FTSE North America Minimum Variance Indices

The FTSE North American Minimum Variance indices aim to deliver reduced index volatility based on historical return information, thereby offering potential improvements to the risk reward trade-off, whilst maintaining full allocation to the equity market.

Reduced volatility is achieved by applying a transparent rules-based approach which minimizes historical variance subject to additional constraints on the weight of individual stocks within the index, and, at aggregate level on the weight of industries represented in the index.

Constituents of the relevant index are selected from the underlying index at the time of the bi-annual review. Aspects such as index reviews and company classification are governed by the FTSE All-World Index Series Ground Rules.

**10-Year Performance - Total Return**

<table>
<thead>
<tr>
<th>Index (USD)</th>
<th>Return %</th>
<th>Return pa %*</th>
<th>Volatility %**</th>
</tr>
</thead>
<tbody>
<tr>
<td>FTSE Developed Ex US Minimum Variance</td>
<td>6.6</td>
<td>-9.5</td>
<td>18.0</td>
</tr>
<tr>
<td>FTSE Developed Ex US</td>
<td>11.2</td>
<td>-6.3</td>
<td>16.4</td>
</tr>
<tr>
<td>FTSE USA Minimum Variance</td>
<td>9.5</td>
<td>-7.3</td>
<td>46.6</td>
</tr>
<tr>
<td>FTSE USA</td>
<td>13.8</td>
<td>3.2</td>
<td>73.1</td>
</tr>
<tr>
<td>FTSE North America Minimum Variance</td>
<td>10.1</td>
<td>-6.3</td>
<td>22.9</td>
</tr>
<tr>
<td>FTSE North America</td>
<td>13.7</td>
<td>2.7</td>
<td>70.5</td>
</tr>
</tbody>
</table>

* Compound annual returns measured over 3 and 5 years respectively
** Volatility – 1YR based on 12 months daily data. 3YR based on weekly data (Wednesday to Wednesday). 5YR based on monthly data.

**FEATURES**

**Methodology**
The approach applies a rules-based strategy to minimise volatility. Some constraints are applied, for example, to avoid over concentration in any particular stock or sector.

**Objective**
The indices are designed for the creation of index tracking funds, derivatives and as a performance benchmark.

**Investability**
Stocks in the underlying universe are free-float weighted to ensure that only the investable opportunity set is included.

**Liquidity**
Stocks are screened to ensure that the index is tradable.

**Transparency**
The indices use a transparent, rules-based construction process. Index Rules are freely available on the FTSE website.

**Availability**
The indices are calculated based on price and total return methodologies, both real time (US index only) and end-of-day.

**Industry Classification Benchmark**
Index constituents are categorized in accordance with the Industry Classification Benchmark (ICB), the global standard for industry sector analysis.

Source: FTSE Russell as at 31 July 2020. Past performance is no guarantee of future results. Returns shown before the index launch date reflect hypothetical historical performance. Please see disclaimer for important legal information.
### Year-on-Year Performance - Total Return

<table>
<thead>
<tr>
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<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>FTSE Developed Ex US Minimum Variance</td>
<td>14.8</td>
<td>-4.2</td>
<td>16.4</td>
<td>15.8</td>
<td>1.6</td>
<td>2.4</td>
<td>4.4</td>
<td>27.3</td>
<td>-10.3</td>
<td>16.1</td>
</tr>
<tr>
<td>FTSE Developed Ex US</td>
<td>9.8</td>
<td>-12.0</td>
<td>17.8</td>
<td>20.6</td>
<td>-4.0</td>
<td>-1.9</td>
<td>3.4</td>
<td>26.3</td>
<td>-14.1</td>
<td>22.6</td>
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<tr>
<td>FTSE USA Minimum Variance</td>
<td>17.2</td>
<td>8.6</td>
<td>14.3</td>
<td>31.8</td>
<td>18.9</td>
<td>1.6</td>
<td>12.2</td>
<td>16.9</td>
<td>-3.3</td>
<td>27.6</td>
</tr>
<tr>
<td>FTSE USA</td>
<td>15.1</td>
<td>1.7</td>
<td>16.3</td>
<td>32.8</td>
<td>13.3</td>
<td>1.0</td>
<td>11.8</td>
<td>22.1</td>
<td>-4.5</td>
<td>31.6</td>
</tr>
<tr>
<td>FTSE North America Minimum Variance</td>
<td>18.2</td>
<td>7.0</td>
<td>14.0</td>
<td>27.5</td>
<td>18.0</td>
<td>-0.7</td>
<td>13.5</td>
<td>17.1</td>
<td>-4.1</td>
<td>28.3</td>
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<tr>
<td>FTSE North America</td>
<td>15.4</td>
<td>0.5</td>
<td>15.8</td>
<td>30.7</td>
<td>12.6</td>
<td>-0.4</td>
<td>12.4</td>
<td>21.8</td>
<td>-5.1</td>
<td>31.5</td>
</tr>
</tbody>
</table>

### Annualised Rolling 252 Volatility - Total Return
INFORMATION

Index Universe
FTSE All-World Index Series

Index Launch
July 2012 (US), May 2013 (North America), May 2015 (Developed ex US)

Base Date
15 June 2012

Base Value
100

Investability Screen
Actual free float applied and liquidity screened

Index Calculation
Real time (US only) and end of day

End-of-Day Distribution
Via FTP and email

Currency
USD, EUR, GBP, JPY, AUD

Review Dates
March and September

History
Available from September 2001 (US), December 2003 (North America), September 2003 (Developed ex US)

Data definitions available from info@ftserussell.com
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