

February 25, 2013

Ministry of Finance Asset Management Department P.O. Box 8008 DEP 0030 Oslo Norway

Dear Sirs:

We have completed the analysis of the Government Pension Fund Global (GPFG) performance records for the period December 31, 2011 through December 31, 2012. The objective of the review was to independently calculate performance of the pension fund at the equity, fixed income and total return level (excluding real estate) and compare these returns to the rates of return calculated by Norges Bank.

## **Required Data and Sources**

The following items were independently calculated by the Spaulding Group and used in the analysis. The source(s) of the data is shown next to each item:

- Pension fund returns in base currency (NOK) Calculated
  - Equity, fixed income and total monthly market values JP Morgan (the custodian)
  - STBF (Short Term Bond Funds) monthly values (part of fixed income value) Norges Bank
  - Corrections (minor) to JPM NAV- Norges Bank
  - Cash Flows JP Morgan
- Benchmark returns in base currency Ministry of Finance
- Currency basket return Calculated
  - Monthly currency weights for benchmark Ministry of Finance
  - Monthly exchange rates for each currency Ministry of Finance
- <u>Pension fund returns in the currency basket (CCY)</u> Calculated using base and currency basket returns
- <u>Benchmark returns in the currency basket</u>- Calculated using base and currency basket returns

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## Results

Figures 1 - 3 display the return comparisons for total (ex. real estate), equity and fixed income, respectively for monthly, quarterly and 2012. Figure 4 displays the monthly currency basket return comparison. Performance was calculated at the base level (NOK). Returns measured in the currency basket (CCY) were then calculated using the monthly derived currency basket return.

We are pleased to report that there were no material discrepancies between the fund returns calculated by The Spaulding Group and Norges Bank. We have identified one difference (at two decimal places) which was strictly due to rounding:

• The fixed income 1st quarter results in base currency displays a .01% difference. The Spaulding Group calculated a return of -1.6243% vs. -1.6251% from Norges.

For October and November 2012, there was a difference between the Spaulding Group's calculation of the fixed income portfolio and the return reported by Norges. This was due to some market value differences that have been since reviewed and adjusted in the Spaulding Group's return. After the adjustment was made, the returns for November in the fixed income portfolio matched to what Norges reported. The tables below reflect the adjusted returns.

|             |                      | To            | otal Fund ( | excluding Re     | eal Estate) |               |        |                  |        |
|-------------|----------------------|---------------|-------------|------------------|-------------|---------------|--------|------------------|--------|
|             |                      | Currency: NOK |             |                  |             | Currency: CCY |        |                  |        |
|             | Ending Value (NOK)   | Fund Return   |             | Benchmark Return |             | Fund Return   |        | Benchmark Return |        |
| Month       |                      | Consultant    | Norges      | Consultant       | Norges      | Consultant    | Norges | Consultant       | Norges |
| Dec-11      | 3,300,443,612,583.05 |               |             |                  |             |               |        |                  |        |
| Jan-12      | 3,409,331,858,044.26 | 2.66%         | 2.66%       | 2.51%            | 2.51%       | 3.58%         | 3.58%  | 3.43%            | 3.43%  |
| Feb-12      | 3,382,847,477,846.75 | -1.39%        | -1.39%      | -1.42%           | -1.42%      | 3.04%         | 3.04%  | 3.00%            | 3.00%  |
| Mar-12      | 3,485,427,432,715.59 | 2.49%         | 2.49%       | 2.42%            | 2.42%       | 0.38%         | 0.38%  | 0.31%            | 0.31%  |
| 1st Quarter |                      | 3.76%         | 3.76%       | 3.50%            | 3.50%       | 7.13%         | 7.13%  | 6.87%            | 6.87%  |
| Apr-12      | 3,499,682,940,077.71 | -0.24%        | -0.24%      | -0.20%           | -0.20%      | -0.84%        | -0.84% | -0.80%           | -0.80% |
| May-12      | 3,493,662,167,029.80 | -0.81%        | -0.81%      | -0.76%           | -0.76%      | -3.49%        | -3.49% | -3.44%           | -3.44% |
| Jun-12      | 3,549,794,545,107.60 | 0.84%         | 0.84%       | 0.93%            | 0.93%       | 2.21%         | 2.21%  | 2.30%            | 2.30%  |
| 2nd Quarter |                      | -0.22%        | -0.22%      | -0.05%           | -0.05%      | -2.18%        | -2.18% | -2.02%           | -2.02% |
| Jul-12      | 3,654,781,250,641.69 | 2.20%         | 2.20%       | 2.25%            | 2.25%       | 1.66%         | 1.66%  | 1.71%            | 1.71%  |
| Aug-12      | 3,631,348,881,786.63 | -1.35%        | -1.35%      | -1.37%           | -1.37%      | 1.48%         | 1.48%  | 1.46%            | 1.46%  |
| Sep-12      | 3,712,170,405,607.70 | 1.46%         | 1.46%       | 1.46%            | 1.46%       | 1.53%         | 1.53%  | 1.53%            | 1.53%  |
| 3rd Quarter |                      | 2.30%         | 2.30%       | 2.32%            | 2.32%       | 4.75%         | 4.75%  | 4.78%            | 4.78%  |
| Oct-12      | 3,740,173,826,895.96 | 0.05%         | 0.05%       | -0.01%           | -0.01%      | 0.37%         | 0.37%  | 0.31%            | 0.31%  |
| Nov-12      | 3,764,948,497,823.34 | 0.48%         | 0.48%       | 0.47%            | 0.47%       | 1.39%         | 1.39%  | 1.38%            | 1.38%  |
| Dec-12      | 3,790,646,104,274.94 | 0.25%         | 0.25%       | 0.19%            | 0.19%       | 1.56%         | 1.56%  | 1.50%            | 1.50%  |
| 4th Quarter |                      | 0.78%         | 0.78%       | 0.64%            | 0.64%       | 3.35%         | 3.35%  | 3.22%            | 3.22%  |
| 2012        |                      | 6.73%         | 6.73%       | 6.53%            | 6.53%       | 13.45%        | 13.45% | 13.24%           | 13.24% |

Figure 1

|             |                      |               |        | Equity     |               |             |        |                  |        |
|-------------|----------------------|---------------|--------|------------|---------------|-------------|--------|------------------|--------|
|             |                      | Currency: NOK |        |            | Currency: CCY |             |        |                  |        |
|             |                      | Fund Return   |        | Benchmar   | k Return      | Fund Return |        | Benchmark Return |        |
| Month       | Ending Value (NOK)   | Consultant    | Norges | Consultant | Norges        | Consultant  | Norges | Consultant       | Norges |
| Dec-11      | 1,944,721,778,569.98 |               |        |            |               |             |        |                  |        |
| Jan-12      | 2,050,698,439,436.45 | 4.37%         | 4.37%  | 4.16%      | 4.16%         | 5.30%       | 5.30%  | 5.09%            | 5.09%  |
| Feb-12      | 2,055,513,664,683.79 | 0.23%         | 0.23%  | 0.16%      | 0.16%         | 4.74%       | 4.74%  | 4.66%            | 4.66%  |
| Mar-12      | 2,121,815,295,953.93 | 2.75%         | 2.75%  | 2.72%      | 2.72%         | 0.63%       | 0.63%  | 0.60%            | 0.60%  |
| 1st Quarter |                      | 7.49%         | 7.49%  | 7.17%      | 7.17%         | 10.99%      | 10.99% | 10.65%           | 10.65% |
| Apr-12      | 2,112,095,965,599.15 | -1.09%        | -1.09% | -1.08%     | -1.08%        | -1.69%      | -1.69% | -1.68%           | -1.68% |
| May-12      | 2,039,339,739,667.18 | -4.24%        | -4.24% | -4.19%     | -4.19%        | -6.82%      | -6.82% | -6.78%           | -6.78% |
| Jun-12      | 2,121,686,836,246.40 | 2.78%         | 2.78%  | 2.90%      | 2.90%         | 4.17%       | 4.17%  | 4.30%            | 4.30%  |
| 2nd Quarter |                      | -2.66%        | -2.66% | -2.48%     | -2.48%        | -4.57%      | -4.57% | -4.40%           | -4.40% |
| Jul-12      | 2,196,808,672,537.49 | 2.37%         | 2.37%  | 2.36%      | 2.36%         | 1.83%       | 1.83%  | 1.82%            | 1.82%  |
| Aug-12      | 2,198,555,852,182.79 | -0.60%        | -0.60% | -0.68%     | -0.68%        | 2.25%       | 2.25%  | 2.17%            | 2.17%  |
| Sep-12      | 2,246,788,824,381.68 | 2.19%         | 2.19%  | 2.17%      | 2.17%         | 2.26%       | 2.26%  | 2.24%            | 2.24%  |
| 3rd Quarter |                      | 3.98%         | 3.98%  | 3.86%      | 3.86%         | 6.48%       | 6.48%  | 6.35%            | 6.35%  |
| Oct-12      | 2,259,653,202,721.97 | -0.04%        | -0.04% | -0.14%     | -0.14%        | 0.29%       | 0.29%  | 0.18%            | 0.18%  |
| Nov-12      | 2,308,855,147,431.45 | 0.94%         | 0.94%  | 0.91%      | 0.91%         | 1.86%       | 1.86%  | 1.83%            | 1.82%  |
| Dec-12      | 2,335,830,286,180.12 | 1.17%         | 1.17%  | 1.10%      | 1.10%         | 2.49%       | 2.49%  | 2.42%            | 2.42%  |
| 4th Quarter |                      | 2.08%         | 2.08%  | 1.87%      | 1.87%         | 4.69%       | 4.69%  | 4.48%            | 4.48%  |
| 2012        |                      | 11.07%        | 11.07% | 10.58%     | 10.58%        | 18.06%      | 18.06% | 17.54%           | 17.54% |

Figure 2

|             |                      |               | Fi     | xed Income       |        |             |        |                  |        |  |
|-------------|----------------------|---------------|--------|------------------|--------|-------------|--------|------------------|--------|--|
|             |                      | Currency: NOK |        |                  |        |             | Curren | Currency: CCY    |        |  |
|             |                      | Fund Return   |        | Benchmark Return |        | Fund Return |        | Benchmark Return |        |  |
| Month       | Ending Value (NOK)   | Consultant    | Norges | Consultant       | Norges | Consultant  | Norges | Consultant       | Norges |  |
| Dec-11      | 1,355,721,834,013.07 |               |        |                  |        |             |        |                  |        |  |
| Jan-12      | 1,358,633,418,607.81 | 0.21%         | 0.21%  | 0.17%            | 0.17%  | 1.11%       | 1.11%  | 1.07%            | 1.07%  |  |
| Feb-12      | 1,327,333,813,162.96 | -3.84%        | -3.84% | -3.78%           | -3.78% | 0.48%       | 0.48%  | 0.54%            | 0.54%  |  |
| Mar-12      | 1,363,612,136,761.66 | 2.08%         | 2.08%  | 1.96%            | 1.96%  | -0.02%      | -0.02% | -0.15%           | -0.15% |  |
| 1st Quarter |                      | -1.62%        | -1.63% | -1.74%           | -1.74% | 1.58%       | 1.58%  | 1.46%            | 1.46%  |  |
| Apr-12      | 1,387,586,974,478.56 | 1.08%         | 1.08%  | 1.13%            | 1.13%  | 0.47%       | 0.47%  | 0.53%            | 0.53%  |  |
| May-12      | 1,454,322,427,362.62 | 4.40%         | 4.40%  | 4.38%            | 4.38%  | 1.59%       | 1.59%  | 1.57%            | 1.57%  |  |
| Jun-12      | 1,428,107,708,861.20 | -1.86%        | -1.86% | -1.83%           | -1.83% | -0.53%      | -0.53% | -0.50%           | -0.50% |  |
| 2nd Quarter |                      | 3.56%         | 3.56%  | 3.63%            | 3.63%  | 1.52%       | 1.52%  | 1.59%            | 1.59%  |  |
| Jul-12      | 1,457,972,578,104.20 | 1.96%         | 1.96%  | 2.09%            | 2.09%  | 1.42%       | 1.42%  | 1.55%            | 1.55%  |  |
| Aug-12      | 1,432,793,029,603.84 | -2.48%        | -2.48% | -2.41%           | -2.41% | 0.32%       | 0.32%  | 0.39%            | 0.39%  |  |
| Sep-12      | 1,465,381,581,226.02 | 0.34%         | 0.34%  | 0.41%            | 0.41%  | 0.41%       | 0.41%  | 0.48%            | 0.48%  |  |
| 3rd Quarter |                      | -0.23%        | -0.23% | 0.03%            | 0.03%  | 2.16%       | 2.16%  | 2.43%            | 2.43%  |  |
| Oct-12      | 1,480,520,624,173.99 | 0.17%         | 0.17%  | 0.18%            | 0.18%  | 0.50%       | 0.50%  | 0.50%            | 0.50%  |  |
| Nov-12      | 1,456,093,350,391.89 | -0.24%        | -0.24% | -0.19%           | -0.19% | 0.67%       | 0.67%  | 0.72%            | 0.72%  |  |
| Dec-12      | 1,454,815,818,094.81 | -1.20%        | -1.20% | -1.20%           | -1.20% | 0.09%       | 0.09%  | 0.09%            | 0.09%  |  |
| 4th Quarter |                      | -1.26%        | -1.26% | -1.22%           | -1.22% | 1.26%       | 1.26%  | 1.31%            | 1.31%  |  |
|             | 2012                 | 0.36%         | 0.36%  | 0.63%            | 0.63%  | 6.69%       | 6.68%  | 6.97%            | 6.97%  |  |

Figure 3

|             | <b>Currency Basket Return</b> |        |  |  |  |
|-------------|-------------------------------|--------|--|--|--|
| Month       | Consultant                    | Norges |  |  |  |
| Jan-12      | -0.89%                        | -0.89% |  |  |  |
| Feb-12      | -4.30%                        | -4.30% |  |  |  |
| Mar-12      | 2.11%                         | 2.11%  |  |  |  |
| 1st Quarter | -3.15%                        | -3.15% |  |  |  |
| Apr-12      | 0.60%                         | 0.60%  |  |  |  |
| May-12      | 2.77%                         | 2.77%  |  |  |  |
| Jun-12      | -1.34%                        | -1.34% |  |  |  |
| 2nd Quarter | 2.01%                         | 2.01%  |  |  |  |
| Jul-12      | 0.53%                         | 0.53%  |  |  |  |
| Aug-12      | -2.79%                        | -2.79% |  |  |  |
| Sep-12      | -0.07%                        | -0.07% |  |  |  |
| 3rd Quarter | -2.34%                        | -2.34% |  |  |  |
| Oct-12      | -0.32%                        | -0.32% |  |  |  |
| Nov-12      | -0.90%                        | -0.90% |  |  |  |
| Dec-12      | -1.29%                        | -1.29% |  |  |  |
| 4th Quarter | -2.49%                        | -2.49% |  |  |  |
| 2012        | -5.93%                        | -5.93% |  |  |  |

Figure 4

We thank you very much for allowing us the opportunity to conduct this review for you.

Sincerely,

Jed Schneider, CIPM, FRM Senior Vice President