What Drives Investment Return?

MicNOVA
November 19, 2014
Earnings

Dividends

P/E Ratio
Historical Sources of Stock Market Returns over the Decades

Investment Return: Dividend Yield and Earnings Growth

Speculative Return: Impact of P/E Change

Market Return: S&P 500 Total

Source: Jack Bogle 2014
Market Return vs. Investment Return, 1900-9/2014

- Investment Return 9.24% / Year
- Market Return 9.58% / Year

Source: Jack Bogle 2014
U.S. Stock Market Return / Investment Return, 1900-9/2014

Returns


S&P 500 Price


Source: Jack Bogle 2014
Cumulative Total Return
Investment and Speculative Return, 1900-9/2014

Value of Initial $1

$1000

Investment Return
Speculative Return

Returns
1-4

6.1%
Annual Real Return
0.4%

Source: Jack Bogle 2014
S&P 500 Dividend Growth, 1926-9/2014

Source: Jack Bogle 2014
Dividends Matter!

Growth of an initial investment of $1,000

- S&P 500 Total Return
- S&P 500 Capital Return

Source: Jack Bogle 2014
## Dividend Yields and Expense Ratios*, 9/2004

<table>
<thead>
<tr>
<th>Category</th>
<th>Net Yield</th>
<th>Expense Ratio</th>
<th>Gross Yield</th>
<th>Percentage of Yield Consumed by Expenses</th>
</tr>
</thead>
<tbody>
<tr>
<td>Domestic Stock</td>
<td>0.7%</td>
<td>1.2%</td>
<td>1.9%</td>
<td>63%</td>
</tr>
<tr>
<td>International Stock</td>
<td>1.1</td>
<td>1.4</td>
<td>2.5</td>
<td>56</td>
</tr>
<tr>
<td>Taxable Bond</td>
<td>2.0</td>
<td>0.9</td>
<td>2.9</td>
<td>31</td>
</tr>
<tr>
<td>Municipal Bond</td>
<td>2.9</td>
<td>0.9</td>
<td>3.8</td>
<td>24</td>
</tr>
<tr>
<td>Balanced</td>
<td>1.7</td>
<td>1.1</td>
<td>2.8</td>
<td>39</td>
</tr>
</tbody>
</table>

*Source: Morningstar

Source: Jack Bogle 2014
Impact of Expenses on Total Return over 30 yrs

- 8% Return
- 0.25% Fee
- 0.9% Fee
- 1.4% Fee
Costs Reduce Return

Distribution of investor returns after costs are considered:
Less than 50% of invested dollars outperform; more than 50% underperform

Average investor return after cost is less than market return

Impact of costs

Average investor return before cost equals market return

Distribution of investor returns before costs are considered:
50% of invested dollars outperform; 50% underperform

Source: Vanguard
Further Study

• http://www.bogleheads.org

• http://vimeo.com/channels/bogleheads

• http://morningstar.com (seach for “jack bogle video”)

• Little Book of Common Sense Investing - Jack Bogle

• Bogleheads’ Guide to Investing, 2d edition 2014