**IAWC Exhibit 10.02**

**Illinois-American Water Company, Inc.**
Index of Schedules


| | Schedule Number |
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**Illinois-American Water Company, Inc.**
Summary Cost of Capital
Average for Twelve Months Ended December 31, 2017

| Type of Capital | Ratios | Cost Rate | Weighted Cost Rate |
|---|---|---|---|
| Long-Term Debt | 47.13% | 5.39% | 2.54% |
| Short-Term Debt | 1.86% | 1.56% | 0.03% |
| Total Debt | 48.99% | | 2.57% |
| Common Equity | 51.01% | 10.75% | 5.48% |
| Total | 100.00% | | 8.05% |

Indicated levels of fixed charge coverage assuming that the Company could actually achieve its overall cost of capital:

Pre-tax coverage of interest expense based upon a 35.000% income tax rate
( 10.98% ÷ 2.54% ) 4.32 x

Post-tax coverage of interest expense
( 8.05% ÷ 2.54% ) 3.17 x

## Illinois-American Water Company, Inc.

Cost of Equity
as of October 31, 2015

### *Market Models (DCF, RP & CAPM)*

| | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|
| ***Discounted Cash Flow (DCF)*** | | | $D_1/P_0$ (1) | + | $g$ (2) | + | *lev.* (3) | = | $k$ |
| Water Group | | | 3.00% | + | 6.00% | + | 0.89% | = | 9.89% |
| ***Risk Premium (RP)*** | | | | | $I$ (4) | + | $RP$ (5) | = | $k$ |
| Water Group | | | | | 4.75% | + | 6.50% | = | 11.25% |
| ***Capital Asset Pricing Model (CAPM)*** | $Rf$ (6) | + | $ß$ (7) | x ( | $Rm-Rf$ (8) | ) + | *size* (9) | = | $k$ |
| Water Group | 3.75% | + | 0.84 | x ( | 7.24% | ) + | 1.10% | = | 10.93% |

### *Book Value Method*

| | *Historical* | *Forecast* | *Average* |
|---|---|---|---|
| ***Comparable Earnings (CE)*** (10) | | | |
| Comparable Earnings Group | 12.3% | 13.8% | 13.05% |

References
(1) Schedule 5, page 1
(2) Schedule 7, page 1
(3) Schedule 8, page 1
(4) A-rated public utility bond yield comprised of a 3.75% risk-free rate of return (Schedule 11, page 2) and a yield spread of 1.00% (Schedule 9, page 3)
(5) Schedule 10, page 1
(6) Schedule 11, page 2
(7) Schedule 8, page 1
(8) Schedule 11, page 2
(9) Schedule 11, page 3
(10) Schedule 12, page 2

Illinois-American Water Company, Inc.
Capitalization and Financial Statistics
2010-2014, Inclusive

| | 2014 | 2013 | 2012 | 2011 | 2010 | |
|---|---|---|---|---|---|---|
| | | | (Millions of Dollars) | | | |
| Amount of Capital Employed | | | | | | |
| Permanent Capital | $ 831.7 | $ 785.6 | $ 778.9 | $ 758.2 | $ 750.8 | |
| Short-Term Debt | $ 14.2 | $ 53.5 | $ 28.9 | $ 31.1 | $ 13.3 | |
| Total Capital | $ 845.9 | $ 839.1 | $ 807.7 | $ 789.3 | $ 764.1 | |
| Capital Structure Ratios | | | | | | |
| Based on Permanent Captial: | | | | | | Average |
| Long-Term Debt | 49.7% | 50.2% | 50.8% | 50.2% | 50.8% | 50.3% |
| Preferred Stock | 0.0% | 0.0% | 0.0% | 0.0% | 0.0% | 0.0% |
| Common Equity (1) | 50.3% | 49.8% | 49.2% | 49.8% | 49.2% | 49.7% |
| | 100.0% | 100.0% | 100.0% | 100.0% | 100.0% | 100.0% |
| Based on Total Capital: | | | | | | |
| Total Debt incl. Short Term | 50.6% | 53.3% | 52.5% | 52.2% | 51.7% | 52.1% |
| Preferred Stock | 0.0% | 0.0% | 0.0% | 0.0% | 0.0% | 0.0% |
| Common Equity (1) | 49.4% | 46.7% | 47.5% | 47.8% | 48.3% | 47.9% |
| | 100.0% | 100.0% | 100.0% | 100.0% | 100.0% | 100.0% |
| Rate of Return on Book Common Equity (1) | 6.7% | 6.7% | 6.8% | 6.7% | 5.1% | 6.4% |
| Operating Ratio (2) | 73.9% | 74.5% | 74.5% | 74.3% | 77.7% | 75.0% |
| Coverage incl. AFUDC (3) | | | | | | |
| Pre-tax: All Interest Charges | 2.92 x | 2.89 x | 2.90 x | 2.89 x | 2.41 x | 2.80 x |
| Post-tax: All Interest Charges | 2.17 x | 2.14 x | 2.15 x | 2.16 x | 1.85 x | 2.09 x |
| Overall Coverage: All Int. & Pfd. Div. | 2.17 x | 2.14 x | 2.15 x | 2.16 x | 1.85 x | 2.09 x |
| Coverage excl. AFUDC (3) | | | | | | |
| Pre-tax: All Interest Charges | 2.91 x | 2.87 x | 2.86 x | 2.85 x | 2.39 x | 2.78 x |
| Post-tax: All Interest Charges | 2.16 x | 2.12 x | 2.11 x | 2.12 x | 1.83 x | 2.07 x |
| Overall Coverage: All Int. & Pfd. Div. | 2.16 x | 2.12 x | 2.11 x | 2.12 x | 1.83 x | 2.07 x |
| Quality of Earnings & Cash Flow | | | | | | |
| AFC/Income Avail. for Common Equity | 1.2% | 1.7% | 3.5% | 2.9% | 2.4% | 2.3% |
| Effective Income Tax Rate | 39.1% | 39.5% | 39.4% | 38.7% | 39.7% | 39.3% |
| Internal Cash Generation/Construction (4) | 79.1% | 86.5% | 87.2% | 88.1% | 79.4% | 84.1% |
| Gross Cash Flow/ Avg. Total Debt (5) | 20.1% | 22.5% | 20.9% | 22.3% | 19.5% | 21.1% |
| Gross Cash Flow Interest Coverage (6) | 3.80 x | 4.31 x | 4.89 x | 5.15 x | 4.47 x | 4.52 x |
| Common Dividend Coverage (7) | 4.24 x | 5.42 x | 4.43 x | 5.23 x | 6.51 x | 5.17 x |

See Page 2 for Notes.

Illinois-American Water Company, Inc.
Capitalization and Financial Statistics
2010-2014, Inclusive

Notes:

(1) Excluding Accumulated Other Comprehensive Income ("OCI") from the equity account..

(2) Total operating expenses, maintenance, depreciation and taxes other than income as a percentage of operating revenues.

(3) Coverage calculations represent the number of times available earnings, both including and excluding AFUDC (allowance for funds used during construction) as reported in its entirety, cover fixed charges.

(4) Internal cash generation/gross construction is the percentage of gross construction expenditures provided by internally-generated funds from operations after payment of all cash dividends divided by gross construction expenditures.

(5) Gross Cash Flow (sum of net income, depreciation, amortization, net deferred income taxes and investment tax credits, less AFUDC) as a percentage of average total debt.

(6) Gross Cash Flow (sum of net income, depreciation, amortization, net deferred income taxes and investment tax credits, less total AFUDC) plus interest charges, divided by interest charges.

(7) Common dividend coverage is the relationship of internally-generated funds from operations after payment of preferred stock dividends to common dividends paid.

Source of Information: Audited Financial Statements

Water Group
Capitalization and Financial Statistics [1]
2010-2014, Inclusive

| | 2014 | 2013 | 2012 | 2011 | 2010 | |
|---|---|---|---|---|---|---|
| | | | (Millions of Dollars) | | | |
| Amount of Capital Employed | | | | | | |
| Permanent Capital | $ 1,951.4 | $ 1,858.7 | $ 1,813.9 | $ 1,747.0 | $ 1,720.0 | |
| Short-Term Debt | $ 66.7 | $ 86.2 | $ 55.1 | $ 81.1 | $ 53.5 | |
| Total Capital | $ 2,018.1 | $ 1,944.9 | $ 1,869.0 | $ 1,828.1 | $ 1,773.5 | |
| Market-Based Financial Ratios | | | | | | Average |
| Price-Earnings Multiple | 19 x | 21 x | 19 x | 20 x | 20 x | 20 x |
| Market/Book Ratio | 206.6% | 202.1% | 184.6% | 177.1% | 175.9% | 189.3% |
| Dividend Yield | 2.9% | 2.9% | 3.3% | 3.5% | 3.5% | 3.2% |
| Dividend Payout Ratio | 56.0% | 63.5% | 60.4% | 69.9% | 67.2% | 63.4% |
| Capital Structure Ratios | | | | | | |
| Based on Permanent Capital: | | | | | | |
| Long-Term Debt | 45.7% | 46.3% | 49.1% | 50.7% | 51.0% | 48.6% |
| Preferred Stock | 0.1% | 0.1% | 0.1% | 0.2% | 0.2% | 0.1% |
| Common Equity [2] | 54.2% | 53.6% | 50.8% | 49.2% | 48.9% | 51.3% |
| | 100.0% | 100.0% | 100.0% | 100.0% | 100.0% | 100.0% |
| Based on Total Capital: | | | | | | |
| Total Debt incl. Short Term | 47.3% | 48.0% | 50.8% | 52.5% | 53.5% | 50.4% |
| Preferred Stock | 0.1% | 0.1% | 0.1% | 0.1% | 0.1% | 0.1% |
| Common Equity [2] | 52.6% | 51.9% | 49.1% | 47.3% | 46.3% | 49.5% |
| | 100.0% | 100.0% | 100.0% | 100.0% | 100.0% | 100.0% |
| Rate of Return on Book Common Equity [2] | 10.8% | 9.6% | 9.9% | 8.9% | 8.9% | 9.6% |
| Operating Ratio [3] | 68.2% | 70.2% | 69.6% | 70.4% | 71.4% | 70.0% |
| Coverage incl. AFUDC [4] | | | | | | |
| Pre-tax: All Interest Charges | 4.43 x | 3.95 x | 3.66 x | 3.41 x | 3.39 x | 3.77 x |
| Post-tax: All Interest Charges | 3.39 x | 3.00 x | 2.71 x | 2.50 x | 2.46 x | 2.81 x |
| Overall Coverage: All Int. & Pfd. Div. | 3.37 x | 2.99 x | 2.70 x | 2.49 x | 2.45 x | 2.80 x |
| Coverage excl. AFUDC [4] | | | | | | |
| Pre-tax: All Interest Charges | 4.38 x | 3.90 x | 3.61 x | 3.36 x | 3.34 x | 3.72 x |
| Post-tax: All Interest Charges | 3.33 x | 2.96 x | 2.66 x | 2.45 x | 2.42 x | 2.76 x |
| Overall Coverage: All Int. & Pfd. Div. | 3.32 x | 2.94 x | 2.65 x | 2.44 x | 2.41 x | 2.75 x |
| Quality of Earnings & Cash Flow | | | | | | |
| AFC/Income Avail. for Common Equity | 2.2% | 2.6% | 3.3% | 3.7% | 3.2% | 3.0% |
| Effective Income Tax Rate | 30.6% | 32.7% | 36.2% | 38.1% | 38.9% | 35.3% |
| Internal Cash Generation/Construction [5] | 94.6% | 82.9% | 83.9% | 78.9% | 67.6% | 81.6% |
| Gross Cash Flow/ Avg. Total Debt [6] | 26.2% | 21.9% | 21.3% | 19.0% | 18.6% | 21.4% |
| Gross Cash Flow Interest Coverage [7] | 6.00 x | 5.23 x | 4.84 x | 4.47 x | 4.36 x | 4.98 x |
| Common Dividend Coverage [8] | 4.24 x | 3.92 x | 3.94 x | 3.82 x | 3.74 x | 3.93 x |

See Page 2 for Notes.

Water Group
Capitalization and Financial Statistics
2010-2014, Inclusive

Notes:

(1) All capitalization and financial statistics for the group are the arithmetic average of the achieved results for each individual company in the group.
(2) Excluding Accumulated Other Comprehensive Income ("OCI") from the equity account.
(3) Total operating expenses, maintenance, depreciation and taxes other than income taxes as a percent of operating revenues.
(4) Coverage calculations represent the number of times available earnings, both including and excluding AFUDC (allowance for funds used during construction) as reported in its entirety, cover fixed charges.
(5) Internal cash generation/gross construction is the percentage of gross construction expenditures provided by internally-generated funds from operations after payment of all cash dividends divided by gross construction expenditures.
(6) Gross Cash Flow (sum of net income, depreciation, amortization, net deferred income taxes and investment tax credits, less total AFUDC) plus interest charges, divided by interest charges.
(7) Gross Cash Flow plus interest charges divided by interest charges.
(8) Common dividend coverage is the relationship of internally-generated funds from operations after payment of preferred stock dividends to common dividends paid.

Basis of Selection:
The Water Group companies have the following common characteristics: (i) they are listed in the "Water Utility Industry" section (basic and expanded editions) of The Value Line Investment Survey, (ii) their stock is publicly traded, and (iii) they are not currently the target of a publicly-announced merger or acquisition.

| | | Corporate Credit Ratings | | Stock | S&P Stock | Value Line |
|---|---|---|---|---|---|---|
| Ticker | Company | Moody's | S&P | Traded | Ranking | Beta |
| AWR | American States Water | A2 | A+ | NYSE | B+ | 0.70 |
| AWK | American Water Works Co. | Baa1 | A- | NYSE | NR | 0.70 |
| WTR | Aqua America, Inc. | - | A+ | NYSE | A | 0.75 |
| ARTNA | Artesian Resources Corp. | - | - | NASDAQ | NR | 0.55 |
| CWT | California Water Serv. Grp. | - | A+ | NYSE | A- | 0.75 |
| CTWS | Connecticut Water Services | - | A | NASDAQ | A- | 0.65 |
| MSEX | Middlesex Water Company | - | A- | NASDAQ | A- | 0.75 |
| SJW | SJW Corporation | - | A | NYSE | A- | 0.75 |
| YORW | York Water Company | - | A- | NASDAQ | A | 0.75 |
| | Average | A3 | A | | A- | 0.71 |

Note: Ratings are those of utility subsidiaries

Source of Information: Utility COMPUSTAT
Moody's Investors Service
Standard & Poor's Corporation
S&P Stock Guide

Standard & Poor's Public Utilities
Capitalization and Financial Statistics [1]
2010-2014, Inclusive

| | 2014 | 2013 | 2012 | 2011 | 2010 | |
|---|---|---|---|---|---|---|
| | | | (Millions of Dollars) | | | |
| Amount of Capital Employed | | | | | | |
| Permanent Capital | $ 23,785.1 | $ 22,496.2 | $ 21,620.0 | $ 18,840.8 | $ 17,587.3 | |
| Short-Term Debt | $ 887.5 | $ 703.8 | $ 648.9 | $ 531.4 | $ 435.4 | |
| Total Capital | $ 24,672.6 | $ 23,200.0 | $ 22,268.9 | $ 19,372.2 | $ 18,022.7 | |
| Market-Based Financial Ratios | | | | | | Average |
| Price-Earnings Multiple | 21 x | 21 x | 18 x | 15 x | 15 x | 18 x |
| Market/Book Ratio | 201.5% | 175.8% | 164.0% | 155.2% | 142.8% | 167.9% |
| Dividend Yield | 3.6% | 3.9% | 4.1% | 4.4% | 4.8% | 4.2% |
| Dividend Payout Ratio | 74.3% | 81.1% | 72.9% | 64.7% | 72.0% | 73.0% |
| Capital Structure Ratios | | | | | | |
| Based on Permanent Captial: | | | | | | |
| Long-Term Debt | 52.8% | 52.7% | 52.9% | 52.9% | 53.4% | 52.9% |
| Preferred Stock | 2.7% | 1.9% | 1.6% | 1.3% | 1.3% | 1.8% |
| Common Equity [2] | 44.4% | 45.4% | 45.5% | 45.8% | 45.3% | 45.3% |
| | 100.0% | 100.0% | 100.0% | 100.0% | 100.0% | 100.0% |
| Based on Total Capital: | | | | | | |
| Total Debt incl. Short Term | 54.7% | 54.3% | 54.5% | 54.5% | 54.7% | 54.5% |
| Preferred Stock | 2.6% | 1.9% | 1.6% | 1.3% | 1.3% | 1.7% |
| Common Equity [2] | 42.7% | 43.9% | 44.0% | 44.3% | 44.0% | 43.8% |
| | 100.0% | 100.0% | 100.0% | 100.0% | 100.0% | 100.0% |
| Rate of Return on Book Common Equity [2] | 9.9% | 8.4% | 9.2% | 10.5% | 10.8% | 9.8% |
| Operating Ratio [3] | 81.0% | 81.3% | 81.3% | 81.4% | 81.6% | 81.3% |
| Coverage incl. AFUDC [4] | | | | | | |
| Pre-tax: All Interest Charges | 3.57 x | 3.24 x | 2.94 x | 3.35 x | 3.34 x | 3.29 x |
| Post-tax: All Interest Charges | 2.70 x | 2.46 x | 2.35 x | 2.59 x | 2.52 x | 2.52 x |
| Overall Coverage: All Int. & Pfd. Div. | 2.67 x | 2.43 x | 2.32 x | 2.57 x | 2.50 x | 2.50 x |
| Coverage excl. AFUDC [4] | | | | | | |
| Pre-tax: All Interest Charges | 3.47 x | 3.15 x | 2.85 x | 3.25 x | 3.25 x | 3.19 x |
| Post-tax: All Interest Charges | 2.60 x | 2.36 x | 2.25 x | 2.49 x | 2.43 x | 2.43 x |
| Overall Coverage: All Int. & Pfd. Div. | 2.57 x | 2.34 x | 2.22 x | 2.47 x | 2.41 x | 2.40 x |
| Quality of Earnings & Cash Flow | | | | | | |
| AFC/Income Avail. for Common Equity | 7.6% | 7.6% | 7.1% | 5.7% | 6.7% | 6.9% |
| Effective Income Tax Rate | 30.2% | 35.2% | 31.8% | 33.5% | 34.3% | 33.0% |
| Internal Cash Generation/Construction [5] | 85.0% | 80.3% | 75.0% | 89.4% | 108.0% | 87.5% |
| Gross Cash Flow/ Avg. Total Debt [6] | 23.3% | 22.7% | 21.9% | 23.2% | 23.9% | 23.0% |
| Gross Cash Flow Interest Coverage [7] | 5.70 x | 5.47 x | 5.37 x | 5.12 x | 5.09 x | 5.35 x |
| Common Dividend Coverage [8] | 7.00 x | 6.38 x | 4.31 x | 4.58 x | 4.88 x | 5.43 x |

See Page 2 for Notes.

Standard & Poor's Public Utilities
Capitalization and Financial Statistics
2010-2014, Inclusive

Notes:

(1) All capitalization and financial statistics for the group are the arithmetic average of the achieved results for each individual company in the group.
(2) Excluding Accumulated Other Comprehensive Income ("OCI") from the equity account
(3) Total operating expenses, maintenance, depreciation and taxes other than income taxes as a percent of operating revenues.
(4) Coverage calculations represent the number of times available earnings, both including and excluding AFUDC (allowance for funds used during construction) as reported in its entirety, cover fixed charges.
(5) Internal cash generation/gross construction is the percentage of gross construction expenditures provided by internally-generated funds from operations after payment of all cash dividends divided by gross construction expenditures.
(6) Gross Cash Flow (sum of net income, depreciation, amortization, net deferred income taxes and investment tax credits, less total AFUDC) as a percentage of average total debt.
(7) Gross Cash Flow (sum of net income, depreciation, amortization, net deferred income taxes and investment tax credits, less total AFUDC) plus interest charges, divided by interest charges.
(8) Common dividend coverage is the relationship of internally-generated funds from operations after payment of preferred stock dividends to common dividends paid.

Source of Information: Annual Reports to Shareholders
Utility COMPUSTAT

**Standard & Poor's Public Utilities**

Company Identities

| | Ticker | Credit Rating [1] Moody's | Credit Rating [1] S&P | Common Stock Traded | S&P Stock Ranking | Value Line Beta |
|---|---|---|---|---|---|---|
| AGL Resources Inc. | GAS | A2 | BBB+ | NYSE | A | 0.75 |
| Ameren Corporation | AEE | Baa1 | BBB+ | NYSE | B | 0.80 |
| American Electric Power | AEP | Baa1 | BBB | NYSE | B | 0.70 |
| CMS Energy | CMS | A3 | BBB | NYSE | B | 0.70 |
| CenterPoint Energy | CNP | A3 | A- | NYSE | B | 0.80 |
| Consolidated Edison | ED | A2 | A- | NYSE | B+ | 0.60 |
| DTE Energy Co. | DTE | A2 | BBB+ | NYSE | B+ | 0.80 |
| Dominion Resources | D | A2 | A- | NYSE | B+ | 0.70 |
| Duke Energy | DUK | A1 | BBB+ | NYSE | B | 0.65 |
| Edison Int'l | EIX | A2 | BBB+ | NYSE | B | 0.80 |
| Entergy Corp. | ETR | Baa1 | BBB | NYSE | A | 0.70 |
| EQT Corp. | EQT | Baa3 | BBB | NYSE | B+ | 1.15 |
| Exelon Corp. | EXC | A2 | BBB | NYSE | B+ | 0.75 |
| FirstEnergy Corp. | FE | Baa2 | BBB- | NYSE | B+ | 0.75 |
| Integrys Energy Group | TEG | A1 | A- | NYSE | B | 1.00 |
| NextEra Energy Inc. | NEE | A1 | A- | NYSE | A | 0.70 |
| NiSource Inc. | NI | Baa1 | BBB- | NYSE | B | 0.85 |
| Northeast Utilities | NU | Baa1 | A- | NYSE | B | 0.75 |
| NRG Energy Inc. | NRG | Ba3 | BB- | NYSE | B | 1.05 |
| ONEOK, Inc. | OKE | Baa3 | BB+ | NYSE | A- | 1.05 |
| PEPCO Holdings, Inc. | POM | Baa1 | BBB+ | NYSE | B | 0.75 |
| PG&E Corp. | PCG | A3 | BBB | NYSE | B | 0.60 |
| PPL Corp. | PPL | Baa1 | BBB | NYSE | B+ | 0.65 |
| Pinnacle West Capital | PNW | A3 | A- | NYSE | B | 0.75 |
| Public Serv. Enterprise Inc. | PEG | A2 | BBB+ | NYSE | B+ | 0.75 |
| SCANA Corp. | SCG | Baa2 | BBB+ | NYSE | A- | 0.70 |
| Sempra Energy | SRE | A1 | A | NYSE | B+ | 0.75 |
| Southern Co. | SO | A3 | A | NYSE | A- | 0.55 |
| TECO Energy | TE | A2 | BBB+ | NYSE | B | 0.95 |
| Wisconsin Energy Corp. | WEC | A1 | A- | NYSE | A | 0.65 |
| Xcel Energy Inc | XEL | A2 | A- | NYSE | B+ | 0.65 |
| Average for S&P Utilities | | A3 | BBB+ | | B+ | 0.77 |

Note: [1] Ratings are those of utility subsidiaries

Source of Information: Moody's Investors Service
Standard & Poor's Corporation
Standard & Poor's Stock Guide
Value Line Investment Survey for Windows

**Monthly Dividend Yields for**
**Water Group**
**for the Twelve Months Ending October 2015**

| Company | Nov-14 | Dec-14 | Jan-15 | Feb-15 | Mar-15 | Apr-15 | May-15 | Jun-15 | Jul-15 | Aug-15 | Sep-15 | Oct-15 | 12-Month Average | 6-Month Average | 3-Month Average |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| American States Water Co (AWR) | 2.44% | 2.27% | 2.16% | 2.13% | 2.14% | 2.23% | 2.22% | 2.29% | 2.34% | 2.38% | 2.17% | 2.21% | | | |
| American Water Works Co Inc (AWK) | 2.34% | 2.33% | 2.22% | 2.30% | 2.30% | 2.51% | 2.58% | 2.81% | 2.64% | 2.62% | 2.48% | 2.38% | | | |
| Aqua America Inc (WTR) | 2.49% | 2.48% | 2.45% | 2.50% | 2.51% | 2.47% | 2.51% | 2.70% | 2.82% | 2.81% | 2.70% | 2.50% | | | |
| Artesian Resource Corp Class A (ARTNA) | 4.02% | 3.83% | 3.92% | 3.97% | 4.04% | 4.09% | 4.11% | 4.17% | 4.09% | 3.98% | 3.64% | 3.67% | | | |
| California Water Service Group (CWT) | 2.60% | 2.65% | 2.75% | 2.64% | 2.74% | 2.83% | 2.81% | 2.94% | 3.13% | 3.25% | 3.04% | 3.02% | | | |
| Connecticut Water Service Inc (CTWS) | 2.96% | 2.85% | 2.88% | 2.78% | 2.84% | 2.88% | 2.92% | 3.02% | 3.16% | 3.08% | 2.94% | 2.92% | | | |
| Middlesex Water Co (MSEX) | 3.50% | 3.35% | 3.55% | 3.32% | 3.40% | 3.41% | 3.53% | 3.43% | 3.41% | 3.39% | 3.24% | 3.11% | | | |
| SJW Corp (SJW) | 2.51% | 2.34% | 2.32% | 2.35% | 2.53% | 2.68% | 2.59% | 2.55% | 2.63% | 2.72% | 2.55% | 2.47% | | | |
| The York Water Co (YORW) | 2.98% | 2.58% | 2.53% | 2.53% | 2.47% | 2.39% | 2.69% | 2.87% | 2.81% | 2.83% | 2.85% | 2.59% | | | |
| **Average** | **2.87%** | **2.74%** | **2.75%** | **2.72%** | **2.77%** | **2.83%** | **2.88%** | **2.98%** | **3.00%** | **3.01%** | **2.85%** | **2.76%** | **2.85%** | **2.91%** | **2.87%** |

Note: Monthly dividend yields are calculated by dividing the annualized quarterly dividend by the month-end closing stock price adjusted by the fraction of the ex-dividend.

Source of Information: http://performance.morningstar.com/stock/performance-return
http://www.nasdaq.com

**Forward-looking Dividend Yield**

| 1/2 Growth | $D_0/P_0$ | (.5g) | $D_1/P_0$ |
|---|---|---|---|
| | 2.91% | 1.030000 | 3.00% |

$$K = \frac{D_0(1+g)^0 + D_0(1+g)^0 + D_0(1+g)^1 + D_0(1+g)^1}{P_0} + g$$

| Discrete | $D_0/P_0$ | Adj. | $D_1/P_0$ |
|---|---|---|---|
| | 2.91% | 1.037227 | 3.02% |

$$K = \frac{D_0(1+g)^{.25} + D_0(1+g)^{.50} + D_0(1+g)^{.75} + D_0(1+g)^{1.00}}{P_0} + g$$

| Quarterly | $D_0/P_0$ | Adj. | $D_1/P_0$ |
|---|---|---|---|
| | 0.7283% | 1.014674 | 2.99% |
| Average | | | 3.00% |
| **Growth rate** | | | 6.00% |
| **K** | | | 9.00% |

$$K = \left[\left(1 + \frac{D_0(1+g)^{.25}}{P_0}\right)^4 - 1\right] + g$$

## Historical Growth Rates

Earnings Per Share, Dividends Per Share,
Book Value Per Share, and Cash Flow Per Share

| Company | Earnings per Share | | Dividends per Share | | Book Value per Share | | Cash Flow per Share | |
|---|---|---|---|---|---|---|---|---|
| | Value Line | | Value Line | | Value Line | | Value Line | |
| | 5 Year | 10 Year | 5 Year | 10 Year | 5 Year | 10 Year | 5 Year | 10 Year |
| American States Water | 14.00% | 11.00% | 8.50% | 5.50% | 6.50% | 6.00% | 9.00% | 8.50% |
| American Water Works Co., Inc. | NMF | - | 21.50% | - | 0.50% | - | 20.50% | - |
| Aqua America, Inc. | 13.00% | 8.50% | 7.00% | 7.50% | 6.50% | 7.50% | 8.00% | 8.00% |
| Artesian Res. Corp. | 3.00% | - | 3.50% | - | 3.00% | - | 3.50% | - |
| California Water Serv. Grp. | 4.00% | 5.00% | 2.00% | 1.50% | 5.00% | 5.50% | 5.50% | 6.00% |
| Connecticut Water Services | 9.00% | 4.00% | 2.00% | 2.00% | 9.50% | 6.50% | 7.50% | 4.00% |
| Middlesex Water Company | 4.50% | 4.00% | 1.50% | 1.50% | 3.00% | 4.50% | 3.00% | 3.50% |
| SJW Corporation | 10.50% | 6.50% | 3.00% | 4.00% | 3.50% | 6.00% | 8.00% | 7.00% |
| York Water Company | 6.00% | 5.50% | 2.50% | 4.00% | 4.50% | 6.50% | 6.50% | 7.00% |
| Average | 8.00% | 6.36% | 5.72% | 3.71% | 4.67% | 6.07% | 7.94% | 6.29% |

Source of Information: Value Line Investment Survey, October 16, 2015

**Analysts' Five-Year Projected Growth Rates**
Earnings Per Share, Dividends Per Share,
Book Value Per Share, and Cash Flow Per Share

| Company | I/B/E/S First Call | Zacks Earnings Per share | Morningstar Earnings Per share | Value Line Earnings Per Share | Value Line Dividends Per Share | Value Line Book Value Per Share | Value Line Cash Flow Per Share | Value Line Percent Retained to Common Equity |
|---|---|---|---|---|---|---|---|---|
| American States Water | 5.00% | 5.00% | 1.00% | 6.00% | 7.50% | 3.00% | 5.00% | 6.50% |
| American Water Works | 7.34% | 7.20% | 5.50% | 7.00% | 8.50% | 5.50% | 6.50% | 4.00% |
| Aqua America, Inc. | 5.55% | 6.00% | 5.80% | 7.50% | 9.50% | 5.50% | 6.50% | 5.50% |
| Artesian Resources Corp. | 4.00% | NA | - | - | - | - | - | - |
| California Water Serv. Grp. | 5.00% | 5.00% | 6.00% | 6.50% | 7.00% | 4.50% | 5.50% | 3.50% |
| Connecticut Water Services | 5.00% | 5.00% | - | 4.50% | 5.00% | 4.00% | 4.50% | 4.00% |
| Middlesex Water Company | 2.70% | NA | - | 5.00% | 2.00% | 3.00% | 4.50% | 3.50% |
| SJW Corporation | 14.00% | NA | 14.00% | 1.50% | 6.00% | 6.00% | 2.50% | 3.00% |
| York Water Company | 4.90% | NA | - | 6.50% | 6.50% | 3.00% | 6.00% | 3.50% |
| Average | 5.94% | 5.64% | 6.46% | 5.56% | 6.50% | 4.31% | 5.13% | 4.19% |

Source of Information : Yahoo First Call, October 29, 2015
Zacks, October 29, 2015
Morningstar, October 29, 2015

**Water Group**
Financial Risk Adjustment

| | American States Water Co (NYSE:AWR) | American Water Works Co. (NYSE:AWK) | Aqua America Inc. (NYSE:WTR) | Artesian Resources Corp (NDS:ARTNA) | California Water Service Group (NYSE:CWT) | Connecticut Water Service (NDS:CTWS) | Middlesex Water Co. (NDS:MSEX) | SJW Corp (NYSE:SJW) | The York Water Company (NDS:YORW) | Average |
|---|---|---|---|---|---|---|---|---|---|---|
| Fiscal Year | 12/31/14 | 12/31/14 | 12/31/14 | 12/31/14 | 12/31/14 | 12/31/14 | 12/31/14 | 12/31/14 | 12/31/14 | |
| Capitalization at Fair Values | | | | | | | | | | |
| Debt(D) | 417,057 | 6,404,388 | 1,694,424 | 129,243 | 534,068 | 189,942 | 141,457 | 460,171 | 100,000 | 1,118,972 |
| Preferred(P) | 0 | | 0 | 0 | 0 | 772 | 2,436 | 0 | 0 | 401 |
| Equity(E) | 1,441,874 | 9,551,413 | 4,670,238 | 201,322 | 1,176,506 | 403,713 | 371,819 | 651,613 | 297,796 | 2,085,144 |
| Total | 1,858,931 | 15,955,801 | 6,364,662 | 330,565 | 1,710,574 | 594,427 | 515,712 | 1,111,784 | 397,796 | 3,204,473 |
| Capital Structure Ratios | | | | | | | | | | |
| Debt(D) | 22.44% | 40.14% | 26.62% | 39.10% | 31.22% | 31.95% | 27.43% | 41.39% | 25.14% | 31.71% |
| Preferred(P) | 0.00% | 0.00% | 0.00% | 0.00% | 0.00% | 0.13% | 0.47% | 0.00% | 0.00% | 0.07% |
| Equity(E) | 77.56% | 59.86% | 73.38% | 60.90% | 68.78% | 67.92% | 72.10% | 58.61% | 74.86% | 68.22% |
| Total | 100.00% | 100.00% | 100.00% | 100.00% | 100.00% | 100.00% | 100.00% | 100.00% | 100.00% | 100.00% |
| Common Stock | | | | | | | | | | |
| Issued | 38,286.626 | 179,462.000 | 176,753.270 | 8,912.000 | 47,806.000 | 11,124.630 | 16,124.000 | 20,286.840 | 12,830.521 | |
| Treasury | 0.000 | 261.000 | 1,837.984 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | |
| Outstanding | 38,286.626 | 179,201.000 | 174,915.286 | 8,912.000 | 47,806.000 | 11,124.630 | 16,124.000 | 20,286.840 | 12,830.521 | |
| Market Price | $37.66 | $53.30 | $26.70 | $22.59 | $24.61 | $36.29 | $23.06 | $32.12 | $23.21 | |
| Capitalization at Carrying Amounts | | | | | | | | | | |
| Debt(D) | 326,090 | 5,491,341 | 1,619,270 | 106,199 | 425,840 | 176,601 | 139,968 | 384,949 | 84,885 | 972,794 |
| Preferred(P) | 0 | 17,151 | 0 | 0 | 0 | 772 | 2,436 | 0 | 0 | 2,262 |
| Equity(E) | 506,801 | 4,915,591 | 1,655,343 | 125,605 | 626,626 | 209,451 | 197,291 | 360,155 | 104,563 | 966,825 |
| Total | 832,891 | 10,424,083 | 3,274,613 | 231,804 | 1,052,466 | 386,824 | 339,695 | 745,104 | 189,448 | 1,941,881 |
| Capital Structure Ratios | | | | | | | | | | |
| Debt(D) | 39.15% | 52.68% | 49.45% | 45.81% | 40.46% | 45.65% | 41.20% | 51.66% | 44.81% | 45.65% |
| Preferred(P) | 0.00% | 0.16% | 0.00% | 0.00% | 0.00% | 0.20% | 0.72% | 0.00% | 0.00% | 0.12% |
| Equity(E) | 60.85% | 47.16% | 50.55% | 54.19% | 59.54% | 54.15% | 58.08% | 48.34% | 55.19% | 54.23% |
| Total | 100.00% | 100.00% | 100.00% | 100.00% | 100.00% | 100.00% | 100.00% | 100.00% | 100.00% | 100.00% |
| Betas Value Line | 0.70 | 0.70 | 0.75 | 0.55 | 0.75 | 0.65 | 0.75 | 0.75 | 0.75 | 0.71 |

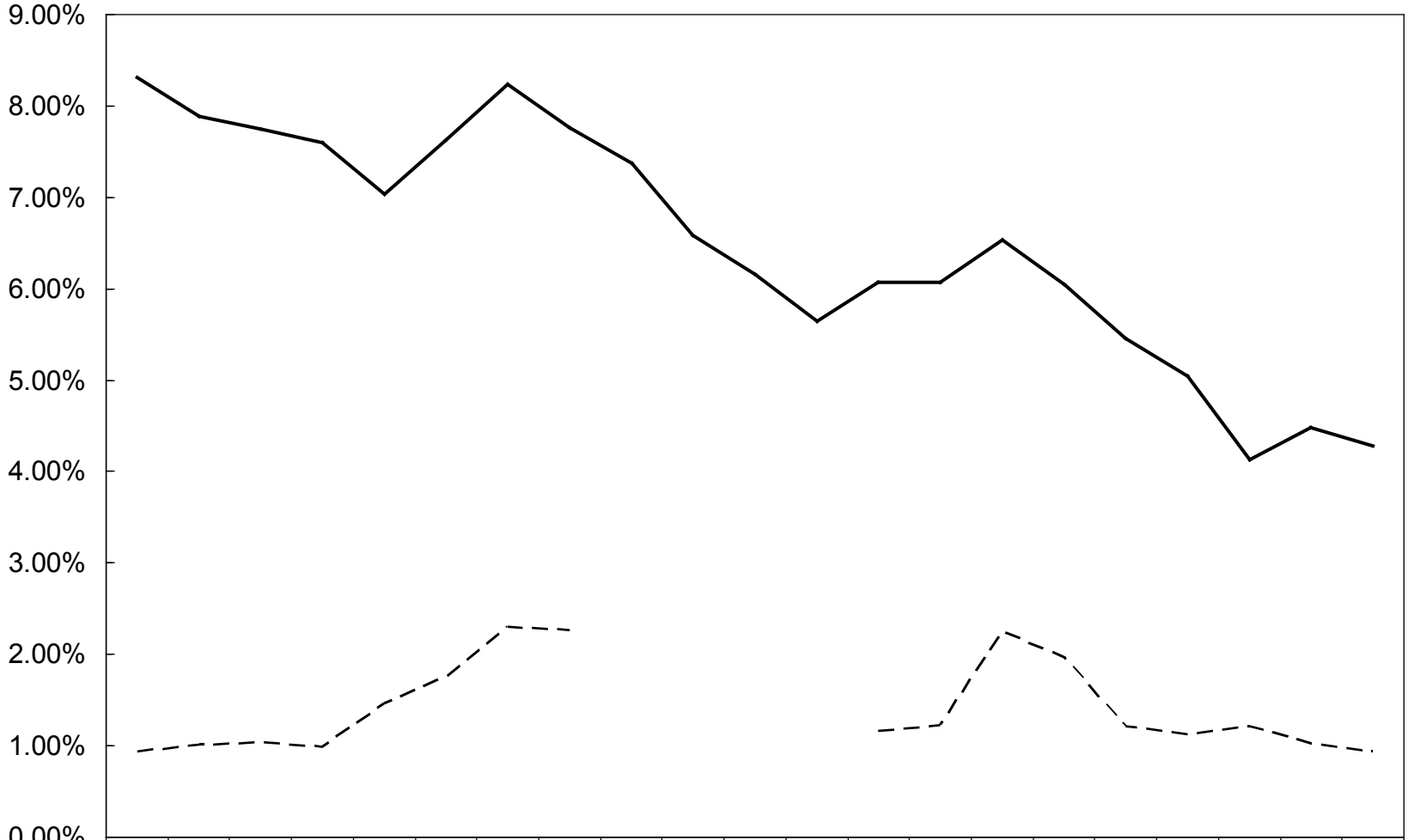
| | | | | | | | | | | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Hamada | Bl | = | Bu | [1+ | (1 - t ) | D/E | + | P/E | ] | | | | | | | | | | | | |
| | 0.71 | = | Bu | [1+ | (1-0.35) | 0.4648 | + | 0.0010 | ] | | | | | | | | | | | | |
| | 0.71 | = | Bu | [1+ | 0.65 | 0.4648 | + | 0.0010 | ] | | | | | | | | | | | | |
| | 0.71 | = | Bu | 1.3031 | | | | | | | | | | | | | | | | | |
| | 0.54 | = | Bu | | | | | | | | | | | | | | | | | | |
| Hamada | Bl | = | 0.54 | [1+ | (1 - t) | D/E | + | P/E | ] | | | | | | | | | | | | |
| | Bl | = | 0.54 | [1+ | 0.65 | 0.8419 | + | 0.0022 | ] | | | | | | | | | | | | |
| | Bl | = | 0.54 | 1.5494 | | | | | | | | | | | | | | | | | |
| | Bl | = | 0.84 | | | | | | | | | | | | | | | | | | |
| M&M | ku | = | ke | - | ((( | ku | - | i | ) | 1-t | ) | D | / | E | ) - ( | ku | - | d | ) | P | / E |
| | 7.92% | = | 9.00% | - | ((( | 7.92% | - | 4.32% | ) | 0.65 | ) | 31.71% | / | 68.22% | ) - ( | 7.92% | - | 5.68% | ) | 0.07% | / 68.22% |
| | 7.92% | = | 9.00% | - | ((( | 3.60% | | | ) | 0.65 | ) | 0.4648 | | | ) - ( | 2.24% | | | ) | 0.0010 | |
| | 7.92% | = | 9.00% | - | (( | 2.34% | | | | | ) | 0.4648 | | | ) - ( | 2.24% | | | ) | 0.0010 | |
| | 7.92% | = | 9.00% | - | | 1.09% | | | | | | | | | - | 0.00% | | | | | |
| M&M | ke | = | ku | + | ((( | ku | - | i | ) | 1-t | ) | D | / | E | ) + ( | ku | - | d | ) | P | / E |
| | 9.89% | = | 7.92% | + | ((( | 7.92% | - | 4.32% | ) | 0.65 | ) | 45.65% | / | 54.23% | ) + ( | 7.92% | - | 5.68% | ) | 0.12% | / 54.23% |
| | 9.89% | = | 7.92% | + | ((( | 3.60% | | | ) | 0.65 | ) | 0.8419 | | | ) + ( | 2.24% | | | ) | 0.0022 | |
| | 9.89% | = | 7.92% | + | ( ( | 2.34% | | | | | ) | 0.8419 | | | ) + ( | 2.24% | | | ) | 0.0022 | |
| | 9.89% | = | 7.92% | + | | 1.97% | | | | | | | | | + | 0.00% | | | | | |

**Interest Rates for Investment Grade Public Utility Bonds**
**Yearly for 2010-2014**
**and the Twelve Months Ended October 2015**

| Years | Aa Rated | A Rated | Baa Rated | Average |
|---|---|---|---|---|
| 2010 | 5.24% | 5.46% | 5.96% | 5.55% |
| 2011 | 4.78% | 5.04% | 5.57% | 5.13% |
| 2012 | 3.83% | 4.13% | 4.86% | 4.27% |
| 2013 | 4.24% | 4.48% | 4.98% | 4.57% |
| 2014 | 4.19% | 4.28% | 4.80% | 4.42% |
| **Five-Year Average** | 4.46% | 4.68% | 5.23% | 4.79% |
| **Months** | | | | |
| Nov-15 | 4.03% | 4.09% | 4.75% | 4.29% |
| Dec-15 | 3.90% | 3.95% | 4.70% | 4.18% |
| Jan-15 | 3.52% | 3.58% | 4.39% | 3.83% |
| Feb-15 | 3.62% | 3.67% | 4.44% | 3.91% |
| Mar-15 | 3.67% | 3.74% | 4.51% | 3.97% |
| Apr-15 | 3.63% | 3.75% | 4.51% | 3.96% |
| May-15 | 4.05% | 4.17% | 4.91% | 4.38% |
| Jun-15 | 4.29% | 4.39% | 5.13% | 4.60% |
| Jul-15 | 4.27% | 4.40% | 5.22% | 4.63% |
| Aug-15 | 4.13% | 4.25% | 5.23% | 4.54% |
| Sep-15 | 4.25% | 4.39% | 5.42% | 4.68% |
| Oct-15 | 4.13% | 4.29% | 5.47% | 4.63% |
| **Twelve-Month Average** | 3.96% | 4.06% | 4.89% | 4.30% |
| **Six-Month Average** | 4.19% | 4.32% | 5.23% | 4.58% |
| **Three-Month Average** | 4.17% | 4.31% | 5.37% | 4.62% |

Source: Mergent Bond Record

# Yields on A-rated Public Utility Bonds and Spreads over 30-Year Treasuries




| | 1994 | 1995 | 1996 | 1997 | 1998 | 1999 | 2000 | 2001 | 2002 | 2003 | 2004 | 2005 | 2006 | 2007 | 2008 | 2009 | 2010 | 2011 | 2012 | 2013 | 2014 |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| A-rated Public Utility | 8.31% | 7.89% | 7.75% | 7.60% | 7.04% | 7.62% | 8.24% | 7.76% | 7.37% | 6.58% | 6.16% | 5.65% | 6.07% | 6.07% | 6.53% | 6.04% | 5.46% | 5.04% | 4.13% | 4.48% | 4.28% |
| Spread vs. 30-year | 0.94% | 1.01% | 1.04% | 0.99% | 1.46% | 1.75% | 2.30% | 2.27% | | | | | 1.16% | 1.23% | 2.25% | 1.96% | 1.21% | 1.13% | 1.21% | 1.03% | 0.94% |

**A rated Public Utility Bonds over 30-Year Treasuries**

| Year | A-rated Public Utility | 30-Year Treasuries Yield | 30-Year Treasuries Spread |
|---|---|---|---|
| Jan-99 | 6.97% | 5.16% | 1.81% |
| Feb-99 | 7.09% | 5.37% | 1.72% |
| Mar-99 | 7.26% | 5.58% | 1.68% |
| Apr-99 | 7.22% | 5.55% | 1.67% |
| May-99 | 7.47% | 5.81% | 1.66% |
| Jun-99 | 7.74% | 6.04% | 1.70% |
| Jul-99 | 7.71% | 5.98% | 1.73% |
| Aug-99 | 7.91% | 6.07% | 1.84% |
| Sep-99 | 7.93% | 6.07% | 1.86% |
| Oct-99 | 8.06% | 6.26% | 1.80% |
| Nov-99 | 7.94% | 6.15% | 1.79% |
| Dec-99 | 8.14% | 6.35% | 1.79% |
| Jan-00 | 8.35% | 6.63% | 1.72% |
| Feb-00 | 8.25% | 6.23% | 2.02% |
| Mar-00 | 8.28% | 6.05% | 2.23% |
| Apr-00 | 8.29% | 5.85% | 2.44% |
| May-00 | 8.70% | 6.15% | 2.55% |
| Jun-00 | 8.36% | 5.93% | 2.43% |
| Jul-00 | 8.25% | 5.85% | 2.40% |
| Aug-00 | 8.13% | 5.72% | 2.41% |
| Sep-00 | 8.23% | 5.83% | 2.40% |
| Oct-00 | 8.14% | 5.80% | 2.34% |
| Nov-00 | 8.11% | 5.78% | 2.33% |
| Dec-00 | 7.84% | 5.49% | 2.35% |
| Jan-01 | 7.80% | 5.54% | 2.26% |
| Feb-01 | 7.74% | 5.45% | 2.29% |
| Mar-01 | 7.68% | 5.34% | 2.34% |
| Apr-01 | 7.94% | 5.65% | 2.29% |
| May-01 | 7.99% | 5.78% | 2.21% |
| Jun-01 | 7.85% | 5.67% | 2.18% |
| Jul-01 | 7.78% | 5.61% | 2.17% |
| Aug-01 | 7.59% | 5.48% | 2.11% |
| Sep-01 | 7.75% | 5.48% | 2.27% |
| Oct-01 | 7.63% | 5.32% | 2.31% |
| Nov-01 | 7.57% | 5.12% | 2.45% |
| Dec-01 | 7.83% | 5.48% | 2.35% |
| Jan-02 | 7.66% | 5.45% | 2.21% |
| Feb-02 | 7.54% | 5.40% | 2.14% |
| Mar-02 | 7.76% | | |
| Apr-02 | 7.57% | | |
| May-02 | 7.52% | | |
| Jun-02 | 7.42% | | |
| Jul-02 | 7.31% | | |
| Aug-02 | 7.17% | | |
| Sep-02 | 7.08% | | |
| Oct-02 | 7.23% | | |
| Nov-02 | 7.14% | | |
| Dec-02 | 7.07% | | |

| Year | A-rated Public Utility | 30-Year Treasuries Yield | 30-Year Treasuries Spread |
|---|---|---|---|
| Jan-03 | 7.07% | | |
| Feb-03 | 6.93% | | |
| Mar-03 | 6.79% | | |
| Apr-03 | 6.64% | | |
| May-03 | 6.36% | | |
| Jun-03 | 6.21% | | |
| Jul-03 | 6.57% | | |
| Aug-03 | 6.78% | | |
| Sep-03 | 6.56% | | |
| Oct-03 | 6.43% | | |
| Nov-03 | 6.37% | | |
| Dec-03 | 6.27% | | |
| Jan-04 | 6.15% | | |
| Feb-04 | 6.15% | | |
| Mar-04 | 5.97% | | |
| Apr-04 | 6.35% | | |
| May-04 | 6.62% | | |
| Jun-04 | 6.46% | | |
| Jul-04 | 6.27% | | |
| Aug-04 | 6.14% | | |
| Sep-04 | 5.98% | | |
| Oct-04 | 5.94% | | |
| Nov-04 | 5.97% | | |
| Dec-04 | 5.92% | | |
| Jan-05 | 5.78% | | |
| Feb-05 | 5.61% | | |
| Mar-05 | 5.83% | | |
| Apr-05 | 5.64% | | |
| May-05 | 5.53% | | |
| Jun-05 | 5.40% | | |
| Jul-05 | 5.51% | | |
| Aug-05 | 5.50% | | |
| Sep-05 | 5.52% | | |
| Oct-05 | 5.79% | | |
| Nov-05 | 5.88% | | |
| Dec-05 | 5.80% | | |
| Jan-06 | 5.75% | | |
| Feb-06 | 5.82% | 4.54% | 1.28% |
| Mar-06 | 5.98% | 4.73% | 1.25% |
| Apr-06 | 6.29% | 5.06% | 1.23% |
| May-06 | 6.42% | 5.20% | 1.22% |
| Jun-06 | 6.40% | 5.15% | 1.25% |
| Jul-06 | 6.37% | 5.13% | 1.24% |
| Aug-06 | 6.20% | 5.00% | 1.20% |
| Sep-06 | 6.00% | 4.85% | 1.15% |
| Oct-06 | 5.98% | 4.85% | 1.13% |
| Nov-06 | 5.80% | 4.69% | 1.11% |
| Dec-06 | 5.81% | 4.68% | 1.13% |

| Year | A-rated Public Utility | 30-Year Treasuries Yield | 30-Year Treasuries Spread |
|---|---|---|---|
| Jan-07 | 5.96% | 4.85% | 1.11% |
| Feb-07 | 5.90% | 4.82% | 1.08% |
| Mar-07 | 5.85% | 4.72% | 1.13% |
| Apr-07 | 5.97% | 4.87% | 1.10% |
| May-07 | 5.99% | 4.90% | 1.09% |
| Jun-07 | 6.30% | 5.20% | 1.10% |
| Jul-07 | 6.25% | 5.11% | 1.14% |
| Aug-07 | 6.24% | 4.93% | 1.31% |
| Sep-07 | 6.18% | 4.79% | 1.39% |
| Oct-07 | 6.11% | 4.77% | 1.34% |
| Nov-07 | 5.97% | 4.52% | 1.45% |
| Dec-07 | 6.16% | 4.53% | 1.63% |
| Jan-08 | 6.02% | 4.33% | 1.69% |
| Feb-08 | 6.21% | 4.52% | 1.69% |
| Mar-08 | 6.21% | 4.39% | 1.82% |
| Apr-08 | 6.29% | 4.44% | 1.85% |
| May-08 | 6.28% | 4.60% | 1.68% |
| Jun-08 | 6.38% | 4.69% | 1.69% |
| Jul-08 | 6.40% | 4.57% | 1.83% |
| Aug-08 | 6.37% | 4.50% | 1.87% |
| Sep-08 | 6.49% | 4.27% | 2.22% |
| Oct-08 | 7.56% | 4.17% | 3.39% |
| Nov-08 | 7.60% | 4.00% | 3.60% |
| Dec-08 | 6.52% | 2.87% | 3.65% |
| Jan-09 | 6.39% | 3.13% | 3.26% |
| Feb-09 | 6.30% | 3.59% | 2.71% |
| Mar-09 | 6.42% | 3.64% | 2.78% |
| Apr-09 | 6.48% | 3.76% | 2.72% |
| May-09 | 6.49% | 4.23% | 2.26% |
| Jun-09 | 6.20% | 4.52% | 1.68% |
| Jul-09 | 5.97% | 4.41% | 1.56% |
| Aug-09 | 5.71% | 4.37% | 1.34% |
| Sep-09 | 5.53% | 4.19% | 1.34% |
| Oct-09 | 5.55% | 4.19% | 1.36% |
| Nov-09 | 5.64% | 4.31% | 1.33% |
| Dec-09 | 5.79% | 4.49% | 1.30% |
| Jan-10 | 5.77% | 4.60% | 1.17% |
| Feb-10 | 5.87% | 4.62% | 1.25% |
| Mar-10 | 5.84% | 4.64% | 1.20% |
| Apr-10 | 5.81% | 4.69% | 1.12% |
| May-10 | 5.50% | 4.29% | 1.21% |
| Jun-10 | 5.46% | 4.13% | 1.33% |
| Jul-10 | 5.26% | 3.99% | 1.27% |
| Aug-10 | 5.01% | 3.80% | 1.21% |
| Sep-10 | 5.01% | 3.77% | 1.24% |
| Oct-10 | 5.10% | 3.87% | 1.23% |
| Nov-10 | 5.37% | 4.19% | 1.18% |
| Dec-10 | 5.56% | 4.42% | 1.14% |

| Year | A-rated Public Utility | 30-Year Treasuries Yield | 30-Year Treasuries Spread |
|---|---|---|---|
| Jan-11 | 5.57% | 4.52% | 1.05% |
| Feb-11 | 5.68% | 4.65% | 1.03% |
| Mar-11 | 5.56% | 4.51% | 1.05% |
| Apr-11 | 5.55% | 4.50% | 1.05% |
| May-11 | 5.32% | 4.29% | 1.03% |
| Jun-11 | 5.26% | 4.23% | 1.03% |
| Jul-11 | 5.27% | 4.27% | 1.00% |
| Aug-11 | 4.69% | 3.65% | 1.04% |
| Sep-11 | 4.48% | 3.18% | 1.30% |
| Oct-11 | 4.52% | 3.13% | 1.39% |
| Nov-11 | 4.25% | 3.02% | 1.23% |
| Dec-11 | 4.33% | 2.98% | 1.35% |
| Jan-12 | 4.34% | 3.03% | 1.31% |
| Feb-12 | 4.36% | 3.11% | 1.25% |
| Mar-12 | 4.48% | 3.28% | 1.20% |
| Apr-12 | 4.40% | 3.18% | 1.22% |
| May-12 | 4.20% | 2.93% | 1.27% |
| Jun-12 | 4.08% | 2.70% | 1.38% |
| Jul-12 | 3.93% | 2.59% | 1.34% |
| Aug-12 | 4.00% | 2.77% | 1.23% |
| Sep-12 | 4.02% | 2.88% | 1.14% |
| Oct-12 | 3.91% | 2.90% | 1.01% |
| Nov-12 | 3.84% | 2.80% | 1.04% |
| Dec-12 | 4.00% | 2.88% | 1.12% |
| Jan-13 | 4.15% | 3.08% | 1.07% |
| Feb-13 | 4.18% | 3.17% | 1.01% |
| Mar-13 | 4.20% | 3.16% | 1.04% |
| Apr-13 | 4.00% | 2.93% | 1.07% |
| May-13 | 4.17% | 3.11% | 1.06% |
| Jun-13 | 4.53% | 3.40% | 1.13% |
| Jul-13 | 4.68% | 3.61% | 1.07% |
| Aug-13 | 4.73% | 3.76% | 0.97% |
| Sep-13 | 4.80% | 3.79% | 1.01% |
| Oct-13 | 4.70% | 3.68% | 1.02% |
| Nov-13 | 4.77% | 3.80% | 0.97% |
| Dec-13 | 4.81% | 3.89% | 0.92% |
| Jan-14 | 4.63% | 3.77% | 0.86% |
| Feb-14 | 4.53% | 3.66% | 0.87% |
| Mar-14 | 4.51% | 3.62% | 0.89% |
| Apr-14 | 4.41% | 3.52% | 0.89% |
| May-14 | 4.26% | 3.39% | 0.87% |
| Jun-14 | 4.29% | 3.42% | 0.87% |
| Jul-14 | 4.23% | 3.33% | 0.90% |
| Aug-14 | 4.13% | 3.20% | 0.93% |
| Sep-14 | 4.24% | 3.26% | 0.98% |
| Oct-14 | 4.06% | 3.04% | 1.02% |
| Nov-14 | 4.09% | 3.04% | 1.05% |
| Dec-14 | 3.95% | 2.83% | 1.12% |

| Year | A-rated Public Utility | 30-Year Treasuries Yield | 30-Year Treasuries Spread |
|---|---|---|---|
| Jan-15 | 3.58% | 2.46% | 1.12% |
| Feb-15 | 3.67% | 2.57% | 1.10% |
| Mar-15 | 3.74% | 2.63% | 1.11% |
| Apr-15 | 3.75% | 2.59% | 1.16% |
| May-15 | 4.17% | 2.96% | 1.21% |
| Jun-15 | 4.39% | 3.11% | 1.28% |
| Jul-15 | 4.40% | 3.07% | 1.33% |
| Aug-15 | 4.25% | 2.86% | 1.39% |
| Sep-15 | 4.39% | 2.95% | 1.44% |
| Oct-15 | 4.29% | 2.89% | 1.40% |
| Average: | | | |
| 12-months | | | 1.23% |
| 6-months | | | 1.34% |
| 3-months | | | 1.41% |

**Common Equity Risk Premiums**
**Years 1926-2014**

| | Large Common Stocks | Long-Term Corp. Bonds | Equity Risk Premium | Long-Term Govt. Bonds Yields |
|---|---|---|---|---|
| Low Interest Rates | 12.21% | 4.85% | 7.36% | 3.00% |
| Average Across All Interest Rates | 12.07% | 6.38% | 5.69% | 5.12% |
| High Interest Rates | 11.93% | 7.95% | 3.98% | 7.28% |

Source of Information: Stocks, Bonds, Bills, and Inflation (SBBI) 2015 Classic Yearbook

**Basic Series**
**Annual Total Returns (except yields)**

| Year | Large Common Stocks | Long-Term Corp. Bonds | Long-Term Govt. Bonds Yields |
|---|---|---|---|
| 1940 | -9.78% | 3.39% | 1.94% |
| 1945 | 36.44% | 4.08% | 1.99% |
| 1941 | -11.59% | 2.73% | 2.04% |
| 1949 | 18.79% | 3.31% | 2.09% |
| 1946 | -8.07% | 1.72% | 2.12% |
| 1950 | 31.71% | 2.12% | 2.24% |
| 1939 | -0.41% | 3.97% | 2.26% |
| 1948 | 5.50% | 4.14% | 2.37% |
| 2013 | 13.69% | 17.28% | 2.40% |
| 2012 | 16.00% | 10.68% | 2.41% |
| 1947 | 5.71% | -2.34% | 2.43% |
| 1942 | 20.34% | 2.60% | 2.46% |
| 1944 | 19.75% | 4.73% | 2.46% |
| 1943 | 25.90% | 2.83% | 2.48% |
| 2011 | 2.11% | 17.95% | 2.48% |
| 1938 | 31.12% | 6.13% | 2.52% |
| 1936 | 33.92% | 6.74% | 2.55% |
| 1951 | 24.02% | -2.69% | 2.69% |
| 1954 | 52.62% | 5.39% | 2.72% |
| 1937 | -35.03% | 2.75% | 2.73% |
| 1953 | -0.99% | 3.41% | 2.74% |
| 1935 | 47.67% | 9.61% | 2.76% |
| 1952 | 18.37% | 3.52% | 2.79% |
| 1934 | -1.44% | 13.84% | 2.93% |
| 1955 | 31.56% | 0.48% | 2.95% |
| 2008 | -37.00% | 8.78% | 3.03% |
| 1932 | -8.19% | 10.82% | 3.15% |
| 1927 | 37.49% | 7.44% | 3.16% |
| 1957 | -10.78% | 8.71% | 3.23% |
| 1930 | -24.90% | 7.98% | 3.30% |
| 1933 | 53.99% | 10.38% | 3.36% |
| 1928 | 43.61% | 2.84% | 3.40% |
| 1929 | -8.42% | 3.27% | 3.40% |
| 1956 | 6.56% | -6.81% | 3.45% |
| 1926 | 11.62% | 7.37% | 3.54% |
| 2013 | 32.39% | -7.07% | 3.67% |
| 1960 | 0.47% | 9.07% | 3.80% |
| 1958 | 43.36% | -2.22% | 3.82% |
| 1962 | -8.73% | 7.95% | 3.95% |
| 1931 | -43.34% | -1.85% | 4.07% |
| 2010 | 15.06% | 12.44% | 4.14% |
| 1961 | 26.89% | 4.82% | 4.15% |
| 1963 | 22.80% | 2.19% | 4.17% |
| 1964 | 16.48% | 4.77% | 4.23% |
| 1959 | 11.96% | -0.97% | 4.47% |
| 1965 | 12.45% | -0.46% | 4.50% |
| 2007 | 5.49% | 2.60% | 4.50% |
| 1966 | -10.06% | 0.20% | 4.55% |
| 2009 | 26.46% | 3.02% | 4.58% |
| 2005 | 4.91% | 5.87% | 4.61% |
| 2002 | -22.10% | 16.33% | 4.84% |
| 2004 | 10.88% | 8.72% | 4.84% |
| 2006 | 15.79% | 3.24% | 4.91% |
| 2003 | 28.68% | 5.27% | 5.11% |
| 1998 | 28.58% | 10.76% | 5.42% |
| 1967 | 23.98% | -4.95% | 5.56% |
| 2000 | -9.10% | 12.87% | 5.58% |
| 2001 | -11.89% | 10.65% | 5.75% |
| 1971 | 14.30% | 11.01% | 5.97% |
| 1968 | 11.06% | 2.57% | 5.98% |
| 1972 | 18.99% | 7.26% | 5.99% |
| 1997 | 33.36% | 12.95% | 6.02% |
| 1995 | 37.58% | 27.20% | 6.03% |
| 1970 | 3.86% | 18.37% | 6.48% |
| 1993 | 10.08% | 13.19% | 6.54% |
| 1996 | 22.96% | 1.40% | 6.73% |
| 1999 | 21.04% | -7.45% | 6.82% |
| 1969 | -8.50% | -8.09% | 6.87% |
| 1976 | 23.93% | 18.65% | 7.21% |
| 1973 | -14.69% | 1.14% | 7.26% |
| 1992 | 7.62% | 9.39% | 7.26% |
| 1991 | 30.47% | 19.89% | 7.30% |
| 1974 | -26.47% | -3.06% | 7.60% |
| 1986 | 18.67% | 19.85% | 7.89% |
| 1994 | 1.32% | -5.76% | 7.99% |
| 1977 | -7.16% | 1.71% | 8.03% |
| 1975 | 37.23% | 14.64% | 8.05% |
| 1989 | 31.69% | 16.23% | 8.16% |
| 1990 | -3.10% | 6.78% | 8.44% |
| 1978 | 6.57% | -0.07% | 8.98% |
| 1988 | 16.61% | 10.70% | 9.18% |
| 1987 | 5.25% | -0.27% | 9.20% |
| 1985 | 31.73% | 30.09% | 9.56% |
| 1979 | 18.61% | -4.18% | 10.12% |
| 1982 | 21.55% | 42.56% | 10.95% |
| 1984 | 6.27% | 16.86% | 11.70% |
| 1983 | 22.56% | 6.26% | 11.97% |
| 1980 | 32.50% | -2.76% | 11.99% |
| 1981 | -4.92% | -1.24% | 13.34% |

**Yields for Treasury Constant Maturities**
**Yearly for 2010-2014**
**and the Twelve Months Ended October 2015**

| Years | 1-Year | 2-Year | 3-Year | 5-Year | 7-Year | 10-Year | 20-Year | 30-Year |
|---|---|---|---|---|---|---|---|---|
| 2010 | 0.32% | 0.70% | 1.11% | 1.93% | 2.62% | 3.22% | 4.03% | 4.25% |
| 2011 | 0.18% | 0.45% | 0.75% | 1.52% | 2.16% | 2.78% | 3.62% | 3.91% |
| 2012 | 0.17% | 0.28% | 0.38% | 0.76% | 1.22% | 1.80% | 2.54% | 2.92% |
| 2013 | 0.13% | 0.31% | 0.54% | 1.17% | 1.74% | 2.35% | 3.12% | 3.45% |
| 2014 | 0.12% | 0.46% | 0.90% | 1.64% | 2.14% | 2.54% | 3.07% | 3.34% |
| **Five-Year Average** | 0.18% | 0.44% | 0.74% | 1.40% | 1.98% | 2.54% | 3.28% | 3.57% |
| **Months** | | | | | | | | |
| Nov-14 | 0.13% | 0.53% | 0.96% | 1.62% | 2.03% | 2.33% | 2.76% | 3.04% |
| Dec-14 | 0.21% | 0.64% | 1.06% | 1.64% | 1.98% | 2.21% | 2.55% | 2.83% |
| Jan-15 | 0.20% | 0.55% | 0.90% | 1.37% | 1.67% | 1.88% | 2.20% | 2.46% |
| Feb-15 | 0.22% | 0.62% | 0.99% | 1.47% | 1.79% | 1.98% | 2.34% | 2.57% |
| Mar-15 | 0.25% | 0.64% | 1.02% | 1.52% | 1.84% | 2.04% | 2.41% | 2.63% |
| Apr-15 | 0.23% | 0.54% | 0.87% | 1.35% | 1.69% | 1.94% | 2.33% | 2.59% |
| May-15 | 0.24% | 0.61% | 0.98% | 1.54% | 1.93% | 2.20% | 2.69% | 2.96% |
| Jun-15 | 0.28% | 0.69% | 1.07% | 1.68% | 2.10% | 2.36% | 2.85% | 3.11% |
| Jul-15 | 0.30% | 0.67% | 1.03% | 1.63% | 2.04% | 2.32% | 2.77% | 3.07% |
| Aug-15 | 0.38% | 0.70% | 1.03% | 1.54% | 1.91% | 2.17% | 2.55% | 2.86% |
| Sep-15 | 0.37% | 0.71% | 1.01% | 1.49% | 1.88% | 2.17% | 2.62% | 2.95% |
| Oct-15 | 0.26% | 0.64% | 0.93% | 1.39% | 1.76% | 2.07% | 2.50% | 2.89% |
| **Twelve-Month Average** | 0.26% | 0.63% | 0.99% | 1.52% | 1.89% | 2.14% | 2.55% | 2.83% |
| **Six-Month Average** | 0.31% | 0.67% | 1.01% | 1.55% | 1.94% | 2.22% | 2.66% | 2.97% |
| **Three-Month Average** | 0.34% | 0.68% | 0.99% | 1.47% | 1.85% | 2.14% | 2.56% | 2.90% |

Source: Federal Reserve statistical release H.15

**Measures of the Risk-Free Rate & Corporate Bond Yields**

The forecast of Treasury and Corporate yields
per the consensus of nearly 50 economists
reported in the Blue Chip Financial Forecasts dated November 1, 2015

| | | Treasury | | | | | Corporate | |
|---|---|---|---|---|---|---|---|---|
| Year | Quarter | 1-Year Bill | 2-Year Note | 5-Year Note | 10-Year Note | 30-Year Bond | Aaa Bond | Baa Bond |
| 2015 | Fourth | 0.4% | 0.7% | 1.5% | 2.2% | 2.9% | 4.0% | 5.2% |
| 2016 | First | 0.6% | 1.0% | 1.8% | 2.4% | 3.1% | 4.2% | 5.3% |
| 2016 | Second | 0.9% | 1.3% | 2.0% | 2.6% | 3.3% | 4.4% | 5.4% |
| 2016 | Third | 1.2% | 1.5% | 2.2% | 2.8% | 3.5% | 4.6% | 5.6% |
| 2016 | Fourth | 1.5% | 1.8% | 2.4% | 3.0% | 3.6% | 4.7% | 5.7% |
| 2017 | First | 1.7% | 2.0% | 2.6% | 3.1% | 3.8% | 4.9% | 5.8% |

**Measures of the Market Premium**

| | Value Line Return | | | | |
|---|---|---|---|---|---|
| As of: | Dividend Yield | | Median Appreciation Potential | | Median Total Return |
| 30-Oct-15 | 2.3% | + | 9.73% | = | 12.03% |

DCF Result for the S&P 500 Composite

| D/P | ( 1+.5g ) | + | g | = | k |
|---|---|---|---|---|---|
| 2.08% | ( 1.0305 ) | + | 6.10% | = | 8.24% |

| | | | | | |
|---|---|---|---|---|---|
| where: | Price (P) | at | 30-Oct-15 | = | 2079.36 |
| | Dividend (D) | for | 3rd Qtr. '15 | = | 10.79 |
| | Dividend (D) | | annualized | = | 43.16 |
| | Growth (g) | by | First Call | = | 6.10% |

Summary

| | | | |
|---|---|---|---|
| Value Line | | | 12.03% |
| S&P 500 | | | 8.24% |
| Average | | | 10.14% |
| Risk-free Rate of Return (Rf) | | | 3.75% |
| Forecast Market Premium | | | 6.39% |
| Historical Market Premium | (Rm) | (Rf) | |
| 1926-2014 Arith. mean | 12.14% | 4.06% | 8.08% |
| Average - Forecast/Historical | | | 7.24% |

This phenomenon can also be viewed graphically, as depicted in the Graph 7-2. The security market line is based on the pure CAPM without adjusting for the size premium. Based on the risk (or beta) of a security, the expected return should fluctuate along the security market line. However, the expected returns for the smaller deciles of the NYSE/AMEX/NASDAQ lie above the line, indicating that these deciles have had returns in excess of those appropriate for their systematic risk.

**Table 7-6:** Size-Decile Portfolios of the NYSE/AMEX/NASDAQ Long-Term Returns in Excess of CAPM

| Decile | Beta* | Arithmetic Mean Return (%) | Actual Return in Excess of Riskless Rate** (%) | CAPM Return in Excess of Riskless Rate† (%) | Size Premium (Return in Excess of CAPM) (%) |
|---|---|---|---|---|---|
| 1 | 0.91 | 11.15 | 6.08 | 6.40 | -0.32 |
| 2 | 1.04 | 12.96 | 7.89 | 7.24 | 0.65 |
| 3 | 1.10 | 13.71 | 8.64 | 7.70 | 0.94 |
| 4 | 1.13 | 14.01 | 8.93 | 7.88 | 1.05 |
| 5 | 1.16 | 14.84 | 9.76 | 8.11 | 1.65 |
| 6 | 1.19 | 15.01 | 9.94 | 8.31 | 1.63 |
| 7 | 1.24 | 15.53 | 10.46 | 8.69 | 1.77 |
| 8 | 1.30 | 16.35 | 11.27 | 9.10 | 2.18 |
| 9 | 1.35 | 17.13 | 12.06 | 9.42 | 2.64 |
| 10 | 1.40 | 20.62 | 15.54 | 9.82 | 5.72 |
| Mid-Cap, 3-5 | 1.12 | 14.00 | 8.93 | 7.83 | 1.10 |
| Low-Cap, 6-8 | 1.23 | 15.44 | 10.36 | 8.59 | 1.77 |
| Micro-Cap, 9-10 | 1.36 | 18.26 | 13.18 | 9.49 | 3.69 |

Data from 1926–2014.

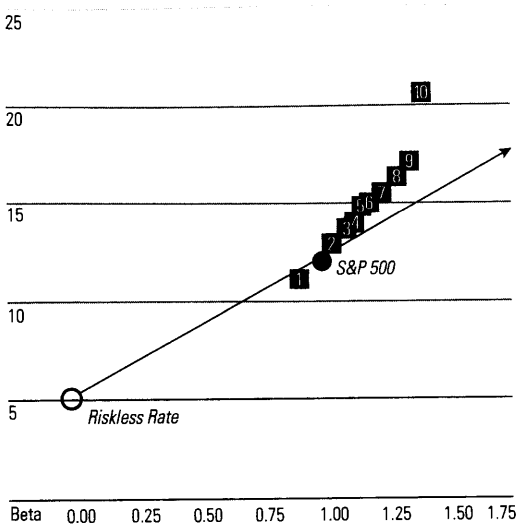
*Betas are estimated from monthly returns in excess of the 30-day U.S. Treasury bill total return, January 1926–December 2014.

**Historical riskless rate measured by the 89-year arithmetic mean income return component of 20-year government bonds (5.07%).

†Calculated in the context of the CAPM by multiplying the equity risk premium by beta. The equity risk premium is estimated by the arithmetic mean total return of the S&P 500 (12.07%) minus the arithmetic mean income return component of 20-year government bonds (5.07%) from 1926–2014.

Source: Morningstar and CRSP. Calculated (or Derived) based on data from CRSP US Stock Database and CRSP US Indices Database ©2015 Center for Research in Security Prices (CRSP®), The University of Chicago Booth School of Business. Used with permission.

**Graph 7-2:** Security Market Line Versus Size-Decile Portfolios of the NYSE/AMEX/NASDAQ




Data from 1926–2014.

### Serial Correlation in Small-Cap Stock Returns

In four of the last 10 years, large-capitalization stocks (deciles 1-2 of NYSE/AMEX/NASDAQ) have outperformed small-capitalization stocks (deciles 9-10). This has led some market observers to speculate that there is no size premium. But statistical evidence suggests that periods of underperformance should be expected. For instance, large-cap stocks have outperformed small-cap stocks in nearly half of the years since 1926. It should be noted, however, that large-cap stocks' average historical outperformance has been less than the average historical outperformance of small-cap stocks.

History tells us that small companies are riskier than large companies. Table 7-1 [see page 100] shows the standard deviation (a measure of risk) for each decile of the NYSE/AMEX/NASDAQ. As one moves from larger to smaller deciles, the standard deviation of return grows. Investors are compensated for taking on this additional risk by the higher returns provided by small companies. It is important to note, however, that the risk/return profile is over the long term. If small companies did not provide higher long-term returns, investors would be more inclined to invest in the less-risky stocks of large companies.

**Comparable Earnings Approach**

Using Non-Utility Companies with
Timeliness of 2 & 3; Safety Rank of 2 & 3; Financial Strength of B, B+, B++ & A;
Price Stability of 85 to 100; Betas of .60 to .80; and Technical Rank of 2, 3, 4 & 5

| Company | Industry | Timeliness Rank | Safety Rank | Financial Strength | Price Stability | Beta | Technical Rank |
|---|---|---|---|---|---|---|---|
| Altria Group | TOBACCO | 2 | 2 | B+ | 100 | 0.65 | 5 |
| Capitol Fed. Fin'l | THRIFT | 3 | 2 | B+ | 100 | 0.65 | 5 |
| Clorox Co. | HOUSEPRD | 3 | 2 | B++ | 100 | 0.65 | 4 |
| Coca-Cola Bottling | BEVERAGE | 3 | 3 | B | 85 | 0.70 | 3 |
| Dollar Tree Inc. | RETAIL | 2 | 2 | A | 85 | 0.65 | 3 |
| Dr Pepper Snapple | BEVERAGE | 2 | 2 | A | 95 | 0.65 | 4 |
| Endurance Specialty | REINSUR | 3 | 2 | B++ | 90 | 0.80 | 3 |
| Hershey Co. | FOODPROC | 3 | 2 | B++ | 100 | 0.60 | 5 |
| Kroger Co. | GROCERY | 2 | 2 | A | 90 | 0.75 | 4 |
| Republic Services | ENVIRONM | 3 | 2 | B++ | 95 | 0.80 | 4 |
| Reynolds American | TOBACCO | 2 | 2 | B+ | 95 | 0.70 | 4 |
| Shaw Commun. 'B' | CABLETV | 3 | 2 | B+ | 100 | 0.60 | 4 |
| Silgan Holdings | PACKAGE | 3 | 3 | B+ | 85 | 0.80 | 2 |
| Verisk Analytics | INFOSER | 3 | 2 | B++ | 95 | 0.70 | 3 |
| Waste Connections | ENVIRONM | 3 | 3 | B+ | 95 | 0.75 | 3 |
| Average | | 3 | 2 | B++ | 94 | 0.70 | 4 |
| Water Group | Average | 3 | 3 | B++ | 91 | 0.72 | 3 |

Source of Information: Value Line Investment Survey for Windows, July 2015

**Comparable Earnings Approach**
Five -Year Average Historical Earned Returns
for Years 2010-2014 and
Projected 3-5 Year Returns

| Company | 2010 | 2011 | 2012 | 2013 | 2014 | Average | Projected 2018-20 |
|---|---|---|---|---|---|---|---|
| Altria Group | 75.2% | 92.1% | NMF | NMF | NMF | 83.7% | NMF |
| Capitol Fed. Fin'l | 7.1% | 3.3% | 4.1% | 4.2% | 5.2% | 4.8% | 6.0% |
| Clorox Co. | NMF | - | NMF | NMF | NMF | - | NMF |
| Coca-Cola Bottling | 28.4% | 21.8% | 21.1% | 16.6% | 17.1% | 21.0% | 22.0% |
| Dollar Tree Inc. | 27.2% | 36.3% | 34.9% | 51.0% | 33.6% | 36.6% | 22.0% |
| Dr Pepper Snapple | 23.7% | 26.8% | 26.9% | 26.5% | 30.6% | 26.9% | 19.0% |
| Endurance Specialty | 12.8% | NMF | 6.0% | 10.8% | 10.9% | 10.1% | 7.5% |
| Hershey Co. | 65.1% | 76.4% | 71.4% | 52.6% | 61.6% | 65.4% | 45.5% |
| Kroger Co. | 21.1% | 30.0% | 33.8% | 27.8% | 32.6% | 29.1% | 23.0% |
| Republic Services | 8.4% | 9.7% | 8.6% | 9.0% | 9.0% | 8.9% | 10.0% |
| Reynolds American | 22.4% | 26.3% | 24.2% | 33.2% | 32.0% | 27.6% | 47.0% |
| Shaw Commun. 'B' | 19.2% | 22.2% | 20.3% | 18.7% | 18.1% | 19.7% | 20.5% |
| Silgan Holdings | 26.1% | 29.4% | 20.1% | 26.0% | 25.7% | 25.5% | 20.0% |
| Verisk Analytics | - | - | NMF | NMF | NMF | - | 23.0% |
| Waste Connections | 10.5% | 12.1% | 9.3% | 10.0% | 10.6% | 10.5% | 12.5% |
| Mean | | | | | | 28.4% | 21.4% |
| Median | | | | | | 25.5% | 20.5% |
| Average (excluding values <8% and >20%) | | | | | | 12.3% | 13.8% |

**Comparable Earnings Approach**
Screening Parameters

Timeliness Rank

The rank for a stock's probable relative market performance in the year ahead. Stocks ranked 1 (Highest) or 2 (Above Average) are likely to outpace the year-ahead market. Those ranked 4 (Below Average) or 5 (Lowest) are not expected to outperform most stocks over the next 12 months. Stocks ranked 3 (Average) will probably advance or decline with the market in the year ahead. Investors should try to limit purchases to stocks ranked 1 (Highest) or 2 (Above Average) for Timeliness.

Safety Rank

A measure of potential risk associated with individual common stocks rather than large diversified portfolios (for which Beta is good risk measure). Safety is based on the stability of price, which includes sensitivity to the market (see Beta) as well as the stock's inherent volatility, adjusted for trend and other factors including company size, the penetration of its markets, product market volatility, the degree of financial leverage, the earnings quality, and the overall condition of the balance sheet. Safety Ranks range from 1 (Highest) to 5 (Lowest). Conservative investors should try to limit purchases to equities ranked 1 (Highest) or 2 (Above Average) for Safety.

Financial Strength

The financial strength of each of the more than 1,600 companies in the VS II data base is rated relative to all the others. The ratings range from A++ to C in nine steps. (For screening purposes, think of an A rating as "greater than" a B). Companies that have the best relative financial strength are given an A++ rating, indicating ability to weather hard times better than the vast majority of other companies. Those who don't quite merit the top rating are given an A+ grade, and so on. A rating as low as C++ is considered satisfactory. A rating of C+ is well below average, and C is reserved for companies with very serious financial problems. The ratings are based upon a computer analysis of a number of key variables that determine (a) financial leverage, (b) business risk, and (c) company size, plus the judgment of Value Line's analysts and senior editors regarding factors that cannot be quantified across-the-board for companies. The primary variables that are indexed and studied include equity coverage of debt, equity coverage of intangibles, "quick ratio", accounting methods, variability of return, fixed charge coverage, stock price stability, and company size.

Price Stability Index

An index based upon a ranking of the weekly percent changes in the price of the stock over the last five years. The lower the standard deviation of the changes, the more stable the stock. Stocks ranking in the top 5% (lowest standard deviations) carry a Price Stability Index of 100; the next 5%, 95; and so on down to 5. One standard deviation is the range around the average weekly percent change in the price that encompasses about two thirds of all the weekly percent change figures over the last five years. When the range is wide, the standard deviation is high and the stock's Price Stability Index is low.

Beta

A measure of the sensitivity of the stock's price to overall fluctuations in the New York Stock Exchange Composite Average. A Beta of 1.50 indicates that a stock tends to rise (or fall) 50% more than the New York Stock Exchange Composite Average. Use Beta to measure the stock market risk inherent in any diversified portfolio of, say, 15 or more companies. Otherwise, use the Safety Rank, which measures total risk inherent in an equity, including that portion attributable to market fluctuations. Beta is derived from a least squares regression analysis between weekly percent changes in the price of a stock and weekly percent changes in the NYSE Average over a period of five years. In the case of shorter price histories, a smaller time period is used, but two years is the minimum. The Betas are periodically adjusted for their long-term tendency to regress toward 1.00.

Technical Rank

A prediction of relative price movement, primarily over the next three to six months. It is a function of price action relative to all stocks followed by Value Line. Stocks ranked 1 (Highest) or 2 (Above Average) are likely to outpace the market. Those ranked 4 (Below Average) or 5 (Lowest) are not expected to outperform most stocks over the next six months. Stocks ranked 3 (Average) will probably advance or decline with the market. Investors should use the Technical and Timeliness Ranks as complements to one another.