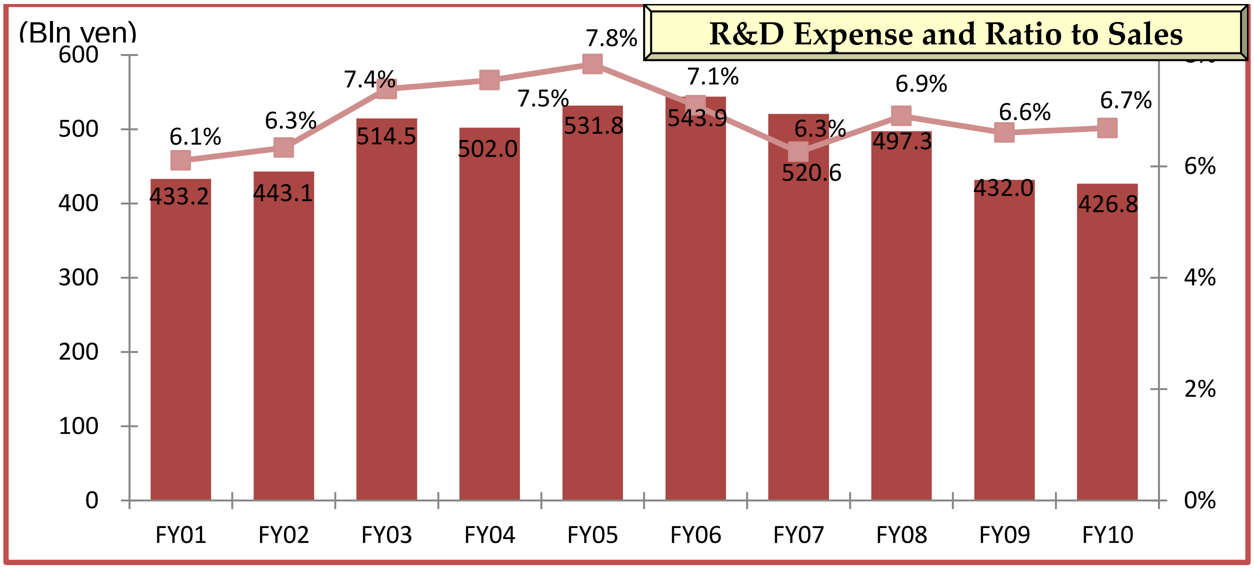
1. The following charts show the appreciation of the Japanese Yen (JPY) with respect to the US Dollar (USD) and the Euro (EUR) in the past few years.

Exchange Rates Charts





2. The following chart displays Sony's R&D expense.[29]



3. The following chart is a ranking of "the most visible companies" based on reputation. Sony and their competitors are highlighted. [30]

The 2012 RQ®
The Reputations of the Most Visible Companies

Rank 1-15	RQ	Rank 16-30	RQ	Rank 31-45	RQ	Rank 46-60	RQ
1 Apple	85.62	16 Kohl's	77.95	31 Toyota Motor Corporation	73.53	46 Chevron*	64.72
2 Google	82.82	17 PepsiCo	77.78	32 Hewlett-Packard	73.41	47 Sears*	64.26
3 The Coca-Cola Company	81.99	18 General Mills	77.39	33 Starbucks	72.97	48 Time Warner	63.38
4 amazon.com	81.92	19 Costco	76.72	34 Best Buy	72.68	49 T-Mobile*	62.82
5 Kraft Foods	81.62	20 Nike	75.95	35 General Electric	72.6	50 Chrysler	60.3
6 The Walt Disney Company	81.28	21 USAA*	75.55	36 Dell	72.59	51 ExxonMobil	60.01
7 Johnson & Johnson	80.45	22 Lowe's*	75.39	37 Walgreens*	72.1	52 Wells Fargo & Co.	59.5
8 Whole Foods Market	80.14	23 IBM	75.11	38 McDonald's	71.77	53 Comcast	59.1
9 Microsoft	79.87	24 Berkshire Hathaway	75.02	39 JCPenney	71.23	54 News Corp*	57.14
10 UPS	79.75	25 Ford Motor Company	74.83	40 Verizon Communications	71.16	55 Citigroup	55.95
11 Sony	79.22	26 Southwest Airlines	74.6	41 Walmart	69.25	56 JPMorgan Chase	54.84
12 Honda Motor Company	78.95	27 Target	74.26	42 Netflix*	68.12	57 BP	53.5
13 Samsung*	78.11	28 Boeing*	74.04	43 Sprint Nextel	65.9	58 Bank of America	49.85
14 Home Depot	78.11	29 Hyundai*	73.92	44 General Motors	65.31	59 Goldman Sachs	47.57
15 Procter & Gamble Co.	78.09	30 Macy's*	73.63	45 AT&T	65.09	60 AIG	46.18

* New to 2012 RQ Study and/or not measured in the 2011 RQ

4. The following table summarizes the units of Sony's key products sold:[31]

Sony's Key Products Sold

Hardware:

In Million Units	01	02	03	04	05	06	07	08	09	10
PlayStation 3	-	-	-	-	-	3.5	9.1	10.1	13.0	14.3
PSP	-	-	-	3.0	14.1	9.6	13.8	14.1	9.9	8.0
PlayStation 2	18.1	22.5	20.1	16.2	16.2	14.8	13.7	7.9	7.3	6.4
Software										
PlayStation 3	-	-	-	-	-	13.3	57.9	104	116	148
PSP	-	-	-	5.9	41.7	54.7	55.5	50.3	44.4	46.6
PlayStation 2	121.8	189.9	222.0	252.0	223.0	193.5	154.0	83.5	35.7	16.4

In Million Units	01	02	03	04	05	06	07	08	09	10
LCD TVs	-	-	0.4	1.0	2.8	6.3	10.6	15.2	15.6	22.4
Video Cameras	5.4	5.8	6.6	7.4	7.6	7.5	7.7	6.2	5.3	5.2
Compact Digital Cameras	3.4	5.6	10.0	14.0	13.5	17.0	23.5	22.0	21.0	24.0
Blu-ray Disc Recorders	-	-	-	-	-	-	-	0.5	0.7	1.0
Blu-ray Disc Players	-	-	-	-	-	-	-	2.2	3.3	4.6
DVD Players*	5.0	7.0	8.5	9.3	8.0	7.9	8.5	9.7	11.5	10.0
PCs	3.5	3.1	3.2	3.3	3.7	4.0	5.2	5.8	6.8	8.7
Digital Music Players	-	-	-	0.9	4.5	4.5	5.8	7.0	8.0	8.4

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