

## Corning Incorporated (GLW)

**\$19.94** (As of 05/14/20)

Price Target (6-12 Months): **\$17.00**

Long Term: 6-12 Months

**Zacks Recommendation:** Underperform

(Since: 03/22/20)

Prior Recommendation: Neutral

Short Term: 1-3 Months

**Zacks Rank:** (1-5)

**4-Sell**

Zacks Style Scores:

VGM:F

Value: F

Growth: F

Momentum: C

### Summary

Corning has withdrawn its 2020 guidance due to the economic uncertainty and disruption caused by the COVID-19 pandemic. The company has been facing headwinds in two segments, Optical Communications and Display Technologies. In Optical Communications, it is seeing market weakness stemming from customers' project spending decisions, primarily in carrier networks. In Display Technologies, lower glass volume and prices are negatively impacting Corning's growth profile. For the TV market in particular, the concentration of market share among a few large players is a concern. Nevertheless, it reported decent first-quarter 2020 results. The top and the bottom line beat their respective Zacks Consensus Estimate. Corning operates on a strong financial foundation, which positions it for long-term growth while adjusting to near-term conditions.

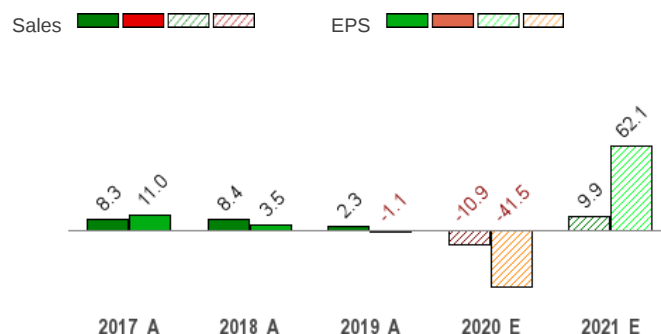
### Price, Consensus & Surprise



### Data Overview

|                            |                                            |
|----------------------------|--------------------------------------------|
| 52 Week High-Low           | \$34.26 - \$17.44                          |
| 20 Day Average Volume (sh) | 4,892,775                                  |
| Market Cap                 | \$15.2 B                                   |
| YTD Price Change           | -31.5%                                     |
| Beta                       | 1.09                                       |
| Dividend / Div Yld         | \$0.88 / 4.4%                              |
| Industry                   | <a href="#">Communication - Components</a> |
| Zacks Industry Rank        | Top 19% (49 out of 253)                    |

### Sales and EPS Growth Rates (Y/Y %)



|                           |            |
|---------------------------|------------|
| Last EPS Surprise         | 17.7%      |
| Last Sales Surprise       | 0.8%       |
| EPS F1 Est- 4 week change | -23.2%     |
| Expected Report Date      | 08/04/2020 |
| Earnings ESP              | 0.0%       |
| P/E TTM                   | 12.9       |
| P/E F1                    | 19.4       |
| PEG F1                    | 10.4       |
| P/S TTM                   | 1.4        |

### Sales Estimates (millions of \$)

|      | Q1      | Q2      | Q3      | Q4      | Annual*  |
|------|---------|---------|---------|---------|----------|
| 2021 | 2,556 E | 2,726 E | 2,901 E | 2,930 E | 11,416 E |
| 2020 | 2,529 A | 2,378 E | 2,667 E | 2,792 E | 10,384 E |
| 2019 | 2,850 A | 2,986 A | 2,969 A | 2,851 A | 11,656 A |

### EPS Estimates

|      | Q1       | Q2       | Q3       | Q4       | Annual*  |
|------|----------|----------|----------|----------|----------|
| 2021 | \$0.33 E | \$0.38 E | \$0.43 E | \$0.55 E | \$1.67 E |
| 2020 | \$0.20 A | \$0.10 E | \$0.29 E | \$0.45 E | \$1.03 E |
| 2019 | \$0.40 A | \$0.45 A | \$0.44 A | \$0.46 A | \$1.76 A |

\*Quarterly figures may not add up to annual.

The data in the charts and tables, including the Zacks Consensus EPS and Sales estimates, is as of 05/14/2020. The reports text is as of 05/15/2020.

## Overview

New York-based Corning Incorporated started out as a glass business that was reincorporated in 1936. The company has since developed its glass technologies to produce advanced glass substrates that are used in a large number of applications across multiple markets. Currently, Corning reports results under five operating segments.

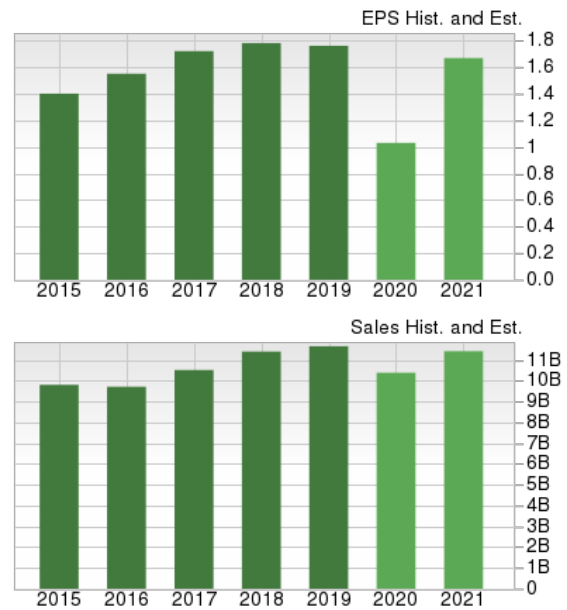
The **Display Technologies** segment (31.4% of total sales in first-quarter 2020) includes glass substrates that are commonly found in liquid crystal display (LCD) TVs, notebooks and flat-panel desktop PC monitors. The company's specialty, active-matrix substrates improve the brightness and sharpness of images.

The company's **Optical Communications** (33.1%) products may be categorized into two. The first category comprises cables. Products are typically sold to its own subsidiaries, which then distribute to end users. The second category is hardware and equipment, which comprises optical and copper connectivity products.

The **Environment Technologies** (13.4%) segment makes ceramic substrates required for mobile and stationary pollution and emission control systems. The primary users of Corning's products are automotive and diesel engine manufacturers.

**Specialty Materials** (14.7%) include different formulations for glass, glass ceramics and fluoride crystals that render special properties to each separate substrate, making it suitable for specific industrial and commercial use.

**Life Sciences** (10.8%) segment products are sold under the Corning, Costar and Pyrex brands primarily for laboratory equipment, such as microplate products, coated slides, filter plates for genomics sample preparation, plastic cell culture dishes, flasks, cryogenic vials, roller bottles, mass cell culture products, liquid handling instruments, Pyrex glass beakers, serological pipettes, centrifuge tubes and laboratory filtration products.



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## Reasons To Sell:

- ▼ A lot of the optimism around Corning's shares has been driven by its Gorilla Glass (GG) formulation. GG is an extremely tough, flexible, scratch resistant, environmentally friendly glass formulation meant for use as a protective layer (around .5 to 2 mm thick) over mobile phones, tablets, notebooks and the like. The product has been designed into numerous consumer devices, including cell phones, tablets and touch notebooks. While this gives it a very broad addressable market, nearly all of this market is currently in a slow growth phase. Therefore, the core end markets are under a lot of pressure. Although Corning continues to innovate with its Vibrant Corning Gorilla Glass, the impact of these efforts on the bottom line remains unclear as of now.
- ▼ The company faces price erosion at the rate of 1-2% per quarter in the Display Technologies business. Therefore, we expect prices to remain a drag on margins, despite an improving demand/supply situation. Although management believes that 1-2% erosion per quarter could be tackled through cost containment, we assume there would be a limit to cost control. Moreover, Corning has withdrawn its 2020 guidance due to the economic uncertainty and disruption caused by the COVID-19 pandemic. The company has been facing headwinds in two segments, Optical Communications and Display Technologies.
- ▼ End market diversification is limited at present, with the display and optical segments accounting for more than two-third of total revenues and around half the business coming from display markets. Since the Display Technologies and Specialty Materials segments are largely dependent on consumer spending, particularly on LCD TVs and mobile PCs, this further narrows down the market. Although the company is expected to benefit from massive growth in China, Chinese panel makers with whom Corning has limited relationship are entering the market. Building a significant position in China in the current environment could be a challenge, despite management's all-out efforts. Also, while GG is being met with enthusiasm, its growing contribution to revenues will increase the dependence on display markets. Another concern with respect to the display market in general and the TV market in particular is the concentration of market share in the hands of a few large players. The loss of a single customer or its decision to cut orders would have significant impact on Corning's results.
- ▼ There is growing interest in sapphire substrates that could replace Corning's GG. Sapphire substrates are far more scratch resistant than GG and therefore less likely to break. However, it is heavier and transmits less light, so its use is relatively limited (camera lens, thumb-print scanner, high end watch covers and in a select few smartphone screens). Current manufacturing technologies are also more expensive and wasteful, but the situation could improve somewhat with volumes. Another competing technology that is a cause of concern is plastic OLED. Plastic brings with itself flexibility and practically removes all chances of breaking. However, manufacturing inefficiencies remain. Although Corning is working on glass improvements, these aren't likely to affect revenues soon while evolving technologies remain a constant threat.
- ▼ As of Mar 31, 2020, the company had \$2,025 million in cash and equivalents with \$7,815 million of long-term debt compared with respective tallies of \$2,434 million and \$7,729 million in the previous quarter. This shows that the company is likely to face liquidity crisis with decreasing cash position and increasing debt burden. Corning currently has a debt-to-capital ratio of 0.39 compared with 0.64 of the sub-industry. The times interest earned has declined steadily over the past few quarters to 3.3 at present relative to 2 for the sub-industry. This shows that the company is less likely to clear its debt. However, it has a dividend payout rate of 52.9%. The rate has increased steadily over the past few quarters, indicating that the company is rewarding shareholders with healthy dividend. It remains to be seen whether Corning reduces the dividend in the near future due to disruptions caused by COVID-19 pandemic.

Increasing cost of sales and perennial price erosion in the Display Technologies unit remain major headwinds for this specialty glass maker.

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## Risks

- Through 2023, Corning expects to deliver 6-8% compound annual sales growth and 12-15% compound annual earnings per share growth while investing \$10 billion to \$12 billion in RD&E, capital, and mergers and acquisitions. It also plans to expand operating margin and ROIC, and deliver \$8 billion to \$10 billion to shareholders, including annual dividend per share increase of at least 10%. To deliver its goals, the company expects to add an incremental \$3 billion to \$4 billion in annual sales and improve profitability by the end of 2023. The company is extending performance under its 2020-2023 Strategy & Growth Framework. It is focusing on its portfolio and utilizing financial strength to enhance shareholder returns. The company's capabilities are becoming increasingly vital to diverse industries, and multiple opportunities support leadership across all of its market-access platforms.
  - Multiple factors should drive Corning's fiber optic solutions business over the next several years, primarily the increasing use of mobile devices that require efficient data transfer and efficient networking systems. Supporting this trend is the proliferation of clouds, which are now resulting in increased storage and even computing on a virtual plane. Since both consumers and enterprises are using the network more, there is tremendous demand for quality networking. Also, data consumption patterns are changing. For instance, there is a growing propensity to consume video content thus creating the need for faster data transfer. Since optical networks are more efficient and most of the existing networks are copper-based, the demand for optical solutions is particularly strong. Corning has several products focused on the datacenter with a portfolio consisting of optical fiber, hardware, cable and connectors that helps it to create optical solutions to meet varying customer needs.
  - Corning is a leading innovator in the glass substrate industry. The company has been developing formulations that are not only suitable for imparting superior picture quality, but also taking care of their effects on the environment. Corning's generation 10 substrates use the proprietary EAGLE XG formulation, which serves both these purposes. Corning was the first glass substrate developer with the generation 10 capability. A higher generation substrate is a larger-sized substrate, which enables panel makers to reduce manufacturing costs since more panels can be built from each substrate. For example, a panel maker can make fifteen 42-inch panels from a generation 10 substrate, compared to eight 42-inch panels from a generation 5. However, the cost per square inch is more or less optimized at generation 8, unless panel sizes increase. Therefore, the generation 10 capability lowers cost for panel sizes of 65 inches or more and will simply help volumes but not provide any additional cost advantage for smaller-sized panels. Either way, Corning's capability positions it to better serve the secular increase in demand for LCD panels. The fact that LCD TVs of 45 inches or larger have been the fastest-growing segment in recent times is also a positive. This will drive demand for the larger-size panels where Corning leads the market. The company's fusion technology reduces glass thickness, enabling panel manufacturers to do away with thinning costs that are usually necessary for making slimmer, lighter and more power efficient consumer devices. In addition to these advantages, the substrate composition makes it particularly eco-friendly and thus more easily acceptable. Subsequently, the company introduced Lotus Glass and Willow Glass. The company's Iris glass also presents significant growth opportunity. We believe that the product portfolio strength along with moderating price decline bodes well for Corning in the long term.
  - In order to aid growth, Corning is successfully leveraging the automotive market to disrupt the 6 billion square-foot auto glazing market based on annual consumption. Corning announced a joint venture with Saint-Goban Sekurit to develop, manufacture and sell lightweight automotive glazing solutions. Per this JV, the company will continue to produce and market Gorilla Glass and other glazers, retaining 100% ownership of the glass business. This venture allows the company to move forward in the value chain beyond glass to manufacture and sell glazing solutions with a leading producer. This also provides a low-cost path for Corning to scale Gorilla Glass glazing solutions worldwide.
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## Last Earnings Report

### Corning Beats Q1 Earnings Estimates, Withdraws Guidance

Corning reported decent first-quarter 2020 results, with the top and the bottom line surpassing their respective Zacks Consensus Estimate. However, revenues and earnings declined on a year-over-year basis.

The specialty glass maker has withdrawn its 2020 guidance due to the economic uncertainty and disruption caused by COVID-19. It continues to focus on three core priorities — preserving the financial strength of the company, protecting employees and communities as well as delivering on customer commitments.

Quarter Ending **03/2020**

| Report Date      | Apr 28, 2020 |
|------------------|--------------|
| Sales Surprise   | 0.82%        |
| EPS Surprise     | 17.65%       |
| Quarterly EPS    | 0.20         |
| Annual EPS (TTM) | 1.55         |

### Bottom Line

On a GAAP basis, net loss for the March quarter was \$96 million or loss of 16 cents per share against a net income of \$499 million or 55 cents per share in the year-ago quarter. The downside was primarily caused by an operating loss.

However, quarterly core net income came in at \$177 million or 20 cents per share compared with 365 million or 40 cents per share in the prior-year quarter. The bottom line beat the Zacks Consensus Estimate by 3 cents.

### Revenues

First-quarter GAAP net sales were down 15% year over year to \$2,391 million. This downtick was caused by the material impact of changing market and customer dynamics in the Optical Communications, Display Technologies and Environmental Technologies business segments.

Quarterly core sales declined to \$2,529 million from \$2,850 million recorded in the year-ago quarter. However, the top line surpassed the consensus mark of \$2,508 million.

### Segment Results

Net sales in the **Optical Communications** segment, which accounts for the lion's share of total revenues, declined 25.7% year over year to \$791 million (in line with management's expectations). This indicates overall market weakness induced by customers' project spending decisions. The business continues to adjust its cost structure to match near-term sales. The segment's net income was \$29 million compared with \$142 million in the prior-year quarter, impacted by lower volume.

Net sales in **Display Technologies** were \$751 million compared with \$818 million in the prior-year quarter due to lower glass volume and prices. The segment's net income was \$152 million compared with \$208 million in the year-ago quarter.

**Specialty Materials'** net sales were up 13.9% to \$352 million, which exceeded management's expectations. The upside was driven by strong demand for premium glasses, other Gorilla Glass innovations and Advanced Optics products. The segment's net income was \$51 million compared with \$49 million in the prior-year quarter.

**Environmental Technologies'** net sales fell 11.6% to \$320 million (below management's expectations), as vehicle manufacturers suspended production in key markets. The segment's net income was \$35 million compared with \$55 million in the prior-year quarter, impacted by lower volume.

Net sales in **Life Sciences** were up 6.2% to \$258 million, which were in line with management's expectations. The segment's net income improved to \$38 million from \$31 million reported in the prior-year quarter, driven by higher sales volume and manufacturing performance optimization.

### Other Details

Quarterly cost of sales increased 6.8% year over year to \$1,830 million. Gross profit declined to \$561 million from \$1,099 million due to lower revenues and higher cost of sales. Core gross profit was \$844 million compared with \$1,139 million recorded in the prior-year quarter, with a respective margin of 33% and 40%. Operating loss was \$121 million against an operating income of \$420 million in the prior-year quarter.

### Cash Flow & Liquidity

In the first quarter, Corning generated \$248 million of net cash from operations against a cash utilization of \$29 million in the year-ago quarter. As of Mar 31, the company had \$2,025 million in cash and equivalents with \$7,815 million of long-term debt.

### Going Forward

Corning is affected by the global economic disruptions and health consequences caused by the pandemic. In the first quarter, the company took action to navigate through these unprecedented times and is planning to take further measures in the ongoing quarter.

Corning operates on a strong financial foundation, which positions it for long-term growth while adjusting to near-term conditions. As the company anticipates lower sales, it is adjusting its operating plan to reduce costs and capital spending.

Moreover, the company has no debt due over the next two years and it expects to maintain a strong cash balance as well as generate positive free cash flow for 2020. It plans to maintain dividends and pause share buybacks.

## Recent News

On May 1, 2020, Corning announced that its board of directors has approved a quarterly dividend of 22 cents per share, payable on Jun 30 to shareholders on record as of May 29.

On Apr 8, Corning announced that it is reorganizing its operating structure after extensive analysis and leadership review. Designed to unlock opportunities for valuable synergies, the new structure aligns executive management and business teams around five Market-Access Platforms (MAPs) — Mobile Consumer Electronics, Optical Communications, Automotive, Life Sciences, and Display. Within each MAP, Corning harnesses a combination of three core capabilities as well as four manufacturing and engineering platforms to bring value to customers. Also, management has created a new leadership position that will drive operational excellence. Eric Musser, a 34-year Corning veteran, has been appointed to the expanded role of president and chief operating officer (COO) with immediate effect. Eric will continue to oversee Corning's international regions as well as global manufacturing and supply management functions. The MAP organizations will report to Eric in his role as COO.

On Feb 20, Corning announced that it is working with Qualcomm Technologies — a subsidiary of Qualcomm Incorporated — to develop 5G mmWave infrastructure systems for enterprises and public venues. The 5G systems are designed to combine Qualcomm Technologies' 5G and mmWave technology with Corning's small-cell expertise to deliver affordable and easy-to-install 5G-ready networks indoors. The relationship will enable Corning to implement new functionality around concurrent beamforming, advanced scheduling and other features necessary to support the characteristics of indoor environments.

On Jan 7, Corning announced that it has collaborated with LG Electronics Vehicle Component Solutions to industrialize its ColdForm Technology. By working together, the companies aim to bring more economical and high-quality curved display modules to the automotive market. Corning's ColdForm Technology provides a cost-effective processing solution compared with conventional hot-formed methods while sustaining exceptional optical performance and its signature durability with AutoGrade Gorilla Glass. The company also announced that it is working with Visteon, a global leader in automotive cockpit electronics technology including digital multi-display modules, to commercialize its ColdForm Technology.

## Valuation

Corning shares are down 34.2% over the trailing 12-month period. Stocks in the Zacks sub-industry are down 20.3% over the past year, but stocks in the Zacks Computer and Technology sector are up 11.5% in the same time frame.

The S&P 500 Index is down 0.3% in the past year.

The stock is currently trading at 1.52X trailing 12-month book value, which compares to 2.50X for the Zacks sub-industry, 4.62X for the Zacks sector and 3.70X for the S&P 500 Index.

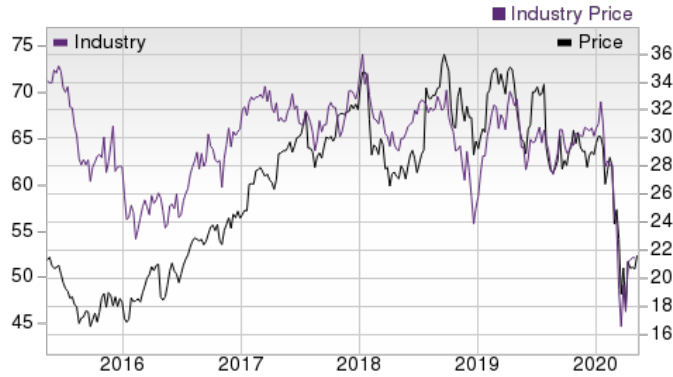
Over the past five years, the stock has traded as high as 2.51X and as low as 1.04X, with a 5-year median of 1.72X. Our Underperform recommendation indicates that the stock will perform worse than the market. Our \$17 price target reflects 11.18X trailing 12-month book value.

The table below shows summary valuation data for GLW

| Valuation Multiples - GLW |               |       |              |        |         |
|---------------------------|---------------|-------|--------------|--------|---------|
|                           |               | Stock | Sub-Industry | Sector | S&P 500 |
| P/B TTM                   | Current       | 1.52  | 2.5          | 4.62   | 3.7     |
|                           | 5-Year High   | 2.51  | 3.5          | 5.38   | 4.55    |
|                           | 5-Year Low    | 1.04  | 1.03         | 3.16   | 2.84    |
|                           | 5-Year Median | 1.72  | 2.42         | 4.3    | 3.65    |
| P/E F12M                  | Current       | 15.75 | 23.6         | 22.99  | 20.42   |
|                           | 5-Year High   | 20.04 | 32.75        | 23.01  | 20.79   |
|                           | 5-Year Low    | 10.62 | 14.43        | 16.71  | 15.19   |
|                           | 5-Year Median | 15.47 | 21.38        | 19.26  | 17.45   |
| P/S F12M                  | Current       | 1.41  | 1.6          | 3.49   | 3.18    |
|                           | 5-Year High   | 2.88  | 2.93         | 3.59   | 3.44    |
|                           | 5-Year Low    | 1.18  | 1.54         | 2.32   | 2.54    |
|                           | 5-Year Median | 2.24  | 2.07         | 3.1    | 3.02    |

As of 05/14/2020

## Industry Analysis Zacks Industry Rank: Top 19% (49 out of 253)



## Top Peers

| Company (Ticker)                        | Rec     | Rank |
|-----------------------------------------|---------|------|
| Arista Networks, Inc. (ANET)            | Neutral | 3    |
| Altice USA, Inc. (ATUS)                 | Neutral | 3    |
| Harmonic Inc. (HLIT)                    | Neutral | 4    |
| Knowles Corporation (KN)                | Neutral | 3    |
| Plantronics, Inc. (PLT)                 | Neutral | 2    |
| Spirent Communications PLC (SPMY)       | Neutral | 2    |
| TESSCO Technologies Incorporated (TESS) | Neutral | 4    |
| Viavi Solutions Inc. (VIAV)             | Neutral | 3    |

| Industry Comparison Industry: Communication - Components |              |            |           | Industry Peers |           |          |
|----------------------------------------------------------|--------------|------------|-----------|----------------|-----------|----------|
|                                                          | GLW          | X Industry | S&P 500   | ANET           | ATUS      | PLT      |
| Zacks Recommendation (Long Term)                         | Underperform | -          | -         | Neutral        | Neutral   | Neutral  |
| Zacks Rank (Short Term)                                  | 4            | -          | -         | 3              | 3         | 2        |
| VGM Score                                                | F            | -          | -         | D              | C         | B        |
| Market Cap                                               | 15.17 B      | 131.36 M   | 18.95 B   | 15.56 B        | 13.66 B   | 499.10 M |
| # of Analysts                                            | 5            | 3          | 14        | 11             | 6         | 4        |
| Dividend Yield                                           | 4.41%        | 0.00%      | 2.2%      | 0.00%          | 0.00%     | 4.80%    |
| Value Score                                              | F            | -          | -         | D              | C         | A        |
| Cash/Price                                               | 0.12         | 0.16       | 0.06      | 0.16           | 0.02      | 0.30     |
| EV/EBITDA                                                | 7.91         | 7.08       | 11.58     | 14.64          | 9.27      | 18.86    |
| PEG Ratio                                                | 10.31        | 2.24       | 2.60      | 2.24           | NA        | NA       |
| Price/Book (P/B)                                         | 1.52         | 1.93       | 2.59      | 5.46           | 8.72      | 0.85     |
| Price/Cash Flow (P/CF)                                   | 4.98         | 9.65       | 10.20     | 21.55          | 5.39      | 1.37     |
| P/E (F1)                                                 | 19.17        | 24.41      | 19.00     | 24.18          | 41.46     | 7.16     |
| Price/Sales (P/S)                                        | 1.37         | 1.23       | 1.93      | 6.95           | 1.39      | 0.28     |
| Earnings Yield                                           | 5.17%        | 2.10%      | 5.05%     | 4.13%          | 2.43%     | 14.00%   |
| Debt/Equity                                              | 0.78         | 0.02       | 0.75      | 0.03           | 15.43     | 2.76     |
| Cash Flow (\$/share)                                     | 4.01         | 0.36       | 7.01      | 9.54           | 4.27      | 9.12     |
| Growth Score                                             | F            | -          | -         | C              | C         | F        |
| Hist. EPS Growth (3-5 yrs)                               | 5.35%        | 10.76%     | 10.82%    | 48.27%         | NA        | 10.76%   |
| Proj. EPS Growth (F1/F0)                                 | -41.48%      | -15.87%    | -10.48%   | -12.63%        | 164.29%   | -40.24%  |
| Curr. Cash Flow Growth                                   | 3.88%        | 3.88%      | 5.68%     | 22.40%         | 6.97%     | 219.80%  |
| Hist. Cash Flow Growth (3-5 yrs)                         | -1.86%       | 13.62%     | 8.52%     | 57.99%         | NA        | 24.06%   |
| Current Ratio                                            | 2.18         | 2.62       | 1.27      | 5.82           | 0.49      | 1.42     |
| Debt/Capital                                             | 38.88%       | 2.52%      | 44.25%    | 2.68%          | 93.91%    | 73.37%   |
| Net Margin                                               | 3.29%        | -1.18%     | 10.54%    | 35.61%         | 1.66%     | -9.69%   |
| Return on Equity                                         | 13.01%       | 5.47%      | 16.29%    | 24.82%         | 10.81%    | 19.10%   |
| Sales/Assets                                             | 0.40         | 0.73       | 0.54      | 0.58           | 0.29      | 0.57     |
| Proj. Sales Growth (F1/F0)                               | -10.91%      | -0.42%     | -2.55%    | -3.90%         | 1.04%     | -11.65%  |
| Momentum Score                                           | C            | -          | -         | B              | F         | B        |
| Daily Price Chg                                          | 1.58%        | 0.00%      | 1.17%     | -3.80%         | -0.22%    | 0.16%    |
| 1 Week Price Chg                                         | 4.65%        | 1.39%      | 3.23%     | 4.99%          | -6.36%    | 2.48%    |
| 4 Week Price Chg                                         | 0.50%        | 0.00%      | 1.06%     | 0.19%          | -11.43%   | 17.15%   |
| 12 Week Price Chg                                        | -29.52%      | -20.68%    | -22.80%   | -9.94%         | -20.68%   | -13.13%  |
| 52 Week Price Chg                                        | -34.62%      | -24.12%    | -12.40%   | -18.94%        | -5.35%    | -73.53%  |
| 20 Day Average Volume                                    | 4,892,775    | 45,058     | 2,553,422 | 881,427        | 6,151,465 | 919,909  |
| (F1) EPS Est 1 week change                               | 0.00%        | 0.00%      | 0.00%     | 0.00%          | 0.00%     | 0.00%    |
| (F1) EPS Est 4 week change                               | -23.25%      | 0.00%      | -5.57%    | 2.70%          | -24.32%   | 0.00%    |
| (F1) EPS Est 12 week change                              | -35.89%      | -26.52%    | -16.22%   | -4.60%         | -31.00%   | 0.00%    |
| (Q1) EPS Est Mthly Chg                                   | -45.97%      | -6.00%     | -11.63%   | 3.01%          | -12.00%   | 0.00%    |

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## Zacks Stock Rating System

We offer two rating systems that take into account investors' holding horizons: Zacks Rank and Zacks Recommendation. Each provides valuable insights into the future profitability of the stock and can be used separately or in combination with each other depending on your investment style.

### Zacks Recommendation

The Zacks Recommendation aims to predict performance over the next 6 to 12 months. The foundation for the quantitatively determined Zacks Recommendation is trends in the company's estimate revisions and earnings outlook. The Zacks Recommendation is broken down into 3 Levels; Outperform, Neutral and Underperform. Unlike many Wall Street firms, we have an excellent balance between the number of Outperform and Neutral recommendations. Our team of 70 analysts are fully versed in the benefits of earnings estimate revisions and how that is harnessed through the Zacks quantitative rating system. But we have given our analysts the ability to override the Zacks Recommendation for the 1200 stocks that they follow. The reason for the analyst over-rides is that there are often factors such as valuation, industry conditions and management effectiveness that a trained investment professional can spot better than a quantitative model.

### Zacks Rank

The Zacks Rank is our short-term rating system that is most effective over the one- to three-month holding horizon. The underlying driver for the quantitatively-determined Zacks Rank is the same as the Zacks Recommendation, and reflects trends in earnings estimate revisions.

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### Zacks Style Scores

The Zacks Style Score is as a complementary indicator to the Zacks rating system, giving investors a way to focus on the highest rated stocks that best fit their own stock picking preferences.

Academic research has proven that stocks with the best Value, Growth and Momentum characteristics outperform the market. The Zacks Style Scores rate stocks on each of these individual styles and assigns a rating of A, B, C, D and F. We also produce the VGM Score (V for Value, G for Growth and M for Momentum), which combines the weighted average of the individual Style Scores into one score. This is perfectly suited for those who want their stocks to have the best scores across the board.

|                |   |
|----------------|---|
| Value Score    | F |
| Growth Score   | F |
| Momentum Score | C |
| VGM Score      | F |

As an investor, you want to buy stocks with the highest probability of success. That means buying stocks with a Zacks Recommendation of Outperform, which also has a Style Score of an A or a B.

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### Disclosures

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