American Association of Port Authorities
Finance Seminar

Session 5: Trends and New Approaches to Port Financing

Ira Smelkinson
Executive Director
Morgan Stanley
1221 Avenue of the Americas, 30th Floor
New York, NY 10019
(212) 762-8029
Ira.Smelkinson@morganstanley.com
Everything Old Is New Again…

“The charm of history and its enigmatic lesson consist in the fact that, from age to age, nothing changes and yet everything is completely different”

- Aldous Huxley

“Each time history repeats itself, the price goes up”

- Anonymous
Where Have We Been?

2008 to 2010

- Credit Market Melt Down
  - Subprime mortgage defaults
  - Failure of mortgage backed securities
  - Credit default swaps triggered
  - Crisis of confidence/liquidity concern leads to bailout
Government Bailout

2008 to 2010

- TARP / government investments
- Guarantee of money funds / commercial paper
- Flight to quality leading to interest rates falling in US Treasuries
- Higher federal deficits / Deficit Reduction Commission
- Financial reform legislation – bankers, lenders, derivatives, rating agencies
Macroeconomic Developments

2008 to 2010

- Rate of GDP recovery?
- Unemployment / underemployment concerns
- Continuing depressed real estate markets
- Deficit / default concerns from Europe
  - Contagion to domestic municipal market?
Credit quality matters

Yields remain low

Reduced appeal / application of bond insurers

Heightened investor focus on credit / reaching out to investors

Build America Bond Program
  - A success story (so far)
Securing Funds for Port Development

- Municipal market investors continue to lend to ports
- Rating agencies have port industry under “negative outlook”
- Traditional bond financing provides attractive funding but involves more steps and time than several years ago
- Private/P3 transactions continue to play a role
Economic Update
The Macro Lens: Turning A Corner

Fundamentals Show a Strengthening Recovery

**Dow Jones and IG Indices**

<table>
<thead>
<tr>
<th>LTM (pts)</th>
<th>(bps)</th>
</tr>
</thead>
<tbody>
<tr>
<td>12,000</td>
<td></td>
</tr>
<tr>
<td>11,000</td>
<td></td>
</tr>
<tr>
<td>10,000</td>
<td></td>
</tr>
<tr>
<td>9,000</td>
<td></td>
</tr>
<tr>
<td>8,000</td>
<td></td>
</tr>
<tr>
<td>7,000</td>
<td></td>
</tr>
<tr>
<td>6,000</td>
<td></td>
</tr>
</tbody>
</table>

**Bank Cash Spreads**

<table>
<thead>
<tr>
<th>LTM Spread to UST (bps)</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
</tr>
</tbody>
</table>

Source: Bloomberg

Source: Morgan Stanley
The Macro Lens: Turning A Corner (cont’d)

Fundamentals Show a Strengthening Recovery

**New/Existing Home Sales**

- **2009-2010 (000s)**
- **(mm)**
- **2009-2010 (000s)**
- **(mm)**
- **300**
- **340**
- **380**
- **420**
- **460**
- **500**
- **Jan-09 Mar-09 May-09 Jul-09 Sep-09 Nov-09 Jan-10 Mar-10**
- **New Home Sales**
- **Existing Home Sales**

**Source:** Bloomberg, U.S. Department of Housing and Urban Development

**Consumer Confidence**

- **LTM (%)**
- **May-09 Aug-09 Nov-09 Feb-10 May-10**
- **60**
- **62**
- **64**
- **66**
- **68**
- **70**
- **72**
- **74**
- **76**

**Michigan Consumer Confidence**

**Source:** Bloomberg, University of Michigan Survey Research

Morgan Stanley
The Wide Angle Lens: Progress is Relative

The Domestic Economy Still Shows Significant Capacity for Improvement

**Dow Jones and IG Indices**

<table>
<thead>
<tr>
<th>05/05</th>
<th>05/06</th>
<th>05/07</th>
<th>05/08</th>
<th>05/09</th>
<th>05/10</th>
</tr>
</thead>
<tbody>
<tr>
<td>16,000</td>
<td>12,000</td>
<td>8,000</td>
<td>4,000</td>
<td>0</td>
<td>0</td>
</tr>
</tbody>
</table>

| 300   | 225   | 150   | 75    | 0     | 0     |

**Bank Cash Spreads**

<table>
<thead>
<tr>
<th>Dec-04</th>
<th>Dec-05</th>
<th>Dec-06</th>
<th>Nov-07</th>
<th>Dec-08</th>
<th>Dec-09</th>
</tr>
</thead>
<tbody>
<tr>
<td>800</td>
<td>700</td>
<td>600</td>
<td>500</td>
<td>400</td>
<td>300</td>
</tr>
</tbody>
</table>

**Note:**
- **Source:** Bloomberg
- **Source:** Morgan Stanley

---

**Stress Test Results Released**
The Wide Angle Lens: Progress is Relative (cont’d)

The Domestic Economy Still Shows Significant Capacity for Improvement

### New/Existing Home Sales

<table>
<thead>
<tr>
<th>Last 5 Years (000s)</th>
<th>Mar-05</th>
<th>Mar-06</th>
<th>Mar-07</th>
<th>Mar-08</th>
<th>Mar-09</th>
<th>Mar-10</th>
</tr>
</thead>
<tbody>
<tr>
<td>1,500</td>
<td>300</td>
<td>600</td>
<td>900</td>
<td>1,200</td>
<td>1,500</td>
<td>8.0</td>
</tr>
<tr>
<td>1,200</td>
<td>600</td>
<td>900</td>
<td>1,200</td>
<td>1,500</td>
<td>8.0</td>
<td>7.0</td>
</tr>
<tr>
<td>900</td>
<td>600</td>
<td>900</td>
<td>1,200</td>
<td>1,500</td>
<td>7.0</td>
<td>6.0</td>
</tr>
<tr>
<td>600</td>
<td>600</td>
<td>900</td>
<td>1,200</td>
<td>1,500</td>
<td>5.0</td>
<td>5.0</td>
</tr>
<tr>
<td>300</td>
<td>600</td>
<td>900</td>
<td>1,200</td>
<td>1,500</td>
<td>4.0</td>
<td>4.0</td>
</tr>
</tbody>
</table>

### Consumer Confidence

<table>
<thead>
<tr>
<th>Last 5 Years (%)</th>
<th>May-05</th>
<th>May-06</th>
<th>May-07</th>
<th>May-08</th>
<th>May-09</th>
<th>May-10</th>
</tr>
</thead>
<tbody>
<tr>
<td>100</td>
<td>100</td>
<td>100</td>
<td>100</td>
<td>100</td>
<td>100</td>
<td>100</td>
</tr>
<tr>
<td>90</td>
<td>90</td>
<td>90</td>
<td>90</td>
<td>90</td>
<td>90</td>
<td>90</td>
</tr>
<tr>
<td>80</td>
<td>80</td>
<td>80</td>
<td>80</td>
<td>80</td>
<td>80</td>
<td>80</td>
</tr>
<tr>
<td>70</td>
<td>70</td>
<td>70</td>
<td>70</td>
<td>70</td>
<td>70</td>
<td>70</td>
</tr>
<tr>
<td>60</td>
<td>60</td>
<td>60</td>
<td>60</td>
<td>60</td>
<td>60</td>
<td>60</td>
</tr>
<tr>
<td>50</td>
<td>50</td>
<td>50</td>
<td>50</td>
<td>50</td>
<td>50</td>
<td>50</td>
</tr>
</tbody>
</table>

**Source:** Bloomberg, U.S. Department of Housing and Urban Development

**Source:** Bloomberg, University of Michigan Survey Research
Risk Versus Economic Indicators: Past 10 Years

Comparing Worst, Best, Average, and Current

### Risk Indicators: Better Than Historical Averages

<table>
<thead>
<tr>
<th>Indicator</th>
<th>Worst</th>
<th>Best</th>
<th>Average</th>
<th>Current</th>
</tr>
</thead>
<tbody>
<tr>
<td>VIX</td>
<td>81</td>
<td>32</td>
<td>10</td>
<td>10</td>
</tr>
<tr>
<td>SPX</td>
<td>677</td>
<td>1089</td>
<td>1565</td>
<td>31</td>
</tr>
<tr>
<td>LIBOR-OIS</td>
<td>369</td>
<td>31</td>
<td>2</td>
<td>2</td>
</tr>
<tr>
<td>CDX IG Index</td>
<td>279</td>
<td>117</td>
<td>29</td>
<td>29</td>
</tr>
<tr>
<td>IG Corporate</td>
<td>629</td>
<td>187</td>
<td>82</td>
<td>82</td>
</tr>
<tr>
<td>BBB Rated Corp</td>
<td>803</td>
<td>225</td>
<td>106</td>
<td>106</td>
</tr>
<tr>
<td>High Yield Corp</td>
<td>1818</td>
<td>623</td>
<td>246</td>
<td>246</td>
</tr>
</tbody>
</table>

### Economic Indicators: Slowly Improving

<table>
<thead>
<tr>
<th>Indicator</th>
<th>Worst</th>
<th>Best</th>
<th>Average</th>
<th>Current</th>
</tr>
</thead>
<tbody>
<tr>
<td>ISM Manufacturing</td>
<td>33</td>
<td>60</td>
<td>61</td>
<td>61</td>
</tr>
<tr>
<td>ISM New Orders</td>
<td>23 Dec-08</td>
<td>66</td>
<td>71 Dec-03</td>
<td></td>
</tr>
<tr>
<td>Capacity Utilization</td>
<td>68 Jun-09</td>
<td>83</td>
<td>txt</td>
<td></td>
</tr>
<tr>
<td>New Home Sales</td>
<td>504</td>
<td>1,389</td>
<td>1,389</td>
<td>1,389</td>
</tr>
<tr>
<td>University of Michigan Consumer Confidence</td>
<td>55 Nov-08</td>
<td>74</td>
<td>112 Jan-00</td>
<td></td>
</tr>
<tr>
<td>Unemployment Rate</td>
<td>9.9</td>
<td>10.2</td>
<td>3.8</td>
<td>3.8</td>
</tr>
<tr>
<td>WTI Crude</td>
<td>145</td>
<td>74</td>
<td>17</td>
<td>17</td>
</tr>
</tbody>
</table>

- Worst since January 2000
- Best since January 2000
- Average
- Current
Tax-Exempt Rates Are Near All-Time Lows

Historical MMD

Current MMD in Historical Context

Since Inception (1982 to Present)
Yield (%)
Municipal Market Reaction to the Credit Crunch

Municipal Yield Curve Has Steepened

Shift in Municipal Market Data Yield Curve (MMD)

Yield (%)

0.0% 1.0% 2.0% 3.0% 4.0% 5.0%

- 337bps

3-years Ago  Current

Morgan Stanley
Measuring Market Risk

Credit Spreads Normalizing

Municipal and Corporate CDS

10-Year Credit Default Swap Index (bps)

Lehman Bankruptcy

Corporate

Municipal

Morgan Stanley
Credit Spreads

Bifurcated, But More Normal

Municipal Credit Spreads (to AAA)

MMD Index
(Rate)

2000 2001 2002 2003 2004 2005 2006 2007 2008 2009 2010

0 50 100 150 200 250 300

AA A BBB

Morgan Stanley
Bond Insurance

Limited Availability and Declining Role

Total Municipal Issuance Volume

By Year and Use of Bond Insurance ($Bn)

Source: Securities Data Corporation
Sovereign Debt Woes, U.S. Market Volatility

The Crisis in Europe is Affecting Equity and Credit Markets Globally

Dow Jones and IG Indices

2010 YTD
( pts) (bps)

0 10 20 30 40 50 1/4 1/22 2/11 3/3 3/23 4/12 4/30 5/21

Source: Bloomberg

Short-Term Funding Markets

2010 YTD
(bps)

0 10 20 30 40 50 60 1/4 1/22 2/11 3/3 3/23 4/12 4/30 5/21

Source: Bloomberg

Greece Portugal Spain SovX (RHS) IG (RHS)

3m LIBOR (LHS) LIBOR-OIS TED Spread
Sovereign Debt Risk is Not New

Sovereign risk has been building in advanced economies for years, owing to steadily increasing indebtedness. The BIS recently expressed concern that most of the deficits are structural rather than cyclical in nature.

- **Above a 90% debt/GDP ratio,**
  “...median growth rates fall by one percent and average growth falls considerably more.”

    NBER, January 2010

---

**Never In Peacetime: G7 Government Deficits Balloon**

Government Debt as a % of GDP

### Fiscal Situation and Forecasts for 2010-11

<table>
<thead>
<tr>
<th>Region</th>
<th>Fiscal Balance</th>
<th></th>
<th>Structural Balance</th>
<th></th>
<th>General Government Debt</th>
</tr>
</thead>
<tbody>
<tr>
<td>Austria</td>
<td>(0.7)</td>
<td>(5.5)</td>
<td>(5.8)</td>
<td>(1.4)</td>
<td>(3.3)</td>
</tr>
<tr>
<td>France</td>
<td>(2.7)</td>
<td>(8.6)</td>
<td>(8.0)</td>
<td>(3.5)</td>
<td>(6.8)</td>
</tr>
<tr>
<td>Germany</td>
<td>0.2</td>
<td>(5.3)</td>
<td>(4.6)</td>
<td>(0.8)</td>
<td>(4.0)</td>
</tr>
<tr>
<td>Greece</td>
<td>(4.0)</td>
<td>(9.8)</td>
<td>(10.0)</td>
<td>(4.5)</td>
<td>(6.9)</td>
</tr>
<tr>
<td>Ireland</td>
<td>0.2</td>
<td>(12.2)</td>
<td>(11.6)</td>
<td>(1.3)</td>
<td>(9.0)</td>
</tr>
<tr>
<td>Italy</td>
<td>(1.5)</td>
<td>(5.4)</td>
<td>(5.1)</td>
<td>(2.2)</td>
<td>(2.6)</td>
</tr>
<tr>
<td>Japan</td>
<td>(2.5)</td>
<td>(8.2)</td>
<td>(9.4)</td>
<td>(3.4)</td>
<td>(7.4)</td>
</tr>
<tr>
<td>Netherlands</td>
<td>0.2</td>
<td>(5.9)</td>
<td>(5.3)</td>
<td>(0.6)</td>
<td>(3.6)</td>
</tr>
<tr>
<td>Portugal</td>
<td>(2.7)</td>
<td>(7.6)</td>
<td>(7.8)</td>
<td>(2.8)</td>
<td>(6.1)</td>
</tr>
<tr>
<td>Spain</td>
<td>1.9</td>
<td>(8.5)</td>
<td>(7.7)</td>
<td>1.6</td>
<td>(5.2)</td>
</tr>
<tr>
<td>UK</td>
<td>(2.7)</td>
<td>(13.3)</td>
<td>(12.5)</td>
<td>(3.4)</td>
<td>(10.5)</td>
</tr>
<tr>
<td>USA</td>
<td>(2.8)</td>
<td>(10.7)</td>
<td>(9.4)</td>
<td>(3.1)</td>
<td>(9.2)</td>
</tr>
<tr>
<td>Asia (4)</td>
<td>0.1</td>
<td>(3.5)</td>
<td>(3.6)</td>
<td>…</td>
<td>…</td>
</tr>
<tr>
<td>Central Europe (5)</td>
<td>3.7</td>
<td>(4.4)</td>
<td>(3.9)</td>
<td>…</td>
<td>…</td>
</tr>
<tr>
<td>Latin America (6)</td>
<td>(1.5)</td>
<td>(2.4)</td>
<td>(2.0)</td>
<td>…</td>
<td>…</td>
</tr>
</tbody>
</table>

(1) Regional averages calculated as weighted averages based on 2005 GDP and PPP exchange rates.
(2) Cyclically adjusted balance.
(3) For Argentina, the Philippines and Thailand, central government debt.
(4) China, Hong Kong SAR, India, Indonesia, Korea, Malaysia, the Philippines, Singapore and Thailand.
(5) The Czech Republic, Hungary and Poland.
(6) Argentina, Brazil, Chile and Mexico.
Sovereign Contagion Risk Could Impact US Munis

Europe’s bank and sovereign exposures are highly inter-connected, which explains why sovereign risk quickly appeared in the banking system. These banks have large US$ funding needs, which firmly links them to the US

- Focus on US deficit could impact buyer’s risk profile
- US municipal issuers’ variable rate programs could be impacted by sovereign contagion
- A number of remarketing agents have begun to give tender notices to banks backing variable rate programs
- The most immediate pressure will be on banks within the PIIGS countries

Who Holds Greece Debt?

Breakdown by Investors

Greek Debt Holders by Region

As of Q3 2009

Summary
As of Q3 2009

<table>
<thead>
<tr>
<th>Type</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Banks</td>
<td>42%</td>
</tr>
<tr>
<td>Insurance</td>
<td>17%</td>
</tr>
<tr>
<td>Mutual/Pension Fund</td>
<td>26%</td>
</tr>
<tr>
<td>Monetary Authority</td>
<td>11%</td>
</tr>
<tr>
<td>Others</td>
<td>4%</td>
</tr>
</tbody>
</table>
Who Holds Greece Debt? (cont’d)

Breakdown by Investors

<table>
<thead>
<tr>
<th>Greek Government Debt Holders</th>
<th>As of Q3 2009 (€Bns)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Banks</td>
<td>42</td>
</tr>
<tr>
<td>Insurance</td>
<td>49</td>
</tr>
<tr>
<td>Mutual/Pension Funds</td>
<td>76</td>
</tr>
<tr>
<td>Monetary Authorities</td>
<td>33</td>
</tr>
<tr>
<td>Others</td>
<td>12</td>
</tr>
</tbody>
</table>

- **Greece**: 125
- **Belgium**: 22
- **France**: 19
- **Germany**: 18
- **Netherlands**: 49
- **Luxembourg**: 11
- **Italy**: 14
- **Other**: 7
- **Other**: 33
- **Other**: 12

**Source**: Financial Times

---

**Morgan Stanley**
Morgan Stanley Rate Outlook

Rates Expected to Rise

Short Term Rates

<table>
<thead>
<tr>
<th>(%)</th>
<th>Nov 6</th>
<th>09Q4</th>
<th>10Q1</th>
<th>10Q2</th>
<th>10Q3</th>
<th>10Q4</th>
<th>11Q1</th>
</tr>
</thead>
<tbody>
<tr>
<td>FFR</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2-Yr UST</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Long Term Rates

<table>
<thead>
<tr>
<th>(%)</th>
<th>Nov 6</th>
<th>09Q4</th>
<th>10Q1</th>
<th>10Q2</th>
<th>10Q3</th>
<th>10Q4</th>
<th>11Q1</th>
</tr>
</thead>
<tbody>
<tr>
<td>FFR</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2-Yr UST</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Source: Morgan Stanley Research, Bloomberg
Seaport Finance Market
Seaport Finance Market

Volume and Tax Status Trends

Seaport Issuance Volume

By Year and Tax Status
($Bn)

24 37 39 33 27 33 47 30 33 37 19

2000 2001 2002 2003 2004 2005 2006 2007 2008 2009 2010

YTD

# of Transactions

Source: Securities Data Corporation

Non-AMT  AMT  Taxable  # of Transactions
Seaport Finance Market

Volume and Tax Status Trends

Seaport Issuance Volume

By Year and Tax Status ($Bn)

Source: Securities Data Corporation
## Summary of 2010 Seaport Financings

### Notable Fixed-Rate 2010 Seaport Financings

<table>
<thead>
<tr>
<th>Issue Date</th>
<th>Issuer</th>
<th>Par ($MM)</th>
<th>Moody's</th>
<th>S&amp;P</th>
<th>Fitch</th>
<th>Ratings</th>
</tr>
</thead>
<tbody>
<tr>
<td>1/14/2010</td>
<td>Port of Houston Authority</td>
<td>91.2</td>
<td>NR</td>
<td>AAA</td>
<td>AA+</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Yield</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>3.51%</td>
<td>4.14%</td>
<td>4.46%</td>
<td>10Y</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>20Y</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>30Y</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>+47</td>
<td>+38</td>
<td>+37</td>
<td>MMD Spread (bps)</td>
</tr>
<tr>
<td>1/21/2010</td>
<td>San Francisco Port Comm.</td>
<td>36.7</td>
<td>A1</td>
<td>A-</td>
<td>A</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Yield</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>-</td>
<td>-</td>
<td>5.13%</td>
<td>10Y</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>20Y</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>-</td>
<td>-</td>
<td></td>
<td>30Y</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>-</td>
<td>-</td>
<td></td>
<td>MMD Spread (bps)</td>
</tr>
<tr>
<td>2/2/2010</td>
<td>Alaska Ind. Dev. &amp; Exp. Auth.</td>
<td>87.1</td>
<td>A1</td>
<td>AA-</td>
<td>NR</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Yield</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>3.94%</td>
<td>-</td>
<td>-</td>
<td>10Y</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>20Y</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>-</td>
<td>-</td>
<td>+98</td>
<td>30Y</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>MMD Spread (bps)</td>
</tr>
<tr>
<td>2/25/2010</td>
<td>North Carolina State Ports</td>
<td>43.9</td>
<td>A3</td>
<td>NR</td>
<td>BBB+</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Yield</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>4.32%</td>
<td>5.02%</td>
<td>5.20%</td>
<td>10Y</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>20Y</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>+136</td>
<td>30Y</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>+120</td>
<td>MMD Spread (bps)</td>
</tr>
<tr>
<td>3/31/2010</td>
<td>Port of Long Beach</td>
<td>200.8</td>
<td>Aa2</td>
<td>AA</td>
<td>AA</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Yield</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>3.56%</td>
<td>-</td>
<td>-</td>
<td>10Y</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>20Y</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>-</td>
<td>-</td>
<td>+47</td>
<td>30Y</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>MMD Spread (bps)</td>
</tr>
<tr>
<td>3/31/2010</td>
<td>Port Authority of NY &amp; NJ</td>
<td>116.8</td>
<td>Aa2</td>
<td>AA-</td>
<td>AA-</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Yield</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>3.30%</td>
<td>-</td>
<td>-</td>
<td>10Y</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>20Y</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>-</td>
<td>-</td>
<td>+21</td>
<td>30Y</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>MMD Spread (bps)</td>
</tr>
<tr>
<td>4/21/2010</td>
<td>Virginia Port Authority</td>
<td>68.6</td>
<td>Aa3</td>
<td>A+</td>
<td>NR</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Yield</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>3.75%</td>
<td>4.54%</td>
<td>4.75%</td>
<td>10Y</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>20Y</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>+77</td>
<td>30Y</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>+72</td>
<td>MMD Spread (bps)</td>
</tr>
<tr>
<td>4/29/2010</td>
<td>Port of Long Beach</td>
<td>158.1</td>
<td>Aa2</td>
<td>AA</td>
<td>AA</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Yield</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>3.41%</td>
<td>-</td>
<td>-</td>
<td>10Y</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>20Y</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>-</td>
<td>-</td>
<td>+47</td>
<td>30Y</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>MMD Spread (bps)</td>
</tr>
</tbody>
</table>

**Source:** MSSRB
Seaport Credit Issues Under More Intense Review

Four critical areas of increased focus for rating analysts and investors

**Weaker market demand and declining cash flow margins**
- Is volume growing or declining?
- Focus on composition of cargo, shippers and competition
- Future capital needs

**Investment losses and weaker balance sheets**
- Increased focus on cash to debt as well as days cash on hand

**Debt structure and liquidity stress**
- Emphasis on bank and swap covenants
- How liquid are assets relative to short term debt (cash to puttable debt)
- Greater emphasis on counterparties and provisions under swap agreements

**Market access solid now, but has been tenuous**
- Assume limited access for “A” rated or higher in stressed times and no access for lower rated entities
- Want to know contingency plans if renewal of bank liquidity disappears

Morgan Stanley
The New Ways of Marketing and Distribution
Evolving Investor Base

Changing Buyers of Fixed-Rate Municipal Bonds

- Composition of bond investors has changed over past 2 years
- Total return investors have largely disappeared
- Retail investors resumed prominence
- More traditional institutional investors

Non-AMT Distribution
1-Year Ago

- Total Return: 35%
- Bond Funds: 25%
- Retail: 10%
- Investment Advisors: 10%
- Insurance Companies: 10%
- Bank Trusts: 10%

Today

- Total Return: 5%
- Bond Funds: 40%
- Retail: 20%
- Insurance Companies: 15%
- Total Return: 5%
- Investment Advisors: 10%
- Bank Trusts: 10%

Composition of bond investors has changed over past 2 years.
Total return investors have largely disappeared.
Retail investors resumed prominence.
More traditional institutional investors.

Changing Buyers of Fixed-Rate Municipal Bonds
Tax-Exempt Investor Base

Recent Seaport Financings

**Virginia Port Authority**
- Series 2006
  - Total Return: 25%
  - Bond Funds: 45%
  - Retail: 5%
  - Bank Trusts: 17%
  - Investment Advisors: 1%
  - Insurance Companies: 7%

**North Carolina State Ports**
- Series 2010
  - Total Return: 8%
  - Bond Funds: 22%
  - Retail: 32%
  - Investment Advisors: 23%
  - Bank Trusts: 12%
  - Insurance Companies: 1%
- Series 2010AB
  - Total Return: 5%
  - Bank Trusts: 3%
  - Bond Funds: 50%
  - Retail: 27%
  - Investment Advisors: 15%
  - Insurance Companies: 15%

Morgan Stanley
Investor Base – Taxable Bonds (and BABs)

Build America Bond Investor Base

- BABs market is distinct from traditional municipal buyer base
- Appeal of BABs to international investors

Taxable Build America Bond Distribution

- Money Managers: 60%
- Insurance Companies: 30%
- Hedge Funds: 5%
- Pension Funds: 2%
- Retail: 3%
- Money Managers: 60%
- Insurance Companies: 30%
- Hedge Funds: 5%
- Pension Funds: 2%
- Retail: 3%
Global Investors for Build America Bonds

International investors are becoming more active in the BAB market

Europe
- UK
  - Blackrock
  - PIMCO
  - Fidelity
  - Wellington
  - L&G
  - Aviva
  - Moore Capital
  - JCAM
  - Rogge
  - UBS
  - Schroders
  - Henderson
  - UBS AM
- France
  - Amundi
  - Carmignac
  - CPR AM
  - CFF
  - Predica
  - BNP AM
- Iberia
  - ESAF
  - BES
- Netherlands
  - F&C
  - Shell PF
  - ING
  - Aegon
- Switzerland
  - Credit Suisse PB
  - Swisscanto
  - Julius Baer
  - UBS PB
- Germany
  - DWS
  - Deka Investment
  - Union Investment
- Italy
  - Generali
  - Banca IMI/Intesa
- Nordic Region
  - KLP
  - AP4
  - PFA
  - Norges Bank
  - Ctrl Bk of Finland

Asia
- AIA (Hong Kong and Singapore)
- Cathay Life (Taiwan)
- Halbis (Hong Kong)
- Samsung Life (S. Korea)
- Bank of China Life (China and Hong Kong)
- Korea Investment Corp (S. Korea)
- HKMA (Hong Kong)
- China Investment Corp (China)
- Bank of East Asia (Hong Kong)
- Private Banks

Latin America
- Rio de Janeiro Global Trust

Australia
- AMP
- OBE
- UBS Asset Mgmt

Middle East
- Ctrl Bk of Azerbaijan
### International Buyers Have Diverse Objectives

**Broadening Buyer Base To Global Investors Will Improve Execution and Pricing**

<table>
<thead>
<tr>
<th><strong>Asset Managers and Hedge Funds</strong></th>
<th><strong>Central Banks and Sovereign Wealth Funds</strong></th>
</tr>
</thead>
<tbody>
<tr>
<td>• The largest and most important buyers of U.S. corporate and sovereign debt</td>
<td>• Looking to diversify beyond U.S. Treasuries (sovereigns and sub-sovereigns are logical extensions on the credit spectrum)</td>
</tr>
<tr>
<td>• Orders from large funds can be as high as over $200 million for a benchmark issue</td>
<td>• Able to purchase long-dated structures out to 30 years</td>
</tr>
<tr>
<td>• Investors purchase across the curve although many funds can only buy out to a maximum maturity of ten years</td>
<td>• Investment strategies include both short-term and “buy and hold”</td>
</tr>
<tr>
<td>• Investment process is focused on relative value within the term structure, credit strategies and tactical asset allocation</td>
<td>• Central banks have proven to be large buyers of USD exposure through unhedged USD-denominated investments</td>
</tr>
<tr>
<td>• Able to purchase across currencies, but many continental European accounts are focused on EUR-denominated issuance</td>
<td>• If investing, more inclined to purchase government-backed issues, i.e. General Obligation debt</td>
</tr>
<tr>
<td></td>
<td>• Increasingly looking to build in-house fund management abilities</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th><strong>Banks</strong></th>
<th><strong>Insurers</strong></th>
</tr>
</thead>
<tbody>
<tr>
<td>• Private Banks in Asia have historically been active purchasers of U.S corporate debt and sovereigns</td>
<td>• Investment strategy is focused on duration management</td>
</tr>
<tr>
<td>• Asian banks look for high quality and, increasingly, for yield</td>
<td>• Able to purchase both intermediate and long-dated securities, although many Asian insurers are local currency-focused</td>
</tr>
<tr>
<td></td>
<td>• In-house fund management model is slowly evolving into a mixed model with significant outsourcing of portfolio management to professional fund managers</td>
</tr>
</tbody>
</table>
Reaching Investors

- Investors focused on credit
- Timely and ongoing outreach in a user friendly accessible format
- For larger transactions:
  - Internet and personal road shows
  - Dedicated websites
  - Print (and radio advertisements)
ARRA and Legislative Developments
Overview of Build America Bonds

Build America Bonds provide savings to most issuers over traditional tax-exempt financings

- Build America provides issuers of non-AMT tax-exempt debt with a 35% interest payment subsidy from the Treasury if they issue in the taxable market
  - Allows issuers to take advantage of relatively low taxable rates in the current market
- By using BABs, issuers can achieve borrowing rates (after the interest rebate from the Treasury) that are lower than they could through pure tax-exempt debt
- BABs also allow municipal issuers to access new investor bases and enhance their credit

**Build America Bond Structure**

- Investor
- Port
- Federal Government/IRS

Morgan Stanley
Build America Taxable Bonds Program

Terms and Conditions

<table>
<thead>
<tr>
<th>Applicable Period:</th>
<th>These provisions only apply to bonds issued before January 1, 2011, but apply for the life of the bond.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Tax Status:</td>
<td>Interest paid on the bonds would be included in gross income for federal income tax purposes.</td>
</tr>
<tr>
<td>Qualified Issuers:</td>
<td>Only issuers that meet the standards of Section 1.103 of the Internal Revenue Code can issue the bonds.</td>
</tr>
<tr>
<td>Eligible Projects:</td>
<td>100% of the project proceeds from the bond issue must be used for capital expenditures that meet certain specifications in Section 54A.</td>
</tr>
<tr>
<td>Payment of Credit:</td>
<td>The Secretary of the Treasury would direct the federal government to pay 35% of the interest payable under the bond issue on each payment date, thereby lowering the costs on the original issuance.</td>
</tr>
<tr>
<td>Arbitrage:</td>
<td>All arbitrage rules apply; the arbitrage yield is calculated net of the government payment to the issuer.</td>
</tr>
</tbody>
</table>

Due to program constraints, limited applicability for ports
ARRA Provisions – Benefits to Port

- Introduction of Build America Bond Program
  - Provides 35% debt service subsidy for eligible “governmental purpose” projects
- Provides “AMT Holiday” for new private activity bonds and refinancing of outstanding private activity bonds issued post-2003 – providing interest savings of around 75bps per year

Provisions scheduled to expire on December 31, 2010 unless extended
ARRA Provisions – Current Legislative Status

Current bills under consideration by the House and Senate would:

• BABs:
  – Extend BABs for 2 years
  – Drop subsidy to 32% and eventually 30%
  – Allow current refunding of BABs

• AMT Holiday:
  – Extend holiday through December 31, 2010 for new money and refundings of bonds issued post December 31, 2003
### ARRA Provisions – Impact of BABs Subsidy Reduction

#### Indicative $100mm BABs/TE Port Financing (‘A’ Rated)

<table>
<thead>
<tr>
<th>Statistics</th>
<th>35% Subsidy (Current)</th>
<th>32% Subsidy</th>
<th>30% Subsidy</th>
</tr>
</thead>
<tbody>
<tr>
<td>Total Par Amount</td>
<td>$100,000,000</td>
<td>$100,000,000</td>
<td>$100,000,000</td>
</tr>
<tr>
<td>Build America Bonds</td>
<td>$80,990,000</td>
<td>$73,625,000</td>
<td>$67,790,000</td>
</tr>
<tr>
<td>Tax-Exempts</td>
<td>$19,010,000</td>
<td>$26,375,000</td>
<td>$32,210,000</td>
</tr>
<tr>
<td>Average Annual DS</td>
<td>$5,867,558</td>
<td>$6,028,264</td>
<td>$6,131,850</td>
</tr>
<tr>
<td>All-In TIC</td>
<td>4.03%</td>
<td>4.19%</td>
<td>4.30%</td>
</tr>
<tr>
<td>PV Loss (1)</td>
<td>-</td>
<td>$2,501,757</td>
<td>$4,096,889</td>
</tr>
</tbody>
</table>

---

(1) Due to decrease in subsidy level
Conclusion

- Ports will continue to secure funding from the traditional sources
- Extension of ARRA provisions provide additional opportunities for capital formation
- Differentiating & positioning the port’s credit in a granular way
- Maintaining ongoing outreach with investors