

FEDERAL RETIREMENT THRIFT INVESTMENT BOARD 77 K Street, NE Washington, DC 20002

January 12, 2018

MEMORANDUM FOR BOARD MEMBERS

KENNEDY, BILYEU, McCRAY, JONES AND JASIEN

FROM: RAVINDRA DEO

CHIEF INVESTMENT OFFICER

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SUBJECT: December 2017 Performance Review - G, F, C, S, I, and L Funds

INTRODUCTION

This report reviews key aspects of the investment performance of the G, F, C, S, I, and L Funds, investment manager performance and tracking error, trading costs, TSP fund performance, and L Fund participation.

TRACKING ERROR - TSP Separate Accounts at BlackRock (BTC)

Monthly Tracking Error

	% BTC	% TSP	% Index	BTC	TSP
<u>Fund</u>	<u>Returns</u>	<u>Returns</u>	<u>Returns</u>	<u>T.E.</u>	vs. BTC
Charal bassass	0.40	0.40	0.40	0.00	0.00
Fixed Income	0.48	0.48	0.46	0.02	0.00
Large Cap	1.11	1.11	1.11	0.00	0.00
Small Mid Cap	0.47	0.47	0.52	-0.05	0.00
International	1.61	1.60	1.61	0.00	-0.01

2017 Year-to-Date (YTD) Tracking Error

<u>Fund</u>	% BTC Returns	% TSP Returns	% Index Returns	BTC <u>T.E.</u>	TSP vs. BTC
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Fixed Income	3.85	3.82	3.54	0.31	-0.03
Large Cap	21.86	21.82	21.83	0.03	-0.04
Small Mid Cap	18.25	18.22	18.12	0.13	-0.03
International	25.47	25.42	25.03	0.44	-0.05

BlackRock's performance was in-line with the Fixed Income Index for the month and outperformed for the year by 31 basis points primarily due to securities lending. For the month, BlackRock underperformed the Small Mid Cap Index by 5 basis points due to security selection and futures mis-tracking. For the year, BlackRock outperformed the Small Mid Cap Index by 13 basis points primarily due to securities lending. BlackRock's performance was in-line with the International Index for the month and outperformed by 44 basis points primarily due to tax advantage. BlackRock's performance for the C Fund was in-line with the Large-Cap index for the month and for the year.

The TSP Funds closely tracked the BTC Accounts for the month and for the year.

Trading Costs

		Trading Costs			
<u>F Fund</u>	<u>Dollar Amount</u> <u>Traded</u>	Dollars	Basis Points		
December Year-to-Date	662,321,100 7,511,289,878	34,912 209,138	0.5 0.3		
<u>C Fund</u>					
December Year-to-Date	1,948,774,302 17,994,952,444	475,521 221,859	2.4 0.1		
<u>S Fund</u>					
December Year-to-Date	1,611,808,632 19,208,968,186	42,314 (2,684,992)	0.3 -1.4		
<u>I Fund</u>					
December Year-to-Date	1,019,284,764 12,063,388,878	2,101,431 5,314,952	20.6 4.4		

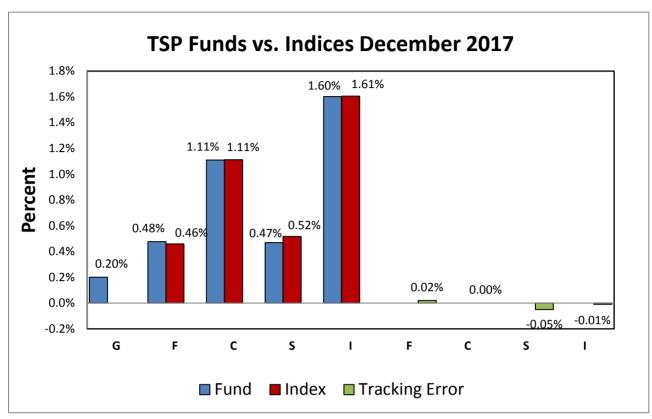
^{* --} Trading Costs are comprised of commissions, fees, and the difference between the price at which a security is traded and the closing index price.

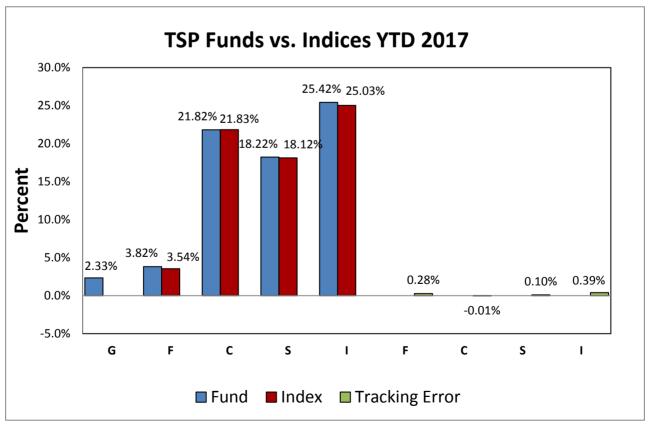
TSP Funds (as of December 30, 2017) Returns

	Annualized (%)			
	1 Year	3 Year	5 Year	10 Year
G Fund	2.33%	2.06%	2.08%	2.38%
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F Fund	3.82%	2.54%	2.50%	4.27%
Bloomberg Barclays U.S. Agg Bond Index	3.54%	2.24%	2.10%	4.01%
Tracking Error	0.28%	0.30%	0.40%	0.26%
C Fund	21.82%	11.45%	15.85%	8.55%
S&P 500 Index	21.83%	11.41%	15.79%	8.50%
Tracking Error	-0.01%	0.04%	0.06%	0.05%
S Fund DJ U.S. Completion TSM Index Tracking Error	18.22% 18.12% 0.10%	10.12% 9.71% 0.41%	14.77% 14.43% 0.34%	9.37% 9.15% 0.22%
I Fund MSCI EAFE (Net) Index	25.42% 25.03%	8.41% 7.80%	8.07% 7.90%	2.23% 1.94%
Tracking Error	0.39%	0.61%	0.17%	0.29%
Lifecycle Funds Returns				
L Income	6.19%	3.86%	4.46%	3.80%
L 2020	9.86%	5.50%	7.44%	4.91%
L 2030	14.54%	7.41%	9.50%	5.85%
L 2040	16.77%	8.27%	10.68%	6.26%
L 2050	18.81%	9.05%	11.72%	NA

Performance of TSP Funds Total Returns

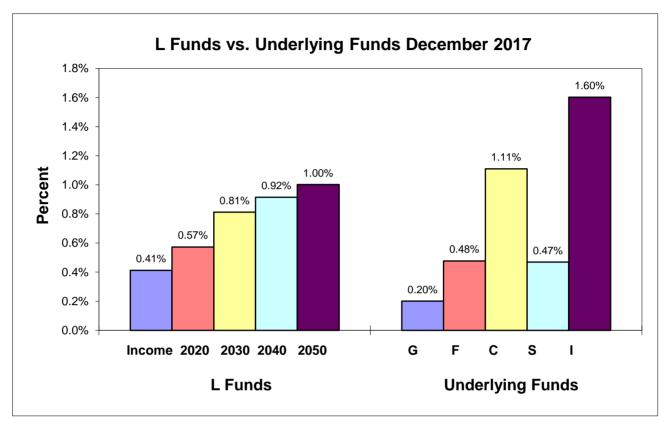
The charts below show the G, F, C, S, and I Fund net rates of return vs. respective benchmark index.

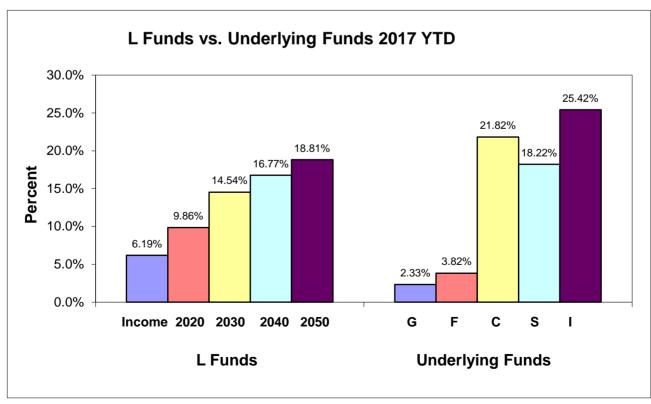




L Funds

The net rates of return for the L Funds are shown below along with comparable returns for the G, F, C, S, and I Funds.





Attachment 1 provides a summary of TSP investment activity and participation rates.

PROXY VOTING -- THIRD QUARTER 2017

An audit of BTC's proxy voting conducted by ISS found no exceptions to BTC's established guidelines during the third quarter of 2017. A copy of the audit report is provided as Attachment 2. The ISS audit report for the fourth quarter of 2017 is not yet available.

CLASS ACTION SETTLEMENTS -- THIRD QUARTER 2017

The Third Quarter began with twenty-four open claims. Fourteen claims were opened in the S Fund during the quarter. Seven claims in the S Fund were closed due to Administrator action. One claim in the C Fund was opened and one claim was settled. Thirty-one claims remained open across the four funds at the end of the quarter. For the year-to-date in 2017, four claims were settled for \$176,470.

	Open at Start of Quarter	<u>Opened</u> <u>during</u> <u>Quarter</u>	<u>Closed</u> <u>during</u> <u>Quarter</u>	Open Claims Outstanding	Estimate of Settled Claims in 2017 (\$)
F Fund	-	-	-	-	\$0
C Fund	9	1	1	9	\$176,470
S Fund	15	14	7	22	\$0
I Fund	-	-	-	-	\$0
Total	24	15	8	31	\$176,470

RECOMMENDATION

The G Fund investments produce long-term yields while incurring no market risk. I recommend reaffirmation of the current G Fund policy of investing solely in short-term maturities.

The F, C, S, and I Funds have tracked their respective indices and have incurred low trading costs. I recommend reaffirmation of the current F, C, S, and I Fund investment policies.

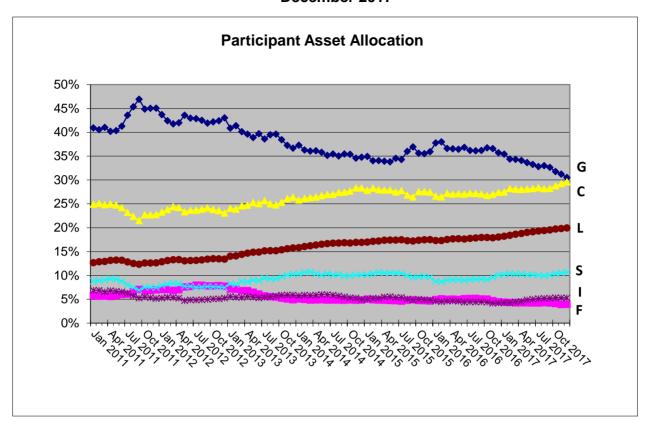
WHEREAS the Federal Employees' Retirement System Act of 1986, as amended (5 U.S.C. § 8401 -- et seq.) provides the Board members shall establish policies for the investment and management of the Thrift Savings Fund (5 U.S.C. § 8472(f) (1) and (2)); and

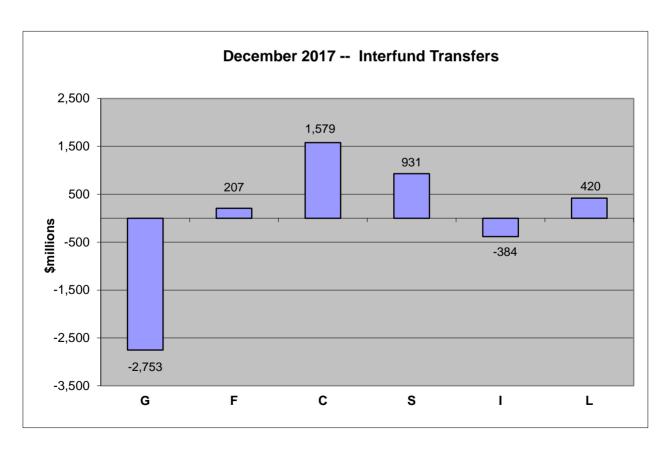
WHEREAS the Board members at this meeting have reviewed the investment performance and investment policies of the Government Securities Investment Fund, the Fixed Income Index Investment Fund, Common Stock Index Investment Fund, the Small Capitalization Stock Index Investment Fund and the International Stock Index Investment Fund; and

WHEREAS the Board members are satisfied with the investment performance and investment policies of these Funds:

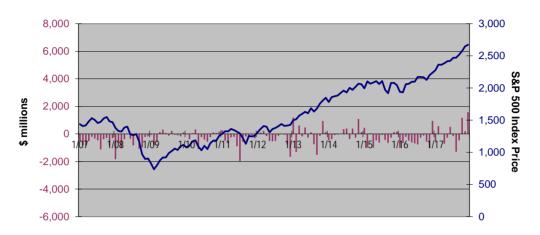
NOW THEREFORE BE IT RESOLVED that the current investment policies for the Government Securities Investment Fund, the Common Stock Index Investment Fund, the Fixed Income Index Investment Fund, the Small Capitalization Stock Index Investment Fund, and the International Stock Index Investment Fund are affirmed without change.

Attachments

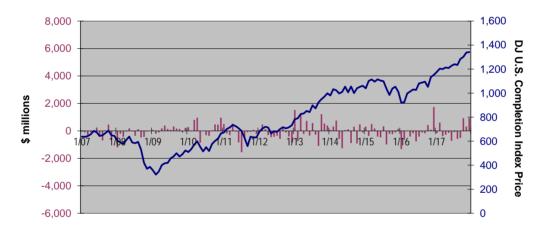




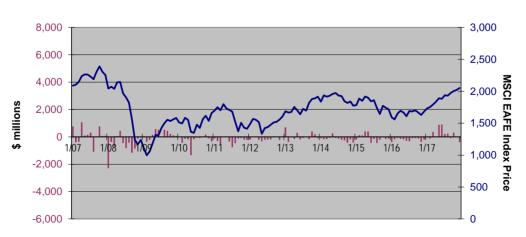
Monthly Interfund Transfers C Fund



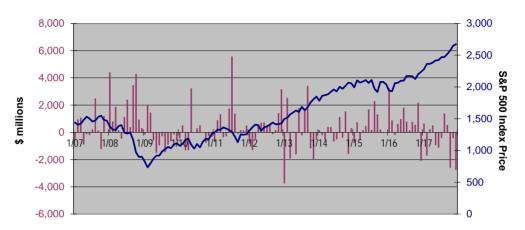
Monthly Interfund Transfers S Fund



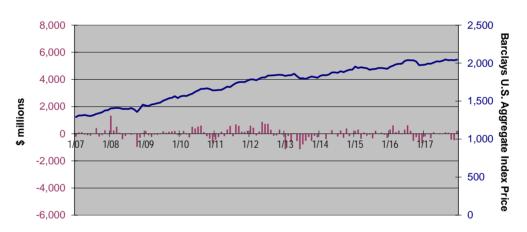
Monthly Interfund Transfers I Fund



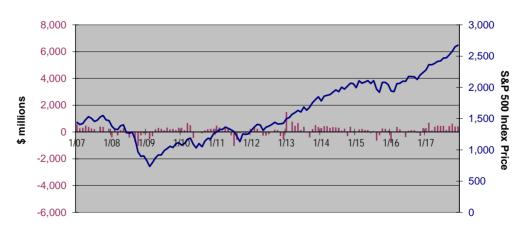
Monthly Interfund Transfers G Fund

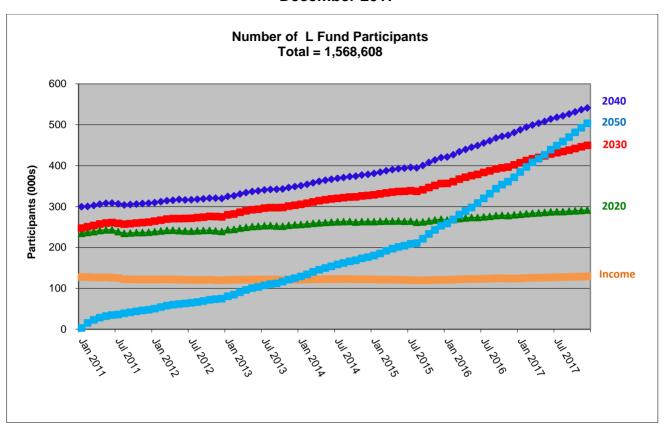


Monthly Interfund Transfers F Fund



Monthly Interfund Transfers L Funds





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November 7, 2017

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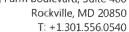
Dear Michelle,

Enclosed are the results of our review of US proxy votes by BlackRock for the 3rd quarter of 2017. Our review found that there were no exceptions to policy over this period.

Best regards,

Fassil G. Michael

Executive Director, Head of Custom Research





MEMORANDUM

The results of our review of BlackRock's 3rd quarter proxy voting for US meetings are as follows:

- Votes at 38 meetings were examined.
- Votes at 5 of the 38 meetings were for directors, auditors, and/or management say-on-pay (MSOP) only.
- At the 33 remaining meetings, there were 75 non-director/auditor/MSOP proposals.

The following table illustrates the votes involved by proposal type:

Proposal	Votes
Executive stock option plan	14
Employee share purchase plan	3
Section 162(m)	1
Advisory vote on golden parachute compensation	7
Frequency vote on MSOP	16
Increase in common stock	1
Increase in preferred stock	1
Issuance of shares for private placement	2
Approve merger agreement	8
Issue shares in connection with merger	1
Approve formation of a holding company	1
Adjourn meeting	11
Establish range for board size	1
Classify board of directors	1
Provide right to act by written consent	1
Change company name	1
Approve change of control	1
Ratify certificate of amendment and reverse stock	1
split	
Amend bylaws	1
Other business	1
Shareholder proposal	1
Total:	75

- There were 14 votes cast on executive stock option plans:
 - a) 13 votes were cast in favor of the plans (92.9 percent);
 - b) 1 vote was cast against the plan (7.1 percent) due to the ability to reprice options without shareholder approval.
- There were 3 votes cast on employee share purchase plans:
 - a) 2 votes were cast in favor of the plans (66.7 percent);
 - b) 1 vote was cast against the plan (33.3 percent) due to the presence of an evergreen provision.
- There was 1 vote cast on an increase in authorized common stock; the vote was cast in favor of the increase.
- There were 9 votes cast on mergers, acquisitions and/or major corporate transactions, including an issuance of shares pursuant to a merger; the votes were cast in favor of the transactions.
- There was 1 vote cast on a shareholder proposal to adopt proxy access; the vote was cast in favor of the proposal.
- There were 21 votes cast on management advisory votes on executive compensation; the votes were cast in favor of the advisory votes.
- There were 7 votes cast on a management advisory vote on golden parachute compensation; the votes were cast in favor of the advisory votes.

There were no exceptions to policy this period.