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Martin Gosman, Zach Idinopulos, Sophia Lindus & Michael Manieri

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WESLEYAN
UNIVERSITY

Department of Economics
Public Affairs Center
238 Church Street
Middletown, CT 06459-007

Tel: (860) 685-2340
Fax: (860) 685-2301
http://www.wesleyan.edu/econ

When First Impressions of Financial Data Mislead
A Working Paper – March 2026

Prof. Martin Gosman, Zach Idinopulos, Sophia Lindus, and Michael Manieri
Wesleyan University

ABSTRACT

At times, the data presented in firms' audited financial statements can seem puzzling. This article describes instances in which the reported figures could leave the firm's stakeholders with a first impression that the data must be in error, as they are difficult to believe or even counterintuitive. As student detectives address the discussion questions provided, they encounter the discretion provided to firms in designating quarterly-reporting periods, computing gross-profit percentages, and influencing the gains and losses reported on disposal of depreciable assets. In addition, their learn that sizable differences between a firm's current and quick ratios and spectacular returns on stockholders' equity might not signify what usually is implied when they are encountered by stakeholders. Other situations addressed include a firm with huge gross profits that nevertheless felt it necessary to liquidate, a retailer of discretionary goods that somehow fared much better than a service firm during an economic meltdown, and a firm reporting different amounts for its account changes depending on which financial statement one looks at. A teaching note provides suggested answers to the discussion questions, learning takeaways, and follow-up discussion points for instructors.

Keywords:

INTRODUCTION

It's been said that you only have one chance to make a first impression. As is true for individuals, financial data reported by firms also make a first impression. Fortunately though, when first impressions of financial data seem counter intuitive and difficult to understand, they can more often than not be explained upon further inspection. The following mysteries are to be considered and resolved here:

1. Of two electronics retailers, why was it the successful one that appeared to have excessive inventory and greater difficulty paying its suppliers?
2. Why did a firm with low inventories and huge gross profits find it necessary to liquidate?
3. During an economic meltdown, why did operating cash disappear for a service firm yet greatly accelerate for a retailer of discretionary consumer goods?
4. Why did Quarter 1 appear to be the busiest period for a firm whose sales actually peaked during Quarter 4?
5. How did two firms selling similar merchandise at similar price points report very different gross-profit percentages?
6. Why did one firm report a gain and the other a loss when they paid identical amounts for equipment and received identical amounts upon the disposals of those assets?
7. How did a manufacturer of personal care products seemingly achieve returns on stockholders' equity ranging from 3% to 39% *per week*?
8. Why did the year's changes reported in key operating accounts differ depending on which of the firm's financial statement one examined?

THE PUZZLING FINANCIAL DATA

1. Which Firm Remained in Business?

The information presented in Table 1 comes from the Fiscal 2023 10-Ks of two electronics retailers. The focus is on 2023 because that was the year that one of the firms filed its last 10-K, prior to closing all of its stores in 2024.

Table 1: Financial Data for Two Electronics Retailers

Financial Data	Firm 1	Firm 2
For Fiscal 2023		
Days' Purchases in Accounts Payable	43 days	56 days

At the End of Fiscal 2023		
Accounts Receivable as % of Current Assets	57%	12%
Current Ratio	2.58 times	1.00 times
Quick Ratio	1.73 times	0.30 times
Falloff from Current to Quick Ratio	33%	70%

First Impression – After examining Table 1, you're fairly certain that it is Firm 1 that remained in business. You reason that the more successful firm would

- be able to pay off its suppliers almost two weeks earlier than its weaker competitor.
- have a smaller falloff from its current ratio to its quick ratio, often suggestive of a firm that had its inventory level under control.

Discussion Questions:

1. Should taking a shorter (longer) time to pay suppliers always be viewed as a sign of financial strength (weakness)? Explain.
2. Explain how the receivables data for Firm 1 in Table 1 could have kept the falloff from the current to quick ratio relatively small even if the firm had had difficulty selling its inventory.
3. Suggest a financial measure that would likely prove superior to the current and quick ratios in gauging a firm's ability to meet its current obligations

2. Why Did They Cease Operations?

The financial data shown in Table 2 came from every 10-Ks filed by a retailer that went bankrupt and closed all of its stores in 2014. It had been in business since 2003, but did not go public until 2011.

Table 2: Financial Data for A Financially Challenged Retailer

Financial Data	2011	2012	2013
Change in Sales Revenue vs. Prior Year	+28%	+8%	+10%
Gross Profit (Margin) Percentage	57.5%	55.7%	54.0%
Days' Sales in Inventory	8 days	10 days	8 days

First Impression -- The data in Table 2 do not trend the way one would expect for a firm that would soon wind up filing for bankruptcy and liquidating soon thereafter. . Consider the following plusses for the business:

- Although, sales revenue rose the most in the year of the IPO, they keep increasing every year.
- Most business can only dream of a gross profit percentage in excess of 50%, and yet this firm comfortably surpassed that mark in all three years.
- Inventory turned over in ten days or less in all three years.

Discussion Questions:

1. Suggest one (or several) lines of retail that normally could *simultaneously* achieve such a high gross profit percentage and such a low days' sales in inventory?
2. Under what circumstances would a firm with a gross profit percentage in excess of 50% find itself unprofitable and unable to continue in business? Explain.

3. What Caused Such Dramatic Changes in Two Firms' Sources and Uses of Cash?

The cash-flow information presented in Table 3 is from 10-Ks filed by two firms for the same two consecutive years (called X and X+1 here) that occurred sometime during the 2015-2025 period. One firm provides a service while the other is a retailer of discretionary consumer goods. After it had increased by 2.8% in Year X, Global GDP had declined by 3.0% during Year X+1, amounting to the largest downturn in the world economy since the Great Depression (Gagnon, Kamin, and Kearns, 2023).

Table 3: Cash-Flow Data for Two Firms

Company	Year	Operating Activities	Financing Activities
Service Firm	X	$8,425,000,000 Cash Provided	$2,880,000,000 Cash Used
	X+1	$3,793,000,000 Cash Used	$19,356,000,000 Cash Provided
Retailer	X	$196,818,000 Cash Used	$786,504,000 Cash Provided
	X+1	$1,416,731,000 Cash Provided	$352,588,000 Cash Provided

First Impression --The data in Table 3 seem to be the reverse of what one might expect:

- During challenging economic times, as was the case in Year X+1, discretionary product purchases can decline sharply, while many services are viewed as essential and continue to be in demand.

- But as shown in Table 3, the organization providing services saw its operating activities *use* $3.7 billions of cash in X+1, $12.2 billion less favorable than the $8.4 billion of cash *provided* during the preceding year.

- On the other hand, the retailer of discretionary consumer goods saw its operating activities *provide* $1.4 billion of cash in X+1, $1.6 billion more favorable than the $200 million of cash *used* during the preceding year.

Discussion Questions:

1. What event occurred at some point during the 2015-2025 period that caused such a large decline in Global GDP?

2. Suggest one (or several) service firms whose cash from operations would inevitably have been adversely affected by the event you cited in (1).

3. Suggest one (or several) retailers of discretionary consumer goods whose cash from operations would very likely have been favorably affected by the event you cited in (1).

4. Was That Really the Quarterly Distribution of Yearly Sales?

Panera Bread operated 877 bakery-cafes at the end of 2005. Its restaurants were usually sited near malls and other major shopping areas, locations that attract the largest number of shoppers between Thanksgiving and Christmas.

In its audited financial statements for 2005, Panera Bread presented the quarterly sales distribution shown in the left-most columns of Table 4. Also shown in Table 4 is the quarterly sales distribution *for that same year* that appeared in the firm's 2006 audited financial statements. Data for 2005 were presented in 2006 because firms were required to display two years' information to facilitate year-to-year comparisons.

Table 4: Two Different Quarterly Sales Distribution for Panera Bread for 2005

	Reported in	**2005 10-K**		**Reported in**	**2006 10-K**
Period	Sales Revenue	% of 2005 Sales	Period	Sales Revenue	% of 2005 Sales
Year Beginning 1/1			Year Beginning 1/1		
Quarter 1	$178,148,000	28%	Quarter 1	$144,137,000	22%
Quarter 2	$140,172,000	22%	Quarter 2	$151,908,000	24%

Quarter 3	$148,626,000	23%	Quarter 3	$158,072,000	25%
Quarter 4	$173,329,000	27%	Quarter 4	$186,158,000	29%
Year Ending 12/31	$640,275,000	100%	Year Ending 12/31	$640,275,000	100%

First Impression --The quarterly sales distributions shown for 2005 are puzzling for a number of reasons:

- Panera seems to be unsure as to how many sales occurred within each quarter of 2005.
- Given where Panera's are located, the reported sales shown in the 2005 10-K seem surprisingly high for Quarter 1 and unrealistically low for Quarter 4.

Discussion Questions:

1. What could Panera have done originally in 2005 to make it appear as if Quarter 1 was its busiest sales period, when in all likelihood it had to be Quarter 4?
2. What challenges might the reporting you cited in (1) present to an analyst who focuses on the relative performance of firms within the restaurant business?
3. Assuming the reporting pattern you cited in (1) is an acceptable practice, how could any possible confusion among financial statement users be lessened?

5. A Perfect Merger?

The information presented in Table 5 comes from the 2024 10-Ks of two department stores that compete across the U.S. They target (pun intended?) the same customer base and sell products at similar piece points.

Table 5: Financial Data for Two Off-Price Retailers

Financial Data – As % of Sales Revenue	Kohl's	Target
Sales Revenue	100.0%	100.0%
Cost of Sales	62.8%	71.8%
Operating Expenses	34.5%	20.6%
Left After All Operating Costs	2.7%	7.6%

First Impression: -- The data in Table 5 might seem to suggest that considerable economies could occur if these two retailers were to merge, because:

- Kohl's cost of sales percentage was much lower than that of Target's.
- Target's operating expenses percentage was much lower than that of Kohl's.
- By leveraging each firm's apparent expertise at cost control, it might seem that the combined firm could have 16.6% of sales revenue left after all operating costs (100% - 62.8% - 20.6%).

Discussion Questions:

1. Assume you have learned that these retailers used discretion in how they classified their distribution-center costs. Indicate where you believe each firm included those costs on its income statement.
2. Is 16.6% a realistic left-over figure for the potentially merged firm ? If not, what is a more likely percentage? Explain.
3. In light of the discretion given to firms, what could (or should) they do to reduce the potential confusion among financial-statements users and better serve their needs?

6. Who Should Pay for Lunch?

Early in 2026, the CEOs of Fast Corporation and Slow Corporation met for lunch. Two years earlier, on January 1, 2024, Fast Corporation and Slow Corporation each purchased an identical piece of equipment for $24,000. Both firm used straight-line depreciation for financial-reporting purposes and estimated that there would be no residual value at the end of the equipment's estimated useful life. Income statement effects from the firms' use and disposal of the equipment (two years after purchase) are shown in Table 6.

Table 6: Income Statement Effects from Equipment Purchase and Early Disposal of Equipment

	Fast Corporation	Slow Corporation
2024 Depreciation Expense	$4,000	$3,000
2025 Depreciation Expense	$4,000	$3,000
Date of Equipment Sale	12/31/25	12/31/25
Sale Price	$16,500	$16,500
Accounting Gain or Loss	$500 Gain ($16,500 - $16,000 BV*)	$1,500 Loss ($16,500 - $18,000 BV*)

* Book Value = Cost – Accumulated Depreciation

First Impression --The data in Table 6 might seem to suggest that Fast's CEO should pick up the check for lunch:

- Fast Corporation recorded an accounting gain of $500 on the equipment sale.
- On the other hand, Slow Corporation recorded a $1,500 accounting loss on the sale.
- Slow's CEO might believe that "Fast's CEO made out better economically on the sale and therefore can afford to be magnanimous and pay for lunch."

Discussion Questions:

1. In what sense were Fast's and Slow's approaches to depreciation reflective of their names?
2. What was the *net effect* on income over the 2024-2025 period from the purchase and sale of the equipment for Fast Corporation? for Slow Corporation? Show calculations.
3. Did Fast Corporation "make out better economically on the equipment sale"? Explain.
4. Who should pay for lunch?

7. How Did Its Returns on Stockholders' Equity Get So High?

Colgate-Palmolive, a manufacturer of personal care products, has regularly been included among those Fortune 500 companies earning the highest returns on stockholders' equity (ROSE). The information presented in Table 7 is from Colgate-Palmolive's 10-Ks and annual issues of the *Fortune 500*.

Table 7: Colgate-Palmolive's Returns on Stockholders' Equity

Year	Ending Retained Earnings		Return on Stockholders' Equity	ROSE Rank Among *F500* Firms		Median ROSE for *F500* Firms
2024	$26.1 billion		1,363%	1st		14.2%
2023	$25.3 billion		378%	3rd		15.3%
2022	$24.6 billion		445%	4th		17.4%
2021	$24.4 billion		356%	2nd		17.5%
2020	$23.7 billion		363%	10th		10.6%
2019	$22.5 billion		2,023%	1st		13.2%
2015-2018	$18.9 - $21.6 billion		*	*		12.9% - 14.5%
2014	$18.8 billion		190%	8th		14.2%

* Could Not Be Calculated for 2015-2018

First Impression --The data in Table 7 could make one wary of the calculations made by Fortune:

- It's hard to believe that the firm achieving the highest ROSE among the *F500* on two different occasions was a company that operates in such competitive categories as soap, dishwashing liquid, toothpaste and toothpaste.

- In 2019 and 2024, the firm's ROSE of 2,023% and 1,363% were, respectively, 153 and 96 times greater than the 13.2% and 14.2% medians for all F500 firms.

- Even if one focuses on the lowest annual ROSE shown in Table 7, the 190% still equates to a return of over 3% *per week*. And a return on 2,023% works out to 39% *per week!*

Discussion Questions:

1. What situation would have made it impossible to calculate a return on stockholders' equity for Colgate-Palmolive over the 2015-2018 period?

2. During 2014 and from 2019-2024, was Colgate's stockholders' equity more likely to have been very low, somewhat low, neither high nor low, somewhat high, or very high? Explain.

3. Was the stockholders' equity size you described in (2) likely the result of the firm lacking sufficient profitability? If not, what might have been the cause?

4. Explain how this exercise shows that a focus on the return on stockholders' equity could send a much too optimistic signal to a firm's present and future stakeholders.

8. Why Are There Multiple Amounts for the Accounts Receivable and Inventory Changes?

Changes that occur in accounts receivable and inventory balances during the current year are found by comparing the beginning and ending amounts for those items on a firm's comparative balance sheet. But when changes in those accounts are shown on a statement of cash flows as adjustment to net income, they must be limited to those changes that reflect (1) differences between customers' payments on account and their credit purchases and (2) differences between the firm's purchases and its cost of goods sold. In this way, the reported cash from operating activities will reflect the cash effect of the firm's transactions with customers and suppliers rather their effect on the firm's net income. (Note: Differences in the firm's accounts payable account would also be relevant here, but they are excluded to keep this illustration more manageable.)

The information presented in Table 8 is from the 2024 10-K of Home Depot. During that year, the firm acquired SRS, a major roofing products company, for $18 billion.

Table 8: Changes in Accounts Receivable and Inventory on Home Depot's 2024 Financial Statements

Financial Data	Amount Shown on	Amount Shown in Operating Activities
	Comparative Balance Sheet	Section of Statement of Cash Flows (SCF)
Change in Accounts Receivable	+$1,575,000,000	-$174,000,000
Change in Inventory	+$2,475,000,000	+$743,000,000

First Impression – Something must be wrong here! How can there be two answers to the question of how much did these accounts change during the year?

- The changes in accounts receivable and inventories shown on the comparative balance each differ by over $1.7 billion from the changes in those *same accounts* shown in the operating-activities section of the statement of cash flows *for the same year.*

- The reported changes in both accounts receivable and inventory were far greater on the comparative balance sheet than on the statement of cash flows.

- For the receivables change, an enormous increase was reflected on the comparative balance sheet while a decrease was reported on the statement of cash flows.

Discussion Questions:

1. Where on Home Depot's 2024 statement of cash flows would you expect to find the $18 billion cash outlay it made to acquire SRS?

2. Explain how your answer in (1) can aid in explaining the huge differences in the amounts shown for the accounts receivable and inventory changes in 2024.

3. How could firms mitigate confusion that can arise when statement users are confronted with such differences?

TEACHING NOTE

Student Audiences
Students should be comfortable with the calculation and purpose of the financial measures defined and featured therein (current ratio, quick ratio, days' purchases in accounts payable, and return on stockholders' equity) and the format and structure of the statement if cash flows. This exercise can be used in Intermediate Accounting courses as well as Financial Statement Analysis classes at the undergraduate and graduate levels. In addition, it can serve as a capstone assignment near the end of a higher-level Introductory Accounting course or as part of an accounting module in a Corporate Finance course.

Time Commitment
This exercise can easily be divided into its eight parts. During each of eight classes, students could break out into teams for fifteen or twenty minutes to collaborate on the issue covered that day. Conclusions reached by the various teams could then be compared and contrasted in class. Of course, depending on the level of the course and the topics covered therein, the instructor could choose to cover several, but not all, of the eight puzzles that are presented here.

On the other hand, the entire exercise can be given out as a homework assignment to individuals or teams. Most students should complete this exercise in ninety minutes, with the time divided equally between reading the text and addressing the discussion questions. A follow-up class conversation could take fifty minutes, especially if students are prompted to defend their answers on the discussion questions and the instructor pursues the follow-up discussion points provided.

Suggested Answers, Learning Takeaways, and Follow-up Discussion Points

1. Which Firm Remained in Business?

Suggested Answers:

1. Paying suppliers more quickly could reflect financial strength, but it could be the result of a firm's efforts to calm worried suppliers. Taking longer to pay suppliers could reflect financial weakness, but it could result when a powerful firm is in a position to extract more favorable credit terms from its suppliers.

2. The current and quick ratios are calculated as follows:

$$\text{Current Ratio} = \frac{\text{Cash + Temporary Investments + Accounts Receivable + Inventory + Prepaid Expenses}}{\text{Current Liabilities}}$$

$$\text{Quick Ratio} = \frac{\text{Cash + Temporary Investments + Accounts Receivable}}{\text{Current Liabilities}}$$

   It is apparent from the data presented in Table 1 that Firm 1 was awash with accounts receivable. Because those receivables greatly pumped up the numerators for *both* its current and quick ratios, excluding a sizable inventory total from the quick ratio's numerator might not have dramatically reduced that ratio relative to the current ratio *because huge receivables remained in both financial measures.*

3. The current ratio has become somewhat of a vestige of a bygone era. After all, current liabilities are not paid out of current assets because a going-concern must continue to maintain adequate levels of those assets. What is needed to satisfy current obligations on a continuing basis is a steady, predictable stream of net cash inflows from business operations.

Learning takeaways: When asking whether a low days' purchases in accounts payable and a relatively small falloff from the current to quick ratio are signs of a financially strong firm, the answer is "it depends"! It could be so, but on the other hand, as in the case of Firm 1, they could signal the need for worried suppliers to get paid more quickly and the fact that a large receivables balance masked the presence of huge unsold inventories.

Follow-up discussion with students: Firm 1 was Conn's and Firm 2 is Best Buy. Accounts receivable representing 57% of Conn's current assets at the end of Fiscal 2023 lessened the falloff from its current to its quick ratio. But unsold inventories were a major problem at Conn's, as its days' sales in inventory was 167 days, more than three times Best Buy's 54 days. (Conn's and Best Buy, 2024). Reference to the firms' statements of cash flows reveals that cash from operations as a percent of average current liabilities was +17% for Best Buy, but a negative -15% for Conn's (Conn's and Best Buy, 2024).

2. Why Did They Cease Operations?

Suggested Answers:

1. Among retailers, restaurants and bakeries would often be first to come to mind. The data is for Crumbs Bake Shop, which had become the largest cupcake chain in the U.S. Gross profits for bakeries generally must be on the high side in order to hopefully cover such major operating expenses as rent, labor, and possible product waste. The ingredients necessary for making cupcakes have a short shelf life, so a DSI as low as 8-10 days would be the norm.

2. A gross profit in excess of 50% will not lead to net income if the firm's operating expenses exceed 50% of its sales revenue – as Table 9 reveals for all three years at Crumbs:

Table 9: Excess of Operating Expenses over Gross Profit at Crumbs Bake Shop

Financial Data	2011	2012	2013
Operating Expenses as % of Sales	73.1%	80.2%	86.6%
Gross Profit Percentage	57.5%	55.7%	54.0%
Excess of Operating Expenses over Gross Profit	15.6%	24.5%	32.6%

Learning takeaways: A healthy gross profit is a necessary, but not sufficient, condition for a firm to achieve a healthy net income. When operating expenses come close to (or even exceed) gross profit, the result will be low positive (or negative) net income.

Follow-up discussion with students: Crumbs, which had been valued at $66 million when it went public in 2011, was bought back by its founders in 2023 for $300 (or 0.00045% of that original valuation). (Fickenscher, 2023). The $300 they paid is the fee charged by the U.S. Patent and Trademark Office to purchase an abandoned brand.

Firms in such other fields as software development, investment banking, and biotechnology regularly achieve very high gross profit percentages with very little inventories, but among retailers, restaurants and bakeries stand out (Bennett, 2026).

3. What Caused Such Dramatic Changes in Two Firms' Sources and Uses of Cash?

Suggested Answers:

1. The event was the COVID-19 pandemic, which emerged in early 2020. In this exercise, Year X was 2019 and Year X+1 was 2020. COVID created understandable anxiety about traveling and shopping in person.
2. Delta Airlines was the highlighted service firm -- its passenger revenue declined by 70% in 2020, compared to a 6% increase during 2019 (Delta, 2021). The restaurant industry was also hard hit. In expectation of sales declines expected during COVID, the stock of DineEquity (Applebee's and IHOP) plunged 32% on March 12, 2020 (Gelski, 2020).

3. Wayfair, an online merchant of furniture and home décor items, was the highlighted retailer -- its sales received a large boost from its exclusive online presence. They grew by 55% in 2020, compared to a 35% growth rate in 2019 (Wayfair, 2021).

Learning takeaways: The financial effects of a major exogenous event is often evidenced by year-to-year comparisons of a firm's cash flows from operating vs. financing activities. When net cash flows are abundant from operations, the firm can place less reliance on cash from financing and perhaps even reduce its existing financing. When operations provide less cash or even use large cash amounts, increased financing must make up the slack. At Delta and Wayfair, the enormity of the shifts in funds provided by operating vs. financing activities were readily apparent from refence to their statements of cash flows.

Follow-up discussion with students: Nordstrom, the department store, say sales fall to $14.1 billion in 2020, compared to a pre-COVID estimate of $17.1 billion for that year (Global Data, 2020). On the other hand, Amazon's sales grew by 41% during 2020 as consumers accelerated their move to online shopping during and after lockdowns (Amazon, 2021).

4. Was That Really the Quarterly Distribution of Yearly Sales?

Suggested Answers:

1. It seems most likely that Panera chose in 2005 to divide its year into quarters of uneven length, making Quarter 1 what has been referred to as a supersized quarter (Fahey, 2017). In Panera's case, Quarter 1 was supersized with 16 weeks, while the three remaining quarters had 12 weeks each. Notice that 16 + 12 + 12 + 12 = 52, but to better sync a firm's internal and external reporting, each quarter can now consist of an even number of 4-week internal reporting periods, something not possible with 13-week quarters.

2. When one compares Panera with peers who reported using quarters of even length, Panera's sales can appear to have peaked, uniquely, in Quarter 1, but this need not indicate that its actual sales distribution during 2005 differed from others in the restaurant business who reported with even quarters.

3. When firms with uneven quarters present their quarterly results, they should prominently note the number of weeks contained in that quarter. They also should remind statement users that the firm's results would have differed had they used even quarters and, as a result, are not comparable with firms that do follow a 13-13-13-13 pattern.

Learning takeaways: One should not assume that all reported business quarters consist of thirteen weeks. Before the true intra-year pattern of sales can be ascertained and analyzed for a firm, it must be determined whether or not all of its quarters were of equal length. Such a determination is also vital before inter-company comparisons can be made.

Follow-up discussion with students: Fortunately, the exact extent to which Parera's uneven quarters affected its reported sales pattern could be ascertained. This was possible because for 2006, the firm shifted its quarterly reporting to four periods of 13 weeks each. Insight into how different the 2005 data would have been had the firm used 13-13-13-13 was provided in Panera's 2006 10-K, where the 2005 year was presented for comparison with the 2006 data *after* being restated to conform to Panera's new 13-13-13-13 pattern. Unfortunately, such precise knowledge of the extent to which a supersized quarter has modified a firm's quarterly sales distribution is not available should the firm elect to continue in a supersized-quarter mode.

The distribution of annual sales by quarter, such as was shown for Panera in Table 4, was a reporting requirement in Firm's 10-Ks through 2020. As of 2021, the SEC allowed firms to omit such disclosures (in many cases) from their 10-Ks (EY, 2021). Gathering such data has since involved referencing a firm's 10-Qs for Quarters 1, 2, and 3 (there is no 10-Q for Quarter 4) and then subtracting the total sales for Quarters 1-3 from the annual sales reported in the firm's 10-K. But at least one could find such timely data somewhere, only now with a little more effort. Even that might not be possible in the future, as the SEC in March 2026 was working on a proposal to eliminate quarterly reporting, with semi-annual reporting being either required or optional (Driebusch, 2026). However, should this to be the case, firms might continue to feel incentivized to make quarterly data available for stakeholders seeking timely data.

5. A Perfect Merger?

Suggested Answers:

1. Differences in the data suggest that Target chose to include distribution costs within its cost of goods sold while Kohl's included them within its operating expense.

2. For 16.6% to be a realistic left-over figure for the merged firm, it would have to be the case that neither had any distribution costs – but those costs do exist and need to be placed somewhere on the income statement. A gross profit percentage around 5% might be attainable if the retailers were to merge.

3. Firms should be urged, or perhaps even required, to specify which costs are included within cost of goods sold and which are included within the operating expenses. Some firms include the following caution in the notes to their

financial statements: "The classification of these expenses varies across the retail industry." Although better than nothing, such a statement merely informs financial-statement users that what they are about to examine may not be comparable among firms. A vast improvement would be the type of exhibit that Target includes in each of its 10-Ks. An abbreviated version of that exhibit appears below in Table 10 (Target, 2025).

Table 10: Components of Cost of Goods Sold vs. Operating Expenses at Target

Included within Cost of Sales	Included within Operating Expenses
Merchandise Costs	Compensation and Benefit Costs for Stores and Headquarters
Import Costs	Occupancy and Operating costs of Stores and Headquarters
Freight Expenses	Advertising Costs
Markdowns and Inventory Shrink	Credit Card and Servicing Expenses
Supply Chain and Digital Fulfillment Costs	Litigation Costs

Learning takeaways: Before analyzing and interpreting a firm's gross-profit percentage, the analyst must heed the advice that applies to sporting events: You cannot interpret the score unless you first know the rules under which the game was played. The gross-profit percentage achieved by a firm and knowledge of how it compares to those of its competitors is of *paramount interest* to analysts, so extreme caution is needed when one is confronted with firms that have classified their expenses differently.

Follow-up discussion with students: Other peers that choose to classify expenses differently include TJX (more in cost of goods sold) vs. Burlington Stores, American Eagle Outfitters (more in cost of goods sold) vs. Abercrombie, Foot Locker (more in cost of goods sold) vs. Genesco and ULTA (more in cost of goods sold) vs. Sally Beauty. The four firms that included distribution and occupancy costs in cost of goods sold reported gross profit percentages that ranged from 28.5% to 39.1%, compared to 39.8% to 62.9% for those with a narrower definition of cost of goods sold (Gosman, Gazi, and Lind, 2024).

6. Who Should Pay for Lunch?

Suggested Answers:

1. With a $24,000 depreciable cost for the equipment, Fast's $4,000 depreciation expense per year indicates it adopted a six-year estimated useful life for the equipment. On the other hand, Slow's $3,000 depreciation expense per year indicates that it adopted an eight-year estimated useful life. Thus Fast set out to depreciate the equipment faster than Slow, reflective of their names.

2. The income effects are shown below in Table 11:

Table 11: Comparison of Equipment Ownership's Income Effects for Fast and Slow Corporations

Income Effects over 2024-2025 Period	Fast's Net Income	Slow's Net Income
2024 Depreciation Expense	Lowered by $4,000	Lowered by $3,000
2025 Depreciation Expense	Lowered by $4,000	Lowered by $3,000
Gain or Loss on Sale of Equipment	Raised by $500	Lowered by $1,500
Net Effect on Income	Lowered by $7,500	Lowered by $7,500

3. As shown in the above table, neither firm fared better economically on the equipment sale. Fast only looked like it did $2,000 better on the sale ($500 gain vs. $1,500 loss) because it had taken $2,000 more depreciation expense than Slow over the 2024-2025 period.

4. The CEOs might elect to split the check or have the one who does not pay now pay the check next time.

Learning takeaways: When depreciable assets are sold before the end of their estimated useful life, firms that have for accounting purposes depreciated those assets more quickly than others will report *seemingly* more favorable outcomes, in the form of larger gains (or smaller losses). Therefore, the accounting gain or loss recorded on the sale of a depreciable asset can mislead as to the wisdom of the disposal decision. From an economic point of view, what needs to be examined when considering whether to sell equipment are whether the equipment might be needed in the future and if it is to be replaced, will satisfactory savings in costs for labor and/or energy result.

Follow-up discussion with students: When addressing the issue of how differing depreciation practices can impact a comparison of firms' earnings, textbooks often focus on whether those firms are using the same depreciation method. Sometimes missing from the discussion is the effect that the use of differing estimated useful lives can have, even in situations when both firms are using the same depreciation method.

Fast Corporation depreciated faster than Slow Corporation and, as a result, recorded a gain on the equipment sale simply to be true to its name rather than in an attempt to avoid taxes. But in the 1960s, two sections of the Internal Revenue Code (1245 and 1250) were enacted in recognition of the relationship between liberal depreciation deductions and recorded gains on property sales. Some companies had been known to super depreciate assets so that fewer earnings were left to be taxed at the higher ordinary corporate tax rates; in return, they welcomed the gains on property sales that would be taxed at the lower capital-gains tax rates. Sections 1245 and 1250 called for depreciation recapture to prevent such tax-saving gains (Schmidt, 1965).

7. How Did Its Returns on Stockholders' Equity Get So High?

Suggested Answers:

1. One cannot compute a percentage when the denominator is not positive. It must have been negative stockholders' equity that precluded calculation of a ROSE for Colgate from 2015-2018.

2. To compute to an enormous ROSE, the firm must have had positive, but very low, stockholders' equity.

3. It was not Colgate's results of operations that produced its low stockholders' equity – its retained earnings were positive (and increasing) throughout the period. It's most likely that, like many firms, Colgate engaged in an aggressive stock buyback program. The cost of these holdings, when subtracted from the firm's paid-in capital and retained earnings, left a stockholders' equity balance that was negative from 2015-2018 and positive, but very low, in 2014 and from 2019-2024.

4. When one looks at a return measure, there can be a tendency to focus on the numerator. This is okay when one is examining the return on sales, for it is difficult for a firm to have impressive profits without having very respectable sales. But an impressive appearing ROSE can occur simply when that ratio's denominator, the firm's stockholders' equity, has been reduced to a very low positive number by negative retained earnings or large treasury stock holdings. These reduction factors do not suggest that the firm has superior earning power.

Learning takeaways: A spectacular return on stockholders' equity is more likely to result from a very low, but positive, stockholders' equity number than from a very high net income number. One cannot characterize Fortune's ROSE calculations as "nonsense" because they do come from data contained in audited financial statements. Nevertheless, they must be viewed with caution and might not be reason to bring out the champagne.

Follow-up discussion with students: During 2024, Colgate's stockholders' equity amount was the 30th lowest among the F500 (Fortune, 2025). The firm's holdings of Treasury Shares, which rose from \$16.9 billion in 2014 to \$27.4 billion in 2024, was the contributing factor (Colgate-Palmolive, 2015 and 2025). Colgate's return on sales of 14.4% in 2024 ranked 122nd among the F500 (Fortune, 2025). Thus, 121 firms ranked higher than Colgate on return on sales but none came close to its 1,363% ROSE. As noted above, it's not difficult for total stockholders' equity of a successful firm to become low positive or negative. The same cannot be said for net sales.

8. Why Are There Multiple Amounts for the Accounts Receivable and Inventory Changes?

Suggested Answers:

1. The cash paid in 2024 when Home Depot acquired SRS would be listed in the investing activities section of its statement of cash flows. The amount listed there would include the portion of the purchase price that was paid for SRS's receivables and inventory.

2. Receivables and inventory acquitted in the SRS acquisition would affect the balance-sheet changes in those accounts for 2024, but would not be relevant when measuring changes that occurred in receivables due to differences between collections on customers' accounts and charge purchases or differences between the firm's purchases and its cost of goods sold. Differences in operating accounts for such non-operating reasons as acquisitions and divestitures are not shown in the operating activities section; to do so would be to double-count them for they are properly reflected among the investing activities.

3. Where changes in accounts receivable and inventories are reported on a statement of cash flows, the firm could note that "changes in operating assets and liabilities are *net of acquisitions and divestitures*."

Learning takeaways: Operating accounts such as accounts receivable and inventory will always change in amount during the year because of business dealings with customers and suppliers. But changes will also occur when the firm has engaged in acquisitions and/or divestitures. Because these investing/disinvesting activities occur regularly at many firms, amounts shown for changes in accounts receivable and inventory in the operating activities of the statement of cash flows will often differ from changes reported on the firm's comparative balance sheet.

Follow-up discussion with students: In a note to its financial statements, Home Depot disclosed how it allocated the $18 billion it paid for SRS among the assets acquitted and liabilities assumed (Home Depot, 2025). Amounts paid to SRS for receivables and inventory were $1.8 billion and $2.0 billion, respectively. Notice that these amounts in large part explain why the changes on Home Depot's comparative balance sheet were each over $1.7 billion higher than the changes shown on the statement of cash flows. Other factors such as foreign currency translations and assets held for sale accounted for the remaining differences.

Divergence between the change amounts on a firm's comparative balance sheet and on its statement of cash flows is the norm for large firms, who tend to regularly make acquisitions and divestitures. The authors examined inventory-change amounts on the financial statements of one hundred retailers and consumer goods manufacturers included in the Fortune 500 for 2024. Change amounts for inventory were identical for only 15% of those firms. In four cases, the inventory-change amounts differed by *over $1 billion* between the two financial statements. And in thirteen instances, the inventory change *for the same year* was positive on one financial statement while it was negative on the other financial statement. Among firms examined, twenty-nine alerted the reader that changes in operating accounts on their statements of cash flows were net of acquisitions and divestitures.

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