

BLACKROCK MUNIASSETS FUND, INC.
Form N-CSRS
January 04, 2017

UNITED STATES

SECURITIES AND EXCHANGE COMMISSION

Washington, D.C. 20549

FORM N-CSR

**CERTIFIED SHAREHOLDER REPORT OF REGISTERED MANAGEMENT INVESTMENT
COMPANIES**

Investment Company Act file number: 811-07642

Name of Fund: BlackRock MuniAssets Fund, Inc. (MUA)

Fund Address: 100 Bellevue Parkway, Wilmington, DE 19809

Name and address of agent for service: John M. Perlowski, Chief Executive Officer, BlackRock MuniAssets
Fund, Inc., 55 East 52nd Street, New York, NY 10055

Registrant's telephone number, including area code: (800) 882-0052, Option 4

Date of fiscal year end: 04/30/2017

Date of reporting period: 10/31/2016

Item 1 Report to Stockholders

SEMI-ANNUAL REPORT (UNAUDITED)

BlackRock MuniAssets Fund, Inc. (MUA)

BlackRock MuniEnhanced Fund, Inc. (MEN)

BlackRock MuniHoldings Fund, Inc. (MHD)

BlackRock MuniHoldings Fund II, Inc. (MUH)

BlackRock MuniHoldings Quality Fund, Inc. (MUS)

BlackRock Muni Intermediate Duration Fund, Inc. (MUI)

BlackRock MuniVest Fund II, Inc. (MVT)

Not FDIC Insured May Lose Value No Bank Guarantee

Table of Contents

	Page
<u>The Markets in Review</u>	3
<u>Semi-Annual Report:</u>	
<u>Municipal Market Overview</u>	4
<u>The Benefits and Risks of Leveraging</u>	5
<u>Derivative Financial Instruments</u>	5
<u>Fund Summaries</u>	6
<u>Financial Statements:</u>	
<u>Schedules of Investments</u>	20
<u>Statements of Assets and Liabilities</u>	69
<u>Statements of Operations</u>	71
<u>Statements of Changes in Net Assets</u>	73
<u>Statements of Cash Flows</u>	75
<u>Financial Highlights</u>	77
<u>Notes to Financial Statements</u>	84
<u>Disclosure of Investment Advisory Agreements</u>	95
<u>Officers and Directors</u>	99
<u>Additional Information</u>	100

The Markets in Review

Dear Shareholder,

Central bank policy decisions have continued to provide support to financial markets, while changing economic outlooks and geopolitical risks have been major drivers of investor sentiment. After ending its near-zero interest rate policy at the end of 2015, the Federal Reserve (the Fed) remained in focus as investors considered the anticipated pace of future rate hikes. With the European Central Bank and the Bank of Japan having moved into stimulus mode, the divergence in global monetary policies drove heightened market volatility at the beginning of 2016 and caused the U.S. dollar to strengthen considerably.

Financial markets had a rough start to the year as the strong dollar challenged U.S. companies that generate revenues overseas and pressured emerging market currencies and commodities prices. Low and volatile oil prices and signs of slowing growth in China were also meaningful factors behind the decline in risk assets early in the year. However, as the first quarter wore on, these pressures abated and a more tempered outlook for U.S. rate hikes helped the markets rebound.

Volatility spiked in late June when the United Kingdom shocked investors with its vote to leave the European Union. Uncertainty around how the British exit might affect the global economy and political landscape drove investors to high-quality assets, pushing already low global yields to even lower levels. However, risk assets recovered swiftly in July as economic data suggested that the consequences had thus far been contained to the United Kingdom.

In a second episode of surprise vote results, equities fell sharply after the news of Donald Trump's victory in the U.S. presidential election, but quickly recovered, and the yield curve steepened due to expectations for rising inflation. Broadly, a reflation theme has been building amid signs of rising price pressures, central banks signaling a greater tolerance to let inflation run hotter, and policy emphasis shifting from monetary to fiscal stimulus.

At BlackRock, we believe investors need to think globally, extend their scope across a broad array of asset classes and be prepared to adjust accordingly as market conditions change over time. We encourage you to talk with your financial advisor and visit blackrock.com for further insight about investing in today's markets.

Sincerely,

Rob Kapito

President, BlackRock Advisors, LLC

Rob Kapito

President, BlackRock Advisors, LLC

Total Returns as of October 31, 2016

	6-month	12-month
U.S. large cap equities (S&P 500® Index)	4.06%	4.51%
U.S. small cap equities (Russell 2000® Index)	6.13	4.11
International equities (MSCI Europe, Australasia, Far East Index)	(0.16)	(3.23)
Emerging market equities (MSCI Emerging Markets Index)	9.41	9.27
3-month Treasury bills (BofA Merrill Lynch 3-Month U.S. Treasury Bill Index)	0.17	0.31

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

U.S. Treasury securities (BofA Merrill Lynch 10-Year U.S. Treasury Index)	0.46	4.24
U.S. investment grade bonds (Bloomberg Barclays U.S. Aggregate Bond Index)	1.51	4.37
Tax-exempt municipal bonds (S&P Municipal Bond Index)	0.98	4.53
U.S. high yield bonds (Bloomberg Barclays U.S. Corporate High Yield 2% Issuer Capped Index)	7.59	10.16

Past performance is no guarantee of future results. Index performance is shown for illustrative purposes only. You cannot invest directly in an index.

THIS PAGE NOT PART OF YOUR FUND REPORT

3

Municipal Market Overview

For the Reporting Period Ended October 31, 2016

Municipal Market Conditions

Municipal bonds generated positive performance for the period, due to falling interest rates and a favorable supply-and-demand environment. Interest rates were volatile late in 2015 (bond prices rise as rates fall) leading up to a long-awaited rate hike from the U.S. Federal Reserve (the Fed) that ultimately came in December. However, ongoing reassurance from the Fed that rates would be increased gradually and would likely remain low overall resulted in strong demand for fixed income investments. Investors favored the relative yield and stability of municipal bonds amid bouts of volatility resulting from uneven U.S. economic data, volatile oil prices, global growth concerns, geopolitical risks (particularly the United Kingdom's decision to leave the European Union and the contentious U.S. election), and widening central bank divergence i.e., policy easing outside the United States while the Fed was posturing to commence policy tightening. During the 12 months ended October 31, 2016, municipal bond funds garnered net inflows of approximately \$61 billion (based on data from the Investment Company Institute).

For the same 12-month period, total new issuance remained robust from a historical perspective at \$439 billion (significantly above the \$420 billion issued in the prior 12-month period). A noteworthy portion of new supply during this period was attributable to refinancing activity (roughly 60%) as issuers continued to take advantage of low interest rates and a flatter yield curve to reduce their borrowing costs.

S&P Municipal Bond Index	
Total Returns as of October 31, 2016	
6 months:	0.98%
12 months:	4.53%

A Closer Look at Yields

From October 31, 2015 to October 31, 2016, yields on AAA-rated 30-year municipal bonds decreased by 51 basis points (bps) from 3.07% to 2.56%, while 10-year rates fell by 31 bps from 2.04% to 1.73% and 5-year rates decreased 4 bps from 1.17% to 1.13% (as measured by Thomson Municipal Market Data). The municipal yield curve experienced significant flattening over the 12-month period with the

spread between 2- and 30-year maturities flattening by 81 bps and the spread between 2- and 10-year maturities flattening by 61 bps.

During the same time period, on a relative basis, tax-exempt municipal bonds broadly outperformed U.S. Treasuries with the greatest outperformance experienced in longer-term issues. In absolute terms, the positive performance of muni bonds was driven largely by falling interest rates as well as a supply/demand imbalance within the municipal market as investors sought income and incremental yield in an environment where opportunities became increasingly scarce. More broadly, municipal bonds benefited from the greater appeal of tax-exempt investing in light of the higher tax rates implemented in 2014. The asset class is known for its lower relative volatility and preservation of principal with an emphasis on income as tax rates rise.

Financial Conditions of Municipal Issuers

The majority of municipal credits remain strong, despite well-publicized distress among a few issuers. Four of the five states with the largest amount of debt outstanding California, New York, Texas and Florida have exhibited markedly improved credit fundamentals during the slow national recovery. However, several states with the largest unfunded pension liabilities have seen their bond prices decline noticeably and remain vulnerable to additional price deterioration. On the local level, Chicago's credit quality downgrade is an outlier relative to other cities due to its larger pension liability and inadequate funding remedies. BlackRock maintains the view that municipal bond defaults will remain minimal and in the periphery while the overall market is fundamentally sound. We continue to advocate careful credit research and believe that a thoughtful approach to structure and security selection remains imperative amid uncertainty in a modestly improving economic environment.

The opinions expressed are those of BlackRock as of October 31, 2016, and are subject to change at any time due to changes in market or economic conditions. The comments should not be construed as a recommendation of any individual holdings or market sectors. Investing involves risk including loss of principal. Bond values fluctuate in price so the value of your investment can go down depending on market conditions. Fixed income risks include interest-rate and credit risk. Typically, when interest rates rise, there is a corresponding decline in bond values. Credit risk refers to the possibility that the bond issuer will not be able to make principal and interest payments. There may be less information on the financial condition of municipal issuers than for public corporations. The market for

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

municipal bonds may be less liquid than for taxable bonds. Some investors may be subject to Alternative Minimum Tax (AMT). Capital gains distributions, if any, are taxable.

The Standard & Poor's Municipal Bond Index, a broad, market value-weighted index, seeks to measure the performance of the US municipal bond market. All bonds in the index are exempt from US federal income taxes or subject to the alternative minimum tax. Past performance is no guarantee of future results. Index performance is shown for illustrative purposes only. It is not possible to invest directly in an index.

The Benefits and Risks of Leveraging

The Funds may utilize leverage to seek to enhance the distribution rate on, and net asset value (NAV) of, their common shares (Common Shares). However, these objectives cannot be achieved in all interest rate environments.

In general, the concept of leveraging is based on the premise that the financing cost of leverage, which is based on short-term interest rates, is normally lower than the income earned by a Fund on its longer-term portfolio investments purchased with the proceeds from leverage. To the extent that the total assets of the Funds (including the assets obtained from leverage) are invested in higher-yielding portfolio investments, the Funds' shareholders benefit from the incremental net income. The interest earned on securities purchased with the proceeds from leverage is paid to shareholders in the form of dividends, and the value of these portfolio holdings is reflected in the per share NAV.

To illustrate these concepts, assume a Fund's Common Shares capitalization is \$100 million and it utilizes leverage for an additional \$30 million, creating a total value of \$130 million available for investment in longer-term income securities. If prevailing short-term interest rates are 3% and longer-term interest rates are 6%, the yield curve has a strongly positive slope. In this case, a Fund's financing costs on the \$30 million of proceeds obtained from leverage are based on the lower short-term interest rates. At the same time, the securities purchased by a Fund with the proceeds from leverage earn income based on longer-term interest rates. In this case, a Fund's financing cost of leverage is significantly lower than the income earned on a Fund's longer-term investments acquired from leverage proceeds, and therefore the holders of Common Shares (Common Shareholders) are the beneficiaries of the incremental net income.

However, in order to benefit Common Shareholders, the return on assets purchased with leverage proceeds must exceed the ongoing costs associated with the leverage. If interest and other costs of leverage exceed the Funds' return on assets purchased with leverage proceeds, income to shareholders is lower than if the Funds had not used leverage. Furthermore, the value of the Funds' portfolio investments generally varies inversely with the direction of long-term interest rates, although other factors can influence the value of portfolio investments. In contrast, the value of the Funds' obligations under their respective leverage arrangements generally does not fluctuate in relation to interest rates. As a result, changes in interest rates can influence the Funds' NAVs positively or negatively. Changes in the future direction of interest rates are very

difficult to predict accurately, and there is no assurance that a Fund's intended leveraging strategy will be successful.

The use of leverage also generally causes greater changes in each Fund's NAV, market price and dividend rates than comparable portfolios without leverage. In a declining market, leverage is likely to cause a greater decline in the NAV and market price of a Fund's Common Shares than if the Fund were not leveraged. In addition, each Fund may be required to sell portfolio securities at inopportune times or at distressed values in order to comply with regulatory requirements applicable to the use of leverage or as required by the terms of leverage instruments, which may cause the Funds to incur losses. The use of leverage may limit a Fund's ability to invest in certain types of securities or use certain types of hedging strategies. Each Fund incurs expenses in connection with the use of leverage, all of which are borne by Common Shareholders and may reduce income to the Common Shares. Moreover, to the extent the calculation of the Funds' investment advisory fees includes assets purchased with the proceeds of leverage, the investment advisory fees payable to the Funds' investment adviser will be higher than if the Funds did not use leverage.

To obtain leverage, each Fund has issued Variable Rate Demand Preferred Shares (VRDP Shares) or Variable Rate Muni Term Preferred Shares (VMTP Shares) (collectively, Preferred Shares) and/or leveraged its assets through the use of tender option bond trusts (TOB Trusts) as described in the Notes to Financial Statements.

Under the Investment Company Act of 1940, as amended (the 1940 Act), each Fund is permitted to issue debt up to 33 1/3% of its total managed assets or equity securities (e.g., Preferred Shares) up to 50% of its total managed assets. A Fund may voluntarily elect to limit its leverage to less than the maximum amount permitted under the 1940 Act. In addition, a Fund may also be subject to certain asset coverage, leverage or portfolio composition requirements imposed by the Preferred Shares' governing instruments or by agencies rating the Preferred Shares, which may be more stringent than those imposed by the 1940 Act.

If a Fund segregates or designates on its books and records cash or liquid assets having a value not less than the value of a Fund's obligations under the TOB Trust (including accrued interest), a TOB Trust is not considered a senior security and is not subject to the foregoing limitations and requirements under the 1940 Act.

Derivative Financial Instruments

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

The Funds may invest in various derivative financial instruments. These instruments are used to obtain exposure to a security, commodity, index, market, and/or other asset without owning or taking physical custody of securities, commodities and/or other referenced assets or to manage market, equity, credit, interest rate, foreign currency exchange rate, commodity and/or other risks. Derivative financial instruments may give rise to a form of economic leverage and involve risks, including the imperfect correlation between the value of a derivative financial instru-

ment and the underlying asset, possible default of the counterparty to the transaction or illiquidity of the instrument. The Funds' successful use of a derivative financial instrument depends on the investment adviser's ability to predict pertinent market movements accurately, which cannot be assured. The use of these instruments may result in losses greater than if they had not been used, may limit the amount of appreciation a Fund can realize on an investment and/or may result in lower distributions paid to shareholders. The Funds' investments in these instruments, if any, are discussed in detail in the Notes to Financial Statements.

Fund Summary as of October 31, 2016

BlackRock MuniAssets Fund, Inc.

Fund Overview

BlackRock MuniAssets Fund, Inc. s (MUA) (the Fund) investment objective is to provide high current income exempt from federal income taxes by investing primarily in a portfolio of medium- to lower-grade or unrated municipal obligations, the interest on which, in the opinion of bond counsel to the issuer, is exempt from federal income taxes. The Fund seeks to achieve its investment objective by investing, under normal market conditions, at least 80% of its assets in municipal bonds exempt from federal income taxes (except that the interest may be subject to the federal alternative minimum tax). The Fund invests at least 65% of its assets in municipal bonds that are rated in the medium to lower categories by nationally recognized rating services (for example, Baa or lower by Moody s Investors Service, Inc. (Moody s) or BBB or lower by Standard & Poor s Corporation (S&P) or securities which are deemed by the investment adviser to be of comparable quality. The Fund may invest directly in such securities or synthetically through the use of derivatives.

No assurance can be given that the Fund s investment objective will be achieved.

Fund Information

Symbol on New York Stock Exchange (NYSE)	MUA
Initial Offering Date	June 25, 1993
Yield on Closing Market Price as of October 31, 2016 (\$14.34) ¹	4.81%
Tax Equivalent Yield ²	8.50%
Current Monthly Distribution per Common Share ³	\$0.0575
Current Annualized Distribution per Common Share ³	\$0.6900
Economic Leverage as of October 31, 2016 ⁴	11%

¹ Yield on closing market price is calculated by dividing the current annualized distribution per share by the closing market price. The current distribution rate may consist of income, net realized gains and/or a return of capital. See the Additional Information Section 19(a) Notice for estimated sources and character of distributions. Past performance does not guarantee future results.

² Tax equivalent yield assumes the maximum marginal federal tax rate of 43.4%, which includes the 3.8% Medicare tax. Actual tax rates will vary based on income, exemptions and deductions. Lower taxes will result in lower tax equivalent yields.

³ The distribution rate is not constant and is subject to change.

⁴ Represents TOB Trusts as a percentage of total managed assets, which is the total assets of the Fund, including any assets attributable to TOB Trusts, minus the sum of accrued liabilities. For a discussion of leveraging techniques utilized by the Fund, please see The Benefits and Risks of Leveraging on page 5.

Performance

Returns for the six months ended October 31, 2016 were as follows:

	Returns Based On	
	Market Price	NAV
MUA ^{1,2}	(0.39)%	2.53%
Lipper High Yield Municipal Debt Funds ³	(2.96)%	1.95%

¹ All returns reflect reinvestment of dividends and/or distributions.

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

² The Fund moved from a premium to NAV to a discount during the period, which accounts for the difference between performance based on price and performance based on NAV.

³ Average return.

Performance results may include adjustments made for financial reporting purposes in accordance with U.S. generally accepted accounting principles. The following discussion relates to the Fund's absolute performance based on NAV:

The U.S. municipal bond market delivered modest gains in the period, with the bulk of the positive return occurring in May and June. During these two months, bond yields fell sharply (as prices rose) in reaction to the highly accommodative policies of the world's central banks and the prospect of the Fed maintaining a gradual, data-dependent approach to raising rates. In the latter part of the period, however, the market gave back some ground as accelerating growth indicated an increased likelihood that the Fed would in fact start to raise rates before year end. Despite this headwind, the tax-exempt market closed in positive territory due to the combination of its attractive yields, a favorable supply-and-demand picture, and the continued health of state and local finances.

The Fund's positions in lower-rated investment-grade securities generally made the largest contributions to performance, as elevated investor risk appetites led to robust demand for higher-yielding issues. Holdings in bonds with maturities of 20 years or longer also aided performance given that longer-term debt benefited from both stronger price performance and higher income relative to shorter-dated securities. At the sector level, the Fund was helped by its positions in health care, transportation and tobacco issues.

The Fund's more-seasoned holdings, while producing generous yields compared to current market rates, detracted from performance. The prices of many of these investments declined due to the premium amortization that occurred as the bonds approached their first call dates. (A call is when an issuer redeems a bond prior to its maturity date; premium is amount by which a bond trades above its \$100 par value.)

The Fund utilized U.S. Treasury futures contracts to manage exposure to a potential rise in interest rates, and its tactical shifts in this area contributed to the Fund's six-month results.

The views expressed reflect the opinions of BlackRock as of the date of this report and are subject to change based on changes in market, economic or other conditions. These views are not intended to be a forecast of future events and are no guarantee of future results.

Market Price and Net Asset Value Per Share Summary

	10/31/16	4/30/16	Change	High	Low
Market Price	\$ 14.34	\$ 14.74	(2.71)%	\$ 15.87	\$ 13.96
Net Asset Value	\$ 14.47	\$ 14.45	0.14%	\$ 14.80	\$ 14.45

Market Price and Net Asset Value History For the Past Five Years

Overview of the Fund's Total Investments*

Sector Allocation	10/31/16	4/30/16
Health	23%	22%
Transportation	18	19
Tobacco	15	14
County/City/Special District/School District	13	14
Education	9	9
Utilities	8	8
Corporate	7	7
State	4	3
Housing	3	4

For Fund compliance purposes, the Fund's sector classifications refer to one or more of the sector sub-classifications used by one or more widely recognized market indexes or rating group indexes, and/or as defined by the investment adviser. These definitions may not apply for purposes of this report, which may combine such sector sub-classifications for reporting ease.

Credit Quality Allocation ¹	10/31/16	4/30/16
AA/Aa	19%	19%
A	7	7
BBB/Baa	21	24
BB/Ba	8	10
B/B	13	9
CCC/Caa	1	²
N/R ³	31	31

¹ For financial reporting purposes, credit quality ratings shown above reflect the highest rating assigned by either S&P or Moody's if ratings differ. These rating agencies are independent, nationally recognized statistical rating organizations and are widely used. Investment grade ratings are credit ratings of BBB/Baa or higher. Below investment grade ratings are credit ratings of BB/Ba or lower. Investments designated N/R are not rated by either rating agency. Unrated investments do not necessarily indicate low credit quality. Credit quality ratings are subject to change.

² Representing less than 1% of the Fund's total investments.

³ The investment adviser evaluates the credit quality of unrated investments based upon certain factors including, but not limited to, credit ratings for similar investments and financial analysis of sectors and individual investments. Using this approach, the investment adviser has deemed certain of these unrated securities as investment grade quality. As of October 31, 2016 and April 30, 2016, the market value of unrated securities deemed by the investment adviser to be investment grade each represents 6% and 5%, respectively, of the Fund's total investments.

Call/Maturity Schedule⁴

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

Calendar Year Ended December 31,	
2016	7%
2017	8
2018	5
2019	5
2020	13

⁴ Scheduled maturity dates and/or bonds that are subject to potential calls by issuers over the next five years.

* Excludes short-term securities.

SEMI-ANNUAL REPORT

OCTOBER 31, 2016

7

Fund Summary as of October 31, 2016

BlackRock MuniEnhanced Fund, Inc.

Fund Overview

BlackRock MuniEnhanced Fund, Inc. s (MEN) (the Fund) investment objective is to provide shareholders with as high a level of current income exempt from federal income taxes as is consistent with its investment policies and prudent investment management. The Fund seeks to achieve its investment objective by investing at least 80% of its assets in municipal bonds exempt from federal income taxes (except that the interest may be subject to the federal alternative minimum tax). Under normal market conditions, the Fund invests primarily in long-term municipal bonds rated investment grade quality, or are deemed to be of comparable quality by the investment adviser, at the time of investment and invests primarily in long-term municipal bonds with maturities of more than ten years at the time of investment. The Fund may invest directly in such securities or synthetically through the use of derivatives.

No assurance can be given that the Fund s investment objective will be achieved.

Fund Information

Symbol on NYSE	MEN
Initial Offering Date	March 2, 1989
Yield on Closing Market Price as of October 31, 2016 (\$11.86) ¹	5.72%
Tax Equivalent Yield ²	10.11%
Current Monthly Distribution per Common Share ³	\$0.0565
Current Annualized Distribution per Common Share ³	\$0.6780
Economic Leverage as of October 31, 2016 ⁴	36%

¹ Yield on closing market price is calculated by dividing the current annualized distribution per share by the closing market price. Past performance does not guarantee future results.

² Tax equivalent yield assumes the maximum marginal federal tax rate of 43.4%, which includes the 3.8% Medicare tax. Actual tax rates will vary based on income, exemptions and deductions. Lower taxes will result in lower tax equivalent yields.

³ The distribution rate is not constant and is subject to change.

⁴ Represents VRDP Shares and TOB Trusts as a percentage of total managed assets, which is the total assets of the Fund, including any assets attributable to VRDP Shares and TOB Trusts, minus the sum of accrued liabilities. For a discussion of leveraging techniques utilized by the Fund, please see The Benefits and Risks of Leveraging on page 5.

Performance

Returns for the six months ended October 31, 2016 were as follows:

	Returns Based On	
	Market Price	NAV
MEN ^{1,2}	(2.89)%	1.20%
Lipper General & Insured Municipal Debt Funds (Leveraged) ³	(3.09)%	1.30%

¹ All returns reflect reinvestment of dividends and/or distributions.

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

- ² The Fund moved from a premium to NAV to a discount during the period, which accounts for the difference between performance based on price and performance based on NAV.
- ³ Average return.

Performance results may include adjustments made for financial reporting purposes in accordance with U.S. generally accepted accounting principles. The following discussion relates to the Fund's absolute performance based on NAV:

The U.S. municipal bond market delivered modest gains in the period, with the bulk of the positive return occurring in May and June. During these two months, bond yields fell sharply (as prices rose) in reaction to the highly accommodative policies of the world's central banks and the prospect of the Fed maintaining a gradual, data-dependent approach to raising rates. In the latter part of the period, however, the market gave back some ground as accelerating growth indicated an increased likelihood that the Fed would in fact start to raise rates before year end. Despite this headwind, the tax-exempt market closed in positive territory due to the combination of its attractive yields, a favorable supply-and-demand picture, and the continued health of state and local finances.

The Fund's exposure to the longer end of the municipal yield curve made a positive contribution to performance. The yield curve flattened during the reporting period, with long-end yields decreasing slightly even as short-term yields rose. The Fund also benefited from high advance-refunding activity in the municipal market. Refunding increased the value of certain holdings when they were paid off with high-quality collateral prior to their original maturity date. The Fund also benefited from its positions in the tax-backed (local) sector. The Fund's exposure to lower-rated investment-grade credits aided performance, as yield spreads for higher-yielding issues generally tightened.

Duration positioning detracted from absolute performance given that municipal yields rose slightly. The Fund's exposure to the front end of the municipal yield curve also detracted from results, as yields on two- to five-year bonds increased more than they did for longer-term issues.

The Fund's yield declined during the period. Many older, higher-yielding bonds matured or were called, and the proceeds were reinvested at much lower prevailing rates.

During the period, the use of leverage helped augment the Fund's returns. While the Fund can still generate additional income through the use of leverage due to the positively sloped yield curve, the benefit has become less pronounced due to rising short-term borrowing costs.

The Fund utilized U.S. Treasury futures contracts to manage exposure to a potential rise in interest rates, and its tactical shifts in this area contributed to the Fund's six-month results.

The views expressed reflect the opinions of BlackRock as of the date of this report and are subject to change based on changes in market, economic or other conditions. These views are not intended to be a forecast of future events and are no guarantee of future results.

Market Price and Net Asset Value Per Share Summary

	10/31/16	4/30/16	Change	High	Low
Market Price	\$ 11.86	\$ 12.55	(5.50)%	\$ 13.21	\$ 11.67
Net Asset Value	\$ 12.33	\$ 12.52	(1.52)%	\$ 12.91	\$ 12.30

Market Price and Net Asset Value History For the Past Five Years

Overview of the Fund's Total Investments*

Sector Allocation	10/31/16	4/30/16
Transportation	23%	21%
County/City/Special District/School District	19	21
Utilities	18	16
State	14	15
Health	10	11
Education	10	10
Corporate	4	4
Housing	1	1
Tobacco	1	1

For Fund compliance purposes, the Fund's sector classifications refer to one or more of the sector sub-classifications used by one or more widely recognized market indexes or rating group indexes, and/or as defined by the investment adviser. These definitions may not apply for purposes of this report, which may combine such sector sub-classifications for reporting ease.

Credit Quality Allocation¹

	10/31/16	4/30/16
AAA/Aaa	9%	9%
AA/Aa	57	58
A	24	25
BBB/Baa	8	7
N/R ²	2	1

¹ For financial reporting purposes, credit quality ratings shown above reflect the highest rating assigned by either S&P or Moody's if ratings differ. These rating agencies are independent, nationally recognized statistical rating organizations and are widely used. Investment grade ratings are credit ratings of BBB/Baa or higher. Below investment grade ratings are credit ratings of BB/Ba or lower. Investments designated N/R are not rated by either rating agency. Unrated investments do not necessarily indicate low credit quality. Credit quality ratings are subject to change.

² The investment adviser evaluates the credit quality of unrated investments based upon certain factors including but not limited to, credit ratings for similar investments and financial analysis of sectors and individual investments. Using this approach, the investment adviser has deemed certain of these unrated securities as investment grade quality. As of October 31, 2016 and April 30, 2016, the market value of unrated securities deemed by the investment adviser to be investment grade each represents less than 1% of the Fund's total investments.

Call/Maturity Schedule³

Calendar Year Ended December 31,

2016	6%
2017	10
2018	10
2019	15

2020

3

³ Scheduled maturity dates and/or bonds that are subject to potential calls by issuers over the next five years.

* Excludes short-term securities.

SEMI-ANNUAL REPORT

OCTOBER 31, 2016

9

Fund Summary as of October 31, 2016

BlackRock MuniHoldings Fund, Inc.

Fund Overview

BlackRock MuniHoldings Fund, Inc. s (MHD) (the Fund) investment objective is to provide shareholders with current income exempt from federal income taxes. The Fund seeks to achieve its investment objective by investing at least 80% of its assets in municipal bonds exempt from federal income taxes (except that the interest may be subject to the federal alternative minimum tax). The Fund invests, under normal market conditions, at least 75% of its assets in municipal bonds rated investment grade, or are deemed to be of comparable quality by the investment adviser, at the time of investment and invests primarily in long-term municipal bonds with a maturity of more than ten years at the time of investment. The Fund may invest directly in such securities or synthetically through the use of derivatives.

No assurance can be given that the Fund s investment objective will be achieved.

Fund Information

Symbol on NYSE	MHD
Initial Offering Date	May 2, 1997
Yield on Closing Market Price as of October 31, 2016 (\$16.75) ¹	5.80%
Tax Equivalent Yield ²	10.25%
Current Monthly Distribution per Common Share ³	\$0.0810
Current Annualized Distribution per Common Share ³	\$0.9720
Economic Leverage as of October 31, 2016 ⁴	38%

¹ Yield on closing market price is calculated by dividing the current annualized distribution per share by the closing market price. Past performance does not guarantee future results.

² Tax equivalent yield assumes the maximum marginal federal tax rate of 43.4%, which includes the 3.8% Medicare tax. Actual tax rates will vary based on income, exemptions and deductions. Lower taxes will result in lower tax equivalent yields.

³ The distribution rate is not constant and is subject to change.

⁴ Represents VMTP Shares and TOB Trusts as a percentage of total managed assets, which is the total assets of the Fund, including any assets attributable to VMTP Shares and TOB Trusts, minus the sum of accrued liabilities. For a discussion of leveraging techniques utilized by the Fund, please see The Benefits and Risks of Leveraging on page 5.

Performance

Returns for the six months ended October 31, 2016 were as follows:

	Returns Based On	
	Market Price	NAV
MHD ^{1,2}	(5.12)%	1.26%
Lipper General & Insured Municipal Debt Funds (Leveraged) ³	(3.09)%	1.30%

¹ All returns reflect reinvestment of dividends and/or distributions.

² The Fund moved from a premium to NAV to a discount during the period, which accounts for the difference between performance based on price and performance based on NAV.

³ Average return.

Performance results may include adjustments made for financial reporting purposes in accordance with U.S. generally accepted accounting principles. The following discussion relates to the Fund's absolute performance based on NAV:

The U.S. municipal bond market delivered modest gains in the period, with the bulk of the positive return occurring in May and June. During these two months, bond yields fell sharply (as prices rose) in reaction to the highly accommodative policies of the world's central banks and the prospect of the Fed maintaining a gradual, data-dependent approach to raising rates. In the latter part of the period, however, the market gave back some ground as accelerating growth indicated an increased likelihood that the Fed would in fact start to raise rates before year end. Despite this headwind, the tax-exempt market closed in positive territory due to the combination of its attractive yields, a favorable supply-and-demand picture, and the continued health of state and local finances.

The Fund's positions in lower-rated investment-grade securities generally made the largest contributions to performance, as elevated investor risk appetites led to robust demand for higher-yielding issues. Holdings in bonds with maturities of 20 years or longer also aided performance given that longer-term debt benefited from both stronger price performance and higher income relative to shorter-dated securities. At the sector level, the Fund was helped by its positions in transportation, utilities and local tax-backed issues.

The Fund's more-seasoned holdings, while producing generous yields compared to current market rates, detracted from performance. The prices of many of these investments declined due to the premium amortization that occurred as the bonds approached their first call dates. (A call is when an issuer redeems a bond prior to its maturity date; premium is amount by which a bond trades above its \$100 par value.)

The Fund utilized U.S. Treasury futures contracts to manage exposure to a potential rise in interest rates, and its tactical shifts in this area contributed to the Fund's six-month results.

The views expressed reflect the opinions of BlackRock as of the date of this report and are subject to change based on changes in market, economic or other conditions. These views are not intended to be a forecast of future events and are no guarantee of future results.

Market Price and Net Asset Value Per Share Summary

	10/31/16	4/30/16	Change	High	Low
Market Price	\$ 16.75	\$ 18.14	(7.66)%	\$ 19.22	\$ 16.70
Net Asset Value		17.96			
	\$ 17.69	\$ ¹	(1.50)%	\$ 18.52	\$ 17.65

¹ The net asset value does not reflect adjustments made for financial reporting purposes in accordance with U.S. generally accepted accounting principles and therefore differs from amount reported in the Financial Highlights.

Market Price and Net Asset Value History For the Past Five Years

Overview of the Fund's Total Investments*

Sector Allocation	10/31/16	4/30/16
Transportation	22%	24%
Health	20	19
Utilities	12	12
County/City/Special District/School District	12	12
State	12	12
Education	11	10
Corporate	6	6
Tobacco	5	5

For Fund compliance purposes, the Fund's sector classifications refer to one or more of the sector sub-classifications used by one or more widely recognized market indexes or rating group indexes, and/or as defined by the investment adviser. These definitions may not apply for purposes of this report, which may combine such sector sub-classifications for reporting ease.

Credit Quality Allocation ¹	10/31/16	4/30/16
AAA/Aaa	4%	5%
AA/Aa	47	48
A	21	22
BBB/Baa	14	13
BB/Ba	3	4
B	2	1
N/R ²	9	7

¹ For financial reporting purposes, credit quality ratings shown above reflect the highest rating assigned by either S&P or Moody's if ratings differ. These rating agencies are independent, nationally recognized statistical rating organizations and are widely used. Investment grade ratings are credit ratings of BBB/Baa or higher. Below investment grade ratings are credit ratings of BB/Ba or lower. Investments designated N/R are not rated by either rating agency. Unrated investments do not necessarily indicate low credit quality. Credit quality ratings are subject to change.

² The investment adviser evaluates the credit quality of unrated investments based upon certain factors including, but not limited to, credit ratings for similar investments and financial analysis of sectors and individual investments. Using this approach, the investment adviser has deemed certain of these unrated securities as investment grade quality. As of October 31, 2016 and April 30, 2016, the market value of unrated securities deemed by the investment adviser to be investment grade each represents 2% of the Fund's total investments.

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

Call/Maturity Schedule³

Calendar Year Ended December 31,

2016	4%
2017	5
2018	5
2019	24
2020	12

³ Scheduled maturity dates and/or bonds that are subject to potential calls by issuers over the next five years.

* Excludes short-term securities.

SEMI-ANNUAL REPORT

OCTOBER 31, 2016

11

Fund Summary as of October 31, 2016

BlackRock MuniHoldings Fund II, Inc.

Fund Overview

BlackRock MuniHoldings Fund II, Inc. s (MUH) (the Fund) investment objective is to provide shareholders with current income exempt from federal income taxes. The Fund seeks to achieve its investment objective by investing, under normal market conditions, at least 80% of its assets in municipal bonds exempt from federal income taxes (except that the interest may be subject to the federal alternative minimum tax). The Fund invests, under normal market conditions, at least 75% of its assets in municipal bonds rated investment grade, or are deemed to be of comparable quality by the investment adviser, at the time of investment and invests primarily in long-term municipal bonds with a maturity of more than ten years at the time of investment. The Fund may invest directly in such securities or synthetically through the use of derivatives.

No assurance can be given that the Fund s investment objective will be achieved.

Fund Information

Symbol on NYSE	MUH
Initial Offering Date	February 27, 1998
Yield on Closing Market Price as of October 31, 2016 (\$15.41) ¹	5.80%
Tax Equivalent Yield ²	10.25%
Current Monthly Distribution per Common Share ³	\$0.0745
Current Annualized Distribution per Common Share ³	\$0.8940
Economic Leverage as of October 31, 2016 ⁴	37%

¹ Yield on closing market price is calculated by dividing the current annualized distribution per share by the closing market price. Past performance does not guarantee future results.

² Tax equivalent yield assumes the maximum marginal federal tax rate of 43.4%, which includes the 3.8% Medicare tax. Actual tax rates will vary based on income, exemptions and deductions. Lower taxes will result in lower tax equivalent yields.

³ The distribution rate is not constant and is subject to change.

⁴ Represents VMTP Shares and TOB Trusts as a percentage of total managed assets, which is the total assets of the Fund, including any assets attributable to VMTP Shares and TOB Trusts, minus the sum of accrued liabilities. For a discussion of leveraging techniques utilized by the Fund, please see The Benefits and Risks of Leveraging on page 5.

Performance

Returns for the six months ended October 31, 2016 were as follows:

	Returns Based On	
	Market Price	NAV
MUH ^{1,2}	(2.44)%	1.26%
Lipper General & Insured Municipal Debt Funds (Leveraged) ³	(3.09)%	1.30%

¹ All returns reflect reinvestment of dividends and/or distributions.

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

² The Fund's discount to NAV, which widened during the period, accounts for the difference between performance based on price and performance based on NAV.

³ Average return.

Performance results may include adjustments made for financial reporting purposes in accordance with U.S. generally accepted accounting principles. The following discussion relates to the Fund's absolute performance based on NAV:

The U.S. municipal bond market delivered modest gains in the period, with the bulk of the positive return occurring in May and June. During these two months, bond yields fell sharply (as prices rose) in reaction to the highly accommodative policies of the world's central banks and the prospect of the Fed maintaining a gradual, data-dependent approach to raising rates. In the latter part of the period, however, the market gave back some ground as accelerating growth indicated an increased likelihood that the Fed would in fact start to raise rates before year end. Despite this headwind, the tax-exempt market closed in positive territory due to the combination of its attractive yields, a favorable supply-and-demand picture, and the continued health of state and local finances.

The Fund's positions in lower-rated investment-grade securities generally made the largest contributions to performance, as elevated investor risk appetites led to robust demand for higher-yielding issues. Holdings in bonds with maturities of 20 years or longer also aided performance given that longer-term debt benefited from both stronger price performance and higher income relative to shorter-dated securities. At the sector level, the Fund was helped by its positions in transportation, utilities and corporate-related issues.

The Fund's more-seasoned holdings, while producing generous yields compared to current market rates, detracted from performance. The prices of many of these investments declined due to the premium amortization that occurred as the bonds approached their first call dates. (A call is when an issuer redeems a bond prior to its maturity date; premium is amount by which a bond trades above its \$100 par value.)

The Fund utilized U.S. Treasury futures contracts to manage exposure to a potential rise in interest rates, and its tactical shifts in this area contributed to the Fund's six-month results.

The views expressed reflect the opinions of BlackRock as of the date of this report and are subject to change based on changes in market, economic or other conditions. These views are not intended to be a forecast of future events and are no guarantee of future results.

Market Price and Net Asset Value Per Share Summary

	10/31/16	4/30/16	Change	High	Low
Market Price	\$ 15.41	\$ 16.23	(5.05)%	\$ 17.28	\$ 15.40
Net Asset Value	\$ 16.27	\$ 16.51	(1.45)%	\$ 17.00	\$ 16.24

Market Price and Net Asset Value History For the Past Five Years

Overview of the Fund's Total Investments*

Sector Allocation	10/31/16	4/30/16
Transportation	22%	22%
Health	20	19
State	13	14
Utilities	12	12
County/City/Special District/School District	12	12
Education	9	9
Corporate	6	6
Tobacco	5	5
Housing	1	1

For Fund compliance purposes, the Fund's sector classifications refer to one or more of the sector sub-classifications used by one or more widely recognized market indexes or rating group indexes, and/or as defined by the investment adviser. These definitions may not apply for purposes of this report, which may combine such sector sub-classifications for reporting ease.

Credit Quality Allocation¹

	10/31/16	4/30/16
AAA/Aaa	3%	4%
AA/Aa	49	50
A	20	23
BBB/Baa	13	11
BB/Ba	3	4
B	2	1
N/R ²	10	7

¹ For financial reporting purposes, credit quality ratings shown above reflect the highest rating assigned by either S&P or Moody's if ratings differ. These rating agencies are independent, nationally recognized statistical rating organizations and are widely used. Investment grade ratings are credit ratings of BBB/Baa or higher. Below investment grade ratings are credit ratings of BB/Ba or lower. Investments designated N/R are not rated by either rating agency. Unrated investments do not necessarily indicate low credit quality. Credit quality ratings are subject to change.

² The investment adviser evaluates the credit quality of unrated investments based upon certain factors including, but not limited to, credit ratings for similar investments and financial analysis of sectors and individual investments. Using this approach, the investment adviser has deemed certain of these unrated securities as investment grade quality. As of October 31, 2016 and April 30, 2016, the market value of unrated securities deemed by the investment adviser to be investment grade each represents 3% of the Fund's total investments.

Call/Maturity Schedule³

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

Calendar Year Ended December 31,	
2016	5%
2017	5
2018	5
2019	25
2020	11

³ Scheduled maturity dates and/or bonds that are subject to potential calls by issuers over the next five years.

* Excludes short-term securities.

SEMI-ANNUAL REPORT

OCTOBER 31, 2016

13

Fund Summary as of October 31, 2016

BlackRock MuniHoldings Quality Fund, Inc.

Fund Overview

BlackRock MuniHoldings Quality Fund, Inc. s (MUS) (the Fund) investment objective is to provide shareholders with current income exempt from federal income taxes. The Fund seeks to achieve its investment objective by investing primarily in long-term, investment grade municipal obligations exempt from federal income taxes (except that the interest may be subject to the federal alternative minimum tax). Under normal market conditions, the Fund invests at least 80% of its assets in investment grade municipal obligations, and obligations deemed to be of comparable quality by the investment adviser, at the time of investment with remaining maturities of one year or more at the time of investment. The Fund may invest directly in such securities or synthetically through the use of derivatives.

No assurance can be given that the Fund s investment objective will be achieved.

Fund Information

Symbol on NYSE	MUS
Initial Offering Date	May 1, 1998
Yield on Closing Market Price as of October 31, 2016 (\$13.56) ¹	5.97%
Tax Equivalent Yield ²	10.55%
Current Monthly Distribution per Common Share ³	\$0.0675
Current Annualized Distribution per Common Share ³	\$0.8100
Economic Leverage as of October 31, 2016 ⁴	37%

¹ Yield on closing market price is calculated by dividing the current annualized distribution per share by the closing market price. Past performance does not guarantee future results.

² Tax equivalent yield assumes the maximum marginal federal tax rate of 43.4%, which includes the 3.8% Medicare tax. Actual tax rates will vary based on income, exemptions and deductions. Lower taxes will result in lower tax equivalent yields.

³ The distribution rate is not constant and is subject to change.

⁴ Represents VMTP Shares and TOB Trusts as a percentage of total managed assets, which is the total assets of the Fund, including any assets attributable to VMTP Shares and TOB Trusts, minus the sum of accrued liabilities. For a discussion of leveraging techniques utilized by the Fund, please see The Benefits and Risks of Leveraging on page 5.

Performance

Returns for the six months ended October 31, 2016 were as follows:

	Returns Based On	
	Market Price	NAV
MUS ^{1,2}	(2.58)%	0.87%
Lipper General & Insured Municipal Debt Funds (Leveraged) ³	(3.09)%	1.30%

¹ All returns reflect reinvestment of dividends and/or distributions.

²

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

The Fund's discount to NAV, which widened during the period, accounts for the difference between performance based on price and performance based on NAV.

³ Average return.

Performance results may include adjustments made for financial reporting purposes in accordance with U.S. generally accepted accounting principles. The following discussion relates to the Fund's absolute performance based on NAV:

The U.S. municipal bond market delivered modest gains in the period, with the bulk of the positive return occurring in May and June. During these two months, bond yields fell sharply (as prices rose) in reaction to the highly accommodative policies of the world's central banks and the prospect of the Fed maintaining a gradual, data-dependent approach to raising rates. In the latter part of the period, however, the market gave back some ground as accelerating growth indicated an increased likelihood that the Fed would in fact start to raise rates before year end. Despite this headwind, the tax-exempt market closed in positive territory due to the combination of its attractive yields, a favorable supply-and-demand picture, and the continued health of state and local finances.

The Fund's position in longer-dated bonds aided performance given the stronger relative returns in this area. Conversely, its positions in short- and intermediate-term issues where yields generally rose dampened its overall results.

The Fund's exposure to lower-rated credits aided performance as yield spreads for higher-yielding issues generally tightened over the period. At the sector level, positions in transportation, tax-backed and utilities issues made the largest positive contributions.

During the period, the use of leverage helped augment the Fund's returns. The Trust utilized U.S. Treasury futures contracts to manage exposure to a potential rise in interest rates, which had a slightly positive impact on results.

The Fund's more-seasoned holdings, while producing generous yields compared to current market rates, detracted from performance. The prices of many of these investments declined due to the premium amortization that occurred as the bonds approached their first call dates. (A call is when an issuer redeems a bond prior to its maturity date; premium is amount by which a bond trades above its \$100 par value).

Reinvestment was an additional drag on performance, as the proceeds of mature or called bonds were reinvested at much lower prevailing rates.

The views expressed reflect the opinions of BlackRock as of the date of this report and are subject to change based on changes in market, economic or other conditions. These views are not intended to be a forecast of future events and are no guarantee of future results.

BlackRock MuniHoldings Quality Fund, Inc.

Market Price and Net Asset Value Per Share Summary

	10/31/16	4/30/16	Change	High	Low
Market Price	\$ 13.56	\$ 14.31	(5.24)%	\$ 15.59	\$ 13.54
Net Asset Value		14.85			
	\$ 14.56	\$ ¹	(1.95)%	\$ 15.17	\$ 14.54

¹ The net asset value does not reflect adjustments made for financial reporting purposes in accordance with U.S. generally accepted accounting principles and therefore differs from amount reported in the Financial Highlights.

Market Price and Net Asset Value History For the Past Five Years

Overview of the Fund's Total Investments*

Sector Allocation	10/31/16	4/30/16
Transportation	38%	40%
County/City/Special District/School District	25	25
Utilities	13	14
Health	12	10
State	5	5
Education	3	3
Housing	2	1
Tobacco	1	1
Corporate	1	1

For Fund compliance purposes, the Fund's sector classifications refer to one or more of the sector sub-classifications used by one or more widely recognized market indexes or rating group indexes, and/or as defined by the investment adviser. These definitions may not apply for purposes of this report, which may combine such sector sub-classifications for reporting ease.

Credit Quality Allocation¹

	10/31/16	4/30/16
AAA/Aaa	4%	6%
AA/Aa	55	56
A	32	32
BBB/Baa	6	3
N/R	3	3

¹ For financial reporting purposes, credit quality ratings shown above reflect the highest rating assigned by either S&P or Moody's if ratings differ. These rating agencies are independent, nationally recognized statistical rating organizations and are widely used. Investment grade ratings are credit ratings of BBB/Baa or higher. Below investment grade ratings are credit ratings of BB/Ba or lower. Investments designated N/R are not rated by either rating agency. Unrated investments do not necessarily indicate low credit quality. Credit quality ratings are subject to change.

Call/Maturity Schedule²

Calendar Year Ended December 31,

2016	2%
2017	3
2018	25
2019	12

2020

4

² Scheduled maturity dates and/or bonds that are subject to potential calls by issuers over the next five years.

³ Representing less than 1% of the Fund's total investments.

* Excludes short-term securities.

SEMI-ANNUAL REPORT

OCTOBER 31, 2016

15

Fund Summary as of October 31, 2016

BlackRock Muni Intermediate Duration Fund, Inc.

Fund Overview

BlackRock Muni Intermediate Duration Fund, Inc. s (MUI) (the Fund) investment objective is to provide common shareholders with high current income exempt from federal income taxes. The Fund seeks to achieve its investment objective by investing at least 80% of its assets in municipal bonds exempt from federal income taxes (except that the interest may be subject to the federal alternative minimum tax). Under normal market conditions, the Fund invests at least 75% of its assets in municipal bonds rated investment grade, or are deemed to be of comparable quality by the investment adviser, at the time of investment and invests at least 80% of its assets in municipal bonds with a duration of three to ten years at the time of investment. The Fund may invest directly in such securities or synthetically through the use of derivatives.

No assurance can be given that the Fund s investment objective will be achieved.

Fund Information

Symbol on NYSE	MUI
Initial Offering Date	August 1, 2003
Yield on Closing Market Price as of October 31, 2016 (\$14.48) ¹	4.60%
Tax Equivalent Yield ²	8.13%
Current Monthly Distribution per Common Share ³	\$0.0555
Current Annualized Distribution per Common Share ³	\$0.6660
Economic Leverage as of October 31, 2016 ⁴	36%

¹ Yield on closing market price is calculated by dividing the current annualized distribution per share by the closing market price. Past performance does not guarantee future results.

² Tax equivalent yield assumes the maximum marginal federal tax rate of 43.4%, which includes the 3.8% Medicare tax. Actual tax rates will vary based on income, exemptions and deductions. Lower taxes will result in lower tax equivalent yields.

³ The distribution rate is not constant and is subject to change.

⁴ Represents VMTP Shares and TOB Trusts as a percentage of total managed assets, which is the total assets of the Fund, including any assets attributable to VMTP Shares and TOB Trusts, minus the sum of accrued liabilities. For a discussion of leveraging techniques utilized by the Fund, please see The Benefits and Risks of Leveraging on page 5.

Performance

Returns for the six months ended October 31, 2016 were as follows:

	Returns Based On	
	Market Price	NAV
MUI ^{1,2}	(2.53)%	1.05%
Lipper Intermediate Municipal Debt Funds ³	(1.81)%	0.78%

¹ All returns reflect reinvestment of dividends and/or distributions.

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

² The Fund's discount to NAV, which widened during the period, accounts for the difference between performance based on price and performance based on NAV.

³ Average return.

Performance results may include adjustments made for financial reporting purposes in accordance with U.S. generally accepted accounting principles. The following discussion relates to the Fund's absolute performance based on NAV:

The U.S. municipal bond market delivered modest gains in the period, with the bulk of the positive return occurring in May and June. During these two months, bond yields fell sharply (as prices rose) in reaction to the highly accommodative policies of the world's central banks and the prospect of the Fed maintaining a gradual, data-dependent approach to raising rates. In the latter part of the period, however, the market gave back some ground as accelerating growth indicated an increased likelihood that the Fed would in fact start to raise rates before year end. Despite this headwind, the tax-exempt market closed in positive territory due to the combination of its attractive yields, a favorable supply-and-demand picture, and the continued health of state and local finances.

The tax-exempt yield curve flattened, with short-term yields rising and longer-term yields moving lower. In this environment, the Fund's longer-dated and longer-duration bonds provided the largest positive returns. (Duration is a measure of interest-rate sensitivity.)

At a time in which investors continued to search for yield, many of the largest contributors to Fund performance were its investments in lower-rated, higher-yielding sectors and securities. At the sector level, positions in tax-backed (school districts), transportation, education and health care sectors made positive contributions to performance.

The Fund's exposure to lower-coupon issues and bonds with longer call dates also benefited returns, as both segments outpaced the broader market.

During the period, the use of leverage helped augment the Fund's returns. However, its use of U.S. Treasury futures contracts to manage exposure to a potential interest rates had a slightly negative impact on performance given that Treasury yields fell during the period. The views expressed reflect the opinions of BlackRock as of the date of this report and are subject to change based on changes in market, economic or other conditions. These views are not intended to be a forecast of future events and are no guarantee of future results.

BlackRock Muni Intermediate Duration Fund, Inc.

Market Price and Net Asset Value Per Share Summary

	10/31/16	4/30/16	Change	High	Low
Market Price	\$ 14.48	\$ 15.19	(4.67)%	\$ 15.62	\$ 14.41
Net Asset Value		16.17			
	\$ 15.97	\$ ¹	(1.24)%	\$ 16.59	\$ 15.93

¹ The net asset value does not reflect adjustments made for financial reporting purposes in accordance with U.S. generally accepted accounting principles and therefore differs from amount reported in the Financial Highlights.

Market Price and Net Asset Value History For the Past Five Years

Overview of the Fund's Total Investments*

Sector Allocation	10/31/16	4/30/16
Transportation	26%	24%
County/City/Special District/School District	18	18
State	13	14
Education	13	13
Health	11	11
Utilities	11	11
Corporate	4	5
Housing	2	2
Tobacco	2	2

For Fund compliance purposes, the Fund's sector classifications refer to one or more of the sector sub-classifications used by one or more widely recognized market indexes or rating group indexes, and/or as defined by the investment adviser. These definitions may not apply for purposes of this report, which may combine such sector sub-classifications for reporting ease.

Credit Quality Allocation¹

	10/31/16	4/30/16
AAA/Aaa	3%	3%
AA/Aa	44	47
A	38	40
BBB/Baa	7	5
BB/Ba	1	1
B	1	1
N/R ²	6	3

¹ For financial reporting purposes, credit quality ratings shown above reflect the highest rating assigned by either S&P's or Moody's if ratings differ. These rating agencies are independent, nationally recognized statistical rating organizations and are widely used. Investment grade ratings are credit ratings of BBB/Baa or higher. Below investment grade ratings are credit ratings of BB/Ba or lower. Investments designated N/R are not rated by either rating agency. Unrated investments do not necessarily indicate low credit quality. Credit quality ratings are subject to change.

² The investment adviser evaluates the credit quality of unrated Investments based upon certain factors including, but not limited to, credit ratings for similar investments and financial analysis of sectors and individual investments. Using this approach, the investment adviser has deemed certain of these unrated securities as investment grade quality. As of October 31, 2016 and April 30, 2016, the market value of unrated securities deemed by the investment adviser to be investment grade represents 2% and 1%, respectively, of the Fund's total investments.

Call/Maturity Schedule³

Calendar Year Ended December 31,

2016	3%
2017	3
2018	5
2019	7
2020	7

³ Scheduled maturity dates and/or bonds that are subject to potential calls by issuers over the next five years.

* Excludes short-term securities.

Fund Summary as of October 31, 2016

BlackRock MuniVest Fund II, Inc.

Fund Overview

BlackRock MuniVest Fund II, Inc. s (MVT) (the Fund) investment objective is to provide shareholders with as high a level of current income exempt from federal income taxes as is consistent with its investment policies and prudent investment management. The Fund seeks to achieve its investment objective by investing at least 80% of its assets in municipal bonds exempt from federal income taxes (except that the interest may be subject to the federal alternative minimum tax). The Fund invests, under normal market conditions, at least 75% of its assets in municipal bonds rated investment grade, or are deemed to be of comparable quality by the investment adviser, at the time of investment and invests primarily in long-term municipal bonds with a maturity of more than ten years at the time of investment. The Fund may invest directly in such securities or synthetically through the use of derivatives.

No assurance can be given that the Fund s investment objective will be achieved.

Fund Information

Symbol on NYSE	MVT
Initial Offering Date	March 29, 1993
Yield on Closing Market Price as of October 31, 2016 (\$16.13) ¹	5.88%
Tax Equivalent Yield ²	10.39%
Current Monthly Distribution per Common Share ³	\$0.0790
Current Annualized Distribution per Common Share ³	\$0.9480
Economic Leverage as of October 31, 2016 ⁴	39%

¹ Yield on closing market price is calculated by dividing the current annualized distribution per share by the closing market price. Past performance does not guarantee future results.

² Tax equivalent yield assumes the maximum marginal federal tax rate of 43.4%, which includes the 3.8% Medicare tax. Actual tax rates will vary based on income, exemptions and deductions. Lower taxes will result in lower tax equivalent yields.

³ The distribution rate is not constant and is subject to change.

⁴ Represents VMTP Shares and TOB Trusts as a percentage of total managed assets, which is the total assets of the Fund, including any assets attributable to VMTP Shares and TOB Trusts, minus the sum of accrued liabilities. For a discussion of leveraging techniques utilized by the Fund, please see The Benefits and Risks of Leveraging on page 5.

Performance

Returns for the six months ended October 31, 2016 were as follows:

	Returns Based On	
	Market Price	NAV
MVT ^{1,2}	(4.48)%	1.14%
Lipper General & Insured Municipal Debt Funds (Leveraged) ³	(3.09)%	1.30%

¹ All returns reflect reinvestment of dividends and/or distributions.

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

² The Fund's premium to NAV, which narrowed during the period, accounts for the difference between performance based on price and performance based on NAV.

³ Average return.

Performance results may include adjustments made for financial reporting purposes in accordance with U.S. generally accepted accounting principles. The following discussion relates to the Fund's absolute performance based on NAV:

The U.S. municipal bond market delivered modest gains in the period, with the bulk of the positive return occurring in May and June. During these two months, bond yields fell sharply (as prices rose) in reaction to the highly accommodative policies of the world's central banks and the prospect of the Fed maintaining a gradual, data-dependent approach to raising rates. In the latter part of the period, however, the market gave back some ground as accelerating growth indicated an increased likelihood that the Fed would in fact start to raise rates before year end. Despite this headwind, the tax-exempt market closed in positive territory due to the combination of its attractive yields, a favorable supply-and-demand picture, and the continued health of state and local finances.

The Fund's positions in lower-rated investment-grade securities generally made the largest contributions to performance, as elevated investor risk appetites led to robust demand for higher-yielding issues. Holdings in bonds with maturities of 20 years or longer also aided performance given that longer-term debt benefited from both stronger price performance and higher income relative to shorter-dated securities. At the sector level, the Fund was helped by its positions in utilities, pre-refunded and corporate-related issues.

The Fund's more-seasoned holdings, while producing generous yields compared to current market rates, detracted from performance. The prices of many of these investments declined due to the premium amortization that occurred as the bonds approached their first call dates. (A call is when an issuer redeems a bond prior to its maturity date; premium is amount by which a bond trades above its \$100 par value.)

The Fund utilized U.S. Treasury futures contracts to manage exposure to a potential rise in interest rates, and its tactical shifts in this area contributed to the Fund's six-month results.

The views expressed reflect the opinions of BlackRock as of the date of this report and are subject to change based on changes in market, economic or other conditions. These views are not intended to be a forecast of future events and are no guarantee of future results.

Market Price and Net Asset Value Per Share Summary

	10/31/16	4/30/16	Change	High	Low
Market Price	\$ 16.13	\$ 17.38	(7.19)%	\$ 18.64	\$ 15.85
Net Asset Value	\$ 15.89	\$ 16.17	(1.73)%	\$ 16.55	\$ 15.87

Market Price and Net Asset Value History For the Past Five Years

Overview of the Fund's Total Investments*

Sector Allocation	10/31/16	4/30/16
Transportation	26%	24%
Health	17	18
State	14	13
County/City/Special District/School District	11	11
Utilities	10	13
Education	8	7
Corporate	7	7
Tobacco	5	5
Housing	2	2

For Fund compliance purposes, the Fund's sector classifications refer to one or more of the sector sub-classifications used by one or more widely recognized market indexes or rating group indexes, and/or as defined by the investment adviser. These definitions may not apply for purposes of this report, which may combine such sector sub-classifications for reporting ease.

Credit Quality Allocation ¹	10/31/16	4/30/16
AAA/Aaa	6%	6%
AA/Aa	49	49
A	17	21
BBB/Baa	12	10
BB/Ba	3	4
B	2	2
N/R ²	11	8

¹ For financial reporting purposes, credit quality ratings shown above reflect the highest rating assigned by either S&P or Moody's if ratings differ. These rating agencies are independent, nationally recognized statistical rating organizations and are widely used. Investment grade ratings are credit ratings of BBB/Baa or higher. Below investment grade ratings are credit ratings of BB/Ba or lower. Investments designated N/R are not rated by either rating agency. Unrated investments do not necessarily indicate low credit quality. Credit quality ratings are subject to change.

² The investment adviser evaluates the credit quality of unrated investments based upon certain factors including, but not limited to, credit ratings for similar investments and financial analysis of sectors and individual investments. Using this approach, the investment adviser has deemed certain of these unrated securities as investment grade quality. As of October 31, 2016 and April 30, 2016 the market value of unrated securities deemed by the investment adviser to be investment grade represents less than 2% and 3%, respectively, of the Fund's total investments.

Call/Maturity Schedule³

Calendar Year Ended December 31,

2016	4%
2017	8

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

2018	11
2019	22
2020	12

³ Scheduled maturity dates and/or bonds that are subject to potential calls by issuers over the next five years.

* Excludes short-term securities.

SEMI-ANNUAL REPORT

OCTOBER 31, 2016

19

Schedule of Investments October 31, 2016 (Unaudited)

BlackRock MuniAssets Fund, Inc. (MUA)

(Percentages shown are based on Net Assets)

	Par	
	(000)	Value
Municipal Bonds		
Alabama 2.1%		
County of Jefferson Alabama, RB, Limited Obligation School, Series A:		
5.25%, 1/01/17	\$ 895	\$ 899,922
5.25%, 1/01/19	2,000	2,011,020
5.50%, 1/01/21	1,215	1,221,695
County of Jefferson Alabama Sewer, Refunding RB, Sub-Lien, Series D, 6.00%, 10/01/42	3,745	4,451,307
State of Alabama Docks Department, Refunding RB, 6.00%, 10/01/40	2,165	2,528,590
		11,112,534
Alaska 0.5%		
Northern Tobacco Securitization Corp., Refunding RB, Tobacco Settlement, Asset-Backed, Series A:		
4.63%, 6/01/23	1,080	1,096,945
5.00%, 6/01/32	1,500	1,464,255
		2,561,200
Arizona 1.5%		
City of Phoenix Arizona IDA, RB:		
Great Hearts Academies Veritas Project, 6.30%, 7/01/42	500	550,760
Great Hearts Academies Veritas Project, 6.40%, 7/01/47	425	469,162
Legacy Traditional Schools Project, Series A, 6.50%, 7/01/34 (a)	570	655,135
Legacy Traditional Schools Project, Series A, 6.75%, 7/01/44 (a)	1,000	1,162,040
City of Phoenix Arizona IDA, Refunding RB (a):		
Basis Schools, Inc. Projects, 5.00%, 7/01/35	305	325,984
Basis Schools, Inc. Projects, 5.00%, 7/01/45	855	904,214
Basis Schools, Inc. Projects, Series A, 5.00%, 7/01/35	260	277,888
Basis Schools, Inc. Projects, Series A, 5.00%, 7/01/46	290	306,692
Legacy Traditional School Projects, 5.00%, 7/01/35	320	330,429
Legacy Traditional School Projects, 5.00%, 7/01/45	255	260,562
Salt Verde Financial Corp., RB, Senior, 5.00%, 12/01/37	1,650	1,978,284
University Medical Center Corp., RB, 6.50%, 7/01/19 (b)	500	570,895
		7,792,045
California 7.8%		
California Municipal Finance Authority, RB, Urban Discovery Academy Project (a):		
5.50%, 8/01/34	315	332,861
6.00%, 8/01/44	665	708,990
6.13%, 8/01/49	580	618,982
	Par	
Municipal Bonds (000) Value		
California (continued)		
California School Finance Authority, RB:		
Alliance for College Ready Public School 2023 Union LLC Project, Series A, 6.40%, 7/01/48	\$ 1,570	\$ 1,870,419
Value Schools, 6.65%, 7/01/33	435	499,458
Value Schools, 6.90%, 7/01/43	975	1,131,410
California Statewide Communities Development Authority, RB, Loma Linda University Medical Center, Series A (a):		
5.00%, 12/01/46	920	1,014,171
5.25%, 12/01/56	2,500	2,789,025
California Statewide Communities Development Authority, Refunding RB, American Baptist Homes of the West, 6.25%, 10/01/39		
	2,175	2,444,809
California Statewide Financing Authority, RB, Asset-Backed, Tobacco Settlement, Series B, 6.00%, 5/01/43		
	1,650	1,662,375
City of San Jose California Hotel Tax, RB, Convention Center Expansion & Renovation Project:		
6.50%, 5/01/36	900	1,079,334
6.50%, 5/01/42	2,220	2,657,051
	375	466,024

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

City of Stockton California Public Financing Authority, RB, Delta Water Supply Project, Series A, 6.25%, 10/01/40			
County of Los Angeles California Tobacco Securitization Agency, RB, Asset-Backed, Los Angeles County Securitization Corp.:			
5.70%, 6/01/46	3,600	3,693,204	
5.60%, 6/01/36	1,285	1,318,256	
County of Riverside California Transportation Commission, RB, Senior Lien, Series A, 5.75%, 6/01/48	2,885	3,338,897	
County of San Francisco California City & Redevelopment Agency, Tax Allocation Bonds, Mission Bay South Redevelopment Project (a)(c):			
0.00%, 8/01/26	1,250	767,563	
0.00%, 8/01/43	1,500	356,355	
Golden State Tobacco Securitization Corp., Refunding RB, Asset-Backed, Series A-1:			
Senior, 5.75%, 6/01/47	3,980	3,918,390	
5.13%, 6/01/47	3,850	3,703,892	
Tobacco Securitization Authority of Southern California, Refunding RB, Tobacco Settlement, Asset-Backed, Senior Series A-1:			
4.75%, 6/01/25	1,375	1,407,312	
5.00%, 6/01/37	4,580	4,525,864	
			40,304,642
Colorado 1.5%			
Castle Oaks Metropolitan District No. 3, GO, 6.25%, 12/01/44	500	532,050	
Colorado Health Facilities Authority, Refunding RB, Series A (a):			
6.13%, 12/01/45	335	364,778	

Portfolio Abbreviations

AGC	Assured Guarantee Corp.	DFA	Development Finance Agency	IDA	Industrial Development Authority
AGM	Assured Guaranty Municipal Corp.	EDA	Economic Development Authority	IDB	Industrial Development Board
AMBAC	American Municipal Bond Assurance Corp.	EDC	Economic Development Corp.	ISD	Independent School District
AMT	Alternative Minimum Tax (subject to)	ERB	Education Revenue Bonds	LRB	Lease Revenue Bonds
ARB	Airport Revenue Bonds	GARB	General Airport Revenue Bonds	M/F	Multi-Family
BAM	Build America Mutual Assurance Co.	GO	General Obligation Bonds	MRB	Mortgage Revenue Bonds
BARB	Building Aid Revenue Bonds	GTD	Guaranteed	NPFGC	National Public Finance Guarantee Corp.
BHAC	Berkshire Hathaway Assurance Corp.	HDA	Housing Development Authority	PSF	Permanent School Fund
CAB	Capital Appreciation Bonds	HFA	Housing Finance Agency	RB	Revenue Bonds
COP	Certificates of Participation	HRB	Housing Revenue Bonds	S/F	Single-Family

See Notes to Financial Statements.

Schedule of Investments (continued)

BlackRock MuniAssets Fund, Inc. (MUA)

	Par	
	(000)	Value
Municipal Bonds		
Colorado (continued)		
Colorado Health Facilities Authority, Refunding RB, Series A (a) (continued):		
6.25%, 12/01/50	\$ 1,115	\$ 1,215,361
Copperleaf Metropolitan District No. 2, GO, Refunding, 5.75%, 12/01/45	720	759,125
Foothills Metropolitan District, Special Assessment Bonds, 6.00%, 12/01/38	3,000	3,266,790
Regional Transportation District, RB, Denver Transit Partners Eagle P3 Project, 6.00%, 1/15/34	1,500	1,707,450
		7,845,554
Connecticut 0.9%		
Mohegan Tribal Finance Authority, RB, 7.00%, 2/01/45 (a)	1,430	1,501,157
Mohegan Tribe of Indians of Connecticut, RB, Series A, 6.75%, 2/01/45 (a)	1,420	1,472,782
Mohegan Tribe of Indians of Connecticut, Refunding RB, Public Improvement, Priority Distribution, Series C, 6.25%, 2/01/30 (a)	1,835	1,896,197
		4,870,136
Delaware 0.7%		
County of Sussex Delaware, RB, NRG Energy, Inc., Indian River Power LLC Project, 6.00%, 10/01/40	1,000	1,103,830
State of Delaware EDA, RB, Exempt Facilities, Indian River Power LLC Project, 5.38%, 10/01/45	2,280	2,458,592
		3,562,422
Florida 8.2%		
Boggy Creek Improvement District, Refunding RB, Special Assessment Bonds, 5.13%, 5/01/43	1,535	1,606,777
Capital Trust Agency, Inc., RB, Silver Creek St. Augustine Project, Series A:		
1st Mortgage, 8.25%, 1/01/44	515	444,991
1st Mortgage, 8.25%, 1/01/49	1,105	954,864
5.75%, 1/01/50	655	651,286
County of Collier Florida IDA, Refunding RB, Arlington of Naples Project, Series A, 8.13%, 5/15/44 (a)	2,510	2,976,082
County of Palm Beach Florida Health Facilities Authority, RB, Acts Retirement Life Community, 5.50%, 11/15/20 (b)	3,500	4,097,275
Florida Development Finance Corp., RB, Renaissance Charter School, Series A:		
5.75%, 6/15/29	690	714,902
6.00%, 6/15/34	835	866,964
6.13%, 6/15/44	3,220	3,329,512
Greeneway Improvement District, RB, Special Assessment Bonds, 5.13%, 5/01/43	1,940	2,030,714
Harbor Bay Community Development District Florida, Special Assessment Bonds, Series A, 7.00%, 5/01/33	410	410,455
Jacksonville Economic Development Commission, Refunding RB, Florida Proton Therapy Institute, Series A, 6.00%, 9/01/17 (a)	295	306,057
Lakewood Ranch Stewardship District, Refunding, Special Assessment Bonds, Lakewood Center & New Sector Projects, 8.00%, 5/01/40	1,485	1,802,849
Lakewood Ranch Stewardship District, Special Assessment Bonds, Village of Lakewood Ranch Sector Projects:		
4.00%, 5/01/21	200	203,972
4.25%, 5/01/26	160	163,250
5.00%, 5/01/36	460	474,320
5.13%, 5/01/46	915	948,004
Mid-Bay Bridge Authority, RB, Springing Lien, Series A, 7.25%, 10/01/21 (b)	4,550	5,836,512
	Par	
	(000)	Value
Municipal Bonds		
Florida (continued)		
Midtown Miami Community Development District, Refunding, Special Assessment Bonds:		
Series A, 5.00%, 5/01/37	\$ 845	\$ 897,314
Series B, 5.00%, 5/01/37	495	525,645
Palm Beach County Health Facilities Authority, Refunding RB, Series A, 7.25%, 6/01/34	500	603,305
Santa Rosa Bay Bridge Authority, RB, 6.25%, 7/01/28 (d)(e)	4,264	2,823,451
Tampa Palms Open Space and Transportation Community Development District, RB, Capital Improvement, Richmond Place Project, 7.50%, 5/01/18	575	575,834
Tolomato Community Development District, Refunding, Special Assessment Bonds:		

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

Convertible CAB, Series A2, 0.00%, 5/01/39 (f)	250	202,045
Convertible CAB, Series A3, 0.00%, 5/01/40 (f)	585	353,662
Convertible CAB, Series A4, 0.00%, 5/01/40 (f)	305	136,759
Series 2, 0.00%, 5/01/40 (f)	805	426,392
Series A1, 6.65%, 5/01/40	875	878,290
Tolomato Community Development District:		
Series 1, 0.00%, 5/01/40 (f)	1,305	815,847
Series 1, 6.65%, 5/01/40 (d)(e)	50	50,739
Series 3, 6.61%, 5/01/40 (d)(e)	875	9
Series 3, 6.65%, 5/01/40 (d)(e)	710	7
Village Community Development District No. 9, Special Assessment Bonds:		
6.75%, 5/01/31	1,575	1,881,038
7.00%, 5/01/41	2,575	3,087,734
5.50%, 5/01/42	1,210	1,378,444
		42,455,301
Georgia 1.6%		
County of Clayton Georgia, Tax Allocation Bonds, Ellenwood Project, 7.50%, 7/01/33	2,575	2,645,349
County of Clayton Georgia Development Authority, Refunding RB, Delta Air Lines, Inc. Project, Series A, 8.75%, 6/01/29	3,365	4,068,823
County of Gainesville & Hall Georgia Development Authority, Refunding RB, Acts Retirement Life Community, Series A-2 (b):		
6.38%, 11/15/19	700	810,852
6.63%, 11/15/19	880	1,025,922
		8,550,946
Guam 0.4%		
Territory of Guam, GO, Series A:		
6.00%, 11/15/19	505	550,601
7.00%, 11/15/19 (b)	1,115	1,312,723
		1,863,324
Illinois 4.7%		
City of Chicago Illinois, GO, Series A, 5.50%, 1/01/39	3,600	3,793,212
Illinois Finance Authority, Refunding RB:		
Friendship Village of Schaumburg, 7.25%, 2/15/45	4,000	4,274,400
Lutheran Home & Services Obligated Group, 5.63%, 5/15/42	2,395	2,563,895
Presence Health Network, Series C, 4.00%, 2/15/41	1,525	1,456,375
Primary Health Care Centers Program, 6.60%, 7/01/24	990	992,525
Rogers Park Montessori School Project, Series 2014, 6.00%, 2/01/34	365	390,597
Rogers Park Montessori School Project, Series 2014, 6.13%, 2/01/45	860	918,695
Roosevelt University Project, 6.50%, 4/01/44	4,170	4,519,863

See Notes to Financial Statements.

Schedule of Investments (continued)

BlackRock MuniAssets Fund, Inc. (MUA)

	Par	
	(000)	Value
Municipal Bonds		
Illinois (continued)		
Metropolitan Pier & Exposition Authority, RB, McCormick Place Expansion Project, Series A, 5.50%, 6/15/53	\$ 2,370	\$ 2,691,514
Railsplitter Tobacco Settlement Authority, RB:		
5.50%, 6/01/23	180	208,678
6.00%, 6/01/28	710	833,718
Village of Lincolnshire Illinois, Special Tax Bonds, Sedgebrook Project, 6.25%, 3/01/34	1,730	1,720,225
		24,363,697
Indiana 1.6%		
City of Valparaiso Indiana, RB, Exempt Facilities, Pratt Paper LLC Project, AMT:		
6.75%, 1/01/34	825	1,012,976
7.00%, 1/01/44	2,000	2,480,280
City of Vincennes Indiana, Refunding RB, Southwest Indiana Regional Youth Village Project, 6.25%, 1/01/29 (a)	2,510	2,496,220
Indiana Finance Authority, RB, Private Activity Bond, Ohio River Bridges East End Crossing Project, Series A, AMT:		
5.00%, 7/01/44	470	516,854
5.00%, 7/01/48	1,555	1,700,284
		8,206,614
Iowa 2.7%		
Iowa Finance Authority, Refunding RB:		
Midwestern Disaster Area, Iowa Fertilizer Co. Project, 5.50%, 12/01/22	2,090	2,118,758
Midwestern Disaster Area, Iowa Fertilizer Co. Project, 5.25%, 12/01/25	2,190	2,284,148
Sunrise Retirement Community Project, 5.50%, 9/01/37	1,355	1,397,615
Sunrise Retirement Community Project, 5.75%, 9/01/43	2,115	2,195,286
Iowa Tobacco Settlement Authority, Refunding RB:		
Asset-Backed, CAB, Series B, 5.60%, 6/01/34	1,200	1,205,556
Series C, 5.38%, 6/01/38	4,900	4,879,910
		14,081,273
Kentucky 1.1%		
Kentucky Economic Development Finance Authority, Refunding RB, Baptist Life Communities Project, Series S:		
6.25%, 11/15/46	635	644,334
6.38%, 11/15/51	620	629,759
Kentucky Public Transportation Infrastructure Authority, RB, Downtown Crossing, First Tier, Series A, 5.75%, 7/01/49	4,000	4,631,200
		5,905,293
Louisiana 2.8%		
Juban Crossing Economic Development District, Refunding RB, General Infrastructure Project, Series C, 7.00%, 9/15/44 (a)	1,055	1,117,498
Louisiana Local Government Environmental Facilities & Community Development Authority, RB, Westlake Chemical Corp. Project, 6.75%, 11/01/32	5,000	5,252,650
Louisiana Public Facilities Authority, RB, Belle Chasse Educational Foundation Project, 6.75%, 5/01/41	1,855	2,134,827
Tobacco Settlement Financing Corp., Refunding RB, Asset-Backed, Series A, 5.25%, 5/15/35	5,570	6,277,334
		14,782,309
Maine 0.6%		
Maine Health & Higher Educational Facilities Authority, RB, Maine General Medical Center, 6.75%, 7/01/41	2,955	3,301,740
	Par	
	(000)	Value
Municipal Bonds		
Maryland 2.0%		
County of Frederick Maryland, RB, Jefferson Technology Park Project, Series B, 7.13%, 7/01/43	\$ 2,840	\$ 3,205,423

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

Maryland EDC, RB, Transportation Facilities Project, Series A, 5.75%, 6/01/35	3,615	3,981,272
Maryland EDC, Refunding RB, CNX Marine Terminals, Inc., 5.75%, 9/01/25	3,085	3,130,318
		10,317,013
Massachusetts 1.4%		
Massachusetts Development Finance Agency, RB:		
Boston Medical Center, Series D, 5.00%, 7/01/44	1,905	2,103,444
Foxborough Regional Charter School, Series A, 7.00%, 7/01/42	1,025	1,156,036
North Hill Communities Issue, Series A, 6.50%, 11/15/43 (a)	2,020	2,196,892
Massachusetts Development Finance Agency, Refunding RB, Tufts Medical Center, Series I, 6.75%, 1/01/36	1,490	1,741,601
		7,197,973
Michigan 0.9%		
City of Detroit Michigan Sewage Disposal System, Refunding RB, Senior Lien, Series A, 5.25%, 7/01/39	2,785	3,110,733
Michigan Finance Authority, RB, Detroit Water & Sewage Disposal System, Senior Lien, Series 2014 C-2, AMT, 5.00%, 7/01/44	415	446,287
Michigan Finance Authority, Refunding RB, Detroit Water & Sewage Department Project, Senior Lien, Series C-1, 5.00%, 7/01/44	920	1,010,666
		4,567,686
Minnesota 0.3%		
City of Rochester Minnesota, RB, Health Care And Facility Homestead Rochester Incorporate, 5.00%, 12/01/49	1,335	1,409,787
Missouri 1.0%		
Kirkwood IDA Missouri, RB, Aberdeen Heights, Series A, 8.25%, 5/15/39	2,315	2,637,665
Lees Summit IDA, RB, John Knox Obligated Group, 5.25%, 8/15/39	2,235	2,421,801
		5,059,466
New Jersey 5.5%		
Casino Reinvestment Development Authority, Refunding RB:		
5.25%, 11/01/39	1,065	1,097,238
5.25%, 11/01/44	770	790,220
County of Essex New Jersey Improvement Authority, RB, AMT, 5.25%, 7/01/45 (a)	1,150	1,188,007
New Jersey EDA, RB:		
Kapkowski Road Landfill Project, Series B, AMT, 6.50%, 4/01/31	2,250	2,692,057
Private Activity Bond, Goethals Bridge Replacement Project, AMT, 5.38%, 1/01/43	2,155	2,448,533
Team Academy Charter School Project, 6.00%, 10/01/43	1,530	1,748,882
New Jersey EDA, Refunding RB:		
Bancroft Neurohealth Project, 5.00%, 6/01/41	365	371,946
Bancroft Neurohealth Project, Series A, 5.00%, 6/01/36	850	870,120
Greater Brunswick Charter School, Inc. Project, Series A, 6.00%, 8/01/49 (a)	500	525,390
New Jersey Health Care Facilities Financing Authority, Refunding RB (b):		
St. Barnabas Health Care System, Series A, 5.63%, 7/01/21	2,650	3,184,584
St. Joseph s Healthcare System, 6.63%, 7/01/18	4,090	4,481,454

See Notes to Financial Statements.

Schedule of Investments (continued)

BlackRock MuniAssets Fund, Inc. (MUA)

	Par	
	(000)	Value
Municipal Bonds		
New Jersey (continued)		
New Jersey Transportation Trust Fund Authority, RB, Transportation Program, Series AA, 5.25%, 6/15/41	\$ 1,140	\$ 1,270,268
Tobacco Settlement Financing Corp. New Jersey, Refunding RB, Series 1A:		
5.00%, 6/01/29	3,735	3,725,513
5.00%, 6/01/41	4,550	4,256,752
		28,650,964
New Mexico 0.6%		
New Mexico Hospital Equipment Loan Council, Refunding RB, Gerald Champion Regional Medical Center Project, 5.50%, 7/01/42	2,970	3,250,398
New York 8.2%		
Counties of New York Tobacco Trust IV, Refunding RB, Settlement Pass-Through:		
5.00%, 6/01/51	445	483,257
Turbo, Series A, 6.25%, 6/01/41 (a)	5,300	5,562,085
Turbo, Series A, 5.00%, 6/01/42	3,155	3,060,949
Turbo, Series A, 5.00%, 6/01/45	1,185	1,152,626
County of Dutchess New York IDA, Refunding RB, Bard College Civic Facility, Series A-1, 5.00%, 8/01/46	3,315	3,059,712
County of Nassau New York Tobacco Settlement Corp., Refunding RB, Asset-Backed, Series A-3, 5.13%, 6/01/46	750	719,348
County of Westchester New York Healthcare Corp., RB, Senior Lien, Series A, 5.00%, 11/01/44	1,333	1,487,836
Erie Tobacco Asset Securitization Corp., Refunding RB, Asset-Backed, Series A, 5.00%, 6/01/45	2,890	2,887,688
Metropolitan Transportation Authority, RB, Series C:		
6.50%, 11/15/18 (b)	1,490	1,659,964
6.50%, 11/15/28	510	567,074
New York Liberty Development Corp., Refunding RB:		
2nd Priority, Bank of America Tower at One Bryant Park Project, Class 3, 6.38%, 7/15/49	1,270	1,418,552
3 World Trade Center Project, Class 1, 5.00%, 11/15/44 (a)	4,705	5,292,560
3 World Trade Center Project, Class 2, 5.15%, 11/15/34 (a)	455	517,271
3 World Trade Center Project, Class 2, 5.38%, 11/15/40 (a)	1,080	1,247,562
3 World Trade Center Project, Class 3, 7.25%, 11/15/44 (a)	1,565	2,021,917
New York Transportation Development Corp., Refunding RB, American Airlines, Inc., AMT, 5.00%, 8/01/31	1,195	1,275,615
Niagara Area Development Corp., Refunding RB, Solid Waste Disposal Facility, Covanta Energy Project, Series A, AMT, 5.25%, 11/01/42 (a)	1,335	1,355,586
Port Authority of New York & New Jersey, ARB, Special Project, JFK International Air Terminal LLC Project, Series 8, 6.00%, 12/01/36	1,340	1,556,450
TSASC, Inc., Refunding RB, Series 1, 5.00%, 6/01/34	2,305	2,284,693
Westchester Tobacco Asset Securitization, Refunding RB, 5.13%, 6/01/45	4,800	4,800,000
		42,410,745
North Carolina 1.5%		
North Carolina Medical Care Commission, Refunding RB, 1st Mortgage, Series A:		
Deerfield Project, 6.13%, 11/01/18 (b)	4,565	5,037,341
Retirement Facilities Whitestone Project, 7.75%, 3/01/31	1,000	1,140,290
Retirement Facilities Whitestone Project, 7.75%, 3/01/41	1,420	1,617,408
		7,795,039
	Par	
	(000)	Value
Municipal Bonds		
Ohio 3.2%		
Buckeye Tobacco Settlement Financing Authority, RB, Asset-Backed, Series A-2:		
Senior Turbo Term, 5.88%, 6/01/47	\$ 6,390	\$ 6,006,792
5.75%, 6/01/34	6,745	6,288,498
6.00%, 6/01/42	3,040	2,898,002
County of Hamilton Ohio, Refunding RB, Improvement-Life Enriching Communities:		
5.00%, 1/01/46	525	570,386

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

5.00%, 1/01/51	875	948,535
		16,712,213
Oklahoma 0.3%		
Oklahoma Development Finance Authority, Refunding RB, Inverness Village Community, 6.00%, 1/01/32	1,305	1,396,115
Oregon 0.8%		
Hospital Facilities Authority of Multnomah County Oregon, Refunding RB, Mirabella at South Waterfront, 5.50%, 10/01/49	1,765	1,937,052
Polk County Hospital Facility Authority, RB, Dallas Retirement Village Project, Series A: 5.13%, 7/01/35	620	640,101
5.38%, 7/01/45	1,435	1,491,295
		4,068,448
Pennsylvania 3.8%		
Allentown Neighborhood Improvement Zone Development Authority, Refunding RB, Series A, 5.00%, 5/01/42	2,140	2,281,689
City of Philadelphia Pennsylvania Hospitals & Higher Education Facilities Authority, RB, Temple University Health System, Series A, 5.63%, 7/01/36	2,000	2,216,740
County of Cumberland Pennsylvania Municipal Authority, Refunding RB, Diakon Lutheran: 6.38%, 1/01/19 (b)	5,550	6,185,198
6.38%, 1/01/39	615	680,473
County of Lancaster Pennsylvania Hospital Authority, Refunding RB, Brethren Village Project, Series A, 6.25%, 7/01/26	1,160	1,181,541
County of Lehigh Pennsylvania General Purpose Authority, Refunding RB, Bible Fellowship Church Homes, 5.13%, 7/01/32	1,800	1,940,922
County of Northampton Pennsylvania IDA, Route 33 Project, Tax Allocation Bonds, 7.00%, 7/01/32	2,110	2,308,804
Pennsylvania Economic Development Financing Authority, Refunding RB, National Gypsum Co., AMT, 5.50%, 11/01/44	2,710	2,978,182
		19,773,549
Puerto Rico 1.0%		
Children's Trust Fund, Refunding RB, Tobacco Settlement, Asset-Backed Bonds: 5.50%, 5/15/39	635	638,048
Series A, 0.00%, 5/15/50 (c)	3,450	299,633
Commonwealth of Puerto Rico, GO, Refunding, Series A, 8.00%, 7/01/35 (d)(e)	1,765	1,202,406
Commonwealth of Puerto Rico, GO (d)(e): Series A, 6.00%, 7/01/38	750	480,938
Refunding Public Improvement, Series A, 5.50%, 7/01/39	665	428,094
Commonwealth of Puerto Rico Aqueduct & Sewer Authority, RB, Senior Lien, Series A, 6.00%, 7/01/44	1,060	817,578
Commonwealth of Puerto Rico Aqueduct & Sewer Authority, Refunding RB, Senior Lien, Series A: 6.13%, 7/01/24	365	291,927
6.00%, 7/01/38	1,150	893,009
		5,051,633

See Notes to Financial Statements.

Schedule of Investments (continued)

BlackRock MuniAssets Fund, Inc. (MUA)

	Par	
	(000)	Value
Municipal Bonds		
Rhode Island 2.3%		
Central Falls Detention Facility Corp., Refunding RB, 7.25%, 7/15/35 (d)(e)	\$ 4,190	\$ 1,039,581
Tobacco Settlement Financing Corp., Refunding RB:		
Series A, 5.00%, 6/01/35	1,000	1,083,350
Series A, 5.00%, 6/01/40	980	1,055,744
Series B, 4.50%, 6/01/45	5,055	5,236,929
Series B, 5.00%, 6/01/50	3,330	3,456,940
		11,872,544
Texas 10.6%		
Central Texas Regional Mobility Authority, Refunding RB:		
CAB, 0.00%, 1/01/28 (c)	1,000	676,550
CAB, 0.00%, 1/01/29 (c)	2,000	1,291,060
CAB, 0.00%, 1/01/30 (c)	1,170	722,943
CAB, 0.00%, 1/01/33 (c)	3,690	1,994,445
CAB, 0.00%, 1/01/34 (c)	4,000	2,039,680
Senior Lien, 6.25%, 1/01/21 (b)	2,210	2,657,216
City of Houston Texas Airport System, Refunding ARB, AMT:		
Special Facilities, Continental Airlines, Inc., Series A, 6.63%, 7/15/38	2,890	3,323,818
United Airlines, Inc. Terminal E Project, 5.00%, 7/01/29	910	1,016,934
Clifton Higher Education Finance Corp., ERB, Idea Public Schools:		
5.50%, 8/15/31	955	1,071,128
5.75%, 8/15/41	720	804,953
County of Bexar Texas Health Facilities Development Corp., RB, Army Retirement Residence Project, 6.20%, 7/01/20 (b)	5,040	5,953,147
County of Harris Texas Cultural Education Facilities Finance Corp., RB, 1st Mortgage, Brazos Presbyterian Homes, Inc. Project, Series B, 7.00%, 1/01/48	475	623,471
County of Matagorda Texas Navigation District No. 1, Refunding RB, Central Power & Light Co., Project, Series A, 6.30%, 11/01/29	2,090	2,336,641
County of Tarrant Texas Cultural Education Facilities Finance Corp., RB, Series A:		
CC Young Memorial Home, 8.00%, 2/15/38	1,745	1,937,090
Senior Living Center Project, 8.25%, 11/15/44	4,200	4,508,112
County of Tarrant Texas Cultural Education Facilities Finance Corp., Refunding RB, Trinity Terrace Project, 5.00%, 10/01/49	865	958,481
County of Travis Texas Health Facilities Development Corp., Refunding RB, 7.13%, 1/01/46	3,080	3,462,782
Mesquite Health Facility Development Corp., Refunding RB, 5.13%, 2/15/42	810	874,516
Mission Economic Development Corp., RB, Senior Lien, Natgasoline Project, Series B, AMT, 5.75%, 10/01/31 (a)	1,325	1,399,703
New Hope Cultural Education Facilities Corp., RB, Stephenville LLC Tarleton State University Project:		
5.88%, 4/01/36	1,210	1,395,614
6.00%, 4/01/45	1,845	2,137,838
Newark Higher Education Finance Corp., RB, Series A (a):		
5.50%, 8/15/35	290	303,125
5.75%, 8/15/45	580	612,271
North Texas Education Finance Corp., ERB, Uplift Education, Series A, 5.25%, 12/01/47	1,600	1,751,024
Red River Health Facilities Development Corp., First MRB, Project:		
Eden Home, Inc., 7.25%, 12/15/42	2,895	2,566,331
Wichita Falls Retirement Foundation, 5.13%, 1/01/41	900	956,502
	Par	
	(000)	Value
Municipal Bonds		
Texas (continued)		
Texas Private Activity Bond Surface Transportation Corp., RB, Senior Lien:		
LBJ Infrastructure Group LLC, 7.00%, 6/30/40	\$ 3,775	\$ 4,453,632
NTE Mobility Partners LLC, North Tarrant Express Managed Lanes Project, 6.88%, 12/31/39	3,000	3,485,640
		55,314,647
Utah 0.6%		
State of Utah Charter School Finance Authority, Refunding RB, 6.75%, 10/15/43	2,950	3,088,326

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

Vermont 0.2%		
Vermont EDA, Refunding, MRB, Wake Robin Corp. Project, 5.40%, 5/01/33	770	829,683
Virginia 3.0%		
County of Fairfax Virginia EDA, Refunding RB, Goodwin House, Inc., 5.13%, 10/01/17 (b)	1,500	1,560,105
Lower Magnolia Green Community Development Authority, Special Assessment Bonds (a):		
5.00%, 3/01/35	510	535,046
5.00%, 3/01/45	520	541,060
Mosaic District Community Development Authority, Special Assessment, Series A:		
6.63%, 3/01/26	1,485	1,690,747
6.88%, 3/01/36	1,300	1,476,592
Tobacco Settlement Financing Corp., Refunding RB, Senior Series B-1, 5.00%, 6/01/47	2,280	2,127,035
Virginia College Building Authority, RB, Marymount University Project, Series B, 5.00%, 7/01/45 (a)	535	579,127
Virginia College Building Authority, Refunding RB, Marymount University Project, Series A (a):		
5.00%, 7/01/35	130	141,722
5.00%, 7/01/45	375	405,930
Virginia Small Business Financing Authority, RB, Senior Lien, Elizabeth River Crossings OpCo LLC Project, AMT, 6.00%, 1/01/37	5,410	6,298,159
		15,355,523
Washington 0.8%		
County of King Washington Public Hospital District No. 4, GO, Refunding, Snoqualmie Valley Hospital, 7.00%, 12/01/40	1,455	1,603,308
Greater Wenatchee Regional Events Center Public Facilities District, Refunding RB, Series A, 5.50%, 9/01/42	1,495	1,571,634
Washington State Housing Finance Commission, Refunding RB (a):		
5.75%, 1/01/35	315	322,595
6.00%, 1/01/45	850	870,289
		4,367,826
Wisconsin 1.0%		
Public Finance Authority, RB, Series A:		
4.75%, 12/01/35	775	808,077
5.00%, 12/01/45	1,605	1,689,920
5.15%, 12/01/50	1,170	1,232,923
Wisconsin Health & Educational Facilities Authority, Refunding RB, St. Johns Communities, Inc., Series A (b):		
7.25%, 9/15/19	425	499,243
7.63%, 9/15/19	855	1,013,406
		5,243,569
Total Municipal Bonds 87.7%		455,292,177

See Notes to Financial Statements.

Schedule of Investments (continued)

BlackRock MuniAssets Fund, Inc. (MUA)

	Par	
	(000)	Value
Municipal Bonds Transferred to Tender Option Bond Trusts (g)		
Colorado 2.4%		
Colorado Health Facilities Authority, Refunding RB, Sisters of Leavenworth Health System, Series A, 5.00%, 1/01/40	\$ 11,468	\$ 12,529,637
Florida 3.1%		
County of Miami-Dade Florida Aviation Revenue, RB, Miami International, Series A, AGC: 5.25%, 10/01/18 (b)	3,345	3,580,756
5.25%, 10/01/33	11,655	12,476,444
		16,057,200
Illinois 2.7%		
Illinois Finance Authority, RB, The Carle Foundation, Series A (AGM), 6.00%, 8/15/41	7,180	8,416,970
State of Illinois Toll Highway Authority, RB, Senior Priority, Series A, 5.00%, 1/01/40	5,056	5,838,962
		14,255,932
New York 13.5%		
City of New York New York Housing Development Corp., RB, M/F Housing, Series D-1, Class B, 4.25%, 11/01/45	8,996	9,376,800
City of New York New York Municipal Water Finance Authority, Refunding RB, Water & Sewer System, 2nd General Resolution: Fiscal 2013, Series CC, 5.00%, 6/15/47	14,181	16,425,797
Series HH, 5.00%, 6/15/31 (b)(h)	8,610	10,043,737
Hudson Yards Infrastructure Corp., RB, Fiscal 2012, Series A, 5.75%, 2/15/47 (h)	4,520	5,280,657
New York Liberty Development Corp., RB, 1 World Trade Center Port Authority Consolidated Bonds, 5.25%, 12/15/43	18,104	21,128,088
	Par	
Municipal Bonds Transferred to Tender Option Bond Trusts (g)		
New York (continued)	(000)	Value
New York Liberty Development Corp., Refunding RB, 4 World Trade Center Project, 5.75%, 11/15/51 (h)	\$ 6,600	\$ 7,743,051
		69,998,130
Washington 1.8%		
City of Bellingham Washington, RB, Water & Sewer, 5.00%, 8/01/40	7,966	9,124,327
Total Municipal Bonds Transferred to Tender Option Bond Trusts 23.5%		121,965,226
Total Long-Term Investments (Cost \$527,633,426) 111.2%		577,257,403
Short-Term Securities	Shares	
BlackRock Liquidity Funds, MuniCash, Institutional Class, 0.44% (i)(j)	165,095	165,111
Total Short-Term Securities (Cost \$165,101) 0.0%		165,111
Total Investments (Cost \$527,798,527) 111.2%		577,422,514
Other Assets Less Liabilities 1.6%		8,160,454
Liability for TOB Trust Certificates, Including Interest Expense and Fees Payable (12.8)%		(66,220,961)
Net Assets Applicable to Common Shares 100.0%		\$ 519,362,007

Notes to Schedule of Investments

(a)

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

Security exempt from registration pursuant to Rule 144A under the Securities Act of 1933, as amended. These securities may be resold in transactions exempt from registration to qualified institutional investors.

- (b) U.S. Government securities, held in escrow, are used to pay interest on this security, as well as to retire the bond in full at the date indicated, typically at a premium to par.
- (c) Zero-coupon bond.
- (d) Non-income producing security.
- (e) Issuer filed for bankruptcy and/or is in default.
- (f) Step-up bond that pays an initial coupon rate for the first period and then a higher coupon rate for the following periods. Rate as of period end.
- (g) Represent bonds transferred to a TOB Trust in exchange of cash and residual certificates received by the Fund. These bonds serve as collateral in a secured borrowing. See Note 4 of the Notes to Financial Statements for details.
- (h) All or a portion of security is subject to a recourse agreement. The aggregate maximum potential amount the Fund could ultimately be required to pay under the agreements, which expire between February 15, 2019 to November 15, 2019, is \$11,849,809. See Note 4 of the Notes to Financial Statements for details.
- (i) During the six months ended October 31, 2016, investments in issuers considered to be an affiliate of the Fund for purposes of Section 2(a)(3) of the Investment Company Act of 1940, as amended, were as follows:

Affiliate	Shares Held at April 30, 2016	Net Activity	Shares Held at October 31, 2016	Value at October 31, 2016	Income	Realized Gain/Capital Gain
BlackRock Liquidity Funds, MuniCash, Institutional Class	4,296,151	(4,131,056)	165,095	\$ 165,111	\$ 2,151	\$ 1,192

- (j) Current yield as of period end.

See Notes to Financial Statements.

Schedule of Investments (continued)

BlackRock MuniAssets Fund, Inc. (MUA)

Derivative Financial Instruments Outstanding as of Period End

Futures Contracts

Contracts	Issue	Expiration	Notional Value	Unrealized Appreciation
Short				
(3)	5-Year U.S. Treasury Note	December 2016	\$ 362,391	\$ 2,716
(27)	10-Year U.S. Treasury Note	December 2016	\$ 3,499,875	49,681
(22)	Long U.S. Treasury Bond	December 2016	\$ 3,579,813	136,011
(5)	Ultra U.S. Treasury Bond	December 2016	\$ 879,687	44,337
Total				\$ 232,745

Derivative Financial Instruments Categorized by Risk Exposure

As of period end, the fair values of derivative financial instruments located in the Statements of Assets and Liabilities were as follows:

Assets	Derivative Financial Instruments	Commodity Contracts	Credit Contracts	Equity Contracts	Foreign Currency Exchange Contracts	Interest Rate Contracts	Other Contracts	Total
Futures contracts	Net unrealized appreciation ¹					\$ 232,745		\$ 232,745

¹ Includes cumulative appreciation (depreciation) on futures contracts, if any, as reported in the Schedule of Investments. Only current day's variation margin is reported within the Statements of Assets and Liabilities.

For the six months ended October 31, 2016, the effect of derivative financial instruments in the Statements of Operations was as follows:

Net Realized Gain (Loss) from:	Commodity Contracts	Credit Contracts	Equity Contracts	Foreign Currency Exchange Contracts	Interest Rate Contracts	Other Contracts	Total
Futures contracts					\$ 306,265		\$ 306,265
Net Change in Unrealized Appreciation (Depreciation) on:							
Futures contracts					\$ 65,535		\$ 65,535

Average Quarterly Balances of Outstanding Derivative Financial Instruments

Futures contracts:

Average notional value of contracts short \$ 10,474,445

For more information about the Fund's investment risks regarding derivative financial instruments, refer to the Notes to Financial Statements.

Fair Value Hierarchy as of Period End

Various inputs are used in determining the fair value of investments and derivative financial instruments. For information about the Fund's policy regarding valuation of investments and derivative financial instruments, refer to the Notes to Financial Statements.

The following tables summarize the Fund's investments and derivative financial instruments categorized in the disclosure hierarchy:

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

	Level 1	Level 2	Level 3	Total
Assets:				
Investments:				
Long-Term Investments ¹		\$ 577,257,403		\$ 577,257,403
Short-Term Securities	\$ 165,111			165,111
Total	\$ 165,111	\$ 577,257,403		\$ 577,422,514

Derivative Financial Instruments²

Assets:				
Interest rate contracts	\$ 232,745			\$ 232,745

¹ See above Schedule of Investments for values in each state or political subdivision.

² Derivative financial instruments are futures contracts which are valued at the unrealized appreciation (depreciation) on the instrument.

See Notes to Financial Statements.

Schedule of Investments (concluded)

BlackRock MuniAssets Fund, Inc. (MUA)

The Fund may hold assets and/or liabilities in which the fair value approximates the carrying amount for financial statement purposes. As of period end, such assets and/or liabilities are categorized within the disclosure hierarchy as follows:

	Level 1	Level 2	Level 3	Total
Assets:				
Cash pledged for futures contracts	\$ 144,950			\$ 144,950
Liabilities:				
TOB Trust Certificates		\$ (66,086,523)		(66,086,523)
Total	\$ 144,950	\$ (66,086,523)		\$ (65,941,573)

During the six months ended October 31, 2016, there were no transfers between levels.

See Notes to Financial Statements.

Schedule of Investments October 31, 2016 (Unaudited)

BlackRock MuniEnhanced Fund, Inc. (MEN)

(Percentages shown are based on Net Assets)

	Par	
	(000)	Value
Municipal Bonds		
Alabama 1.4%		
County of Jefferson Alabama, RB, Limited Obligation School, Series A:		
5.50%, 1/01/22	\$ 2,750	\$ 2,765,153
4.75%, 1/01/25	2,200	2,212,122
		4,977,275
Alaska 0.7%		
Alaska Industrial Development & Export Authority, RB, Providence Health Services, Series A,		
5.50%, 10/01/41	990	1,127,075
Borough of Matanuska-Susitna Alaska, RB, Goose Creek Correctional Center (AGC) (a):		
6.00%, 9/01/19	765	870,272
6.00%, 9/01/19	435	494,860
		2,492,207
Arizona 1.8%		
County of Maricopa Arizona IDA, Refunding RB, Banner Health Obligation Group (b):		
3.25%, 1/01/37	920	877,974
5.00%, 1/01/38	725	845,923
Salt River Project Agricultural Improvement & Power District, RB, Series A, 5.00%, 1/01/38		
	1,500	1,567,785
State of Arizona, COP, Department of Administration, Series A (AGM):		
5.00%, 10/01/27	2,700	2,978,235
5.00%, 10/01/29	400	440,736
		6,710,653
California 19.1%		
Alameda Corridor Transportation Authority, Refunding RB, CAB, Subordinate Lien, Series A		
(AMBAC) (a)(c):		
5.40%, 10/01/17	10,185	10,618,677
5.45%, 10/01/17	3,700	3,859,248
Anaheim Public Financing Authority California, RB, Senior, Public Improvements Project, Series		
A (AGM), 6.00%, 9/01/24	5,000	6,204,750
Cabrillo Community College District, GO, CAB, Election of 2004, Series B (NPFGC),		
0.00%, 8/01/37 (d)	2,400	907,584
California Health Facilities Financing Authority, RB:		
St. Joseph Health System, Series A, 5.75%, 7/01/39		
	550	611,479
Sutter Health, Series B, 5.88%, 8/15/31		
	1,200	1,400,364
California Health Facilities Financing Authority, Refunding RB, St. Joseph Health System,		
Series A, 5.00%, 7/01/37	1,090	1,252,737
California State University, Refunding RB:		
(AGM), 5.00%, 5/01/17 (a)	550	561,869
(AGM), 5.00%, 11/01/37	600	612,204
Series A, 5.00%, 5/01/17 (a)	850	868,301
California Statewide Communities Development Authority, RB, Kaiser Permanente, Series A,		
5.00%, 4/01/42	1,480	1,683,204
City of Redding California, COP, Refunding, Series A (AGM), 5.00%, 6/01/30		
	1,420	1,500,542
City of San Jose California, Refunding ARB, Series A-1, AMT, 5.75%, 3/01/34		
	850	990,633
County of Orange California Sanitation District, COP, Series B (AGM), 5.00%, 2/01/17 (a)		
	1,500	1,516,260
County of San Joaquin California Transportation Authority, Refunding RB, Limited Tax, Measure		
K, Series A, 6.00%, 3/01/36	2,175	2,608,760
County of San Mateo California Community College District, GO, CAB, Election of 2001, Series		
C (NPFGC), 0.00%, 9/01/30 (d)	12,740	8,719,511
	Par	
	(000)	Value
Municipal Bonds		
California (continued)		
Los Angeles Community College District California, GO, Election of 2001, Series A (AGM),		
5.00%, 8/01/17 (a)	\$ 1,300	\$ 1,342,133

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

Mount San Antonio Community College District, GO, Refunding, CAB, Election of 2008, Series A, 6.25%, 8/01/43 (c)	2,500	2,062,875
Poway Unified School District, GO, Refunding, CAB, School Facilities Improvement, Election of 2008, Series B, 0.00%, 8/01/36 (d)	3,750	1,867,950
Rio Hondo Community College District California, GO, CAB, Election of 2004, Series C, 0.00%, 8/01/38 (d)	5,000	2,355,850
San Diego California Unified School District, GO, CAB, Election of 2008 (d):		
Series C, 0.00%, 7/01/38	1,600	744,864
Series G, 0.00%, 7/01/34	650	300,723
Series G, 0.00%, 7/01/35	690	300,426
Series G, 0.00%, 7/01/36	1,035	424,122
Series G, 0.00%, 7/01/37	690	265,070
San Diego California Unified School District, GO, Refunding, Series R-1 (d):		
0.00%, 7/01/30	5,000	3,279,450
0.00%, 7/01/31	1,280	803,520
San Diego Community College District California, GO, CAB, Election of 2006 (d):		
0.00%, 8/01/31	2,145	1,145,216
0.00%, 8/01/32	2,680	1,341,956
San Marcos Unified School District, GO, Election of 2010, Series A:		
5.00%, 8/01/34	700	807,275
5.00%, 8/01/38	600	690,762
Walnut Valley Unified School District, GO, CAB, Election of 2007, Series B, 0.00%, 8/01/36 (d)	5,500	2,756,160
West Basin Municipal Water District California, COP, Refunding, Series B (AGC), 5.00%, 8/01/18 (a)	5,035	5,397,721
		69,802,196
Colorado 0.6%		
Regional Transportation District, COP, Refunding, Series A, 5.38%, 6/01/31	2,000	2,251,400
District of Columbia 1.5%		
District of Columbia Ballpark Revenue, RB, Series B-1, 5.00%, 2/01/31	5,360	5,378,760
Florida 14.9%		
City of Tallahassee Florida Energy System Revenue, RB, (NPFGC):		
5.00%, 10/01/32	4,000	4,145,880
5.00%, 10/01/37	7,500	7,765,800
County of Brevard Florida Health Facilities Authority, Refunding RB, Health First, Inc. Project, 5.00%, 4/01/39	1,600	1,810,192
County of Broward Florida Water & Sewer Utility, Refunding RB, Series A, 5.25%, 10/01/18 (a)	850	920,099
County of Duval Florida School Board, COP, Master Lease Program (AGM), 5.00%, 7/01/17 (a)	2,625	2,700,101
County of Highlands Florida Health Facilities Authority, RB, Adventist Health System/Sunbelt, Series B, 6.00%, 11/15/37	1,450	1,639,428
County of Hillsborough Florida Aviation Authority, RB, Series A, AMT (AGC), 5.38%, 10/01/33	4,050	4,329,855
County of Lee Florida, Refunding ARB, Series A, AMT:		
5.63%, 10/01/26	960	1,107,773
5.38%, 10/01/32	3,160	3,611,248
County of Miami-Dade Florida, GO, Building Better Communities Program, Series B-1, 5.75%, 7/01/18 (a)	1,400	1,513,022

See Notes to Financial Statements.

Schedule of Investments (continued)

BlackRock MuniEnhanced Fund, Inc. (MEN)

	Par	
	(000)	Value
Municipal Bonds		
Florida (continued)		
County of Miami-Dade Florida, RB, Seaport:		
Series A, 6.00%, 10/01/38	\$ 2,025	\$ 2,461,084
Series B, AMT, 6.00%, 10/01/30	640	781,113
Series B, AMT, 6.25%, 10/01/38	415	512,089
Series B, AMT, 6.00%, 10/01/42	660	787,829
County of Miami-Dade Florida Aviation, Refunding ARB, AMT, 5.00%, 10/01/34	190	216,167
County of Miami-Dade Florida Educational Facilities Authority, RB, University Miami, Series A, 5.00%, 4/01/40	2,995	3,466,503
County of Miami-Dade Florida School Board Foundation, Inc., 5.00%, 5/01/18 (a)	10,000	10,615,700
County of Palm Beach Florida Solid Waste Authority, Refunding RB:		
5.00%, 10/01/21 (a)	30	35,356
5.00%, 10/01/31	1,970	2,283,447
County of Sarasota Florida Public Hospital District, RB, Sarasota Memorial Hospital Project, Series A, 5.63%, 7/01/39	275	300,528
Florida Ports Financing Commission, Refunding RB, State Transportation Trust Fund, Series B, AMT:		
5.13%, 6/01/27	2,000	2,310,760
5.38%, 10/01/29	1,050	1,220,352
		54,534,326
Georgia 3.5%		
County of Burke Georgia Development Authority, Refunding RB, Oglethorpe Power-Vogtle Project, Series C, 5.70%, 1/01/43	1,150	1,205,545
County of Gainesville Georgia & Hall Hospital Authority, Refunding RB, Northeast Georgia Health System, Inc. Project, Series A, 5.50%, 8/15/54	500	601,240
Municipal Electric Authority of Georgia, Refunding RB, Series EE (AMBAC), 7.00%, 1/01/25	7,475	10,271,098
Private Colleges & Universities Authority, RB, Savannah College of Art & Design:		
5.00%, 4/01/33	140	159,690
5.00%, 4/01/44	380	426,432
		12,664,005
Illinois 16.0%		
City of Chicago Illinois, GARB, O Hare International Airport, 3rd Lien, Series A, 5.75%, 1/01/39	5,110	5,894,385
City of Chicago Illinois, GO, Refunding, Series A, Project, 5.25%, 1/01/33	1,185	1,233,703
City of Chicago Illinois, GO, Series A, 5.25%, 1/01/35	400	411,716
City of Chicago Illinois, RB, Motor Fuel Tax Project, Series A (AGC), 5.00%, 1/01/38	715	737,744
City of Chicago Illinois, Refunding RB, Sales Tax Receipts, Series A, 5.00%, 1/01/41	2,220	2,308,911
City of Chicago Illinois Transit Authority, RB:		
5.25%, 12/01/49	900	1,023,624
Sales Tax Receipts, 5.25%, 12/01/36	595	658,558
County of Cook Illinois Forest Preserve District, GO, Refunding, Limited Tax Project, Series B, 5.00%, 12/15/37	45	49,185
Illinois Finance Authority, RB, Carle Foundation, Series A:		
5.75%, 8/15/34	650	752,388
6.00%, 8/15/41	1,000	1,169,310
Illinois Finance Authority, Refunding RB, Silver Cross Hospital and Medical Centers:		
4.13%, 8/15/37	700	728,252
5.00%, 8/15/44	350	388,846
Illinois Municipal Electric Agency, RB, Series A (NPFGC), 5.25%, 2/01/17 (a)	1,000	1,011,360
	Par	
	(000)	Value
Municipal Bonds		
Illinois (continued)		
Illinois Sports Facilities Authority, RB, State Tax Supported (AMBAC), 5.50%, 6/15/30 (c)	\$ 12,490	\$ 12,536,088
Kane McHenry Cook & De Kalb Counties Unit School District No. 300, GO, Refunding, 5.25%, 1/01/33	9,145	10,522,877
Metropolitan Pier & Exposition Authority, RB, CAB, McCormick Place Expansion Project, Series A (NPFGC) (d):		

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

0.00%, 12/15/26	5,000	3,366,000
0.00%, 12/15/33	9,950	4,691,027
Metropolitan Pier & Exposition Authority, Refunding RB, CAB, McCormick Place Expansion Project, Series B (AGM), 0.00%, 6/15/44 (d)	3,450	998,361
Railsplitter Tobacco Settlement Authority, RB, 6.00%, 6/01/28	675	792,619
Regional Transportation Authority, RB, Series A (AMBAC), 7.20%, 11/01/20	4,595	5,141,300
State of Illinois, GO:		
5.25%, 2/01/33	830	894,682
5.50%, 7/01/33	820	900,360
5.25%, 2/01/34	830	894,682
5.50%, 7/01/38	445	486,421
University of Illinois, RB, Auxiliary Facilities System, Series A, 5.00%, 4/01/39	905	1,009,871
		58,602,270
Indiana 0.9%		
Indiana Finance Authority, RB, Series A:		
CWA Authority Project, 1st Lien, 5.25%, 10/01/38	1,100	1,281,170
Private Activity Bond, Ohio River Bridges East End Crossing Project, AMT, 5.00%, 7/01/44	515	566,340
Private Activity Bond, Ohio River Bridges, AMT, 5.00%, 7/01/40	890	987,144
Indianapolis Local Public Improvement Bond Bank, Refunding RB, Waterworks Project, Series A (AGC), 5.25%, 1/01/29	600	652,890
		3,487,544
Iowa 3.1%		
Iowa Finance Authority, RB, Iowa Health Care Facilities, Series A (AGC), 5.63%, 8/15/19 (a)	5,725	6,443,774
Iowa Student Loan Liquidity Corp., RB, Senior Series A-2, AMT:		
5.60%, 12/01/26	2,270	2,444,790
5.70%, 12/01/27	1,025	1,097,519
5.80%, 12/01/29	695	742,364
5.85%, 12/01/30	730	780,333
		11,508,780
Louisiana 1.3%		
City of New Orleans Louisiana Aviation Board, RB, Series B, AMT, 5.00%, 1/01/40	2,795	3,143,257
Louisiana Public Facilities Authority, RB, Provident Group-Flagship Properties LLC, Series A, 5.00%, 7/01/56	275	304,909
Louisiana Public Facilities Authority, Refunding RB, Christus Health, Series B (AGC), 6.50%, 7/01/30	1,250	1,376,788
		4,824,954
Maine 0.3%		
Maine Health & Higher Educational Facilities Authority, RB, Series A, 5.00%, 7/01/46	1,035	1,136,399
Massachusetts 1.5%		
Massachusetts DFA, Refunding RB, Emmanuel College Issue, Series A, 5.00%, 10/01/43	370	417,478

See Notes to Financial Statements.

Schedule of Investments (continued)

BlackRock MuniEnhanced Fund, Inc. (MEN)

	Par	
	(000)	Value
Municipal Bonds		
Massachusetts (continued)		
Massachusetts HFA, Refunding RB, Series C, AMT, 5.35%, 12/01/42	\$ 950	\$ 1,014,857
Massachusetts School Building Authority, RB, Dedicated Sales Tax, Senior Series A, 5.00%, 5/15/43	1,280	1,487,846
Massachusetts Water Resources Authority, Refunding RB, General, Series A (NPFGC), 5.00%, 8/01/34	2,530	2,606,533
		5,526,714
Michigan 2.8%		
City of Detroit Michigan Sewage Disposal System, Refunding RB, 2nd Lien, Series E (BHAC), 5.75%, 7/01/18 (a)	2,500	2,688,825
City of Detroit Michigan Water Supply System, RB, 2nd Lien, Series B (AGM), 6.25%, 7/01/36	400	441,720
City of Lansing Michigan, RB, Board of Water & Light Utilities System, Series A, 5.50%, 7/01/41	1,700	1,989,442
Michigan Finance Authority, Refunding RB:		
Henry Ford Health System, 3.25%, 11/15/42	875	790,484
Trinity Health Credit Group, 5.00%, 12/01/21 (a)	20	23,731
Royal Oak Hospital Finance Authority Michigan, Refunding RB, William Beaumont Hospital, Series D, 5.00%, 9/01/39	1,040	1,173,775
State of Michigan Building Authority, Refunding RB, Facilities Program:		
Series I-A, 5.38%, 10/15/36	145	166,711
Series I-A, 5.38%, 10/15/41	700	803,747
Series II-A (AGM), 5.25%, 10/15/36	900	1,031,769
State of Michigan HDA, RB, S/F Housing, Series C, AMT, 5.50%, 12/01/28	580	615,879
Western Michigan University, Refunding RB, General, University and College Improvements (AGM), 5.00%, 11/15/39	380	432,029
		10,158,112
Minnesota 0.7%		
City of Minneapolis Minnesota, Refunding RB, Fairview Health Services, Series B (AGC):		
6.50%, 11/15/18 (a)	385	428,170
6.50%, 11/15/38	2,115	2,324,872
		2,753,042
Nebraska 1.8%		
Central Plains Energy Project Nebraska, RB, Gas Project No. 3, 5.25%, 9/01/37	750	853,852
Central Plains Nebraska Energy Project, RB, Gas Project No. 3, 5.00%, 9/01/32	5,000	5,654,100
		6,507,952
Nevada 1.6%		
City of Las Vegas Nevada, GO, Limited Tax, Performing Arts Center, 6.00%, 4/01/19 (a)	850	951,550
County of Clark Nevada, ARB, Las Vegas-McCarran International Airport, Series A:		
5.25%, 7/01/42	500	552,365
(AGM), 5.25%, 7/01/39	3,800	4,200,444
		5,704,359
New Jersey 9.1%		
New Jersey EDA, RB:		
Motor Vehicle Surcharge, Series A (NPFGC), 5.25%, 7/01/31	3,125	3,210,906
Motor Vehicle Surcharge, Series A (NPFGC), 5.25%, 7/01/33	7,800	8,014,422
Private Activity Bond, Goethals Bridge Replacement Project, AMT, 5.13%, 1/01/34	685	779,160
Private Activity Bond, Goethals Bridge Replacement Project, AMT, 5.38%, 1/01/43	895	1,016,908
	Par	
	(000)	Value
Municipal Bonds		
New Jersey (continued)		
New Jersey EDA, RB (continued):		
School Facilities Construction (AGC), 6.00%, 12/15/18 (a)	\$ 1,975	\$ 2,185,436
School Facilities Construction (AGC), 6.00%, 12/15/34	25	27,487
Series WW, 5.25%, 6/15/33	155	174,174

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

Series WW, 5.00%, 6/15/34	205	224,830
Series WW, 5.00%, 6/15/36	925	1,010,183
Series WW, 5.25%, 6/15/40	265	294,662
New Jersey Higher Education Student Assistance Authority, Refunding RB, Series 1, AMT:		
5.50%, 12/01/26	480	536,712
5.75%, 12/01/27	3,115	3,502,849
New Jersey Housing & Mortgage Finance Agency, Refunding RB, M/F Housing, Series 2, AMT,		
4.35%, 11/01/33	970	1,012,670
New Jersey Transportation Trust Fund Authority, RB:		
Transportation Program, Series AA, 5.25%, 6/15/33	1,460	1,620,731
Transportation Program, Series AA, 5.00%, 6/15/38	1,760	1,902,190
Transportation System, Series A, 5.50%, 6/15/41	2,000	2,204,240
Transportation System, Series AA, 5.50%, 6/15/39	1,150	1,290,634
Transportation System, Series B, 5.50%, 6/15/31	1,000	1,121,800
Transportation System, Series B, 5.00%, 6/15/42	2,500	2,656,475
Transportation System, Series D, 5.00%, 6/15/32	625	687,050
		33,473,519
New York 6.5%		
City of New York New York Municipal Water Finance Authority, Refunding RB, Second General Resolution, Fiscal 2012, Series BB, 5.25%, 6/15/44	1,425	1,682,996
City of New York New York Transitional Finance Authority, BARB, Fiscal 2009, Series S-4, 5.50%, 1/15/33	1,600	1,759,120
City of New York New York Transitional Finance Authority, RB, Fiscal 2009, Series S-4, 5.50%, 1/15/34	2,750	3,023,488
City of New York New York Transitional Finance Authority, Refunding RB, Future Tax Secured, Series B, 5.00%, 11/01/32	1,480	1,756,538
County of Erie New York Industrial Development Agency, RB, City School District of Buffalo, Series A (AGM), 5.75%, 5/01/17 (a)	1,500	1,537,665
Hudson Yards Infrastructure Corp., RB, Series A, 5.75%, 2/15/47	700	817,873
Metropolitan Transportation Authority, RB, Series C:		
6.50%, 11/15/18 (a)	2,985	3,325,499
6.50%, 11/15/28	1,015	1,128,589
Metropolitan Transportation Authority Hudson Rail Yards Trust Obligations, Refunding RB, Series A, 5.00%, 11/15/56	1,465	1,655,347
New York Transportation Development Corp., RB, Laguardia Airport Terminal B Redevelopment Project, Series A, AMT, 5.00%, 7/01/46	2,915	3,177,379
State of New York Dormitory Authority, RB, Series B, 5.75%, 3/15/36	1,200	1,332,204
State of New York HFA, RB, Affordable Housing, M/F Housing, Series B, AMT, 5.30%, 11/01/37	2,500	2,539,400
		23,736,098
Ohio 1.5%		
County of Lucas Ohio, Refunding RB, Promedica Healthcare, Series A, 6.50%, 11/15/37	530	646,616

See Notes to Financial Statements.

Schedule of Investments (continued)

BlackRock MuniEnhanced Fund, Inc. (MEN)

	Par	
	(000)	Value
Municipal Bonds		
Ohio (continued)		
State of Ohio Turnpike Commission, RB, CAB, Junior Lien, Infrastructure Projects, Series A-2, 0.00%, 2/15/37 (d)	\$ 10,000	\$ 4,724,600
		5,371,216
Pennsylvania 5.9%		
Commonwealth Financing Authority, RB, Series B, 5.00%, 6/01/42	1,600	1,789,504
Pennsylvania Economic Development Financing Authority, RB, Pennsylvania Rapid Bridge Finco LP, AMT:		
5.00%, 12/31/34	7,290	8,192,648
5.00%, 12/31/38	1,305	1,456,367
Pennsylvania Higher Educational Facilities Authority, Refunding RB, Thomas Jefferson University, Series A, 5.25%, 9/01/50	2,480	2,864,896
Pennsylvania Turnpike Commission, RB:		
Series A, 5.00%, 12/01/38	620	716,106
Series A-1, 5.00%, 12/01/46	3,320	3,797,980
Series C, 5.50%, 12/01/33	555	667,249
Subordinate, Special Motor License Fund, 6.00%, 12/01/20 (a)	575	686,303
Pennsylvania Turnpike Commission, Refunding RB, Series A-1, 5.00%, 12/01/40	765	871,312
Philadelphia School District, GO, Series E (a):		
2016, 6.00%, 9/01/18	395	413,944
6.00%, 9/01/18	5	5,464
		21,461,773
Rhode Island 1.1%		
Rhode Island Commerce Corp., RB, Airport Corporation, 5.00%, 7/01/41	215	246,373
Tobacco Settlement Financing Corp., Refunding RB, Series B:		
4.50%, 6/01/45	1,055	1,092,969
5.00%, 6/01/50	2,630	2,730,256
		4,069,598
South Carolina 6.0%		
South Carolina Jobs EDA, Refunding RB, Palmetto Health, Series A (AGM), 6.50%, 8/01/39	115	138,045
South Carolina Ports Authority, RB, AMT, 5.25%, 7/01/50	2,330	2,641,777
South Carolina Transportation Infrastructure Bank, RB, Series A, 5.25%, 10/01/40	3,000	3,304,470
State of South Carolina Public Service Authority, 5.50%, 1/01/19 (a)	80	87,587
State of South Carolina Public Service Authority, RB, Santee Cooper:		
Series A, 5.50%, 12/01/54	8,725	10,278,574
Series E, 5.50%, 12/01/53	745	872,902
State of South Carolina Public Service Authority, Refunding RB:		
Santee Cooper, Series B, 5.00%, 12/01/38	2,080	2,402,462
Series A, 5.50%, 1/01/19 (a)	920	1,007,253
Series E, 5.25%, 12/01/55	1,050	1,237,509
		21,970,579
Tennessee 1.5%		
Metropolitan Government of Nashville & Davidson County Health & Educational Facilities Board, Refunding RB, Vanderbilt University, Series B, 5.50%, 10/01/19 (a)	5,000	5,640,500
Texas 14.7%		
Central Texas Turnpike System, Refunding RB, CAB, Series B, 0.00%, 8/15/37 (d)	890	392,392
	Par	
	(000)	Value
Municipal Bonds		
Texas (continued)		
City of Houston Texas Combined Utility System Revenue, Refunding RB, Combined 1st Lien, Series A (AGC):		
5.38%, 5/15/19 (a)	\$ 1,280	\$ 1,420,979
6.00%, 5/15/19 (a)	1,990	2,240,302
6.00%, 11/15/35	110	123,992

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

5.38%, 11/15/38	70	76,843
City of San Antonio Texas Public Service Board, RB, Junior Lien, 5.00%, 2/01/38	575	666,695
County of Midland Texas Fresh Water Supply District No. 1, RB, CAB, City of Midland Project, Series A, 0.00%, 9/15/36 (d)	2,130	984,720
County of Tarrant Texas Cultural Education Facilities Finance Corp., Refunding RB:		
Cook Children s Medical Center, 5.25%, 12/01/39	750	870,960
Texas Health Resources System , Series A, 5.00%, 2/15/41 (b)	3,445	4,007,327
Dallas-Fort Worth International Airport, ARB, Joint Improvement, AMT:		
Series D, 5.00%, 11/01/38	1,975	2,199,814
Series D, 5.00%, 11/01/42	1,500	1,667,025
Series H, 5.00%, 11/01/32	3,000	3,397,200
Dallas-Fort Worth International Airport, Refunding ARB, Series F, 5.25%, 11/01/33	975	1,162,073
Leander ISD, GO, Refunding, CAB, Series D, 0.00%, 8/15/38 (d)	3,420	1,435,682
Mansfield Texas ISD, GO, School Building (PSF-GTD), 5.00%, 2/15/17 (a)	1,725	1,746,045
North Texas Tollway Authority, Refunding RB:		
1st Tier System (NPFGC), 5.75%, 1/01/18 (a)	600	634,122
1st Tier System (NPFGC), 5.75%, 1/01/40	195	204,777
1st Tier System, Series A, 6.00%, 1/01/19 (a)	2,270	2,514,184
1st Tier System, Series A (NPFGC), 6.00%, 1/01/28	525	578,965
1st Tier System, Series K-2 (AGC), 6.00%, 1/01/19 (a)	4,015	4,446,894
1st Tier System, Series S, 5.75%, 1/01/18 (a)	805	850,780
1st Tier, Series K-1 (AGC), 5.75%, 1/01/19 (a)	3,800	4,188,474
Series B, 5.00%, 1/01/40	495	566,518
San Antonio Public Facilities Corp., Refunding RB, Convention Center Refinancing and Expansion Project, CAB (d):		
0.00%, 9/15/35	4,990	2,194,203
0.00%, 9/15/36	11,525	4,779,418
0.00%, 9/15/37	8,245	3,218,518
Texas Municipal Gas Acquisition & Supply Corp. III, RB:		
5.00%, 12/15/32	705	785,807
Natural Gas Utility Improvements, 5.00%, 12/15/31	1,190	1,333,478
Texas Private Activity Bond Surface Transportation Corp., RB, Senior Lien, AMT, Blueridge Transportation Group:		
5.00%, 12/31/45	820	909,930
5.00%, 12/31/50	455	501,538
Texas Transportation Commission, Refunding RB, Central Texas Turnpike System, 1st Tier, Series A, 5.00%, 8/15/41	3,080	3,487,145
		53,586,800
Utah 1.5%		
Utah Transit Authority, RB, Series A, 5.00%, 6/15/18 (a)	5,000	5,333,150

See Notes to Financial Statements.

Schedule of Investments (continued)

BlackRock MuniEnhanced Fund, Inc. (MEN)

	Par	
	(000)	Value
Municipal Bonds		
Washington 1.1%		
Central Puget Sound Regional Transit Authority, RB, Series A, 5.00%, 11/01/17 (a)	\$ 1,600	\$ 1,668,384
Port of Seattle Washington, RB, Series C, AMT, 5.00%, 4/01/40	1,015	1,151,720
Washington Health Care Facilities Authority, RB, Providence Health & Services, Series A: 5.00%, 10/01/39	525	570,948
5.25%, 10/01/39	625	686,969
		4,078,021
Wisconsin 0.8%		
Public Finance Authority, RB, KU Campus Development Corp., Central District Development Project, 5.00%, 3/01/46	1,100	1,266,287
State of Wisconsin Health & Educational Facilities Authority, RB, Ascension Health Senior Credit Group, Series E, 5.00%, 11/15/33	1,375	1,524,421
		2,790,708
Total Municipal Bonds 123.2%		450,532,910
Municipal Bonds Transferred to Tender Option Bond Trusts (e)		
Arizona 0.4%		
City of Phoenix Arizona Civic Improvement Corp., Refunding RB, Water System, Junior Lien, Series A, 5.00%, 7/01/34	1,200	1,313,664
California 1.9%		
County of San Diego California Water Authority Financing Corp., COP, Refunding, Series A (AGM) (a):		
5.00%, 5/01/18	466	495,315
5.00%, 5/01/18	2,344	2,490,310
Los Angeles Community College District California, GO, Election of 2001, Series A (AGM), 5.00%, 8/01/17 (a)	2,500	2,581,025
San Diego Community College District California, GO, Election of 2002, 5.25%, 8/01/19 (a)	404	450,853
University of California, RB, Series O, 5.75%, 5/15/19 (a)	840	940,841
		6,958,344
Colorado 2.4%		
Colorado Health Facilities Authority, Refunding RB, Catholic Health Initiatives, Series A: 5.50%, 7/01/34 (f)	900	991,467
5.00%, 2/01/41	7,000	7,598,080
		8,589,547
Connecticut 0.4%		
Connecticut State Health & Educational Facility Authority, Refunding RB, Trinity Health Credit Group, 5.00%, 12/01/45	1,381	1,597,822
District of Columbia 1.6%		
District of Columbia, RB, Series A, 5.50%, 12/01/30 (f)	1,005	1,138,992
District of Columbia Water & Sewer Authority, Refunding RB, Senior Lien, Series A, 6.00%, 10/01/18 (a)(f)	1,779	1,951,296
Metropolitan Washington Airports Authority, Refunding ARB, Series A, AMT, 5.00%, 10/01/30	2,530	2,896,774
		5,987,062
Florida 4.3%		
County of Miami-Dade Florida, Refunding RB, Transit System Sales Surtax, 5.00%, 7/01/42	4,480	5,139,501
	Par	
Municipal Bonds Transferred to Tender Option Bond Trusts (e)		
	(000)	Value
Florida (continued)		
County of Miami-Dade Florida Water & Sewer System, (AGC), 5.00%, 10/01/39	\$ 4,621	\$ 5,197,356

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

County of Orange Florida School Board, COP, Series A (AGC), 5.50%, 8/01/19 (a)	3,544	3,974,807
State of Florida Board of Education, GO, Refunding, Series C, 5.00%, 6/01/18 (f)	1,349	1,396,541
		15,708,205
Illinois 3.8%		
Metropolitan Pier & Exposition Authority, RB, McCormick Place Expansion Project, Series A, 5.00%, 6/15/42 (f)	260	275,504
State of Illinois, RB, Build Illinois, Series B, 5.25%, 6/15/19 (a)(f)	4,399	4,880,366
State of Illinois Toll Highway Authority, RB:		
Senior Priority, Series A, 5.00%, 1/01/40	2,730	3,153,386
Senior Priority, Series B, 5.50%, 1/01/18 (a)	1,880	1,981,811
Senior, Series B, 5.00%, 1/01/40	1,050	1,207,653
Series A, 5.00%, 1/01/38	2,138	2,440,800
		13,939,520
Massachusetts 0.5%		
Commonwealth of Massachusetts, GO, Series A, 5.00%, 3/01/46	1,461	1,695,034
Michigan 3.3%		
Michigan Finance Authority, RB, Beaumont Health Credit Group, 5.00%, 11/01/44	1,970	2,209,830
Michigan Finance Authority, Refunding RB, Hospital, Trinity Health Credit Group, 5.00%, 12/01/39	7,510	8,672,323
Michigan State Building Authority, Refunding RB, Facilities Program, Series I, 5.00%, 10/15/45	870	1,003,536
		11,885,689
Nevada 4.2%		
City of Las Vegas Nevada, GO, Limited Tax, Performing Arts Center, 6.00%, 4/01/19 (a)(f)	3,778	4,228,986
County of Clark Nevada Water Reclamation District, GO, Series B (a):		
Limited Tax, 5.75%, 7/01/19	1,829	2,056,393
5.50%, 7/01/19	4,499	5,027,375
Las Vegas Valley Water District Nevada, GO, Refunding, Water Improvement, Series A, 5.00%, 6/01/46	3,460	4,060,898
		15,373,652
New Jersey 0.8%		
County of Hudson New Jersey Improvement Authority, RB, Hudson County Vocational-Technical Schools Project, 5.25%, 5/01/51	800	953,664
New Jersey Transportation Trust Fund Authority, RB, Transportation System, Series B, 5.25%, 6/15/36 (f)	1,840	2,017,009
		2,970,673
New York 4.7%		
City of New York New York Municipal Water Finance Authority, RB, Water & Sewer System, Fiscal 2009, Series A:		
5.75%, 6/15/18 (a)	290	311,667
5.75%, 6/15/40	969	1,042,353
City of New York New York Municipal Water Finance Authority, Refunding RB, Water & Sewer System, 2nd General Resolution, Fiscal 2013, Series CC, 5.00%, 6/15/47	5,680	6,579,585
City of New York New York Water & Sewer System, Refunding RB, 2nd General Resolution, Fiscal 2014, Series DD, 5.00%, 6/15/35	1,665	1,981,466

See Notes to Financial Statements.

Schedule of Investments (continued)

BlackRock MuniEnhanced Fund, Inc. (MEN)

	Par	
	(000)	Value
Municipal Bonds Transferred to Tender Option Bond Trusts (e)		
New York (continued)		
Metropolitan Transportation Authority, RB, Sub-Series D-1, 5.25%, 11/15/44	\$ 3,470	\$ 4,175,000
Metropolitan Transportation Authority, Refunding RB, Series C-1, 5.25%, 11/15/56	1,500	1,803,323
Triborough Bridge & Tunnel Authority, RB, General, Series A-2, 5.25%, 11/15/34 (f)	1,300	1,408,550
		17,301,944
Ohio 0.2%		
State of Ohio, RB, Cleveland Clinic Health Obligated Group, Series B, 5.50%, 1/01/34	580	632,386
Pennsylvania 0.3%		
County of Westmoreland Pennsylvania Municipal Authority, RB, (BAM), 5.00%, 8/15/42	900	1,030,635
South Carolina 0.4%		
South Carolina Public Service Authority, Refunding RB, Series A (a)(f):		
5.50%, 1/01/19	102	111,462
5.50%, 1/01/19	1,175	1,288,814
		1,400,276
Texas 0.6%		
Clear Creek Independent School District, GO, Refunding, Schoolbuilding (PSF-GTD):		
5.00%, 2/15/17 (a)	1,812	1,833,386
5.00%, 2/15/33	388	392,948
		2,226,334
Virginia 0.1%		
County of Fairfax Virginia IDA, Refunding RB, Health Care, Inova Health System:		
5.50%, 5/15/19 (a)	122	135,596
5.50%, 5/15/35	227	251,919
		387,515
Washington 2.1%		
Central Puget Sound Regional Transit Authority, RB, Series A (AGM), 5.00%, 11/01/17 (a)	4,004	4,175,327
	Par	
Municipal Bonds Transferred to Tender Option Bond Trusts (e)		
Washington (continued)		
Washington Health Care Facilities Authority, Refunding RB, Seattle Children's Hospital, Series B, 5.00%, 10/01/38	\$ 2,880	\$ 3,584,535
		7,759,862
Wisconsin 1.0%		
Wisconsin Health & Educational Facilities Authority, Refunding RB, Froedtert & Community Health, Inc., Obligated Group:		
Series A, 5.00%, 4/01/42	1,980	2,199,978
Series C, 5.25%, 4/01/39 (f)	1,430	1,531,241
		3,731,219
Total Municipal Bonds Transferred to Tender Option Bond Trusts 33.0%		120,489,383
Total Long-Term Investments (Cost \$517,779,728) 156.2%		571,022,293
Short-Term Securities		
BlackRock Liquidity Funds, MuniCash, Institutional Class, 0.44% (g)(h)	1,191,332	1,191,451
Total Short-Term Securities (Cost \$1,191,332) 0.3%		1,191,451
Total Investments (Cost \$518,971,060) 156.5%		572,213,744
Other Assets Less Liabilities 0.2%		884,759

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

Liability for TOB Trust Certificates, Including Interest		
Expense and Fees Payable (17.8)%		(65,238,623)
VRDP Shares, at Liquidation Value, Net of Deferred Offering Costs (38.9)%		(142,302,234)
Net Assets Applicable to Common Shares 100.0%		\$ 365,557,646

Notes to Schedule of Investments

- (a) U.S. Government securities, held in escrow, are used to pay interest on this security, as well as to retire the bond in full at the date indicated, typically at a premium to par.
- (b) When-issued security.
- (c) Step-up bond that pays an initial coupon rate for the first period and then a higher coupon rate for the following periods. Rate as of period end.
- (d) Zero-coupon bond.
- (e) Represent bonds transferred to a TOB Trust in exchange of cash and residual certificates received by the Fund. These bonds serve as collateral in a secured borrowing. See Note 4 of the Notes to Financial Statements for details.
- (f) All or a portion of security is subject to a recourse agreement. The aggregate maximum potential amount the Fund could ultimately be required to pay under the agreements, which expire between January 1, 2017 to December 1, 2029, is \$12,169,536. See Note 4 of the Notes to Financial Statements for details.
- (g) During the six months ended October 31, 2016, investments in issuers considered to be an affiliate of the Fund for purposes of Section 2(a)(3) of the Investment Company Act of 1940, as amended, were as follows:

Affiliate	Shares Held		Shares Held		Value at October 31, 2016	Income	Realized Gain/Capital Gain
	at April 30, 2016	Net Activity	at October 31, 2016				
BlackRock Liquidity Funds, MuniCash, Institutional Class	2,133,375	(942,043)	1,191,332		\$ 1,191,451	\$ 3,339	\$ 705

- (h) Current yield as of period end.

See Notes to Financial Statements.

Schedule of Investments (continued)

BlackRock MuniEnhanced Fund, Inc. (MEN)

Derivative Financial Instruments Outstanding as of Period End

Futures Contracts

Contracts Short	Issue	Expiration	Notional Value	Unrealized Appreciation
(1)	5-Year U.S. Treasury Note	December 2016	\$ 120,797	\$ 905
(63)	10-Year U.S. Treasury Note	December 2016	\$ 8,166,375	100,150
(68)	Long U.S. Treasury Bond	December 2016	\$ 11,064,875	447,196
(11)	Ultra U.S. Treasury Bond	December 2016	\$ 1,935,312	104,370
Total				\$ 652,621

Derivative Financial Instruments Categorized by Risk Exposure

As of period end, the fair values of derivative financial instruments located in the Statements of Assets and Liabilities were as follows:

Assets	Derivative Financial Instruments	Commodity Contracts	Credit Contracts	Equity Contracts	Foreign Currency Exchange Contracts	Interest Rate Contracts	Other Contracts	Total
Futures contracts	Net unrealized appreciation ¹					\$ 652,621		\$ 652,621

¹ Includes cumulative appreciation (depreciation) on futures contracts, if any, as reported in the Schedule of Investments. Only current day's variation margin is reported within the Statements of Assets and Liabilities.

For the six months ended October 31, 2016, the effect of derivative financial instruments in the Statements of Operations was as follows:

	Commodity Contracts	Credit Contracts	Equity Contracts	Foreign Currency Exchange Contracts	Interest Rate Contracts	Other Contracts	Total
Net Realized Gain (Loss) from:							
Futures contracts					\$ 79,817		\$ 79,817
Net Change in Unrealized Appreciation (Depreciation) on:							
Futures contracts					\$ 541,271		\$ 541,271

Average Quarterly Balances of Outstanding Derivative Financial Instruments

Futures contracts:

Average notional value of contracts short \$ 19,252,883

For more information about the Fund's investment risks regarding derivative financial instruments, refer to the Notes to Financial Statements.

Fair Value Hierarchy as of Period End

Various inputs are used in determining the fair value of investments and derivative financial instruments. For information about the Fund's policy regarding valuation of investments and derivative financial instruments, refer to the Notes to Financial Statements.

The following tables summarize the Fund's investments and derivative financial instruments categorized in the disclosure hierarchy:

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

	Level 1	Level 2	Level 3	Total
Assets:				
Investments:				
Long-Term Investments ¹		\$ 571,022,293		\$ 571,022,293
Short-Term Securities	\$ 1,191,451			1,191,451
Total	\$ 1,191,451	\$ 571,022,293		\$ 572,213,744

Derivative Financial Instruments²

Assets:				
Interest rate contracts	\$ 652,621			\$ 652,621

¹ See above Schedule of Investments for values in each state or political subdivision.

² Derivative financial instruments are futures contracts which are valued at the unrealized appreciation (depreciation) on the instrument.

See Notes to Financial Statements.

Schedule of Investments (concluded)

BlackRock MuniEnhanced Fund, Inc. (MEN)

The Fund may hold assets and/or liabilities in which the fair value approximates the carrying amount for financial statement purposes. As of period end, such assets and/or liabilities are categorized within the disclosure hierarchy as follows:

	Level 1	Level 2	Level 3	Total
Assets:				
Cash pledged for futures contracts	\$ 391,900			\$ 391,900
Liabilities:				
TOB Trust Certificates		\$ (65,110,308)		(65,110,308)
VRDP Shares at Liquidation Value		(142,500,000)		(142,500,000)
Total	\$ 391,900	\$ (207,610,308)		\$ (207,218,408)

During the six months ended October 31, 2016, there were no transfers between levels.

See Notes to Financial Statements.

Schedule of Investments October 31, 2016 (Unaudited)

BlackRock MuniHoldings Fund, Inc. (MHD)

(Percentages shown are based on Net Assets)

	Par	
	(000)	Value
Municipal Bonds		
Alabama 3.8%		
County of Jefferson Alabama, RB, Limited Obligation School, Series A, 5.00%, 1/01/24	\$ 4,550	\$ 4,575,070
County of Jefferson Alabama Sewer, Refunding RB:		
Senior Lien, Series A (AGM), 5.00%, 10/01/44	570	649,612
Senior Lien, Series A (AGM), 5.25%, 10/01/48	1,090	1,253,217
Sub-Lien, Series D, 6.00%, 10/01/42	1,000	1,188,600
Sub-Lien, Series D, 7.00%, 10/01/51	1,545	1,937,554
		9,604,053
Alaska 0.6%		
Northern Tobacco Securitization Corp., Refunding RB, Tobacco Settlement, Asset-Backed, Series A, 5.00%, 6/01/46	1,660	1,567,057
Arizona 2.6%		
City of Phoenix Arizona IDA, RB, Legacy Traditional Schools Projects, Series A, 5.00%, 7/01/46 (a)	1,230	1,258,474
Salt Verde Financial Corp., RB, Senior:		
5.00%, 12/01/32	2,000	2,410,480
5.00%, 12/01/37	2,360	2,829,546
		6,498,500
California 11.6%		
California Health Facilities Financing Authority, RB:		
St. Joseph Health System, Series A, 5.75%, 7/01/39	1,530	1,701,023
Sutter Health, Series B, 6.00%, 8/15/42	2,200	2,566,806
California Health Facilities Financing Authority, Refunding RB, St. Joseph Health System, Series A, 5.00%, 7/01/33		
California Municipal Finance Authority, RB, Senior, Caritas Affordable Housing, Inc. Projects, S/F Housing, Series A:		
5.25%, 8/15/39	105	121,533
5.25%, 8/15/49	265	304,739
California Pollution Control Financing Authority, RB, Poseidon Resources (Channel Side) LP Desalination Project, AMT, 5.00%, 11/21/45 (b)		
	1,025	1,128,535
California Statewide Communities Development Authority, RB, Series A:		
John Muir Health, 5.13%, 7/01/39	1,510	1,648,799
Loma Linda University Medical Center, 5.00%, 12/01/41 (b)	380	422,784
Loma Linda University Medical Center, 5.00%, 12/01/46 (b)	460	507,086
California Statewide Communities Development Authority, Refunding RB, John Muir Health, Series A, 4.00%, 8/15/51		
	1,650	1,704,929
City of Los Angeles California Department of Airports, Refunding ARB, Los Angeles International Airport, Series A, 5.25%, 5/15/39		
	555	610,606
City of Stockton California Public Financing Authority, RB, Delta Water Supply Project, Series A, 6.25%, 10/01/38		
	255	316,896
Montebello Unified School District, GO, CAB (NPFGC), 0.00%, 8/01/22 (c)	2,405	2,131,672
San Diego Unified School District California, GO, CAB, Election of 2008, Series A, 0.00%, 7/01/29 (c)	3,475	2,384,649
State of California, GO, Various Purposes, 6.50%, 4/01/33	8,370	9,453,497
State of California Public Works Board, LRB, Various Capital Projects:		
Series I, 5.00%, 11/01/38	550	648,236
Sub-Series I-1, 6.38%, 11/01/19 (d)	820	950,642
	Par	
	(000)	Value
Municipal Bonds		
California (continued)		
Tobacco Securitization Authority of Southern California, Refunding RB, Tobacco Settlement, Asset-Backed, Senior Series A-1, 4.75%, 6/01/25	\$ 1,400	\$ 1,432,900
		29,046,771
Colorado 2.4%		
	1,455	1,556,835

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

Colorado Educational & Cultural Facilities Authority, RB, Charter School, Colorado Springs, 5.50%, 7/01/40		
County of Adams Colorado, COP, Refunding, 4.00%, 12/01/40	545	587,592
Regional Transportation District, COP, Refunding, Series A, 5.38%, 6/01/31	710	799,247
Regional Transportation District, RB, Denver Transit Partners Eagle P3 Project, 6.00%, 1/15/34	1,425	1,622,078
University of Colorado, RB, Series A, 5.38%, 6/01/19 (d)	1,250	1,388,600
		5,954,352
Connecticut 1.1%		
Connecticut State Health & Educational Facility Authority, Refunding RB, Wesleyan University, Series G, 5.00%, 7/01/20 (d)	2,515	2,863,579
Delaware 1.8%		
County of Sussex Delaware, RB, NRG Energy, Inc., Indian River Power LLC Project, 6.00%, 10/01/40	790	872,026
Delaware Transportation Authority, RB, 5.00%, 6/01/55	840	952,677
State of Delaware EDA, RB, Exempt Facilities, Indian River Power LLC Project, 5.38%, 10/01/45	2,430	2,620,342
		4,445,045
District of Columbia 4.1%		
District of Columbia, Tax Allocation Bonds, City Market at O Street Project, 5.13%, 6/01/41	1,520	1,720,138
Metropolitan Washington Airports Authority, Refunding RB, Dulles Toll Road: 1st Senior Lien, Series A, 5.00%, 10/01/39	505	552,672
1st Senior Lien, Series A, 5.25%, 10/01/44	1,470	1,614,222
CAB, 2nd Senior Lien, Series B (AGC), 0.00%, 10/01/35 (c)	13,485	6,519,728
		10,406,760
Florida 4.9%		
City of Clearwater Florida Water & Sewer Revenue, RB, Series A, 5.25%, 12/01/39	2,375	2,629,956
County of Broward Florida Water & Sewer Utility, Refunding RB, Series A, 5.25%, 10/01/18 (d)	750	811,852
County of Collier Florida Health Facilities Authority, Refunding RB, Series A, 5.00%, 5/01/45	960	1,088,477
County of Miami-Dade Florida Aviation, Refunding ARB, Miami International Airport, Series A-1, 5.38%, 10/01/41	2,620	2,957,535
Mid-Bay Bridge Authority, RB, Springing Lien, Series A, 7.25%, 10/01/21 (d)	2,095	2,687,361
Palm Coast Park Community Development District, Special Assessment Bonds, 5.70%, 5/01/37	590	550,016
Village Community Development District No.10, Special Assessment Bonds, 5.13%, 5/01/43	1,455	1,611,776
		12,336,973
Georgia 1.5%		
County of Gainesville Georgia & Hall Hospital Authority, Refunding RB, Northeast Georgia Health System, Inc. Project, Series A, 5.50%, 8/15/54	370	444,918
DeKalb Private Hospital Authority, Refunding RB, Children's Healthcare, 5.25%, 11/15/39	585	646,618

See Notes to Financial Statements.

Schedule of Investments (continued)

BlackRock MuniHoldings Fund, Inc. (MHD)

	Par	
	(000)	Value
Municipal Bonds		
Georgia (continued)		
Metropolitan Atlanta Rapid Transit Authority, RB, Sales Tax, 3rd Indenture, Series A, 5.00%, 7/01/39	\$ 2,410	\$ 2,643,601
		3,735,137
Hawaii 0.4%		
State of Hawaii Harbor System, RB, Series A, 5.25%, 7/01/30	945	1,057,842
Illinois 15.5%		
City of Chicago Illinois, GARB, O Hare International Airport, 3rd Lien, Series A, 5.75%, 1/01/39	2,000	2,307,000
City of Chicago Illinois, GO, Project, 5.00%, 1/01/34	1,265	1,284,468
City of Chicago Illinois, GO, Refunding, Series A: Project, 5.25%, 1/01/32	2,195	2,285,215
5.00%, 1/01/35	2,000	2,031,160
City of Chicago Illinois, Special Assessment Bonds, Lake Shore East, 6.75%, 12/01/32	897	894,228
City of Chicago Illinois O Hare International Airport, GARB, 3rd Lien, Series C, 6.50%, 1/01/21 (d)	4,055	4,850,875
City of Chicago Illinois Transit Authority, RB, Sales Tax Receipts, 5.25%, 12/01/40	730	805,803
City of Chicago Illinois Waterworks, Refunding RB, 2nd Lien Project, 5.00%, 11/01/42	1,000	1,094,130
County of Cook Illinois Community College District No. 508, GO, City College of Chicago, 5.50%, 12/01/38	560	634,211
Illinois Finance Authority, Refunding RB: Central Dupage Health, Series B, 5.50%, 11/01/39	1,115	1,257,977
Presence Health Network, Series C, 4.00%, 2/15/41	1,035	988,425
Illinois State Toll Highway Authority, RB: Senior, Series C, 5.00%, 1/01/36	1,870	2,153,660
Senior, Series C, 5.00%, 1/01/37	2,000	2,301,820
Series A, 5.00%, 1/01/38	415	473,681
Metropolitan Pier & Exposition Authority, Refunding RB, McCormick Place Expansion Project: CAB, Series B (AGM), 0.00%, 6/15/47 (c)	13,220	3,313,593
Series B (AGM), 5.00%, 6/15/50	3,070	3,269,366
Series B-2, 5.00%, 6/15/50	1,740	1,818,352
Railsplitter Tobacco Settlement Authority, RB: 5.50%, 6/01/23	315	365,186
6.00%, 6/01/28	800	939,400
State of Illinois, GO: 5.00%, 2/01/39	1,100	1,138,445
Series A, 5.00%, 4/01/38	2,625	2,710,654
State of Illinois, RB, Build Illinois, Series B, 5.25%, 6/15/19 (d)	440	488,184
University of Illinois, RB, Auxiliary Facilities System, Series A: 5.00%, 4/01/39	580	647,210
5.00%, 4/01/44	705	783,749
		38,836,792
Indiana 4.3%		
City of Valparaiso Indiana, RB, Exempt Facilities, Pratt Paper LLC Project, AMT: 6.75%, 1/01/34	560	687,596
7.00%, 1/01/44	1,355	1,680,390
Indiana Finance Authority, RB, Series A: CWA Authority Project, 1st Lien, 5.25%, 10/01/38	2,275	2,649,693
Private Activity Bond, Ohio River Bridges East End Crossing Project, AMT, 5.00%, 7/01/44	310	340,904
Private Activity Bond, Ohio River Bridges East End Crossing Project, AMT, 5.00%, 7/01/48	1,030	1,126,233
	Par	
	(000)	Value
Municipal Bonds		
Indiana (continued)		
Indiana Finance Authority, RB, Series A (continued): Private Activity Bond, Ohio River Bridges East End Crossing Project, AMT, 5.25%, 1/01/51	\$ 290	\$ 321,018
Sisters of St. Francis Health Services, 5.25%, 11/01/39	585	644,588
Indiana Finance Authority, Refunding RB, Parkview Health System, Series A, 5.75%, 5/01/31	1,300	1,442,181
Indiana Municipal Power Agency, RB, Series B, 6.00%, 1/01/19 (d)	775	858,018
Indianapolis Local Public Improvement Bond Bank, RB, Series A, 5.00%, 1/15/40	880	1,013,346

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

		10,763,967
Iowa 2.1%		
Iowa Finance Authority, Refunding RB, Midwestern Disaster Area, Iowa Fertilizer Co. Project:		
5.00%, 12/01/19	615	631,826
5.50%, 12/01/22	1,630	1,652,429
5.25%, 12/01/25	320	333,757
Iowa Student Loan Liquidity Corp., Refunding RB, Student Loan, Senior Series A-1, AMT,		
5.15%, 12/01/22	800	849,432
Iowa Tobacco Settlement Authority, Refunding RB, Asset-Backed, Series C, 5.63%, 6/01/46	1,730	1,699,327
		5,166,771
Kansas 0.7%		
Kansas Development Finance Authority, Refunding RB, Adventist Health, Series C, 5.75%, 11/15/38	1,520	1,713,618
Kentucky 0.6%		
Kentucky Economic Development Finance Authority, RB, Catholic Health Initiatives, Series A, 5.25%, 1/01/45	705	785,687
Kentucky Public Transportation Infrastructure Authority, RB, Downtown Crossing Project, Convertible CAB, 1st Tier, Series C, 0.00%, 7/01/43 (e)	865	736,401
		1,522,088
Louisiana 3.4%		
East Baton Rouge Sewerage Commission, RB, Series A, 5.25%, 2/01/19 (d)	570	624,087
Louisiana Local Government Environmental Facilities & Community Development Authority, RB, Westlake Chemical Corp. Project, 6.75%, 11/01/32	3,500	3,676,855
New Orleans Aviation Board, RB, Passenger Facility Charge, Series A, 5.25%, 1/01/41	430	467,277
Tobacco Settlement Financing Corp., Refunding RB, Asset-Backed, Series A:		
5.50%, 5/15/30	700	789,873
5.25%, 5/15/31	600	671,634
5.25%, 5/15/32	765	869,361
5.25%, 5/15/33	830	936,829
5.25%, 5/15/35	350	394,447
		8,430,363
Maine 0.1%		
Maine Health & Higher Educational Facilities Authority, RB, Series A, 5.00%, 7/01/39	210	228,276
Maryland 1.0%		
Maryland EDC, RB, Transportation Facilities Project, Series A, 5.75%, 6/01/35	300	330,396
Maryland EDC, Refunding RB, CNX Marine Terminals, Inc., 5.75%, 9/01/25	530	537,786
Maryland Health & Higher Educational Facilities Authority, Refunding RB, Charlestown Community Project, 6.25%, 1/01/21 (d)	1,520	1,755,235
		2,623,417

See Notes to Financial Statements.

Schedule of Investments (continued)

BlackRock MuniHoldings Fund, Inc. (MHD)

	Par	
	(000)	Value
Municipal Bonds		
Massachusetts 2.1%		
Commonwealth of Massachusetts, GO, Series E, 3.00%, 4/01/44	\$ 2,060	\$ 1,925,667
Massachusetts Development Finance Agency, Refunding RB:		
Boston University, Series P, 5.45%, 5/15/59	1,165	1,439,824
Covanta Energy Project, Series C, AMT, 5.25%, 11/01/42 (b)	1,575	1,593,884
Massachusetts Health & Educational Facilities Authority, Refunding RB, Partners Healthcare System, Series J1, 5.00%, 7/01/39	255	279,225
		5,238,600
Michigan 3.4%		
City of Detroit Michigan Sewage Disposal System, Refunding RB, Senior Lien, Series A, 5.25%, 7/01/39	3,085	3,445,822
Kalamazoo Hospital Finance Authority, Refunding RB, Bronson Methodist Hospital, 5.50%, 5/15/36	955	1,062,409
Michigan Finance Authority, Refunding RB:		
Detroit Water & Sewage Department Project, Senior Lien, Series C-1, 5.00%, 7/01/44	630	692,086
Henry Ford Health System, 4.00%, 11/15/46	1,040	1,047,696
Michigan State Hospital Finance Authority, Refunding RB, Henry Ford Health System, 5.75%, 11/15/19 (d)	2,105	2,399,111
		8,647,124
Minnesota 0.9%		
City of Minneapolis Minnesota, Refunding RB, Fairview Health Services, Series A, 6.75%, 11/15/18 (d)	2,135	2,385,137
Mississippi 0.3%		
University of Southern Mississippi, RB, Campus Facilities Improvements Project, 5.38%, 9/01/19 (d)	675	757,147
Missouri 0.2%		
Bi-State Development Agency of the Missouri-Illinois Metropolitan District, Refunding RB, Combined Lien, Series A, 5.00%, 10/01/44	175	200,162
State of Missouri Health & Educational Facilities Authority, Refunding RB, St. Louis College of Pharmacy Project, 5.50%, 5/01/43	175	194,761
		394,923
Nebraska 0.3%		
Central Plains Energy Project Nebraska, RB, Gas Project No. 3, 5.25%, 9/01/37	575	654,620
New Hampshire 1.4%		
New Hampshire Health & Education Facilities Authority, Refunding RB, Dartmouth-Hitchcock, 6.00%, 8/01/38	3,035	3,408,517
New Jersey 6.6%		
Casino Reinvestment Development Authority, Refunding RB:		
5.25%, 11/01/39	735	757,248
5.25%, 11/01/44	1,095	1,123,755
County of Essex New Jersey Improvement Authority, RB, AMT, 5.25%, 7/01/45 (b)	775	800,614
New Jersey EDA, RB, Continental Airlines, Inc. Project, AMT:		
5.13%, 9/15/23	1,410	1,568,724
5.25%, 9/15/29	1,365	1,517,661
New Jersey EDA, Refunding, Special Assessment Bonds, Kapkowski Road Landfill Project, 5.75%, 4/01/31	1,550	1,799,379
New Jersey State Turnpike Authority, RB:		
Series A, 5.00%, 1/01/43	1,925	2,193,018
Series E, 5.00%, 1/01/45	1,875	2,163,844
	Par	
	(000)	Value
Municipal Bonds		
New Jersey (continued)		
New Jersey Transportation Trust Fund Authority, RB:		
Transportation Program, Series AA, 5.00%, 6/15/44	\$ 895	\$ 964,846
Transportation System, Series A, 5.50%, 6/15/41	1,575	1,735,839
Transportation System, Series B, 5.25%, 6/15/36	1,705	1,868,595
		16,493,523
New York 7.9%		

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

City of New York New York Transitional Finance Authority, RB, Fiscal 2012, Sub-Series E-1, 5.00%, 2/01/42	310	356,788
Counties of New York Tobacco Trust IV, Refunding RB, Settlement Pass-Through Turbo, Series A, 6.25%, 6/01/41 (b)	1,300	1,364,285
County of Dutchess New York Industrial Development Agency, Refunding RB, Bard College Civic Facility, Series A-1, 5.00%, 8/01/46	1,800	1,661,382
County of Westchester New York Healthcare Corp., RB, Senior Lien, Series A, 5.00%, 11/01/44	237	265,105
Erie Tobacco Asset Securitization Corp., Refunding RB, Asset-Backed, Series A, 5.00%, 6/01/45	1,405	1,403,876
Long Island Power Authority, Refunding RB, Electric System, Series A, 5.75%, 4/01/39	1,450	1,589,084
Metropolitan Transportation Authority, RB, Series B, 5.25%, 11/15/38	1,715	2,047,607
Metropolitan Transportation Authority, Refunding RB, Dedicated Tax Fund, Series B, 5.00%, 11/15/34	1,740	1,940,048
Metropolitan Transportation Authority Hudson Rail Yards Trust Obligations, Refunding RB, Series A, 5.00%, 11/15/56	765	864,396
New York Liberty Development Corp., Refunding RB:		
2nd Priority, Bank of America Tower at One Bryant Park Project, Class 3, 6.38%, 7/15/49	850	949,425
3 World Trade Center Project, Class 1, 5.00%, 11/15/44 (b)	2,275	2,559,102
3 World Trade Center Project, Class 2, 5.15%, 11/15/34 (b)	245	278,531
3 World Trade Center Project, Class 2, 5.38%, 11/15/40 (b)	605	698,866
Port Authority of New York & New Jersey, ARB, Special Project, JFK International Air Terminal LLC Project, Series 8:		
6.00%, 12/01/36	900	1,045,377
6.00%, 12/01/42	875	1,013,617
Westchester Tobacco Asset Securitization, Refunding RB, 5.13%, 6/01/45	1,700	1,700,000
		19,737,489
North Carolina 0.6%		
North Carolina Medical Care Commission, RB, Health Care Facilities, Duke University Health System, Series A, 5.00%, 6/01/19 (d)	970	1,067,999
North Carolina Medical Care Commission, Refunding RB, 1st Mortgage, Retirement Facilities Whitestone Project, Series A, 7.75%, 3/01/41	415	472,693
		1,540,692
Ohio 0.5%		
County of Franklin Ohio, RB, Health Care Facilities Improvement, OPRS Communities Obligation Group, Series A, 6.13%, 7/01/40	470	534,705
State of Ohio, RB, Portsmouth Bypass Project, AMT, 5.00%, 6/30/53	580	635,442
		1,170,147

See Notes to Financial Statements.

Schedule of Investments (continued)

BlackRock MuniHoldings Fund, Inc. (MHD)

	Par	
	(000)	Value
Municipal Bonds		
Oklahoma 0.4%		
County of Epworth Oklahoma Finance Authority, Refunding RB, Epworth Villa Project, Series A, 5.13%, 4/01/42	\$ 975	\$ 1,009,651
Pennsylvania 3.1%		
City of Philadelphia Pennsylvania Hospitals & Higher Education Facilities Authority, RB, Temple University Health System, Series A, 5.63%, 7/01/42	460	508,111
Pennsylvania Economic Development Financing Authority, RB:		
American Water Co. Project, 6.20%, 4/01/39	2,520	2,795,587
Pennsylvania Bridge Finco LP, AMT, 5.00%, 6/30/42	2,015	2,229,618
Pennsylvania Economic Development Financing Authority, Refunding RB, National Gypsum Co., AMT, 5.50%, 11/01/44	1,105	1,214,351
Pennsylvania Turnpike Commission, RB, Series A, 5.00%, 12/01/44	795	913,280
		7,660,947
Rhode Island 2.1%		
Tobacco Settlement Financing Corp., Refunding RB:		
Series A, 5.00%, 6/01/35	580	628,343
Series B, 4.50%, 6/01/45	1,900	1,968,381
Series B, 5.00%, 6/01/50	2,605	2,704,303
		5,301,027
South Carolina 3.6%		
State of South Carolina Ports Authority, RB:		
5.25%, 7/01/40	2,285	2,548,392
AMT, 5.25%, 7/01/55	925	1,044,843
State of South Carolina Public Service Authority, RB, Santee Cooper, Series A, 5.50%, 12/01/54	2,385	2,809,673
State of South Carolina Public Service Authority, Refunding RB, Series E, 5.25%, 12/01/55	2,260	2,663,591
		9,066,499
Tennessee 0.9%		
City of Chattanooga Tennessee Health Educational & Housing Facility Board, RB, Catholic Health Initiatives, Series A, 5.25%, 1/01/45		
	980	1,092,161
County of Hardeman Tennessee Correctional Facilities Corp., RB, 7.75%, 8/01/17	525	524,963
Metropolitan Government Nashville & Davidson County Health & Educational Facilities Board, RB, Vanderbilt University Medical Center, Series A, 5.00%, 7/01/46	495	571,230
		2,188,354
Texas 6.0%		
Central Texas Regional Mobility Authority, Refunding RB:		
Senior Lien, 6.25%, 1/01/21 (d)	1,480	1,779,493
Sub-Lien, 5.00%, 1/01/33	250	277,205
Central Texas Turnpike System, Refunding RB, Series C, 5.00%, 8/15/42	425	481,109
City of Austin Texas Airport System, ARB, Revenue, AMT, 5.00%, 11/15/39	440	497,072
City of Austin Texas Electric Utility Revenue, Refunding RB, Series A, 5.00%, 11/15/37	1,500	1,708,065
City of Dallas Texas Waterworks & Sewer System Revenue, Refunding RB:		
5.00%, 10/01/20 (d)	485	557,207
5.00%, 10/01/35	565	642,885
City of Houston Texas Airport System, Refunding ARB, Senior Lien, Series A, 5.50%, 7/01/39	1,070	1,146,601
County of Harris Texas Cultural Education Facilities Finance Corp., RB, 1st Mortgage, Brazos Presbyterian Homes, Inc. Project, Series B, 7.00%, 1/01/48	325	426,585
	Par	
	(000)	Value
Municipal Bonds		
Texas (continued)		
County of Harris Texas Health Facilities Development Corp., Refunding RB, Memorial Hermann Healthcare System, Series B, 7.25%, 12/01/18 (d)	\$ 1,910	\$ 2,159,465
La Vernia Higher Education Finance Corp., RB, Kipp, Inc., Series A, 6.38%, 8/15/19 (d)	450	515,079
North Texas Tollway Authority, RB, CAB, Special Project System, Series B, 0.00%, 9/01/37 (c)	1,400	615,874
Texas Private Activity Bond Surface Transportation Corp., RB, Senior Lien:		

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

LBJ Infrastructure Group LLC, 7.00%, 6/30/40	2,000	2,359,540
NTE Mobility Partners LLC, North Tarrant Express Managed Lanes Project, 6.88%, 12/31/39	1,700	1,975,196
		15,141,376
Vermont 0.0%		
Vermont Educational & Health Buildings Financing Agency, RB, Developmental & Mental Health, Series A, 6.00%, 6/15/17	10	9,952
Virginia 2.4%		
County of Fairfax Virginia EDA, Refunding RB, Goodwin House, Inc., 5.13%, 10/01/17 (d)	1,000	1,040,070
County of Hanover Virginia EDA, Refunding RB, Covenant Woods, Series A: 5.00%, 7/01/42	625	660,269
Residential Care Facility, 5.00%, 7/01/47	970	1,020,120
Virginia Small Business Financing Authority, RB, Senior Lien, Elizabeth River Crossings OpCo LLC Project, AMT: 5.25%, 1/01/32	550	617,985
6.00%, 1/01/37	2,230	2,596,099
		5,934,543
Washington 2.4%		
County of Grant Washington Public Utility District No 2, Refunding RB, Series A: 5.00%, 1/01/41	1,355	1,575,445
5.00%, 1/01/43	1,555	1,806,630
Port of Seattle Washington, RB, Series C, AMT, 5.00%, 4/01/40	540	612,738
Washington Health Care Facilities Authority, RB, Catholic Health Initiatives, Series A, 5.75%, 1/01/45	1,625	1,906,759
		5,901,572
Wisconsin 3.5%		
State of Wisconsin, Refunding RB, Series A, 6.00%, 5/01/36	4,980	5,553,098
State of Wisconsin Health & Educational Facilities Authority, RB, Ascension Health Senior Credit Group, Series E, 5.00%, 11/15/33	1,710	1,895,826
Wisconsin Health & Educational Facilities Authority, Refunding RB, Medical College of Wisconsin, Inc., 4.00%, 12/01/46	1,305	1,373,173
		8,822,097
Wyoming 0.1%		
Wyoming Municipal Power Agency, Inc., RB, Series A, 5.00%, 1/01/42	210	224,165
Total Municipal Bonds 111.2%		278,489,463
Municipal Bonds Transferred to Tender Option Bond Trusts (f)		
Alabama 0.5%		
Auburn University, Refunding RB, Series A, 4.00%, 6/01/41	1,220	1,314,611

See Notes to Financial Statements.

Schedule of Investments (continued)

BlackRock MuniHoldings Fund, Inc. (MHD)

	Par	
	(000)	Value
Municipal Bonds Transferred to Tender Option Bond Trusts (f)		
California 7.6%		
Bay Area Toll Authority, Refunding RB, San Francisco Bay Area, Series F-1, 5.63%, 4/01/19 (d)	\$ 2,270	\$ 2,525,439
California Educational Facilities Authority, RB, University of Southern California, Series B, 5.25%, 10/01/18 (d)(g)	1,845	1,999,740
City & County of San Francisco California Public Utilities Commission, RB, Water Revenue, Series B, 5.00%, 11/01/19 (d)	6,600	7,381,704
City of Los Angeles California Department of Airports, Refunding ARB, Los Angeles International Airport, Senior Series A, 5.00%, 5/15/40	4,121	4,635,935
Los Angeles Community College District California, GO, Election of 2001, Series A (AGM), 5.00%, 8/01/17 (d)	1,620	1,672,504
San Diego Community College District California, GO, Election of 2002, 5.25%, 8/01/19 (d)	748	834,913
		19,050,235
Colorado 3.6%		
Colorado Health Facilities Authority, RB, Catholic Health (AGM) (d):		
Series C-3, 5.10%, 4/29/18	2,580	2,743,314
Series C-7, 5.00%, 5/01/18	1,650	1,752,366
Colorado Health Facilities Authority, Refunding RB, Catholic Health Initiatives, Series A, 5.50%, 7/01/34 (g)	1,490	1,641,429
County of Adams Colorado, COP, Refunding, 4.00%, 12/01/45	2,700	2,877,822
		9,014,931
Connecticut 2.6%		
Connecticut State Health & Educational Facility Authority, RB, Yale University:		
Series T-1, 4.70%, 7/01/29	3,179	3,259,859
Series X-3, 4.85%, 7/01/37	3,262	3,346,494
		6,606,353
Florida 1.8%		
County of Miami-Dade Florida, RB, Water & Sewer System, 5.00%, 10/01/34	3,939	4,445,474
Georgia 1.0%		
Private Colleges & Universities Authority, Refunding RB, Emory University, Series C, 5.00%, 9/01/18 (d)	2,259	2,429,117
Massachusetts 2.1%		
Massachusetts School Building Authority, RB, Senior, Series B, 5.00%, 10/15/41	4,502	5,234,511
Nebraska 1.3%		
County of Sarpy Hospital Authority No. 1, Refunding RB, Nebraska Medicine, 4.00%, 5/15/51	3,106	3,217,863
New Hampshire 0.6%		
New Hampshire Health & Education Facilities Authority, RB, Dartmouth College, 5.25%, 6/01/19 (d)(g)	1,410	1,562,221
New York 9.0%		
City of New York New York Municipal Water Finance Authority, Refunding RB, Water & Sewer System, 2nd General Resolution, Series FF-2, 5.50%, 6/15/40		
	1,110	1,234,165
Hudson Yards Infrastructure Corp., RB, Fiscal 2012, Series A, 5.75%, 2/15/47 (g)	1,110	1,296,799
Metropolitan Transportation Authority, Refunding RB, Series C-1, 5.25%, 11/15/56	3,240	3,895,177
New York Liberty Development Corp., RB, 1 World Trade Center Port Authority Consolidated Bonds, 5.25%, 12/15/43	7,440	8,682,296
New York Liberty Development Corp., Refunding RB, 4 World Trade Center Project, 5.75%, 11/15/51 (g)	4,460	5,232,425
	Par	
Municipal Bonds Transferred to Tender Option Bond Trusts (f)		
New York (continued)		
Port Authority of New York & New Jersey, Refunding ARB, 194th Series, 5.25%, 10/15/55	\$ 1,860	\$ 2,226,699
		22,567,561
North Carolina 1.3%		
North Carolina Capital Facilities Finance Agency, Refunding RB:		
Duke University Project, Series B, 5.00%, 10/01/55	1,830	2,145,693
Wake Forest University, 5.00%, 1/01/19 (d)	1,080	1,173,323

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

		3,319,016
Ohio 4.2%		
State of Ohio, Refunding RB, Cleveland Clinic Health System Obligated Group, Series A, 5.50%, 1/01/39	9,644	10,503,688
Texas 6.0%		
City of San Antonio Texas Public Service Board, RB, Electric & Gas Systems, Junior Lien, 5.00%, 2/01/43	1,720	1,987,770
County of Harris Texas, Refunding RB, Toll Road, Senior Lien, Series A (g):		
5.00%, 8/15/19 (d)	2,620	2,867,817
5.00%, 8/15/38	2,004	2,193,632
County of Harris Texas Metropolitan Transit Authority, Refunding RB, Series A, 5.00%, 11/01/41	2,350	2,707,623
University of Texas, Refunding RB, Financing System, Series B, 5.00%, 8/15/43	2,041	2,403,316
University of Texas, Permanent University Fund, Refunding RB, Series B, 4.00%, 7/01/41	2,720	2,956,205
		15,116,363
Utah 1.1%		
City of Riverton Utah, RB, IHC Health Services, Inc., 5.00%, 8/15/41	2,519	2,722,555
Virginia 2.5%		
University of Virginia, Refunding RB, GO, 5.00%, 6/01/40	3,749	3,986,430
Virginia Small Business Financing Authority, Refunding RB, Sentara Healthcare, 5.00%, 11/01/40	2,095	2,318,689
		6,305,119
Washington 0.8%		
Central Puget Sound Regional Transit Authority, RB, Series A (AGM), 5.00%, 11/01/17 (d)	1,860	1,939,103
Wisconsin 1.7%		
Wisconsin Health & Educational Facilities Authority, Refunding RB, Froedtert & Community Health, Inc., Obligated Group, Series C, 5.25%, 4/01/39 (g)	3,959	4,240,360
Total Municipal Bonds Transferred to Tender Option Bond Trusts 47.7%		119,589,081
Total Long-Term Investments (Cost \$358,940,950) 158.9%		398,078,544

See Notes to Financial Statements.

Schedule of Investments (continued)

BlackRock MuniHoldings Fund, Inc. (MHD)

Short-Term Securities	Shares	Value
BlackRock Liquidity Funds, MuniCash, Institutional Class, 0.44% (h)(i)	864,675	\$ 864,761
Total Short-Term Securities		864,761
(Cost \$864,675) 0.3%		398,943,305
Total Investments (Cost \$359,805,625) 159.2%		3,148,310
Other Assets Less Liabilities 1.2%		(67,863,606)
Liability for TOB Trust Certificates, Including Interest Expense and Fees Payable (27.0)%		(83,700,000)
VMTP Shares, at Liquidation Value (33.4)%		
Net Assets Applicable to Common Shares 100.0%		\$ 250,528,009

Notes to Schedule of Investments

- (a) When-issued security.
- (b) Security exempt from registration pursuant to Rule 144A under the Securities Act of 1933, as amended. These securities may be resold in transactions exempt from registration to qualified institutional investors.
- (c) Zero-coupon bond.
- (d) U.S. Government securities, held in escrow, are used to pay interest on this security, as well as to retire the bond in full at the date indicated, typically at a premium to par.
- (e) Step-up bond that pays an initial coupon rate for the first period and then a higher coupon rate for the following periods. Rate as of period end.
- (f) Represent bonds transferred to a TOB Trust in exchange of cash and residual certificates received by the Fund. These bonds serve as collateral in a secured borrowing. See Note 4 of the Notes to Financial Statements for details.
- (g) All or a portion of security is subject to a recourse agreement. The aggregate maximum potential amount the Fund could ultimately be required to pay under the agreements, which expire between April 1, 2017 to February 15, 2031, is \$11,675,108. See Note 4 of the Notes to Financial Statements for details.
- (h) During the six months ended October 31, 2016, investments in issuers considered to be an affiliate of the Fund for purposes of Section 2(a)(3) of the Investment Company Act of 1940, as amended, were as follows:

Affiliate	Shares Held at April 30,		Shares Held at October 31, 2016	Value at October 31, 2016	Income	Realized Gain/Capital Gain
	2016	Net Activity				
BlackRock Liquidity Funds, MuniCash, Institutional Class	1,575,949	(711,274)	864,675	\$ 864,761	\$ 2,798	\$ 609

- (i) Current yield as of period end.

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

Derivative Financial Instruments Outstanding as of Period End

Futures Contracts

Contracts	Issue	Expiration	Notional Value	Unrealized Appreciation
Short				
(7)	5-Year U.S. Treasury Note	December 2016	\$ 845,578	\$ 6,260
(27)	10-Year U.S. Treasury Note	December 2016	\$ 3,499,875	49,227
(30)	Long U.S. Treasury Bond	December 2016	\$ 4,881,563	183,866
(10)	Ultra U.S. Treasury Bond	December 2016	\$ 1,759,375	92,505
Total				\$ 331,858

Derivative Financial Instruments Outstanding as of Period End

As of period end, the fair values of derivative financial instruments located in the Statements of Assets and Liabilities were as follows:

Assets	Derivative Financial Instruments	Commodity Contracts	Credit Contracts	Equity Contracts	Foreign Currency Exchange Contracts	Interest Rate Contracts	Other Contracts	Total
Futures contracts	Net unrealized appreciation ¹					\$ 331,858		\$ 331,858

¹ Includes cumulative appreciation (depreciation) on futures contracts, if any, as reported in the Schedule of Investments. Only current day's variation margin is reported within the Statements of Assets and Liabilities.

See Notes to Financial Statements.

Schedule of Investments (concluded)

BlackRock MuniHoldings Fund, Inc. (MHD)

For the six months ended October 31, 2016, the effect of derivative financial instruments in the Statements of Operations was as follows:

	Commodity Contracts	Credit Contracts	Equity Contracts	Foreign Currency Exchange Contracts	Interest Rate Contracts	Other Contracts	Total
Net Realized Gain (Loss) from:							
Futures contracts					\$ 315,342		\$ 315,342
Net Change in Unrealized Appreciation (Depreciation) on:							
Futures contracts					\$ 204,630		\$ 204,630

Average Quarterly Balances of Outstanding Derivative Financial Instruments

Futures contracts:

Average notional value of contracts short \$ 11,001,883

For more information about the Fund's investment risks regarding derivative financial instruments, refer to the Notes to Financial Statements.

Fair Value Hierarchy as of Period End

Various inputs are used in determining the fair value of investments and derivative financial instruments. For information about the Fund's policy regarding valuation of investments and derivative financial instruments, refer to the Notes to Financial Statements.

The following tables summarize the Fund's investments and derivative financial instruments categorized in the disclosure hierarchy:

	Level 1	Level 2	Level 3	Total
Assets:				
Investments:				
Long-Term Investments		\$ 398,078,544		\$ 398,078,544
Short-Term Securities	\$ 864,761			864,761
Total	\$ 864,761	\$ 398,078,544		\$ 398,943,305

Derivative Financial Instruments²

Assets:

Interest rate contracts \$ 331,858 \$ 331,858

¹ See above Schedule of Investments for values in each state.

² Derivative financial instruments are futures contracts which are valued at the unrealized appreciation (depreciation) on the instrument.

The Fund may hold assets and/or liabilities in which the fair value approximates the carrying amount for financial statement purposes. As of period end, such assets and/or liabilities are categorized within the disclosure hierarchy as follows:

	Level 1	Level 2	Level 3	Total
Assets:				
Cash pledged for futures contracts	\$ 201,550			\$ 201,550
Liabilities:				
TOB Trust Certificates		\$ (67,744,850)		(67,744,850)
VMTP Shares at Liquidation Value		(83,700,000)		(83,700,000)
Total	\$ 201,550	\$ (151,444,850)		\$ (151,243,300)

During the six months ended October 31, 2016, there were no transfers between levels.

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

See Notes to Financial Statements.

42

SEMI-ANNUAL REPORT

OCTOBER 31, 2016

Schedule of Investments October 31, 2016 (Unaudited)

BlackRock MuniHoldings Fund II, Inc. (MUH)

(Percentages shown are based on Net Assets)

	Par	
	(000)	Value
Municipal Bonds		
Alabama 3.1%		
County of Jefferson Alabama, RB, Limited Obligation School, Series A, 5.00%, 1/01/24	\$ 3,450	\$ 3,469,009
County of Jefferson Alabama Sewer, Refunding RB, Sub-Lien, Series D, 6.00%, 10/01/42	1,875	2,228,625
		5,697,634
Alaska 0.8%		
Northern Tobacco Securitization Corp., Refunding RB, Tobacco Settlement, Asset-Backed, Series A, 5.00%, 6/01/46	1,660	1,567,057
Arizona 1.0%		
City of Phoenix Arizona IDA, RB, Legacy Traditional Schools Projects, Series A, 5.00%, 7/01/46	890	910,603
Salt Verde Financial Corp., RB, Senior, 5.00%, 12/01/37	810	971,158
		1,881,761
California 14.2%		
Benicia Unified School District, GO, CAB, Series A (NPFGC), 0.00%, 8/01/20 (a)	2,000	1,885,680
California Health Facilities Financing Authority, RB:		
St. Joseph Health System, Series A, 5.75%, 7/01/39	1,110	1,234,076
Sutter Health, Series B, 6.00%, 8/15/42	1,585	1,849,267
California Health Facilities Financing Authority, Refunding RB, St. Joseph Health System, Series A, 5.00%, 7/01/33	445	514,389
California Municipal Finance Authority, RB, Senior, Caritas Affordable Housing, Inc. Projects, S/F Housing, Series A:		
5.25%, 8/15/39	80	92,597
5.25%, 8/15/49	195	224,242
California Pollution Control Financing Authority, RB, Poseidon Resources (Channel Side) LP Desalination Project, AMT, 5.00%, 11/21/45 (b)	730	803,737
California Statewide Communities Development Authority, RB, Series A:		
John Muir Health, 5.13%, 7/01/39	1,090	1,190,193
Loma Linda University Medical Center, 5.00%, 12/01/41 (b)	275	305,962
Loma Linda University Medical Center, 5.00%, 12/01/46 (b)	335	369,291
California Statewide Communities Development Authority, Refunding RB, John Muir Health, Series A, 4.00%, 8/15/51	1,195	1,234,782
City of Los Angeles California Department of Airports, Refunding ARB, Los Angeles International Airport, Series A, 5.25%, 5/15/39	400	440,076
City of Stockton California Public Financing Authority, RB, Delta Water Supply Project, Series A, 6.25%, 10/01/38	185	229,905
San Diego Unified School District California, GO, CAB, Election of 2008, Series A, 0.00%, 7/01/29 (a)	2,525	1,732,731
San Marino Unified School District, GO, Series A (NPFGC), 0.00%, 7/01/19 (a)	2,070	1,998,626
State of California, GO, Various Purposes:		
6.00%, 3/01/33	1,265	1,468,298
6.50%, 4/01/33	7,325	8,273,221
State of California Public Works Board, LRB, Various Capital Projects:		
Series I, 5.00%, 11/01/38	405	477,337
Sub-Series I-1, 6.38%, 11/01/19 (c)	600	695,592
Tobacco Securitization Authority of Southern California, Refunding RB, Tobacco Settlement, Asset-Backed, Senior Series A-1, 4.75%, 6/01/25	1,045	1,069,557
		26,089,559
	Par	
	(000)	Value
Municipal Bonds		
Colorado 1.7%		
Colorado Educational & Cultural Facilities Authority, RB, Charter School, Colorado Springs, 5.50%, 7/01/40	\$ 1,055	\$ 1,128,839
County of Adams Colorado, COP, Refunding, 4.00%, 12/01/40	400	431,260
Regional Transportation District, COP, Refunding, Series A, 5.38%, 6/01/31	510	574,107
University of Colorado, RB, Series A, 5.38%, 6/01/19 (c)	920	1,022,010

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

		3,156,216
Delaware 1.9%		
County of Sussex Delaware, RB, NRG Energy, Inc., Indian River Power LLC Project, 6.00%, 10/01/40	570	629,183
Delaware Transportation Authority, RB, 5.00%, 6/01/55	605	686,155
State of Delaware EDA, RB, Exempt Facilities, Indian River Power LLC Project, 5.38%, 10/01/45	2,050	2,210,576
		3,525,914
District of Columbia 3.6%		
Metropolitan Washington Airports Authority, Refunding RB, Dulles Toll Road:		
1st Senior Lien, Series A, 5.00%, 10/01/39	255	279,072
1st Senior Lien, Series A, 5.25%, 10/01/44	1,000	1,098,110
CAB, 2nd Senior Lien, Series B (AGC), 0.00%, 10/01/34 (a)	10,170	5,200,023
		6,577,205
Florida 3.8%		
City of Clearwater Florida Water & Sewer Revenue, RB, Series A, 5.25%, 12/01/39	1,725	1,910,179
County of Broward Florida Water & Sewer Utility, Refunding RB, Series A, 5.25%, 10/01/18 (c)	545	589,946
County of Collier Florida Health Facilities Authority, Refunding RB, Series A, 5.00%, 5/01/45	700	793,681
Mid-Bay Bridge Authority, RB, Springing Lien, Series A, 7.25%, 10/01/21 (c)	1,525	1,956,194
Palm Coast Park Community Development District, Special Assessment Bonds, 5.70%, 5/01/37	450	419,504
Village Community Development District No.10, Special Assessment Bonds, 5.13%, 5/01/43	1,170	1,296,067
		6,965,571
Georgia 0.9%		
County of Gainesville Georgia & Hall Hospital Authority, Refunding RB, Northeast Georgia Health System, Inc. Project, Series A, 5.50%, 8/15/54	270	324,670
DeKalb Private Hospital Authority, Refunding RB, Children's Healthcare, 5.25%, 11/15/39	420	464,238
Metropolitan Atlanta Rapid Transit Authority, RB, Sales Tax, 3rd Indenture, Series A, 5.00%, 7/01/39	740	811,728
		1,600,636
Hawaii 0.4%		
State of Hawaii Harbor System, RB, Series A, 5.25%, 7/01/30	680	761,199
Idaho 1.1%		
County of Power Idaho Industrial Development Corp., RB, FMC Corp. Project, AMT, 6.45%, 8/01/32	2,000	2,004,280
Illinois 16.5%		
City of Chicago Illinois, GARB, O'Hare International Airport, 3rd Lien, Series A, 5.75%, 1/01/39	2,500	2,883,750
City of Chicago Illinois, GO, Project, Series A, 5.00%, 1/01/34	915	929,082
City of Chicago Illinois, GO, Refunding, Project, Series A, 5.25%, 1/01/32	2,290	2,384,119

See Notes to Financial Statements.

Schedule of Investments (continued)

BlackRock MuniHoldings Fund II, Inc. (MUH)

	Par	
	(000)	Value
Municipal Bonds		
Illinois (continued)		
City of Chicago Illinois, Special Assessment Bonds, Lake Shore East, 6.75%, 12/01/32	\$ 598	\$ 596,152
City of Chicago Illinois O Hare International Airport, GARB, 3rd Lien, Series C, 6.50%, 1/01/41	2,935	3,511,052
City of Chicago Illinois Transit Authority, RB, Sales Tax Receipts, 5.25%, 12/01/40	530	585,035
City of Chicago Illinois Waterworks, Refunding RB, 2nd Lien Project, 5.00%, 11/01/42	1,845	2,018,670
County of Cook Illinois Community College District No. 508, GO, City College of Chicago, 5.50%, 12/01/38	410	464,333
Illinois Finance Authority, Refunding RB:		
Central Dupage Health, Series B, 5.50%, 11/01/39	800	902,584
Presence Health Network, Series C, 4.00%, 2/15/41	745	711,475
Illinois State Toll Highway Authority, RB:		
Senior, Series C, 5.00%, 1/01/36	1,355	1,560,540
Senior, Series C, 5.00%, 1/01/37	1,450	1,668,819
Series A, 5.00%, 1/01/38	915	1,044,381
Metropolitan Pier & Exposition Authority, Refunding RB, McCormick Place Expansion Project:		
CAB, Series B (AGM), 0.00%, 6/15/47 (a)	9,555	2,394,961
Series B (AGM), 5.00%, 6/15/50	2,230	2,374,816
Series B-2, 5.00%, 6/15/50	1,260	1,316,738
Railsplitter Tobacco Settlement Authority, RB:		
5.50%, 6/01/23	230	266,644
6.00%, 6/01/28	500	587,125
State of Illinois, GO:		
5.00%, 2/01/39	810	838,309
Series A, 5.00%, 4/01/38	1,920	1,982,650
State of Illinois, RB, Build Illinois, Series B, 5.25%, 6/15/19 (c)	315	349,496
University of Illinois, RB, Auxiliary Facilities System, Series A:		
5.00%, 4/01/39	425	474,249
5.00%, 4/01/44	520	578,084
		30,423,064
Indiana 4.7%		
City of Valparaiso Indiana, RB, Exempt Facilities, Pratt Paper LLC Project, AMT:		
6.75%, 1/01/34	415	509,558
7.00%, 1/01/44	1,000	1,240,140
Indiana Finance Authority, RB, Series A:		
CWA Authority Project, 1st Lien, 5.25%, 10/01/38	1,660	1,933,402
Private Activity Bond, Ohio River Bridges East End Crossing Project, AMT, 5.00%, 7/01/44	225	247,430
Private Activity Bond, Ohio River Bridges East End Crossing Project, AMT, 5.00%, 7/01/48	740	809,138
Private Activity Bond, Ohio River Bridges East End Crossing Project, AMT, 5.25%, 1/01/51	210	232,462
Sisters of St. Francis Health Services, 5.25%, 11/01/39	420	462,781
Indiana Finance Authority, Refunding RB, Parkview Health System, Series A, 5.75%, 5/01/31	1,660	1,841,554
Indiana Municipal Power Agency, RB, Series B, 6.00%, 1/01/19 (c)	565	625,523
Indianapolis Local Public Improvement Bond Bank, RB, Series A, 5.00%, 1/15/40	640	736,979
		8,638,967
Iowa 1.5%		
Iowa Finance Authority, Refunding RB, Midwestern Disaster Area, Iowa Fertilizer Co. Project:		
5.00%, 12/01/19	450	462,312
5.25%, 12/01/25	230	239,887
	Par	
	(000)	Value
Municipal Bonds		
Iowa (continued)		
Iowa Student Loan Liquidity Corp., Refunding RB, Student Loan, Senior Series A-1, AMT, 5.15%, 12/01/22	\$ 710	\$ 753,871
Iowa Tobacco Settlement Authority, Refunding RB, Asset-Backed, Series C, 5.63%, 6/01/46	1,270	1,247,483
		2,703,553
Kansas 0.7%		

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

Kansas Development Finance Authority, Refunding RB, Adventist Health, Series C, 5.75%, 11/15/38	1,105	1,245,755
Kentucky 0.6%		
Kentucky Economic Development Finance Authority, RB, Catholic Health Initiatives, Series A, 5.25%, 1/01/45	520	579,514
Kentucky Public Transportation Infrastructure Authority, RB, Downtown Crossing Project, Convertible CAB, 1st Tier, Series C, 0.00%, 7/01/43 (d)	635	540,595
		1,120,109
Louisiana 3.3%		
East Baton Rouge Sewerage Commission, RB, Series A, 5.25%, 2/01/19 (c)	420	459,854
Louisiana Local Government Environmental Facilities & Community Development Authority, RB, Westlake Chemical Corp. Project, 6.75%, 11/01/32	2,500	2,626,325
New Orleans Aviation Board, RB, Passenger Facility Charge, Series A, 5.25%, 1/01/41	310	336,874
Tobacco Settlement Financing Corp., Refunding RB, Asset-Backed, Series A:		
5.50%, 5/15/30	510	575,479
5.25%, 5/15/31	435	486,935
5.25%, 5/15/32	555	630,713
5.25%, 5/15/33	600	677,226
5.25%, 5/15/35	255	287,382
		6,080,788
Maine 0.1%		
Maine Health & Higher Educational Facilities Authority, RB, Series A, 5.00%, 7/01/39	150	163,055
Maryland 1.0%		
Maryland EDC, RB, Transportation Facilities Project, Series A, 5.75%, 6/01/35	220	242,291
Maryland EDC, Refunding RB, CNX Marine Terminals, Inc., 5.75%, 9/01/25	390	395,729
Maryland Health & Higher Educational Facilities Authority, Refunding RB, Charlestown Community Project, 6.25%, 1/01/21 (c)	1,095	1,264,462
		1,902,482
Massachusetts 2.7%		
Commonwealth of Massachusetts, GO, Series E, 3.00%, 4/01/44	1,505	1,406,859
Massachusetts Development Finance Agency, Refunding RB:		
Boston University, Series P, 5.45%, 5/15/59	845	1,044,336
Covanta Energy Project, Series C, AMT, 5.25%, 11/01/42 (b)	1,155	1,168,848
Massachusetts Health & Educational Facilities Authority, Refunding RB, Partners Healthcare System, Series J1, 5.00%, 7/01/39	360	394,200
Massachusetts HFA, Refunding RB, Series F, AMT, 5.70%, 6/01/40	950	989,862
		5,004,105
Michigan 3.4%		
City of Detroit Michigan Sewage Disposal System, Refunding RB, Senior Lien, Series A, 5.25%, 7/01/39	2,235	2,496,406

See Notes to Financial Statements.

Schedule of Investments (continued)

BlackRock MuniHoldings Fund II, Inc. (MUH)

	Par	
	(000)	Value
Municipal Bonds		
Michigan (continued)		
Kalamazoo Hospital Finance Authority, Refunding RB, Bronson Methodist Hospital, 5.50%, 5/15/36	\$ 690	\$ 767,604
Michigan Finance Authority, Refunding RB:		
Detroit Water & Sewage Department Project, Senior Lien, Series C-1, 5.00%, 7/01/44	455	499,840
Henry Ford Health System, 4.00%, 11/15/46	750	755,550
Michigan State Hospital Finance Authority, Refunding RB, Henry Ford Health System, 5.75%, 11/15/19 (c)	1,520	1,732,375
		6,251,775
Minnesota 0.9%		
City of Minneapolis Minnesota, Refunding RB, Fairview Health Services, Series A, 6.75%, 11/15/18 (c)	1,540	1,720,426
Missouri 0.2%		
Bi-State Development Agency of the Missouri-Illinois Metropolitan District, Refunding RB, Combined Lien, Series A, 5.00%, 10/01/44	125	142,972
State of Missouri Health & Educational Facilities Authority, Refunding RB, St. Louis College of Pharmacy Project, 5.50%, 5/01/43	130	144,680
		287,652
New Hampshire 0.9%		
New Hampshire Health & Education Facilities Authority, Refunding RB, Dartmouth-Hitchcock, 6.00%, 8/01/38	1,530	1,718,297
New Jersey 5.6%		
Casino Reinvestment Development Authority, Refunding RB:		
5.25%, 11/01/39	530	546,043
5.25%, 11/01/44	790	810,745
County of Essex New Jersey Improvement Authority, RB, AMT, 5.25%, 7/01/45 (b)	560	578,508
New Jersey EDA, RB, Continental Airlines, Inc. Project, AMT:		
5.13%, 9/15/23	1,040	1,157,073
5.25%, 9/15/29	990	1,100,722
New Jersey EDA, Refunding, Special Assessment Bonds, Kapkowski Road Landfill Project, 5.75%, 4/01/31	1,125	1,306,001
New Jersey State Turnpike Authority, RB, Series E, 5.00%, 1/01/45	1,355	1,563,738
New Jersey Transportation Trust Fund Authority, RB:		
Transportation Program, Series AA, 5.00%, 6/15/44	645	695,336
Transportation System, Series A, 5.50%, 6/15/41	1,025	1,129,673
Transportation System, Series B, 5.25%, 6/15/36	1,235	1,353,498
		10,241,337
New York 8.1%		
City of New York New York Transitional Finance Authority, RB, Fiscal 2012, Sub-Series E-1, 5.00%, 2/01/42	740	851,688
Counties of New York Tobacco Trust IV, Refunding RB, Settlement Pass-Through Turbo, Series A, 6.25%, 6/01/41 (b)	1,000	1,049,450
County of Dutchess New York IDA, Refunding RB, Bard College Civic Facility, Series A-1, 5.00%, 8/01/46	1,355	1,250,651
County of Westchester New York Healthcare Corp., RB, Senior Lien, Series A, 5.00%, 11/01/44	267	297,567
Erie Tobacco Asset Securitization Corp., Refunding RB, Asset-Backed, Series A, 5.00%, 6/01/45	1,020	1,019,184
Long Island Power Authority, Refunding RB, Electric System, Series A, 5.75%, 4/01/39	1,050	1,150,716
Metropolitan Transportation Authority, RB, Series B, 5.25%, 11/15/38	1,255	1,498,395
Metropolitan Transportation Authority, Refunding RB, Dedicated Tax Fund, Series B, 5.00%, 11/15/34	1,270	1,416,012
	Par	
	(000)	Value
Municipal Bonds		
New York (continued)		
Metropolitan Transportation Authority Hudson Rail Yards Trust Obligations, Refunding RB, Series A, 5.00%, 11/15/56	\$ 555	\$ 627,111
New York Liberty Development Corp., Refunding RB:		
2nd Priority, Bank of America Tower at One Bryant Park Project, Class 3, 6.38%, 7/15/49	615	686,937
3 World Trade Center Project, Class 1, 5.00%, 11/15/44 (b)	1,495	1,681,696

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

3 World Trade Center Project, Class 2, 5.15%, 11/15/34 (b)	175	198,950
3 World Trade Center Project, Class 2, 5.38%, 11/15/40 (b)	440	508,266
Port Authority of New York & New Jersey, ARB, Special Project, JFK International Air Terminal LLC Project, Series 8:		
6.00%, 12/01/36	650	754,994
6.00%, 12/01/42	630	729,805
Westchester Tobacco Asset Securitization, Refunding RB, 5.13%, 6/01/45	1,200	1,200,000
		14,921,422
North Carolina 0.6%		
North Carolina Medical Care Commission, RB, Health Care Facilities, Duke University Health System, Series A, 5.00%, 6/01/19 (c)	705	776,226
North Carolina Medical Care Commission, Refunding RB, 1st Mortgage, Retirement Facilities Whitestone Project, Series A, 7.75%, 3/01/41	305	347,401
		1,123,627
Ohio 0.5%		
County of Franklin Ohio, RB, Health Care Facilities Improvement, OPRS Communities Obligation Group, Series A, 6.13%, 7/01/40	350	398,184
State of Ohio, RB, Portsmouth Bypass Project, AMT, 5.00%, 6/30/53	420	460,148
		858,332
Pennsylvania 2.4%		
City of Philadelphia Pennsylvania Hospitals & Higher Education Facilities Authority, RB, Temple University Health System, Series A, 5.63%, 7/01/42	335	370,038
Pennsylvania Economic Development Financing Authority, RB:		
American Water Co. Project, 6.20%, 4/01/39	1,830	2,030,129
Pennsylvania Bridge Finco LP, AMT, 5.00%, 6/30/42	440	486,864
Pennsylvania Economic Development Financing Authority, Refunding RB, National Gypsum Co., AMT, 5.50%, 11/01/44	800	879,168
Pennsylvania Turnpike Commission, RB, Series A, 5.00%, 12/01/44	585	672,036
		4,438,235
Rhode Island 2.1%		
Tobacco Settlement Financing Corp., Refunding RB:		
Series A, 5.00%, 6/01/35	420	455,007
Series B, 4.50%, 6/01/45	1,375	1,424,486
Series B, 5.00%, 6/01/50	1,895	1,967,238
		3,846,731
South Carolina 3.8%		
State of South Carolina Ports Authority, RB:		
5.25%, 7/01/40	1,650	1,840,196
AMT, 5.25%, 7/01/55	670	756,805
State of South Carolina Public Service Authority, RB, Santee Cooper, Series A, 5.50%, 12/01/54	2,040	2,403,242

See Notes to Financial Statements.

Schedule of Investments (continued)

BlackRock MuniHoldings Fund II, Inc. (MUH)

	Par	
	(000)	Value
Municipal Bonds		
South Carolina (continued)		
State of South Carolina Public Service Authority, Refunding RB, Series E, 5.25%, 12/01/55	\$ 1,635	\$ 1,926,978
		6,927,221
Tennessee 0.9%		
City of Chattanooga Tennessee Health Educational & Housing Facility Board, RB, Catholic Health Initiatives, Series A, 5.25%, 1/01/45	720	802,404
County of Hardeman Tennessee Correctional Facilities Corp., RB, Series B, 7.38%, 8/01/17	435	436,066
Metropolitan Government Nashville & Davidson County Health & Educational Facilities Board, RB, Vanderbilt University Medical Center, Series A, 5.00%, 7/01/46	360	415,440
		1,653,910
Texas 5.4%		
Central Texas Regional Mobility Authority, Refunding RB:		
Senior Lien, 6.25%, 1/01/21 (c)	1,070	1,286,525
Sub-Lien, 5.00%, 1/01/33	180	199,588
Central Texas Turnpike System, Refunding RB, Series C, 5.00%, 8/15/42	310	350,926
City of Austin Texas Airport System, ARB, Revenue, AMT, 5.00%, 11/15/39	320	361,507
City of Houston Texas Airport System, Refunding ARB, Senior Lien, Series A, 5.50%, 7/01/39	535	573,301
County of Harris Texas Cultural Education Facilities Finance Corp., RB, 1st Mortgage, Brazos Presbyterian Homes, Inc. Project, Series B, 7.00%, 1/01/48	240	315,017
County of Harris Texas Health Facilities Development Corp., Refunding RB, Memorial Hermann Healthcare System, Series B, 7.25%, 12/01/18 (c)	1,380	1,560,242
County of Midland Texas Fresh Water Supply District No. 1, RB, CAB, City of Midland Project, Series A (a):		
0.00%, 9/15/40	2,525	943,163
0.00%, 9/15/41	1,395	494,039
La Vernia Higher Education Finance Corp., RB, Kipp, Inc., Series A, 6.38%, 8/15/19 (c)	320	366,278
New Hope Cultural Education Facilities Corp., RB, Collegiate Housing Tarleton State University Project, 5.00%, 4/01/35	145	157,756
North Texas Tollway Authority, RB, CAB, Special Project System, Series B, 0.00%, 9/01/37 (a)	1,015	446,509
Texas Private Activity Bond Surface Transportation Corp., RB, Senior Lien:		
LBJ Infrastructure Group LLC, 7.00%, 6/30/40	1,165	1,374,432
NTE Mobility Partners LLC, North Tarrant Express Managed Lanes Project, 6.88%, 12/31/39	1,300	1,510,444
		9,939,727
Vermont 0.0%		
Vermont Educational & Health Buildings Financing Agency, RB, Development & Mental Health, 6.50%, 6/15/32	80	80,148
Virginia 2.7%		
County of Fairfax Virginia EDA, Refunding RB, Goodwin House, Inc., 5.13%, 10/01/17 (c)	2,500	2,600,175
Virginia Small Business Financing Authority, RB, Senior Lien, Elizabeth River Crossings OpCo LLC Project, AMT:		
5.25%, 1/01/32	400	449,444
6.00%, 1/01/37	1,640	1,909,239
		4,958,858
Washington 2.3%		
County of Grant Washington Public Utility District No 2, Refunding RB, Series A, 5.00%, 1/01/41	985	1,145,250
Grant County Public Utility District No 2, Refunding RB, Series A, 5.00%, 1/01/43	1,125	1,307,047
	Par	
Municipal Bonds		
Washington (continued)		
Port of Seattle Washington, RB, Series C, AMT, 5.00%, 4/01/40	\$ 390	\$ 442,533
Washington Health Care Facilities Authority, RB, Catholic Health Initiatives, Series A, 5.75%, 1/01/45	1,195	1,402,201
		4,297,031

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

Wisconsin 3.5%		
State of Wisconsin, Refunding RB, Series A, 6.00%, 5/01/36	3,620	4,036,590
State of Wisconsin Health & Educational Facilities Authority, RB, Ascension Health Senior Credit Group, Series E, 5.00%, 11/15/33	1,235	1,369,207
Wisconsin Health & Educational Facilities Authority, Refunding RB, Medical College of Wisconsin, Inc., 4.00%, 12/01/46	945	994,367
		6,400,164
Total Municipal Bonds 106.9%		196,773,803

Municipal Bonds Transferred to Tender Option Bond Trusts (e)

Alabama 0.5%		
Auburn University, Refunding RB, Series A, 4.00%, 6/01/41	880	948,244
California 7.5%		
Bay Area Toll Authority, Refunding RB, San Francisco Bay Area, Series F-1, 5.63%, 4/01/19 (c)	1,640	1,824,546
California Educational Facilities Authority, RB, University of Southern California, Series B, 5.25%, 10/01/18 (c)(f)	1,335	1,446,966
City & County of San Francisco California Public Utilities Commission, RB, Water Revenue, Series B, 5.00%, 11/01/19 (c)	4,770	5,334,959
City of Los Angeles California Department of Airports, Refunding ARB, Los Angeles International Airport, Senior Series A, 5.00%, 5/15/40	2,967	3,337,873
Los Angeles Community College District California, GO, Election of 2001, Series A (AGM), 5.00%, 8/01/17 (c)	1,170	1,207,920
San Diego Community College District California, GO, Election of 2002, 5.25%, 8/01/19 (c)	553	617,836
		13,770,100

Colorado 3.6%		
Colorado Health Facilities Authority, RB, Catholic Health (AGM) (c):		
Series C-3, 5.10%, 4/29/18	1,870	1,988,371
Series C-7, 5.00%, 5/01/18	1,200	1,274,448
Colorado Health Facilities Authority, Refunding RB, Catholic Health Initiatives, Series A, 5.50%, 7/01/34 (f)	1,080	1,189,761
County of Adams Colorado, COP, Refunding, 4.00%, 12/01/45	1,950	2,078,427
		6,531,007

Connecticut 2.6%		
Connecticut State Health & Educational Facility Authority, RB, Yale University:		
Series T-1, 4.70%, 7/01/29	2,299	2,357,760
Series X-3, 4.85%, 7/01/37	2,362	2,422,615
		4,780,375

Florida 1.7%		
County of Miami-Dade Florida, RB, Water & Sewer System, 5.00%, 10/01/34	2,840	3,204,352

See Notes to Financial Statements.

Schedule of Investments (continued)

BlackRock MuniHoldings Fund II, Inc. (MUH)

	Par	
	(000)	Value
Municipal Bonds Transferred to Tender Option Bond Trusts (e)		
Georgia 1.0%		
Private Colleges & Universities Authority, Refunding RB, Emory University, Series C, 5.00%, 9/01/18 (c)	\$ 1,649	\$ 1,773,470
Massachusetts 2.0%		
Massachusetts School Building Authority, RB, Senior, Series B, 5.00%, 10/15/41	3,211	3,733,951
Nebraska 1.8%		
County of Sarpy Nebraska Hospital Authority No. 1, Refunding RB, Nebraska Medicine, 4.00%, 5/15/51	3,241	3,357,770
New Hampshire 0.6%		
New Hampshire Health & Education Facilities Authority, RB, Dartmouth College, 5.25%, 6/01/19 (c)(f)	1,020	1,130,117
New York 10.9%		
City of New York New York Municipal Water Finance Authority, Refunding RB, Water & Sewer System, 2nd General Resolution, Series FF-2, 5.50%, 6/15/40	810	900,607
City of New York New York Transitional Finance Authority, BARB, Fiscal 2009, Series S-3, 5.25%, 1/15/39	3,299	3,580,705
Hudson Yards Infrastructure Corp., RB, Fiscal 2012, Series A, 5.75%, 2/15/47 (f)	810	946,312
Metropolitan Transportation Authority, Refunding RB, Series C-1, 5.25%, 11/15/56	2,340	2,813,184
New York Liberty Development Corp., RB, 1 World Trade Center Port Authority Consolidated Bonds, 5.25%, 12/15/43	5,400	6,301,667
New York Liberty Development Corp., Refunding RB, 4 World Trade Center Project, 5.75%, 11/15/51 (f)	3,250	3,812,866
Port Authority of New York & New Jersey, Refunding ARB, 194th Series, 5.25%, 10/15/55	1,350	1,616,152
		19,971,493
North Carolina 1.3%		
North Carolina Capital Facilities Finance Agency, Refunding RB:		
Duke University Project, Series B, 5.00%, 10/01/55	1,320	1,547,713
Wake Forest University, 5.00%, 1/01/19 (c)	800	869,128
		2,416,841
Ohio 4.1%		
State of Ohio, Refunding RB, Cleveland Clinic Health System Obligated Group, Series A, 5.50%, 1/01/39	6,974	7,595,980
Texas 6.2%		
City of San Antonio Texas Public Service Board, RB, Electric & Gas Systems, Junior Lien, 5.00%, 2/01/43	1,260	1,456,157
County of Harris Texas, Refunding RB, Toll Road, Senior Lien, Series A (f):		
5.00%, 8/15/19 (c)	1,905	2,085,685
5.00%, 8/15/38	1,458	1,595,369
	Par	
Municipal Bonds Transferred to Tender Option Bond Trusts (e)		
Texas (continued)		
County of Harris Texas Metropolitan Transit Authority, Refunding RB, Series A, 5.00%, 11/01/41	\$ 1,710	\$ 1,970,228
University of Texas, Refunding RB, Financing System, Series B, 5.00%, 8/15/43	1,801	2,120,573
University of Texas, Permanent University Fund, Refunding RB, Series B, 4.00%, 7/01/41	1,980	2,151,943
		11,379,955
Utah 0.8%		
City of Riverton Utah, RB, IHC Health Services, Inc., 5.00%, 8/15/41	1,395	1,507,129
Virginia 2.5%		
University of Virginia, Refunding RB, GO, 5.00%, 6/01/40	2,729	2,902,121
Virginia Small Business Financing Authority, Refunding RB, Sentara Healthcare, 5.00%, 11/01/40	1,553	1,718,829
		4,620,950
Washington 0.8%		
Central Puget Sound Regional Transit Authority, RB, Series A (AGM), 5.00%, 11/01/17 (c)	1,365	1,423,052
Wisconsin 1.7%		

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

Wisconsin Health & Educational Facilities Authority, Refunding RB, Froedtert & Community Health, Inc., Obligated Group, Series C, 5.25%, 4/01/39 (f)	2,859	3,062,482
Total Municipal Bonds Transferred to Tender Option Bond Trusts 49.6%		91,207,268
Total Long-Term Investments (Cost \$259,953,117) 156.5%		287,981,071
Short-Term Securities 0.6%	Shares	
BlackRock Liquidity Funds, MuniCash, Institutional Class, 0.44% (g)(h)	1,171,042	1,171,159
Total Short-Term Securities (Cost \$1,171,042) 0.6%		1,171,159
Total Investments (Cost \$261,124,159) 157.1%		289,152,230
Other Assets Less Liabilities 1.2%		2,211,263
Liability for TOB Trust Certificates, Including Interest Expense and Fees Payable (28.4)%		(52,256,364)
VMTP Shares, at Liquidation Value (29.9)%		(55,000,000)
Net Assets Applicable to Common Shares 100.0%		\$ 184,107,129

Notes to Schedule of Investments

- (a) Zero-coupon bond.
- (b) Security exempt from registration pursuant to Rule 144A under the Securities Act of 1933, as amended. These securities may be resold in transactions exempt from registration to qualified institutional investors.
- (c) U.S. Government securities, held in escrow, are used to pay interest on this security, as well as to retire the bond in full at the date indicated, typically at a premium to par.
- (d) Step-up bond that pays an initial coupon rate for the first period and then a higher coupon rate for the following periods. Rate as of period end.
- (e) Represent bonds transferred to a TOB Trust in exchange of cash and residual certificates received by the Fund. These bonds serve as collateral in a secured borrowing. See Note 4 of the Notes to Financial Statements for details.
- (f) All or a portion of security is subject to a recourse agreement. The aggregate maximum potential amount the Fund could ultimately be required to pay under the agreements, which expire between April 1, 2017 to February 15, 2031, is \$8,452,555. See Note 4 of the Notes to Financial Statements for details.

See Notes to Financial Statements.

Schedule of Investments (continued)

BlackRock MuniHoldings Fund II, Inc. (MUH)

(g) During the six months ended October 31, 2016, investments in issuers considered to be an affiliate of the Fund for purposes of Section 2(a)(3) of the Investment Company Act of 1940, as amended, were as follows:

Affiliate	Shares Held at April 30, 2016	Net Activity	Shares Held at October 31, 2016	Value at October 31, 2016	Income	Realized Gain/Capital Gain
BlackRock Liquidity Funds, MuniCash, Institutional Class	866,768	304,274	1,171,042	\$ 1,171,159	\$ 3,119	\$ 1,500

(h) Current yield as of period end.

Derivative Financial Instruments Outstanding as of Period End

Futures Contracts

Contracts	Issue	Expiration	Notional Value	Unrealized Appreciation
Short				
(5)	5-Year U.S. Treasury Note	December 2016	\$ 603,984	\$ 4,526
(21)	10-Year U.S. Treasury Note	December 2016	\$ 2,722,125	38,177
(20)	Long U.S. Treasury Bond	December 2016	\$ 3,254,375	123,269
(7)	Ultra U.S. Treasury Bond	December 2016	\$ 1,231,563	62,996
Total				\$ 228,968

Derivative Financial Instruments Categorized by Risk Exposure

As of period end, the fair values of derivative financial instruments located in the Statements of Assets and Liabilities were as follows:

Assets	Derivative Financial Instruments	Commodity Contracts	Credit Contracts	Equity Contracts	Foreign Currency Exchange Contracts	Interest Rate Contracts	Other Contracts	Total
Futures contracts	Net unrealized appreciation ¹					\$ 228,968		\$ 228,968

¹ Includes cumulative appreciation (depreciation) on futures contracts, if any, as reported in the Schedule of Investments. Only current day's variation margin is reported within the Statements of Assets and Liabilities.

For the six months ended October 31, 2016, the effect of derivative financial instruments in the Statements of Operations was as follows:

Net Realized Gain (Loss) from:	Commodity Contracts	Credit Contracts	Equity Contracts	Foreign Currency Exchange Contracts	Interest Rate Contracts	Other Contracts	Total
Futures contracts					\$ 276,618		\$ 276,618
Net Change in Unrealized Appreciation (Depreciation) on:							
Futures contracts					\$ 170,680		\$ 170,680

Average Quarterly Balances of Outstanding Derivative Financial Instruments

Futures contracts:

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

Average notional value of contracts short

\$ 8,046,125

For more information about the Fund's investment risks regarding derivative financial instruments, refer to the Notes to Financial Statements.

Fair Value Hierarchy as of Period End

Various inputs are used in determining the fair value of investments and derivative financial instruments. For information about the Fund's policy regarding valuation of investments and derivative financial instruments, refer to the Notes to Financial Statements.

The following tables summarize the Fund's investments and derivative financial instruments categorized in the disclosure hierarchy:

	Level 1	Level 2	Level 3	Total
Assets:				
Investments:				
Long-Term Investments ¹		\$ 287,981,071		\$ 287,981,071
Short-Term Securities	\$ 1,171,159			1,171,159
Total	\$ 1,171,159	\$ 287,981,071		\$ 289,152,230

See Notes to Financial Statements.

Schedule of Investments (concluded)

BlackRock MuniHoldings Fund II, Inc. (MUH)

	Level 1	Level 2	Level 3	Total
Derivative Financial Instruments ²				
Assets:				
Interest rate contracts	\$ 228,968			\$ 228,968

¹ See above Schedule of Investments for values in each state or political subdivision.

² Derivative financial instruments are futures contracts which are valued at the unrealized appreciation (depreciation) on the instrument. The Fund may hold assets and/or liabilities in which the fair value approximates the carrying amount for financial statement purposes. As of period end, such assets and/or liabilities are categorized within the disclosure hierarchy as follows:

	Level 1	Level 2	Level 3	Total
Assets:				
Cash pledged for futures contracts	\$ 140,200			\$ 140,200
Liabilities:				
TOB Trust Certificates		\$ (52,164,040)		(52,164,040)
VMTP Shares at Liquidation Value		(55,000,000)		(55,000,000)
Total	\$ 140,200	\$ (107,164,040)		\$ (107,023,840)

During the six months ended October 31, 2016, there were no transfers between levels.

See Notes to Financial Statements.

Schedule of Investments October 31, 2016 (Unaudited)

BlackRock MuniHoldings Quality Fund, Inc. (MUS)

(Percentages shown are based on Net Assets)

	Par (000)	Value
Municipal Bonds		
Alabama 1.7%		
City of Birmingham Alabama Special Care Facilities Financing Authority, RB, Children s Hospital (AGC), 6.00%, 6/01/19 (a)	\$ 2,330	\$ 2,625,398
City of Selma Alabama IDB, RB, Gulf Opportunity Zone, International Paper Co. Project, Series A, 5.38%, 12/01/35	565	647,682
		3,273,080
California 26.2%		
California Educational Facilities Authority, RB, University of Southern California, Series A, 5.25%, 10/01/18 (a)	2,895	3,137,804
California Health Facilities Financing Authority, RB, Sutter Health, Series B, 6.00%, 8/15/42	1,730	2,018,443
Central Unified School District, GO, Election of 2008, Series A (AGC), 5.63%, 8/01/19 (a)	1,325	1,492,785
City & County of San Francisco California Airports Commission, Refunding ARB, AMT, Series A: 2nd, 5.50%, 5/01/28	1,085	1,298,832
2nd, 5.25%, 5/01/33	850	982,260
5.00%, 5/01/44	1,090	1,233,095
City of Los Angeles California Department of Water & Power, RB, Power System, Sub-Series A-1, 5.25%, 7/01/38	1,575	1,681,816
City of San Jose California, Refunding ARB, Series A-1, AMT: 5.50%, 3/01/30	2,400	2,772,144
5.75%, 3/01/34	2,180	2,540,681
City of Sunnyvale California, Refunding RB, 5.25%, 4/01/40	1,605	1,805,994
County of Sacramento California, ARB, Senior Series A (AGC), 5.50%, 7/01/41	2,100	2,251,431
County of Ventura California Community College District, GO, Election of 2002, Series C, 5.50%, 8/01/18 (a)	1,850	1,999,979
Golden Empire Schools Financing Authority, Refunding RB, Kern High School District Projects, 1.06%, 5/01/17 (b)	1,140	1,139,795
Kern Community College District, GO, Safety, Repair & Improvement, Series C, 5.50%, 11/01/33	1,420	1,752,535
Los Angeles Community College District California, GO, Election of 2008, Series C, 5.25%, 8/01/20 (a)	1,000	1,153,820
Oceanside Unified School District, GO, Series A (AGC), 5.25%, 8/01/33	1,825	1,948,370
Redondo Beach Unified School District, GO, Election of 2008, Series E, 5.50%, 8/01/21 (a)	1,335	1,605,404
Riverside County Public Financing Authority, RB, Capital Facilities Project, 5.25%, 11/01/40	2,500	2,993,100
San Pablo Joint Powers Financing Authority, RB, (NPFGC) (c): 0.00%, 12/01/16 (a)	1,695	1,105,513
0.00%, 12/01/16 (a)	1,515	934,467
0.00%, 12/01/16 (a)	1,515	883,730
0.00%, 12/01/24	940	611,273
0.00%, 12/01/25	840	516,541
0.00%, 12/01/26	840	488,477
State of California Public Works Board, LRB, Various Capital Projects, Series I: 5.50%, 11/01/30	1,500	1,835,865
5.50%, 11/01/31	2,465	3,004,367
State of California Public Works Board, RB, Department of Corrections & Rehabilitation, Series F, 5.25%, 9/01/33	725	872,204
Township of Washington California Health Care District, GO, Election of 2004, Series B, 5.50%, 8/01/40	540	645,489
University of California, Refunding RB, The Regents of Medical Center, Series J, 5.25%, 5/15/38	4,070	4,876,104
		49,582,318
Municipal Bonds		
Colorado 2.2%		
City & County of Denver Colorado Airport System, ARB, Series A, AMT: 5.50%, 11/15/28	\$ 1,000	\$ 1,182,090
5.50%, 11/15/30	340	399,017
5.50%, 11/15/31	405	473,571
Colorado Health Facilities Authority, RB, Hospital, NCMC, Inc. Project, Series B (AGM), 6.00%, 5/15/19 (a)	1,900	2,136,930
		4,191,608

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

District of Columbia 1.1%

District of Columbia Water & Sewer Authority, Refunding RB, Series A, 5.50%, 10/01/18 (a)	2,000	2,175,220
---	-------	-----------

Florida 15.8%

City of Jacksonville Florida, Refunding RB, Series A, 5.25%, 10/01/33	400	477,872
County of Broward Florida Airport System Revenue, ARB, Series A, AMT, 5.00%, 10/01/45	2,845	3,225,291
County of Hillsborough Florida Aviation Authority, Refunding ARB, Tampa International Airport, Series A, AMT, 5.50%, 10/01/29	1,735	2,038,695
County of Lee Florida, Refunding ARB, Series A, AMT, 5.38%, 10/01/32	1,500	1,714,200
County of Lee Florida HFA, RB, S/F Housing, Multi-County Program, Series A-2, AMT (Ginnie Mae), 6.00%, 9/01/40	190	192,785
County of Miami-Dade Florida, RB, Seaport: Series A, 5.38%, 10/01/33	1,015	1,163,515
Series A, 6.00%, 10/01/38	1,000	1,215,350
Series B, AMT, 6.25%, 10/01/38	460	567,617
Series B, AMT, 6.00%, 10/01/42	615	734,113
County of Miami-Dade Florida Aviation Revenue, Refunding ARB, Series A, AMT, 5.00%, 10/01/31	2,900	3,342,917
County of Miami-Dade Florida Educational Facilities Authority, RB, University Miami, Series A, 5.00%, 4/01/40	3,465	4,010,495
County of Orange Florida School Board, COP, Series A (AGC), 5.50%, 8/01/19 (a)	4,645	5,210,064
Reedy Creek Improvement District, GO, Series A, 5.25%, 6/01/32	1,040	1,228,511
Tohopekaliga Water Authority, Refunding RB, Series A, 5.25%, 10/01/21 (a)	3,995	4,755,728

29,877,153

Hawaii 1.5%

State of Hawaii, Department of Transportation, COP, AMT: 5.25%, 8/01/25	425	504,641
5.25%, 8/01/26	460	544,433
State of Hawaii, Department of Transportation, RB, Series A, AMT, 5.00%, 7/01/45	1,500	1,706,535

2,755,609

Illinois 16.7%

City of Chicago Illinois, GARB, O Hare International Airport, 3rd Lien, Series A, 5.75%, 1/01/39	1,145	1,320,757
City of Chicago Illinois Midway International Airport, Refunding GARB, 2nd Lien, Series A, 5.00%, 1/01/41	1,000	1,110,360
City of Chicago Illinois O Hare International Airport, GARB, 3rd Lien, Series C, 6.50%, 1/01/41	5,225	6,250,511
City of Chicago Illinois Transit Authority, RB: Federal Transit Administration, Section 5309, Series A (AGC), 6.00%, 12/01/18 (a)	2,000	2,209,300
Sales Tax Receipts, 5.25%, 12/01/36	1,000	1,106,820
Sales Tax Receipts, 5.25%, 12/01/40	1,790	1,975,874
City of Chicago Illinois Wastewater Transmission, RB, 2nd Lien, 5.00%, 1/01/42	2,050	2,212,196

See Notes to Financial Statements.

Schedule of Investments (continued)

BlackRock MuniHoldings Quality Fund, Inc. (MUS)

	Par (000)	Value
Municipal Bonds		
Illinois (continued)		
County of Cook Illinois Community College District No. 508, GO, City College of Chicago:		
5.50%, 12/01/38	\$ 2,250	\$ 2,548,170
5.25%, 12/01/43	4,015	4,470,943
Illinois Finance Authority, Refunding RB, Presence Health Network, Series C:		
4.00%, 2/15/41	665	635,075
5.00%, 2/15/41	555	604,828
Railsplitter Tobacco Settlement Authority, RB:		
5.50%, 6/01/23	1,405	1,628,845
6.00%, 6/01/28	400	469,700
State of Illinois, GO:		
5.25%, 2/01/31	875	950,075
5.25%, 2/01/32	1,355	1,465,920
5.50%, 7/01/33	2,000	2,196,000
5.50%, 7/01/38	425	464,559
		31,619,933
Indiana 3.8%		
Indiana Finance Authority, RB, Private Activity Bond, Ohio River Bridges, Series A, AMT,		
5.00%, 7/01/40	565	626,670
Indianapolis Local Public Improvement Bond Bank, RB, Series F, 5.25%, 2/01/36	3,055	3,486,518
Indianapolis Local Public Improvement Bond Bank, Refunding RB, Waterworks Project, Series A (AGC), 5.50%, 1/01/38	2,780	3,051,217
		7,164,405
Louisiana 1.6%		
Lake Charles Harbor & Terminal District, RB, Series B, AMT (AGM), 5.50%, 1/01/29		
	1,500	1,782,705
Tobacco Settlement Financing Corp., Refunding RB, Asset-Backed, Series A, 5.50%, 5/15/29	1,215	1,322,904
		3,105,609
Massachusetts 1.0%		
Massachusetts Development Finance Agency, Refunding RB, Emmanuel College Issue, Series A,		
4.00%, 10/01/46	520	525,938
Massachusetts HFA, Refunding RB, Series C, AMT, 5.35%, 12/01/42	1,235	1,319,314
		1,845,252
Michigan 1.1%		
Royal Oak Hospital Finance Authority Michigan, Refunding RB, William Beaumont Hospital, Series V,		
8.25%, 9/01/18 (a)	1,910	2,165,902
Minnesota 0.8%		
City of Minneapolis Minnesota, Refunding RB, Fairview Health Services, Series B (AGC):		
6.50%, 11/15/18 (a)	205	227,987
6.50%, 11/15/38	1,120	1,231,137
		1,459,124
Mississippi 2.4%		
Mississippi Development Bank, RB, Jackson Water & Sewer System Project (AGM), 6.88%, 12/01/40		
	2,595	3,456,384
Mississippi State University Educational Building Corp., Refunding RB, Mississippi State University Improvement Project, 5.25%, 8/01/38	1,000	1,186,180
		4,642,564
Nevada 3.7%		
County of Clark Nevada, ARB, Las Vegas-McCarran International Airport, Series A (AGM),		
5.25%, 7/01/39	1,410	1,558,586
County of Clark Nevada, GO, Limited Tax, 5.00%, 6/01/38	3,500	3,704,435
Municipal Bonds		
Nevada (continued)		
County of Clark Nevada Water Reclamation District, GO, Series A, 5.25%, 7/01/19 (a)	\$ 1,500	\$ 1,666,485

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

		6,929,506
New Jersey 8.6%		
New Jersey EDA, RB, Private Activity Bond, Goethals Bridge Replacement Project, AMT:		
5.38%, 1/01/43	3,000	3,408,630
The (AGM), 5.00%, 1/01/31	790	899,368
New Jersey Health Care Facilities Financing Authority, RB, Series A:		
RWJ Barnabas Health Obligated Group, 5.00%, 7/01/43 (d)	930	1,067,333
Virtua Health (AGC), 5.50%, 7/01/38	2,100	2,316,993
New Jersey Transportation Trust Fund Authority, RB, Transportation System:		
Series A, 5.50%, 6/15/41	1,780	1,961,774
Series A (AGC), 5.63%, 12/15/28	3,170	3,472,988
Series AA, 5.50%, 6/15/39	1,890	2,121,128
Series B, 5.25%, 6/15/36	1,000	1,095,950
		16,344,164
New York 5.6%		
City of New York New York Municipal Water Finance Authority, Refunding RB, 2nd General Resolution, Series EE:		
Fiscal 2009, 5.25%, 6/15/40	3,410	3,766,686
Water & Sewer System, 5.38%, 6/15/43	1,305	1,512,325
Hudson Yards Infrastructure Corp., RB, Series A, 5.75%, 2/15/47	2,510	2,932,659
Port Authority of New York & New Jersey, Refunding ARB, Consolidated, 166th Series, 5.25%, 7/15/36	2,000	2,309,700
		10,521,370
Ohio 1.3%		
State of Ohio Turnpike Commission, RB, Junior Lien, Infrastructure Projects, Series A-1, 5.25%, 2/15/31	2,000	2,373,160
Oklahoma 1.4%		
Norman Regional Hospital Authority, Refunding RB, 4.00%, 9/01/37 (d)	2,555	2,588,036
Pennsylvania 4.1%		
Pennsylvania Housing Finance Agency, Refunding RB, Series 121, 3.10%, 10/01/36	1,000	979,550
Pennsylvania Turnpike Commission, RB, Series B, 5.00%, 12/01/45	4,990	5,697,233
Township of Bristol Pennsylvania School District, GO, 5.25%, 6/01/37	1,000	1,143,760
		7,820,543
South Carolina 5.8%		
County of Charleston South Carolina, RB, Special Source, 5.25%, 12/01/38	2,180	2,604,402
County of Charleston South Carolina Airport District, ARB, Series A, AMT:		
5.50%, 7/01/38	1,000	1,143,500
6.00%, 7/01/38	1,695	1,993,388
5.50%, 7/01/41	1,000	1,145,450
South Carolina Ports Authority, RB, AMT, 5.25%, 7/01/50	1,095	1,241,522
State of South Carolina Public Service Authority, Refunding RB, Series E, 5.25%, 12/01/55	2,500	2,946,450
		11,074,712
Tennessee 1.5%		
Metropolitan Nashville Airport Authority, ARB, Series B, AMT, 5.00%, 7/01/40	2,500	2,856,450

See Notes to Financial Statements.

Schedule of Investments (continued)

BlackRock MuniHoldings Quality Fund, Inc. (MUS)

	Par (000)	Value
Municipal Bonds		
Texas 22.1%		
Austin Community College District Public Facility Corp., RB, Educational Facilities Project, Round Rock Campus, 5.25%, 8/01/18 (a)	\$ 2,500	\$ 2,689,575
City of Beaumont Texas, GO, Certificates of Obligation, 5.25%, 3/01/37	1,360	1,601,291
City of Houston Texas Combined Utility System Revenue, Refunding RB, Combined 1st Lien, Series A (AGC):		
6.00%, 5/15/19 (a)	3,790	4,266,706
6.00%, 11/15/35	210	236,712
Dallas Area Rapid Transit, Refunding RB, Senior Lien (a):		
5.25%, 12/01/18	1,490	1,623,891
5.25%, 12/01/18	1,110	1,209,745
Dallas-Fort Worth International Airport, ARB, Joint Improvement, AMT:		
Series A, 5.00%, 11/01/38	2,965	3,261,500
Series H, 5.00%, 11/01/37	2,200	2,468,004
Lower Colorado River Authority, Refunding RB, 5.50%, 5/15/33	1,240	1,472,984
North Texas Tollway Authority, RB, Special Projects, Series A, 5.50%, 9/01/41	3,150	3,710,039
North Texas Tollway Authority, Refunding RB, 1st Tier System:		
(NPFGC), 5.75%, 1/01/18 (a)	1,835	1,939,356
(NPFGC), 5.75%, 1/01/40	590	619,583
Series A, 5.63%, 1/01/18 (a)	2,940	3,102,935
Series A, 5.63%, 1/01/33	3,645	3,822,949
Series S, 5.75%, 1/01/18 (a)	5,360	5,664,823
Series S, 5.75%, 1/01/18 (a)	2,460	2,599,900
Series SE, 5.75%, 1/01/40	915	962,525
Red River Education Financing Corp., RB, Texas Christian University Project, 5.25%, 3/15/38	620	729,424
		41,981,942
Virginia 1.1%		
City of Lexington Virginia IDA, RB, Washington & Lee University, 5.00%, 1/01/43	570	650,216
Virginia Public School Authority, RB, Fluvanna County School Financing, 6.50%, 12/01/18 (a)	1,300	1,450,865
		2,101,081
Washington 1.5%		
City of Seattle Washington Municipal Light & Power, Refunding RB, Series A, 5.25%, 2/01/36	1,375	1,582,611
State of Washington, GO, Various Purposes, Series B, 5.25%, 2/01/36	1,075	1,244,033
		2,826,644
Total Municipal Bonds 132.6%		251,275,385

Municipal Bonds Transferred to**Tender Option Bond Trusts (f)**

Colorado 3.2%		
Colorado Health Facilities Authority, RB, Catholic Health, Series C-3 (AGM), 5.10%, 4/29/18 (a)	5,610	5,965,113
Connecticut 1.1%		
Connecticut State Health & Educational Facility Authority, Refunding RB, Trinity Health Credit Group, 5.00%, 12/01/45	1,771	2,049,381
District of Columbia 0.6%		
District of Columbia Water & Sewer Authority, Refunding RB, Senior Lien, Series A, 6.00%, 10/01/18 (a)(g)	1,039	1,140,083
Florida 4.3%		
County of Miami-Dade Florida, GO, Building Better Communities Program, Series B-1, 6.00%, 7/01/18 (a)	7,500	8,136,450

Municipal Bonds Transferred to

	Par (000)	Value
Tender Option Bond Trusts (f)		
Illinois 1.4%		
City of Chicago Illinois, Refunding RB, Waterworks, 2nd Lien (AGM), 5.25%, 11/01/33	\$ 2,508	\$ 2,645,824

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

Kentucky 0.8%		
Kentucky State Property & Building Commission, Refunding RB, (AGC):		
5.25%, 2/01/19 (a)	1,246	1,354,337
5.25%, 2/01/27	160	173,829
		1,528,166
Michigan 1.8%		
Michigan State Building Authority, Refunding RB, Facilities Program, Series I,		
5.00%, 10/15/45	3,020	3,483,540
Nevada 5.1%		
County of Clark Nevada Water Reclamation District, GO (a):		
Limited Tax, 6.00%, 7/01/18	5,000	5,422,550
Series B, 5.50%, 7/01/19	3,749	4,189,479
		9,612,029
New Jersey 1.3%		
New Jersey Housing & Mortgage Finance Agency, RB, S/F Housing, Series CC,		
5.25%, 10/01/29	2,289	2,409,391
New York 5.2%		
City of New York New York Transitional Finance Authority, RB, Fiscal 2009, Series S-3,		
17.38%, 1/15/39 (b)(e)	4,530	5,286,398
New York Liberty Development Corp., RB, 1 World Trade Center Port Authority		
Consolidated Bonds, 5.25%, 12/15/43	1,400	1,519,087
New York Liberty Development Corp., Refunding RB, 4 World Trade Center Project,		
5.75%, 11/15/51 (g)	2,660	3,120,684
		9,926,169
Pennsylvania 0.7%		
County of Westmoreland Pennsylvania Municipal Authority, Refunding RB, 5.00%, 8/15/38	1,180	1,354,215
Utah 0.6%		
City of Riverton Utah, RB, IHC Health Services, Inc., 5.00%, 8/15/41	1,005	1,085,781
Total Municipal Bonds Transferred to		
Tender Option Bond Trusts 26.1%		49,336,142
Total Long-Term Investments		
(Cost \$273,558,784) 158.7%		300,611,527
Short-Term Securities	Shares	
BlackRock Liquidity Funds, MuniCash, Institutional Class, 0.44% (h)(i)	1,556,554	1,556,710
Total Short-Term Securities		
(Cost \$1,556,554) 0.8%		1,556,710
Total Investments (Cost \$275,115,338) 159.5%		302,168,237
Other Assets Less Liabilities (0.1)%		(258,269)
Liability for TOB Trust Certificates, Including Interest		
Expense and Fees Payable (13.4)%		(25,356,328)
VMTP Shares, at Liquidation Value (45.9)%		(87,000,000)
Net Assets Applicable to Common Shares 100.0%		\$ 189,553,640

See Notes to Financial Statements.

Schedule of Investments (continued)

BlackRock MuniHoldings Quality Fund, Inc. (MUS)

Notes to Schedule of Investments

- (a) U.S. Government securities, held in escrow, are used to pay interest on this security, as well as to retire the bond in full at the date indicated, typically at a premium to par.
- (b) Variable rate security. Rate as of period end.
- (c) Zero-coupon bond.
- (d) When-issued security.
- (e) Security exempt from registration pursuant to Rule 144A under the Securities Act of 1933, as amended. These securities may be resold in transactions exempt from registration to qualified institutional investors.
- (f) Represent bonds transferred to a TOB Trust in exchange of cash and residual certificates received by the Fund. These bonds serve as collateral in a secured borrowing. See Note 4 of the Notes to Financial Statements for details.
- (g) All or a portion of security is subject to a recourse agreement. The aggregate maximum potential amount the Fund could ultimately be required to pay under the agreements, which expire between May 7, 2018 to November 15, 2019, is \$2,230,645. See Note 4 of the Notes to Financial Statements for details.
- (h) During the six months ended October 31, 2016, investments in issuers considered to be an affiliate of the Fund for purposes of Section 2(a)(3) of the Investment Company Act of 1940, as amended, were as follows:

Affiliate	Shares Held at April 30, 2016	Net Activity	Shares Held at October 31, 2016	Value at October 31, 2016	Income	Realized Gain
BlackRock Liquidity Funds, MuniCash, Institutional Class	1,352,893	203,661	1,556,554	\$ 1,556,710	\$ 1,083	\$ 20

- (i) Current yield as of period end.

Derivative Financial Instruments Outstanding as of Period End

Futures Contracts

Contracts	Issue	Expiration	Notional Value	Unrealized Appreciation
Short				
(2)	5-Year U.S. Treasury Note	December 2016	\$ 241,594	\$ 1,811
(29)	10-Year U.S. Treasury Note	December 2016	\$ 3,759,125	50,275
(19)	Long U.S. Treasury Bond	December 2016	\$ 3,091,656	107,371
(3)	Ultra U.S. Treasury Bond	December 2016	\$ 527,813	22,731

Total	\$ 182,188
--------------	------------

Derivative Financial Instruments Categorized by Risk Exposure

As of period end, the fair values of derivative financial instruments located in the Statements of Assets and Liabilities were as follows:

Assets	Derivative Financial Instruments	Commodity Contracts	Credit Contracts	Equity Contracts	Foreign Currency Exchange Contracts	Interest Rate Contracts	Other Contracts	Total
Futures contracts	Net unrealized appreciation ¹					\$ 182,188		\$ 182,188

¹ Includes cumulative appreciation (depreciation) on futures contracts, if any, as reported in the Schedule of Investments. Only current day's variation margin is reported within the Statements of Assets and Liabilities.

For the six months ended October 31, 2016, the effect of derivative financial instruments in the Statements of Operations was as follows:

	Commodity Contracts	Credit Contracts	Equity Contracts	Foreign Currency Exchange Contracts	Interest Rate Contracts	Other Contracts	Total
Net Realized Gain (Loss) from:							
Futures contracts					\$ 93,428		\$ 93,428
Net Change in Unrealized Appreciation (Depreciation) on:							
Futures contracts					\$ 132,651		\$ 132,651

Average Quarterly Balances of Outstanding Derivative Financial Instruments

Futures contracts:	
Average notional value of contracts	short \$ 8,022,148

For more information about the Fund's investment risks regarding derivative financial instruments, refer to the Notes to Financial Statements.

See Notes to Financial Statements.

Schedule of Investments (concluded)

BlackRock MuniHoldings Quality Fund, Inc. (MUS)

Fair Value Hierarchy as of Period End

Various inputs are used in determining the fair value of investments and derivative financial instruments. For information about the Fund's policy regarding valuation of investments and derivative financial instruments, refer to the Notes to Financial Statements.

The following tables summarize the Fund's investments and derivative financial instruments categorized in the disclosure hierarchy:

	Level 1	Level 2	Level 3	Total
Assets:				
Investments:				
Long-Term Investments ¹		\$ 300,611,527		\$ 300,611,527
Short-Term Securities	\$ 1,556,710			1,556,710
Total	\$ 1,556,710	\$ 300,611,527		\$ 302,168,237

Derivative Financial Instruments²

Assets:				
Interest rate contracts	\$ 182,188			\$ 182,188

¹ See above Schedule of Investments for values in each state or political subdivision.

² Derivative financial instruments are futures contracts which are valued at the unrealized appreciation (depreciation) on the instrument.

The Fund may hold assets and/or liabilities in which the fair value approximates the carrying amount for financial statement purposes. As of period end, such assets and/or liabilities are categorized within the disclosure hierarchy as follows:

	Level 1	Level 2	Level 3	Total
Assets:				
Cash pledged for futures contracts	\$ 126,150			\$ 126,150
Liabilities:				
TOB Trust Certificates		\$ (25,313,395)		(25,313,395)
VMTP Shares at Liquidation Value		(87,000,000)		(87,000,000)
Total	\$ 126,150	\$ (112,313,395)		\$ (112,187,245)

During the six months ended October 31, 2016, there were no transfers between levels.

See Notes to Financial Statements.

Schedule of Investments October 31, 2016 (Unaudited)

BlackRock Muni Intermediate Duration Fund, Inc. (MUI)

(Percentages shown are based on Net Assets)

	Par	
	(000)	Value
Municipal Bonds		
Alabama 2.8%		
City of Birmingham Alabama Special Care Facilities Financing Authority, RB, Children s Hospital (AGC), 6.00%, 6/01/19 (a)	\$ 4,615	\$ 5,200,090
County of Jefferson Alabama, RB, Limited Obligation School, Series A: 5.50%, 1/01/21	5,500	5,530,305
5.25%, 1/01/23	6,500	6,535,815
		17,266,210
Arizona 3.5%		
Arizona Board of Regents, University of Arizona, RB, 5.00%, 8/01/28	2,000	2,293,600
Arizona Health Facilities Authority, Refunding RB, Phoenix Children s Hospital, Series A, 5.00%, 2/01/30	2,685	2,972,805
Arizona State University, RB, Series D, 5.00%, 7/01/32	1,350	1,616,126
City of Phoenix Arizona IDA, RB, Facility, Legacy Traditional Schools Project, Series A, 5.75%, 7/01/24 (b)	750	851,775
City of Tucson Arizona, COP, Refunding, (AGC), 4.00%, 7/01/20	2,325	2,543,782
County of Pinal Arizona Electric District No. 3, Refunding RB, 5.00%, 7/01/21 (a)	1,600	1,875,104
Glendale Union School District No. 205, GO, Series C: 5.00%, 7/01/24	1,945	2,335,692
5.00%, 7/01/27	500	587,210
Phoenix-Mesa Gateway Airport Authority, RB, Mesa Project, AMT: 5.00%, 7/01/27	700	796,075
5.00%, 7/01/32	1,925	2,139,022
Scottsdale IDA, Refunding RB, Scottsdale Healthcare, Series C (AGM), 5.00%, 9/01/35	2,050	2,254,282
State of Arizona, COP, Department of Administration, Series A (AGM), 4.25%, 10/01/23	1,000	1,072,910
		21,338,383
Arkansas 1.0%		
Arkansas State University, RB, 5.00%, 12/01/33	480	554,078
City of Benton, RB, 5.00%, 6/01/29	1,055	1,248,877
University of Arkansas, Refunding RB: 5.00%, 3/01/31	2,315	2,765,476
5.00%, 3/01/34	1,270	1,499,083
		6,067,514
California 3.9%		
California Health Facilities Financing Authority, RB, Sutter Health, Series B, 5.00%, 8/15/22	2,135	2,474,935
California Health Facilities Financing Authority, Refunding RB, 5.00%, 11/15/29	1,930	2,354,195
California Infrastructure & Economic Development Bank, Refunding RB, 4.00%, 11/01/31	1,335	1,464,522
California Pollution Control Financing Authority, RB, Mandatory Put Bonds, Republic Services, Inc. Project, Series B, AMT, 5.25%, 6/01/23 (c)	605	629,714
California Pollution Control Financing Authority, Refunding RB, Pacific Gas, Series C, AMT (NPFGC), 4.75%, 12/01/23	5,000	5,105,600
City of San Jose California, Refunding ARB, Series A-1, AMT, 5.00%, 3/01/25	2,000	2,246,240
State of California, GO: 5.50%, 4/01/28	15	15,061
Various Purposes, 5.00%, 11/01/17 (a)	1,235	1,287,574
Various Purposes, 5.75%, 4/01/31	7,000	7,772,800
Various Purposes, 5.00%, 11/01/32	765	794,605
		24,145,246
	Par	
	(000)	Value
Municipal Bonds		
Colorado 1.0%		
Denver Urban Renewal Authority, Refunding, Tax Allocation Bond, Stapleton, Senior-Series A-1, 5.00%, 12/01/23	\$ 2,500	\$ 2,963,325

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

Park Creek Metropolitan District, Refunding, Tax Allocation Bonds, 5.00%, 12/01/34	500	570,020
University of Northern Colorado, Refunding RB, Series A, 5.00%, 6/01/31	2,000	2,350,960
		5,884,305
Connecticut 3.4%		
Connecticut State Health & Educational Facility Authority, Refunding RB:		
5.00%, 12/01/33	4,015	4,775,160
Lawrence & Memorial Hospital, Series F, 5.00%, 7/01/31	4,530	5,004,744
University of Connecticut, RB, Series A:		
5.00%, 3/15/31	5,025	6,022,261
5.00%, 3/15/32	4,000	4,768,160
		20,570,325
Florida 6.7%		
County of Broward Florida School Board, COP, Refunding, Series A (AGM), 5.00%, 7/01/24	10,000	11,440,500
County of Lee Florida, Refunding ARB, Series A, AMT:		
5.50%, 10/01/23	1,000	1,164,600
(AGM), 5.00%, 10/01/27	1,635	1,852,422
County of Miami-Dade Florida, RB, AMT, Series B:		
6.00%, 10/01/28	3,470	4,268,482
6.00%, 10/01/29	3,480	4,264,636
County of Miami-Dade Florida Educational Facilities Authority, Refunding RB, Series A, 5.00%, 4/01/32	5,020	5,888,108
County of Miami-Dade Florida Transit System Sales Surtax Revenue, Refunding RB, 5.00%, 7/01/32	1,500	1,746,915
County of Miami-Dade Florida Water & Sewer System Revenue, Refunding RB, Series C (BHAC), 5.00%, 10/01/18 (a)	8,000	8,621,840
Midtown Miami Community Development District, Refunding, Special Assessment Bonds, Series A, 4.25%, 5/01/24	1,665	1,784,947
Sterling Hill Community Development District, Refunding RB, Special Assessment Bonds, Series B, 5.50%, 11/01/15 (d)(e)	150	104,976
		41,137,426
Georgia 1.9%		
City of Atlanta Georgia Water & Wastewater Revenue RB, Refunding RB, 5.00%, 11/01/32	10,000	11,903,700
Hawaii 0.9%		
State of Hawaii Airports System, Refunding ARB, Series A, 5.25%, 7/01/29	5,000	5,686,550
Idaho 0.4%		
Boise State University, Refunding RB, Series A:		
5.00%, 4/01/32	1,300	1,565,109
5.00%, 4/01/33	1,000	1,198,370
		2,763,479
Illinois 16.8%		
City of Chicago Illinois Midway International Airport, Refunding ARB, 2nd Lien, Series A:		
5.00%, 1/01/32	5,000	5,647,250
AMT, 5.50%, 1/01/32	1,500	1,734,285
City of Chicago Illinois O Hare International Airport, Refunding GARB, AMT, Series C:		
5.25%, 1/01/28	1,350	1,579,392
5.25%, 1/01/29	3,020	3,512,411

See Notes to Financial Statements.

Schedule of Investments (continued)

BlackRock Muni Intermediate Duration Fund, Inc. (MUI)

	Par	
	(000)	Value
Municipal Bonds		
Illinois (continued)		
City of Chicago Illinois O Hare International Airport, RB, Refunding GARB, 5.00%, 1/01/32	\$ 3,745	\$ 4,381,350
City of Chicago Illinois O Hare International Airport, Refunding GARB, Senior Lien, Series A, AMT, 5.00%, 1/01/23	13,000	15,292,940
City of Chicago Illinois Transit Authority, RB, 5.25%, 12/01/31	3,700	4,132,234
Illinois State Toll Highway Authority, Refunding RB, Senior, Series A, 5.00%, 12/01/32	5,690	6,736,107
Madison-Macoupin Etc. Counties Community College District No. 536, GO, Refunding, Lewis & Clark Community College:		
5.00%, 5/01/30	475	526,566
5.00%, 5/01/31	500	554,280
5.00%, 5/01/32	500	553,560
McHenry County Conservation District, GO, 5.13%, 2/01/17 (a)	12,695	12,834,899
Railsplitter Tobacco Settlement Authority, RB:		
5.50%, 6/01/23	3,500	4,057,620
6.25%, 6/01/24	11,750	11,884,067
State of Illinois, GO:		
5.25%, 2/01/30	5,000	5,445,450
5.00%, 5/01/30	10,000	10,595,900
State of Illinois Toll Highway Authority, RB, Series A, 5.00%, 1/01/34	9,140	10,466,123
Village of Hodgkins Illinois, RB, MBM Project, AMT, 5.90%, 11/01/17	3,085	3,090,892
		103,025,326
Indiana 5.9%		
City of Whiting Indiana, RB, BP Products North America, Inc. Project, 5.25%, 1/01/21	4,800	5,482,512
County of Jasper Indiana, Refunding RB, Northern Indiana Public Service Co., Series C (NPFGC), 5.85%, 4/01/19	2,000	2,187,800
Indiana Finance Authority, RB, Wastewater, 1st Lien, Series A, 5.25%, 10/01/31	10,000	11,744,900
Indiana Finance Authority, Refunding RB, US Steel Corp. Project, 6.00%, 12/01/19	5,000	5,021,400
Indiana Municipal Power Agency, Refunding RB, Series A, 5.00%, 1/01/33	10,000	11,842,200
		36,278,812
Iowa 1.3%		
Iowa Higher Education Loan Authority, RB, Private College Facility:		
5.25%, 4/01/23	695	808,000
5.25%, 4/01/24	730	847,333
5.25%, 4/01/25	520	602,612
5.25%, 4/01/26	360	416,023
Iowa Higher Education Loan Authority, Refunding RB:		
Drake University Project, 4.00%, 4/01/27	620	706,112
Drake University Project, 4.00%, 4/01/28	750	845,040
Private College Facility, 5.00%, 9/01/20 (a)	2,315	2,645,119
Private College Facility, Upper Iowa University Project, 5.00%, 9/01/20 (f)	1,000	1,137,760
		8,007,999
Kansas 1.4%		
Kansas Development Finance Authority, Refunding RB, Adventist Health System/Sunbelt Obligated Group, Series C, 5.00%, 11/15/23	1,500	1,657,920
Seward County Unified School District No. 480 Liberal, GO, Refunding, 5.00%, 9/01/22 (a)	6,000	6,872,400
		8,530,320
	Par	
	(000)	Value
Municipal Bonds		
Louisiana 4.0%		
City of Bossier City Louisiana Utilities, Refunding RB, 5.00%, 10/01/32	\$ 2,000	\$ 2,363,360
City of New Orleans Louisiana Aviation Board, Refunding GARB, Restructuring, Series A-2 (AGC), 6.00%, 1/01/23	850	931,609
Louisiana Local Government Environmental Facilities & Community Development Authority, Refunding RB, BRCC Facilities Corp. Project:		

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

5.00%, 12/01/27	3,445	3,941,941
5.00%, 12/01/28	3,715	4,250,889
New Orleans Aviation Board, RB, Series A:		
5.00%, 1/01/32	1,000	1,155,620
5.00%, 1/01/33	1,000	1,151,690
State of Louisiana Gasoline & Fuels Tax Revenue, Refunding RB, 4.00%, 5/01/34	5,750	6,199,822
Terbonne Levee & Conservation District, RB, Sales Tax, 5.00%, 7/01/28	3,660	4,179,940
		24,174,871
Maine 0.3%		
Portland Housing Development Corp., Refunding RB, Senior Living, Retirement Facilities, Series A, 6.00%, 2/01/34	1,965	1,968,085
Maryland 0.8%		
Maryland EDC, RB, Transportation Facilities Project, Series A, 5.13%, 6/01/20	1,615	1,746,719
Maryland Health & Higher Educational Facilities Authority, RB, Johns Hopkins Health System, Series B, 5.00%, 7/01/33	1,140	1,303,271
Maryland Health & Higher Educational Facilities Authority, Refunding RB, 5.00%, 7/01/33	1,500	1,747,590
		4,797,580
Massachusetts 0.8%		
Massachusetts Development Finance Agency, RB, Dana-Farber Cancer Institute Issue, Series N, 5.00%, 12/01/33	1,300	1,548,443
Massachusetts Development Finance Agency, Refunding RB, 5.00%, 1/01/31	1,730	1,992,424
Massachusetts Health & Educational Facilities Authority, Refunding RB, Winchester Hospital, 5.00%, 7/01/25	1,060	1,178,423
		4,719,290
Michigan 3.1%		
Manistee Area Public Schools, GO, Refunding, (Q-SBLF), 5.00%, 5/01/25	1,000	1,142,090
Michigan Finance Authority, Refunding RB, Senior Lien, Detroit Water and Sewer, Series C-3 (AGM), 5.00%, 7/01/31	4,000	4,630,120
Michigan State Building Authority, Refunding RB, Facilities Program, Series II-A, 5.00%, 10/15/24	2,500	2,883,175
Michigan State Hospital Finance Authority, Refunding RB, Henry Ford Health System, 5.25%, 11/15/19 (a)	4,900	5,511,569
State of Michigan, Refunding RB, 5.00%, 3/15/27	3,750	4,677,112
		18,844,066
Minnesota 1.3%		
City of Minneapolis, RB, YMCA of the Greater Twin Cities Project:		
4.00%, 6/01/30	150	163,454
4.00%, 6/01/31	50	54,050
Minnesota Higher Education Facilities Authority, Refunding RB:		
St. Olaf College, Series 8-N, 4.00%, 10/01/33	750	827,445
University of St. Thomas, Series 8-L, 5.00%, 4/01/35	500	584,175

See Notes to Financial Statements.

Schedule of Investments (continued)

BlackRock Muni Intermediate Duration Fund, Inc. (MUI)

	Par	
	(000)	Value
Municipal Bonds		
Minnesota (continued)		
University of Minnesota, RB, Biomedical Science Research Facilities Funding Program:		
Series B, 5.00%, 8/01/36	\$ 1,000	\$ 1,149,790
Series C, 5.00%, 8/01/27	1,390	1,671,739
Series C, 5.00%, 8/01/28	740	889,162
Series C, 5.00%, 8/01/29	1,555	1,858,629
Series C, 5.00%, 8/01/30	835	992,414
		8,190,858
Montana 0.4%		
County of Gallatin Montana School District No 7 Bozeman, GO, 4.00%, 12/01/31	340	381,983
County of Yellowstone Montana School District No. 2 Billings, GO, 5.00%, 6/15/30	500	595,805
Montana State Board of Regents, RB, 5.00%, 11/15/30	1,000	1,196,780
		2,174,568
Nebraska 1.1%		
County of Douglas Nebraska Hospital Authority No. 3, Refunding RB, 5.00%, 11/01/30	800	930,176
County of Lancaster Nebraska Hospital Authority No. 1, Refunding RB, Immanuel Obligation Group, 5.50%, 1/01/30	1,000	1,115,000
Nebraska Public Power District, Refunding RB:		
Series A, 5.00%, 1/01/30	1,000	1,167,940
Series A, 5.00%, 1/01/32	2,000	2,319,720
Series A-1, 3.00%, 1/01/33	900	920,313
		6,453,149
Nevada 1.6%		
County of Clark Nevada Department of Aviation, Refunding RB, 5.00%, 7/01/33	5,000	5,791,400
County of Humboldt Nevada, Refunding RB, Idaho Power Co. Project, 5.15%, 12/01/24	3,800	4,150,094
		9,941,494
New Jersey 21.6%		
County of Essex New Jersey Improvement Authority, LRB, Newark Project, Series A (AGM), 5.00%, 11/01/20	2,000	2,195,840
New Jersey EDA, RB, AMT:		
Continental Airlines, Inc. Project, 5.13%, 9/15/23	6,040	6,719,923
Goethals Bridge Replacement Project, Private Activity Bond, 5.50%, 1/01/26	1,500	1,758,075
Goethals Bridge Replacement Project, Private Activity Bond, 5.50%, 1/01/27	1,000	1,170,640
New Jersey EDA, Refunding RB:		
New Jersey American Water Co., Series E, AMT, 4.70%, 12/01/25	3,000	3,260,610
School Facilities Construction, Series AA, 4.25%, 12/15/24	3,850	3,975,857
School Facilities Construction, Series EE, 5.00%, 9/01/23	3,465	3,762,574
New Jersey Educational Facilities Authority, RB, Higher Education Facilities Trust Fund, 5.00%, 6/15/28	10,000	11,219,000
New Jersey Educational Facilities Authority, Refunding RB, 5.00%, 7/01/30	5,000	5,857,900
New Jersey Higher Education Student Assistance Authority, Refunding RB:		
Series 1, AMT, 5.50%, 12/01/26	1,340	1,498,321
Student Loan, Series 1A, 4.75%, 12/01/21	1,555	1,654,691
New Jersey State Turnpike Authority, 5.00%, 1/01/32	12,000	14,106,360
New Jersey State Turnpike Authority, Refunding RB, Series B, 5.00%, 1/01/29	10,000	11,738,400
	Par	
	(000)	Value
Municipal Bonds		
New Jersey (continued)		
New Jersey Transportation Trust Fund Authority, RB:		
5.00%, 6/15/30 (g)	\$ 2,000	\$ 2,219,000
Series B, 5.25%, 6/15/26	3,500	3,894,940
Transportation Program, Series AA, 5.25%, 6/15/31	12,000	13,404,000
Transportation Program, Series AA, 5.25%, 6/15/32	2,250	2,531,880
Transportation System, Series A, 5.25%, 6/15/24	3,185	3,582,775

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

Transportation System, Series B, 5.50%, 6/15/31	13,970	15,671,546
Transportation System, Series C, 5.25%, 6/15/32	10,000	11,190,000
Newark Housing Authority, RB, Series A: 5.00%, 12/01/23	1,230	1,457,156
5.00%, 12/01/25	1,345	1,576,138
South Jersey Port Corp., RB, Marine Terminal, Series O-1 (AGC), 4.63%, 1/01/19 (a)	1,375	1,481,865
State of New Jersey, GO, Various Purposes, 5.00%, 6/01/28	5,000	5,952,700
		131,880,191
New Mexico 1.3%		
County of Albuquerque Bernalillo New Mexico Water Utility Authority, Refunding RB, 4.00%, 7/01/33	4,510	4,927,400
New Mexico Hospital Equipment Loan Council, Refunding RB, 5.00%, 8/01/31	2,500	2,975,375
		7,902,775
New York 19.3%		
Build NYC Resource Corp., Refunding RB, 5.00%, 7/01/33	3,085	3,568,142
City of New York New York, GO, Refunding, Series A, 5.00%, 8/01/29	6,125	7,440,037
City of New York New York, GO: Sub-Series B-1, 5.25%, 9/01/22	4,250	4,588,045
Sub-Series I-1, 5.50%, 4/01/21	5,000	5,524,800
Sub-Series-D- 1, 5.13%, 12/01/17 (a)	2,730	2,858,665
Sub-Series-D- 1, 5.13%, 12/01/26	1,885	1,971,993
City of New York New York Transitional Finance Authority, BARB, Fiscal 2009, Series S-3, 5.00%, 1/15/23	3,560	3,873,814
County of Monroe New York Industrial Development Corp., Refunding RB, Series A, 5.00%, 7/01/29	5,695	6,809,284
County of Nassau New York, GO, Series A: 5.00%, 1/01/32	1,000	1,182,070
5.00%, 1/01/33	3,110	3,662,429
County of Westchester New York Healthcare Corp., Refunding RB, Senior Lien, Remarketing, Series A: 5.00%, 11/01/24	5,470	6,266,213
5.00%, 11/01/30	655	732,552
Long Island Power Authority, Refunding RB, Electric System, Series A, 5.50%, 4/01/19 (a)	1,000	1,107,050
Metropolitan Transportation Authority, RB: Sub-Series B-1, 5.00%, 11/15/24	2,300	2,713,011
Sub-Series B-4, 5.00%, 11/15/24	1,500	1,769,355
New York City Trust for Cultural Resources, Refunding RB, Carnegie Hall, Series A, 5.00%, 12/01/29	2,750	3,050,575
New York State Dormitory Authority, RB: Mental Health Services (AGM), 5.00%, 8/15/18 (a)	3,625	3,890,459
Mental Health Services (AGM), 5.00%, 2/15/22	325	348,501
North Shore-Long Island Jewish Health System, Series A, 5.50%, 5/01/19 (a)	1,495	1,662,275
New York State Dormitory Authority, Refunding RB: 4.25%, 9/01/19 (a)	480	520,843
5.00%, 7/01/30	1,555	1,899,541

See Notes to Financial Statements.

Schedule of Investments (continued)

BlackRock Muni Intermediate Duration Fund, Inc. (MUI)

	Par	
	(000)	Value
Municipal Bonds		
New York (continued)		
New York State Thruway Authority, RB, Junior Lien, Series A:		
5.00%, 1/01/33	\$ 4,500	\$ 5,343,390
5.00%, 1/01/34	2,000	2,365,920
Port Authority of New York & New Jersey, ARB, JFK International Air Terminal LLC Project, 5.00%, 12/01/20	2,475	2,788,533
Port Authority of New York & New Jersey, Refunding ARB, Consolidated, 152nd Series, AMT, 5.00%, 11/01/23	1,000	1,058,430
Port Authority of New York & New Jersey, Refunding RB, 5.00%, 11/01/28	6,185	7,605,138
State of New York Dormitory Authority, RB:		
Fordham University, Series A, 5.25%, 7/01/25	900	1,038,159
Icahn School of Medicine at Mount Sinai, Series A, 5.00%, 7/01/32	9,000	10,483,830
Mental Health Services (AGM), 5.00%, 8/15/18 (a)	10	10,736
Mental Health Services (AGM), 5.00%, 8/15/18 (a)	30	32,208
Mental Health Services, 2nd Series (AGM), 5.00%, 8/15/18 (a)	10	10,736
Municipal Health Facilities Lease, Sub-Series 2-4, 5.00%, 1/15/27	6,900	7,232,235
New York University Hospitals Center, Series A, 5.00%, 7/01/20 (a)	1,725	1,968,760
New York University Hospitals Center, Series A, 5.13%, 7/01/20 (a)	1,670	1,913,486
State of New York Dormitory Authority, Refunding RB, North Shore-Long Island Jewish Obligated Group, Series A, 5.00%, 5/01/32	3,060	3,619,399
State of New York Urban Development Corp., RB, Service Contract, Series B, 5.00%, 1/01/21	6,500	6,943,170
		117,853,784
North Carolina 0.3%		
North Carolina Medical Care Commission, Refunding RB, WakeMed, Series A, 5.00%, 10/01/31	1,500	1,712,775
Ohio 1.2%		
State of Ohio Turnpike Commission, RB, Junior Lien, Infrastructure Projects, Series A-1, 5.25%, 2/15/31	6,000	7,119,480
Oklahoma 0.8%		
Oklahoma City Public Property Authority, Refunding RB:		
5.00%, 10/01/27	1,190	1,433,831
5.00%, 10/01/28	1,265	1,511,030
5.00%, 10/01/29	1,400	1,661,254
		4,606,115
Oregon 2.5%		
County of Klamath Oregon School District, GO:		
5.00%, 6/15/30	1,000	1,185,870
5.00%, 6/15/31	1,000	1,182,460
County of Umatilla Oregon School District No. 16R Pendleton, GO, Series A, 5.00%, 6/15/32	2,000	2,367,840
County of Yamhill Oregon School District No. 40 McMinnville, GO, 4.00%, 6/15/33	1,380	1,533,566
Klamath Falls Intercommunity Hospital Authority, Refunding RB, Sky Lakes Medical Center Project:		
5.00%, 9/01/30	400	477,448
5.00%, 9/01/31	300	354,963
5.00%, 9/01/32	540	635,888
Oregon Health & Science University, Refunding RB, Series B, 5.00%, 7/01/33	2,500	3,019,350
Oregon State Facilities Authority, Refunding RB, Reed College Project, Series A, 5.00%, 7/01/29	1,835	2,059,421
State of Oregon, GO, Series H, 5.00%, 5/01/36	2,000	2,331,440
		15,148,246
	Par	
	(000)	Value
Municipal Bonds		
Pennsylvania 4.1%		
City of Philadelphia Pennsylvania, ARB, Series A, AMT, 5.00%, 6/15/20	\$ 2,895	\$ 2,967,578
County of Allegheny Pennsylvania, GO, Refunding, Series C-68, 5.00%, 11/01/25	2,515	2,909,654
County of Allegheny Pennsylvania, GO, Series C-67:		
5.00%, 11/01/25	2,700	3,133,539
5.00%, 11/01/26	2,375	2,728,044
Pennsylvania Turnpike Commission, RB:		

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

Series B, 5.00%, 12/01/32	1,500	1,757,760
Sub-Series B, 5.25%, 12/01/31	4,000	4,544,440
South Fork Municipal Authority, Refunding RB, Conemaugh Valley Memorial Hospital, Series A (AGC), 6.00%, 7/01/20 (a)	6,225	7,308,274
		25,349,289
Puerto Rico 1.6%		
Puerto Rico Housing Finance Authority, Refunding RB, M/F Housing, Subordinate, Capital Fund Modernization, 5.13%, 12/01/27	9,000	9,615,330
Rhode Island 1.8%		
Narragansett Bay Commission, Refunding RB, Series B, 5.00%, 9/01/32	4,150	4,965,309
Providence Redevelopment Agency, Refunding RB, Series A, 5.00%, 4/01/29	1,000	1,128,530
Rhode Island Health & Educational Building Corp., RB, City of Newport Issue Financing Program, Series C, 5.00%, 5/15/30	2,305	2,641,092
Rhode Island Health & Educational Building Corp., Refunding RB, 5.00%, 9/01/32	2,000	2,375,760
		11,110,691
South Carolina 1.9%		
South Carolina State Public Service Authority, Refunding RB, Series A, 5.00%, 12/01/34	10,000	11,856,200
South Dakota 0.2%		
South Dakota Health & Educational Facilities Authority, Refunding RB, Regional Health, 5.00%, 9/01/25	1,000	1,120,360
Tennessee 2.0%		
County of Memphis-Shelby Tennessee Sports Authority, Inc., Refunding RB, Memphis Arena Project:		
Series A, 5.00%, 11/01/23	2,695	2,971,103
Series B, 5.00%, 11/01/22	1,000	1,104,310
Knox County Health Educational & Housing Facility Board Tennessee, Refunding RB, Eastowne Village Project, 4.00%, 6/01/31 (c)	3,275	3,455,911
Metropolitan Government Nashville & Davidson County Health & Educational Facilities Board, RB, Vanderbilt University Medical Center, Series A, 5.00%, 7/01/35	4,000	4,692,480
		12,223,804
Texas 7.1%		
City of Grapevine Texas, GO, 5.00%, 2/15/33	5,685	6,655,032
City of Houston Texas, Refunding ARB, Subordinate Lien, Series A, AMT:		
5.00%, 7/01/25	1,500	1,688,835
5.00%, 7/01/32	1,010	1,118,949
Dallas/Fort Worth International Airport, Refunding RB, AMT:		
Series E, 5.00%, 11/01/26	2,185	2,462,539
Series E, 5.00%, 11/01/27	4,960	5,583,869
Series F, 5.00%, 11/01/31	6,345	7,083,177
Love Field Airport Modernization Corp., RB, Southwest Airlines Co. Project, AMT, 5.00%, 11/01/28	1,000	1,132,240
North Texas Tollway Authority, Refunding RB, Series A, 5.00%, 1/01/33	2,500	2,959,625

See Notes to Financial Statements.

Schedule of Investments (continued)

BlackRock Muni Intermediate Duration Fund, Inc. (MUI)

	Par	
	(000)	Value
Municipal Bonds		
Texas (continued)		
Red River Education Financing Corp., RB, 5.00%, 3/15/33	\$ 1,340	\$ 1,565,388
San Jacinto River Authority, RB, Special Project (AGM), 5.25%, 10/01/25	2,910	3,204,230
Socorro ISD, GO, Refunding, School Building (PSF-GTD), 5.00%, 8/15/32	2,500	2,828,125
Via Metropolitan Transit Authority, Refunding RB:		
5.25%, 8/01/28	1,585	1,873,105
5.25%, 8/01/29	1,720	2,003,628
5.25%, 8/01/33	3,000	3,483,090
		43,641,832
U.S. Virgin Islands 0.9%		
Virgin Islands Public Finance Authority, Refunding RB, Series A, 5.25%, 10/01/24	5,000	5,681,750
Vermont 1.0%		
University of Vermont & State Agricultural College, Refunding RB, 4.00%, 10/01/30	5,565	6,165,297
West Virginia 1.0%		
West Virginia Hospital Finance Authority, Refunding RB, Charleston Area Medical Center, Inc., Series A, 5.13%, 9/01/23	4,000	4,363,360
West Virginia University, RB, West Virginia University Project, Series B, 5.00%, 10/01/30	1,500	1,731,750
		6,095,110
Wisconsin 1.6%		
Public Finance Authority, Refunding RB, AMT:		
National Gypsum Co., 5.25%, 4/01/30	2,410	2,638,685
Wisconsin Airport Facilities, Senior Obligated Group, Series B, 5.25%, 7/01/28	4,765	5,266,087
Wisconsin Health & Educational Facilities Authority, Refunding RB, The Monroe Clinic, Inc.:		
4.00%, 2/15/31	450	481,649
4.00%, 2/15/33	1,100	1,167,782
		9,554,203
Total Municipal Bonds 134.5%		822,506,788
Municipal Bonds Transferred to Tender Option Bond Trusts (h)		
Connecticut 1.9%		
Connecticut State Health & Educational Facility Authority, Refunding RB, 5.00%, 12/01/33	10,000	11,893,272
Illinois 1.5%		
Du Page & Will Counties Community School District No. 204, GO, School Building, Series A (NPFGC), 5.25%, 12/30/17 (a)	8,650	8,913,542
Louisiana 2.3%		
State of Louisiana, GO, Series A, 5.00%, 8/01/24	12,000	14,096,160
	Par	
Municipal Bonds Transferred to Tender Option Bond Trusts (h)		
	(000)	Value
Massachusetts 1.9%		
Massachusetts Development Finance Agency, Refunding RB, Partners Healthcare, Series L, 5.00%, 7/01/31	\$ 10,175	\$ 11,674,970
Minnesota 1.9%		
State of Minnesota, GO, State Various Purposes, Series A, 4.00%, 8/01/29	10,525	11,469,065
New York 9.3%		
City of New York New York, GO, Refunding, Series E, 5.00%, 8/01/27	3,507	3,864,172
City of New York New York, GO, Series I, 5.00%, 3/01/32	7,009	8,197,102
City of New York New York Municipal Water Finance Authority, Refunding RB, Water & Sewer System, Series A:		
4.75%, 6/15/17 (a)	1,508	1,544,496
4.75%, 6/15/30	6,492	6,650,064
Metropolitan Transportation Authority, RB, Series B, 5.25%, 11/15/19 (a)	4,001	4,512,961
	5,530	6,361,601

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

Port Authority of New York & New Jersey, ARB, Consolidated, 169th Series, AMT, 5.00%, 10/15/26

Port Authority of New York & New Jersey, RB, 178th Series, AMT, 5.00%, 12/01/32	4,009	4,619,291
Sales Tax Asset Receivable Corp., Refunding RB, Fiscal 2015, Series A, 5.00%, 10/15/31	5,010	6,159,995
State of New York Dormitory Authority, Refunding RB, Series E, 5.25%, 3/15/33	7,000	8,585,500
State of New York Urban Development Corp., RB, Personal Income Tax, Series A-1, 5.00%, 3/15/32	5,501	6,530,743
		57,025,925
Total Municipal Bonds Transferred to Tender Option Bond Trusts 18.8%		115,072,934
Total Long-Term Investments		
(Cost \$875,399,329) 153.3%		937,579,722

Short-Term Securities

	Shares	
BlackRock Liquidity Funds, MuniCash, Institutional Class, 0.44% (i)(j)	12,881,521	12,882,809
Total Short-Term Securities		
(Cost \$12,881,708) 2.1%		12,882,809
Total Investments (Cost \$888,281,037) 155.4%		950,462,531
Other Assets Less Liabilities 1.9%		11,286,294
Liability for TOB Trust Certificates, Including Interest Expense and Fees Payable (10.3)%		(63,213,962)
VMTP Shares, at Liquidation Value (47.0)%		(287,100,000)
Net Assets Applicable to Common Shares 100.0%		\$ 611,434,863

Notes to Schedule of Investments

- (a) U.S. Government securities, held in escrow, are used to pay interest on this security, as well as to retire the bond in full at the date indicated, typically at a premium to par.
- (b) Security exempt from registration pursuant to Rule 144A under the Securities Act of 1933, as amended. These securities may be resold in transactions exempt from registration to qualified institutional investors.
- (c) Variable rate security. Rate as of period end.
- (d) Non-income producing security.
- (e) Issuer filed for bankruptcy and/or is in default.
- (f) Security is collateralized by municipal bonds or U.S. Treasury obligations.

See Notes to Financial Statements.

Schedule of Investments (continued)

BlackRock Muni Intermediate Duration Fund, Inc. (MUI)

(g) When-issued security.

(h) Represent bonds transferred to a TOB Trust in exchange of cash and residual certificates received by the Fund. These bonds serve as collateral in a secured borrowing. See Note 4 of the Notes to Financial Statements for details.

(i) Current yield as of period end.

(j) During the six months ended October 31, 2016, investments in issuers considered to be an affiliate of the Fund for purposes of Section 2(a)(3) of the Investment Company Act of 1940, as amended, were as follows:

Affiliate	Shares Held at April 30, 2016	Net Activity	Shares Held at October 31, 2016	Value at October 31, 2016	Income	Realized Gain/Capital Gain
BlackRock Liquidity Funds, MuniCash, Institutional Class	12,303,103	578,418	12,881,521	\$ 12,882,809	\$ 13,236	\$ 10,490

Derivative Financial Instruments Outstanding as of Period End

Futures Contracts

Contracts	Issue	Expiration	Notional Value	Unrealized Appreciation
Short				
(3)	5-Year U.S. Treasury Note	December 2016	\$ 362,391	\$ 2,715
(151)	10-Year U.S. Treasury Note	December 2016	\$ 19,573,375	275,392
(63)	Long U.S. Treasury Bond	December 2016	\$ 10,251,281	395,401
Total				\$ 673,508

Derivative Financial Instruments Categorized by Risk Exposure

As of period end, the fair values of derivative financial instruments located in the Statements of Assets and Liabilities were as follows:

Assets	Derivative Financial Instruments	Commodity Contracts	Credit Contracts	Equity Contracts	Foreign Currency Exchange Contracts	Interest Rate Contracts	Other Contracts	Total
Futures contracts	Net unrealized appreciation ¹					\$ 673,508		\$ 673,508

¹ Includes cumulative appreciation (depreciation) on futures contracts, if any, as reported in the Schedule of Investments. Only current day's variation margin is reported within the Statements of Assets and Liabilities.

For the six months ended October 31, 2016, the effect of derivative financial instruments in the Statements of Operations was as follows:

Net Realized Gain (Loss) from:	Commodity Contracts	Credit Contracts	Equity Contracts	Foreign Currency Exchange Contracts	Interest Rate Contracts	Other Contracts	Total
Futures contracts					\$ 485,825		\$ 485,825

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

Net Change in Unrealized Appreciation (Depreciation) on:

Futures contracts	\$ 418,871	\$ 418,871
-------------------	------------	------------

Average Quarterly Balances of Outstanding Derivative Financial Instruments

Futures contracts:

Average notional value of contracts	long	\$ 546,060 ¹
Average notional value of contracts	short	\$ 41,177,672

¹ Actual amounts for the period are shown due to limited outstanding derivative financial instruments as of each quarter end.

For more information about the Fund's investment risks regarding derivative financial instruments, refer to the Notes to Financial Statements.

See Notes to Financial Statements.

Schedule of Investments (concluded)

BlackRock Muni Intermediate Duration Fund, Inc. (MUI)

Fair Value Hierarchy as of Period End

Various inputs are used in determining the fair value of investments and derivative financial instruments. For information about the Fund's policy regarding valuation of investments and derivative financial instruments, refer to the Notes to Financial Statements.

The following tables summarize the Fund's investments and derivative financial instruments categorized in the disclosure hierarchy:

	Level 1	Level 2	Level 3	Total
Assets:				
Investments:				
Long-Term Investments ¹		\$ 937,579,722		\$ 937,579,722
Short-Term Securities	\$ 12,882,809			12,882,809
Total	\$ 12,882,809	\$ 937,579,722		\$ 950,462,531

Derivative Financial Instruments²

Assets:				
Interest rate contracts	\$ 673,508			\$ 673,508

¹ See above Schedule of Investments for values in each state or political subdivision.

² Derivative financial instruments are futures contracts which are valued at the unrealized appreciation (depreciation) on the instrument.

The Fund may hold assets and/or liabilities in which the fair value approximates the carrying amount for financial statement purposes. As of period end, such assets and/or liabilities are categorized within the disclosure hierarchy as follows:

	Level 1	Level 2	Level 3	Total
Assets:				
Cash pledged for futures contracts	\$ 442,900			\$ 442,900
Liabilities:				
TOB Trust Certificates		\$ (63,101,848)		(63,101,848)
VMTP Shares at Liquidation Value		(287,100,000)		(287,100,000)
Total	\$ 442,900	\$ (350,201,848)		\$ (349,758,948)

During the six months ended October 31, 2016, there were no transfers between levels.

See Notes to Financial Statements.

Schedule of Investments October 31, 2016 (Unaudited)

BlackRock MuniVest Fund II, Inc. (MVT)

(Percentages shown are based on Net Assets)

	Par (000)	Value
Municipal Bonds		
Alabama 2.0%		
County of Jefferson Alabama, RB, Limited Obligation School, Series A, 5.25%, 1/01/19	\$ 1,490	\$ 1,498,211
County of Jefferson Alabama Sewer, Refunding RB:		
Senior Lien, Series A (AGM), 5.00%, 10/01/44	805	917,434
Sub-Lien, Series D, 6.00%, 10/01/42	3,575	4,249,245
		6,664,890
Alaska 0.3%		
Northern Tobacco Securitization Corp., Refunding RB, Tobacco Settlement, Asset-Backed, Series A, 4.63%, 6/01/23	1,045	1,061,396
Arizona 0.5%		
City of Phoenix Arizona IDA, RB, Legacy Traditional Schools Projects, Series A, 5.00%, 7/01/46	1,685	1,724,008
California 13.1%		
California Health Facilities Financing Authority, RB:		
St. Joseph Health System, Series A, 5.75%, 7/01/39	2,200	2,445,916
Sutter Health, Series B, 6.00%, 8/15/42	3,170	3,698,534
California Health Facilities Financing Authority, Refunding RB, St. Joseph Health System, Series A, 5.00%, 7/01/33	890	1,028,778
California Municipal Finance Authority, RB, Senior, Caritas Affordable Housing, Inc. Projects, S/F Housing, Series A:		
5.25%, 8/15/39	145	167,832
5.25%, 8/15/49	370	425,485
California Pollution Control Financing Authority, RB, Poseidon Resources (Channel Side) LP Desalination Project, AMT, 5.00%, 11/21/45 (a)	1,495	1,646,010
California Statewide Communities Development Authority, RB, Loma Linda University Medical Center, Series A (a):		
5.00%, 12/01/41	290	322,651
5.00%, 12/01/46	635	699,999
City of Los Angeles California Department of Airports, Refunding ARB, Los Angeles International Airport, Series A:		
Senior, 5.00%, 5/15/40	5,930	6,670,953
5.25%, 5/15/39	800	880,152
City of Stockton California Public Financing Authority, RB, Delta Water Supply Project, Series A, 6.25%, 10/01/40	360	447,383
Golden State Tobacco Securitization Corp., Refunding RB, Asset-Backed, Series A-1, 5.13%, 6/01/47	2,165	2,082,838
San Marcos Unified School District, GO, CAB, Election of 2010, Series B, 0.00%, 8/01/42 (b)	2,000	737,880
State of California, GO, Various Purposes:		
6.00%, 3/01/33	2,525	2,930,793
6.50%, 4/01/33	14,925	16,857,041
State of California Public Works Board, LRB, Various Capital Projects:		
Series I, 5.00%, 11/01/38	775	913,423
Sub-Series I-1, 6.38%, 11/01/19 (c)	1,185	1,373,794
Tobacco Securitization Authority of Southern California, Refunding RB, Tobacco Settlement, Asset-Backed, Senior Series A-1, 4.75%, 6/01/25	665	680,627
		44,010,089
Colorado 0.3%		
Colorado Health Facilities Authority, RB, Catholic Health Initiatives, Series D, 6.25%, 10/01/33	1,060	1,155,612
Connecticut 1.6%		
Connecticut State Health & Educational Facility Authority, RB, Ascension Health Senior Credit, Series A, 5.00%, 11/15/40	1,375	1,504,112
	Par (000)	Value
Municipal Bonds		
Connecticut (continued)		
Connecticut State Health & Educational Facility Authority, Refunding RB, Wesleyan University, Series G, 5.00%, 7/01/20 (c)	\$ 3,385	\$ 3,854,161
		5,358,273
Delaware 2.1%		

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

County of Sussex Delaware, RB, NRG Energy, Inc., Indian River Power LLC Project, 6.00%, 10/01/40	1,125	1,241,809
Delaware Transportation Authority, RB, 5.00%, 6/01/55	1,165	1,321,273
State of Delaware EDA, RB, Exempt Facilities, Indian River Power LLC Project, 5.38%, 10/01/45	4,065	4,383,411
		6,946,493
District of Columbia 3.3%		
District of Columbia, Refunding RB, Kipp Charter School, Series A, 6.00%, 7/01/43	240	285,756
Metropolitan Washington Airports Authority, Refunding RB, Dulles Toll Road:		
1st Senior Lien, Series A, 5.25%, 10/01/44	1,500	1,647,165
CAB, 2nd Senior Lien, Series B (AGC), 0.00%, 10/01/33 (b)	6,590	3,503,706
CAB, 2nd Senior Lien, Series B (AGC), 0.00%, 10/01/34 (b)	4,830	2,469,627
CAB, 2nd Senior Lien, Series B (AGC), 0.00%, 10/01/35 (b)	6,515	3,149,872
		11,056,126
Florida 3.1%		
County of Collier Florida Health Facilities Authority, Refunding RB, Series A, 5.00%, 5/01/45	1,340	1,519,332
County of Miami-Dade Florida Aviation, Refunding ARB, Miami International Airport, Series A-1, 5.38%, 10/01/41	1,165	1,315,087
Mid-Bay Bridge Authority, RB, Springing Lien, Series A, 7.25%, 10/01/21 (c)	3,015	3,867,491
Palm Coast Park Community Development District, Special Assessment Bonds, 5.70%, 5/01/37	1,085	1,011,470
Village Community Development District No.10, Special Assessment Bonds, 5.13%, 5/01/43	2,305	2,553,364
		10,266,744
Georgia 1.6%		
City of Atlanta Georgia Water & Wastewater, Refunding RB, 5.00%, 11/01/40	600	700,716
County of Gainesville Georgia & Hall Hospital Authority, Refunding RB, Northeast Georgia Health System, Inc. Project, Series A, 5.50%, 8/15/54	515	619,277
DeKalb Private Hospital Authority, Refunding RB, Children's Healthcare, 5.25%, 11/15/39	130	143,693
Metropolitan Atlanta Rapid Transit Authority, RB, Sales Tax, 3rd Indenture, Series A, 5.00%, 7/01/39	3,465	3,800,863
Municipal Electric Authority of Georgia, Refunding RB, Series X, 6.50%, 1/01/20	150	161,412
		5,425,961
Hawaii 0.5%		
State of Hawaii Harbor System, RB, Series A, 5.25%, 7/01/30	1,355	1,516,801
Illinois 19.8%		
City of Chicago Illinois, GO, Project, Series A, 5.00%, 1/01/34	1,815	1,842,933
City of Chicago Illinois, GO, Refunding, Project, Series A, 5.25%, 1/01/32	4,555	4,742,211
City of Chicago Illinois, Special Assessment Bonds, Lake Shore East, 6.75%, 12/01/32	797	794,537
City of Chicago Illinois O'Hare International Airport, GARB, 3rd Lien, Series C, 6.50%, 1/01/41	5,865	7,016,124

See Notes to Financial Statements.

Schedule of Investments (continued)

BlackRock MuniVest Fund II, Inc. (MVT)

	Par (000)	Value
Municipal Bonds		
Illinois (continued)		
City of Chicago Illinois Transit Authority, RB, Sales Tax Receipts, 5.25%, 12/01/40	\$ 1,050	\$ 1,159,032
City of Chicago Illinois Waterworks, Refunding RB, 2nd Lien:		
Project, 5.00%, 11/01/42	915	1,001,129
(AGM), 5.25%, 11/01/33	1,325	1,397,782
County of Cook Illinois Community College District No. 508, GO, City College of Chicago, 5.50%, 12/01/38	805	911,679
Illinois Finance Authority, RB, Advocate Health Care Network, Series D, 6.50%, 11/01/18 (c)	5,000	5,551,300
Illinois Finance Authority, Refunding RB:		
Central Dupage Health, Series B, 5.50%, 11/01/39	1,610	1,816,450
Presence Health Network, Series C, 4.00%, 2/15/41	1,425	1,360,875
Illinois State Toll Highway Authority, RB:		
Senior, Series C, 5.00%, 1/01/36	2,615	3,011,669
Senior, Series C, 5.00%, 1/01/37	2,800	3,222,548
Series A, 5.00%, 1/01/38	1,980	2,259,972
Metropolitan Pier & Exposition Authority, Refunding RB, McCormick Place Expansion Project:		
Series B (AGM), 5.00%, 6/15/50	4,315	4,595,216
Series B-2, 5.00%, 6/15/50	2,500	2,612,575
Railsplitter Tobacco Settlement Authority, RB:		
5.50%, 6/01/23	440	510,101
6.00%, 6/01/28	1,140	1,338,645
Regional Transportation Authority, RB:		
Series A (AMBAC), 7.20%, 11/01/20	660	738,467
Series A (NPFGC), 6.70%, 11/01/21	4,030	4,569,657
Series C (NPFGC), 7.75%, 6/01/20	1,795	2,032,209
State of Illinois, GO:		
5.00%, 2/01/39	1,540	1,593,823
Series A, 5.00%, 4/01/35	3,000	3,113,160
Series A, 5.00%, 4/01/38	3,640	3,758,773
State of Illinois, RB, Build Illinois, Series B, 5.25%, 6/15/19 (c)	630	698,991
University of Illinois, RB, Auxiliary Facilities System, Series A:		
5.00%, 4/01/39	810	903,863
5.00%, 4/01/44	985	1,095,025
Village of Hodgkins Illinois, RB, Metropolitan Biosolids Management LLC Project, AMT, 6.00%, 11/01/23	2,800	2,805,236
		66,453,982
Indiana 4.5%		
City of Valparaiso Indiana, RB, Exempt Facilities, Pratt Paper LLC Project, AMT:		
6.75%, 1/01/34	790	970,001
7.00%, 1/01/44	1,905	2,362,467
Indiana Finance Authority, RB, Series A:		
CWA Authority Project, 1st Lien, 5.25%, 10/01/38	3,280	3,820,216
Private Activity Bond, Ohio River Bridges East End Crossing Project, AMT, 5.00%, 7/01/44	450	494,861
Private Activity Bond, Ohio River Bridges East End Crossing Project, AMT, 5.00%, 7/01/48	1,430	1,563,605
Private Activity Bond, Ohio River Bridges East End Crossing Project, AMT, 5.25%, 1/01/51	405	448,319
Sisters of St. Francis Health Services, 5.25%, 11/01/39	840	925,562
	Par (000)	Value
Municipal Bonds		
Indiana (continued)		
Indiana Finance Authority, Refunding RB, Parkview Health System, Series A, 5.75%, 5/01/31	\$ 2,795	\$ 3,100,689
Indianapolis Local Public Improvement Bond Bank, RB, Series A, 5.00%, 1/15/40	1,270	1,462,443
		15,148,163
Iowa 1.5%		
Iowa Finance Authority, Refunding RB, Midwestern Disaster Area, Iowa Fertilizer Co. Project:		
5.00%, 12/01/19	890	914,350
5.50%, 12/01/22	2,340	2,372,199
5.25%, 12/01/25	460	479,775
Iowa Student Loan Liquidity Corp., Refunding RB, Student Loan, Senior Series A-1, AMT, 5.15%, 12/01/22	1,190	1,263,530

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

		5,029,854
Kentucky 0.6%		
Kentucky Economic Development Finance Authority, RB, Catholic Health Initiatives, Series A, 5.25%, 1/01/45	995	1,108,878
Kentucky Public Transportation Infrastructure Authority, RB, Downtown Crossing Project, Convertible CAB, 1st Tier, Series C, 0.00%, 7/01/43 (d)	1,200	1,021,596
		2,130,474
Louisiana 2.7%		
Louisiana Local Government Environmental Facilities & Community Development Authority, RB, Westlake Chemical Corp. Project, Series A-1, 6.50%, 11/01/35	3,320	3,841,705
Tobacco Settlement Financing Corp., Refunding RB, Asset-Backed, Series A:		
5.50%, 5/15/30	1,020	1,150,958
5.25%, 5/15/31	870	973,869
5.25%, 5/15/32	1,110	1,261,426
5.25%, 5/15/33	1,205	1,360,096
5.25%, 5/15/35	505	569,130
		9,157,184
Maryland 1.1%		
Maryland Community Development Administration, Refunding, HRB, Residential, Series D, AMT, 4.90%, 9/01/42	1,500	1,518,780
Maryland EDC, RB, Transportation Facilities Project, Series A, 5.75%, 6/01/35	435	479,074
Maryland EDC, Refunding RB, CNX Marine Terminals, Inc., 5.75%, 9/01/25	750	761,018
Maryland Health & Higher Educational Facilities Authority, RB, University of Maryland Medical System, Series B (NPFGC), 7.00%, 7/01/22	725	860,698
		3,619,570
Massachusetts 3.5%		
Commonwealth of Massachusetts, GO, Series E, 3.00%, 4/01/44	1,370	1,280,662
Massachusetts Development Finance Agency, Refunding RB, Covanta Energy Project, Series C, AMT, 5.25%, 11/01/42 (a)	2,205	2,231,438
Massachusetts Health & Educational Facilities Authority, Refunding RB, Partners Healthcare System, Series J1, 5.00%, 7/01/39	990	1,084,050
Massachusetts HFA, RB, AMT:		
M/F Housing, Series A, 5.20%, 12/01/37	2,830	2,888,043
S/F Housing, Series 130, 5.00%, 12/01/32	2,240	2,243,450
Massachusetts HFA, Refunding RB, Series F, AMT, 5.70%, 6/01/40	1,955	2,037,032
		11,764,675

See Notes to Financial Statements.

Schedule of Investments (continued)

BlackRock MuniVest Fund II, Inc. (MVT)

	Par (000)	Value
Municipal Bonds		
Michigan 6.6%		
City of Detroit Michigan Sewage Disposal System, Refunding RB, Senior Lien, Series A, 5.25%, 7/01/39	\$ 4,425	\$ 4,942,548
Kalamazoo Hospital Finance Authority, Refunding RB, Bronson Methodist Hospital, 5.50%, 5/15/36	1,380	1,535,209
Michigan Finance Authority, Refunding RB:		
Detroit Water & Sewage Department Project, Senior Lien, Series C-1, 5.00%, 7/01/44	880	966,724
Henry Ford Health System, 4.00%, 11/15/46	1,420	1,430,508
Michigan State Hospital Finance Authority, Refunding RB, Series A:		
Henry Ford Health System, 5.25%, 11/15/46	5,080	5,088,839
McLaren Health Care, 5.75%, 5/15/18 (c)	7,560	8,122,161
		22,085,989
Mississippi 1.4%		
County of Lowndes Mississippi, Refunding RB, Solid Waste Disposal & Pollution Control, Weyerhaeuser Co. Project, Series A, 6.80%, 4/01/22	3,000	3,665,790
University of Southern Mississippi, RB, Campus Facilities Improvements Project, 5.38%, 9/01/19 (c)	1,065	1,194,610
		4,860,400
Missouri 0.2%		
Bi-State Development Agency of the Missouri-Illinois Metropolitan District, Refunding RB, Combined Lien, Series A, 5.00%, 10/01/44	255	291,664
State of Missouri Health & Educational Facilities Authority, Refunding RB, St. Louis College of Pharmacy Project, 5.50%, 5/01/43	245	272,665
		564,329
Nebraska 0.8%		
Central Plains Energy Project Nebraska, RB, Gas Project No. 3:		
5.25%, 9/01/37	825	939,238
5.00%, 9/01/42	1,445	1,616,594
		2,555,832
New Jersey 6.1%		
Casino Reinvestment Development Authority, Refunding RB:		
5.25%, 11/01/39	1,675	1,725,702
5.25%, 11/01/44	1,525	1,565,046
County of Essex New Jersey Improvement Authority, RB, AMT, 5.25%, 7/01/45 (a)	1,085	1,120,859
New Jersey EDA, RB, Continental Airlines, Inc. Project, AMT, 5.25%, 9/15/29	1,955	2,173,647
New Jersey EDA, Refunding, Special Assessment Bonds, Kapkowski Road Landfill Project, 5.75%, 4/01/31	2,240	2,600,394
New Jersey Housing & Mortgage Finance Agency, RB, S/F Housing, Series AA, 6.38%, 10/01/28	150	154,872
New Jersey State Turnpike Authority, RB:		
Series A, 5.00%, 1/01/43	1,985	2,261,372
Series E, 5.00%, 1/01/45	2,615	3,017,841
New Jersey Transportation Trust Fund Authority, RB:		
Transportation Program, Series AA, 5.00%, 6/15/44	1,270	1,369,111
Transportation System, Series A, 5.50%, 6/15/41	1,635	1,801,966
Transportation System, Series B, 5.25%, 6/15/36	2,460	2,696,037
		20,486,847
New York 16.0%		
Brooklyn Arena Local Development Corp., Refunding RB, Barclays Center Project, Series A, 3.00%, 7/15/43	2,655	2,502,523
City of New York New York Industrial Development Agency, RB, Special Needs Facilities Pooled Program, Series C-1, 6.50%, 7/01/17	255	255,173
	Par (000)	Value
Municipal Bonds		
New York (continued)		
City of New York New York Transitional Finance Authority, RB:		
Fiscal 2009, Series S-3, 5.25%, 1/15/39	\$ 6,700	\$ 7,271,443
Fiscal 2012, Sub-Series E-1, 5.00%, 2/01/42	1,960	2,255,823
	1,800	1,889,010

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

Counties of New York Tobacco Trust IV, Refunding RB, Settlement Pass-Through Turbo, Series A, 6.25%, 6/01/41 (a)		
County of Westchester New York Industrial Development Agency, RB, Special Needs Facilities Pooled Program, Series E-1, 6.50%, 7/01/17	400	400,568
Erie Tobacco Asset Securitization Corp., Refunding RB, Asset-Backed, Series A, 5.00%, 6/01/45	1,960	1,958,432
Metropolitan Transportation Authority, RB, Series C: 6.50%, 11/15/18 (c)	7,015	7,815,201
6.50%, 11/15/28	2,390	2,657,465
Metropolitan Transportation Authority Hudson Rail Yards Trust Obligations, Refunding RB, Series A, 5.00%, 11/15/56	1,045	1,180,777
New York Liberty Development Corp., RB, 1 World Trade Center Port Authority Consolidated, 5.25%, 12/15/43	10,735	12,527,852
New York Liberty Development Corp., Refunding RB: 2nd Priority, Bank of America Tower at One Bryant Park Project, Class 3, 6.38%, 7/15/49	1,220	1,362,703
3 World Trade Center Project, Class 1, 5.00%, 11/15/44 (a)	2,860	3,217,157
3 World Trade Center Project, Class 2, 5.15%, 11/15/34 (a)	340	386,532
3 World Trade Center Project, Class 2, 5.38%, 11/15/40 (a)	850	981,878
New York State Dormitory Authority, Refunding RB, General Purpose, Series A, 5.00%, 6/15/31	1,790	2,117,194
Port Authority of New York & New Jersey, ARB, Special Project, JFK International Air Terminal LLC Project, Series 8: 6.00%, 12/01/36	1,165	1,353,183
6.00%, 12/01/42	1,250	1,448,025
Westchester Tobacco Asset Securitization, Refunding RB, 5.13%, 6/01/45	2,300	2,300,000
		53,880,939
North Carolina 0.8%		
North Carolina Medical Care Commission, Refunding RB: 1st Mortgage, Retirement Facilities Whitestone Project, Series A, 7.75%, 3/01/41	595	677,717
Carolina Village Project, 6.00%, 4/01/38	2,000	2,068,620
		2,746,337
Ohio 1.4%		
Buckeye Tobacco Settlement Financing Authority, RB, Asset-Backed, Senior Turbo Term, Series A-2, 5.88%, 6/01/47	4,000	3,760,120
County of Franklin Ohio, RB, Health Care Facilities Improvement, OPRS Communities Obligation Group, Series A, 6.13%, 7/01/40	660	750,862
State of Ohio, RB, Portsmouth Bypass Project, AMT, 5.00%, 6/30/53	275	301,287
		4,812,269
Pennsylvania 1.8%		
City of Philadelphia Pennsylvania Hospitals & Higher Education Facilities Authority, RB, Temple University Health System, Series A, 5.63%, 7/01/42	635	701,415

See Notes to Financial Statements.

Schedule of Investments (continued)

BlackRock MuniVest Fund II, Inc. (MVT)

	Par (000)	Value
Municipal Bonds		
Pennsylvania (continued)		
Pennsylvania Economic Development Financing Authority, RB:		
Aqua Pennsylvania, Inc. Project, Series B, 5.00%, 11/15/40	\$ 1,890	\$ 2,076,316
Pennsylvania Bridge Finco LP, AMT, 5.00%, 6/30/42	850	940,533
Pennsylvania Economic Development Financing Authority, Refunding RB, National Gypsum Co., AMT, 5.50%, 11/01/44	1,035	1,137,424
Pennsylvania Turnpike Commission, RB, Series A, 5.00%, 12/01/44	1,105	1,269,402
		6,125,090
Rhode Island 2.0%		
Tobacco Settlement Financing Corp., Refunding RB:		
Series A, 5.00%, 6/01/40	820	883,378
Series B, 4.50%, 6/01/45	2,645	2,740,194
Series B, 5.00%, 6/01/50	2,945	3,057,263
		6,680,835
South Carolina 4.8%		
State of South Carolina Ports Authority, RB:		
5.25%, 7/01/40	3,280	3,658,086
AMT, 5.25%, 7/01/55	1,295	1,462,780
State of South Carolina Public Service Authority, RB, Santee Cooper, Series A, 5.50%, 12/01/54	6,180	7,280,411
State of South Carolina Public Service Authority, Refunding RB, Series E, 5.25%, 12/01/55	3,135	3,694,848
		16,096,125
Tennessee 0.6%		
City of Chattanooga Tennessee Health Educational & Housing Facility Board, RB, Catholic Health Initiatives, Series A, 5.25%, 1/01/45		
	995	1,108,878
Metropolitan Government Nashville & Davidson County Health & Educational Facilities Board, RB, Vanderbilt University Medical Center, Series A, 5.00%, 7/01/46		
	690	796,260
		1,905,138
Texas 6.9%		
Central Texas Regional Mobility Authority, Refunding RB, Senior Lien, 6.25%, 1/01/21 (c)		
	2,140	2,573,050
City of Dallas Texas Waterworks & Sewer System Revenue, Refunding RB:		
5.00%, 10/01/20 (c)	235	269,987
5.00%, 10/01/35	275	312,909
City of Houston Texas Airport System, Refunding ARB, United Airlines, Inc. Terminal E Project, AMT, 5.00%, 7/01/29		
	965	1,078,397
Clifton Higher Education Finance Corp., RB, Idea Public Schools, 6.00%, 8/15/43		
	745	891,430
County of Fort Bend Texas Industrial Development Corp., RB, NRG Energy Project, Series B, 4.75%, 11/01/42		
	670	711,466
County of Harris Texas Cultural Education Facilities Finance Corp., RB, 1st Mortgage, Brazos Presbyterian Homes, Inc. Project, Series B, 7.00%, 1/01/48		
	455	597,219
County of Harris Texas Health Facilities Development Corp., Refunding RB, Memorial Hermann Healthcare System, Series B, 7.25%, 12/01/18 (c)		
	2,000	2,261,220
North Texas Tollway Authority, Refunding RB, Series A:		
1st Tier System, 6.25%, 1/01/19 (c)	5,690	6,332,515
1st Tier System, 6.25%, 1/01/39	1,310	1,440,659
5.00%, 1/01/38	925	1,063,140
	Par (000)	Value
Municipal Bonds		
Texas (continued)		
Texas Private Activity Bond Surface Transportation Corp., RB, Senior Lien:		
LBJ Infrastructure Group LLC, 7.00%, 6/30/40	\$ 2,000	\$ 2,359,540
NTE Mobility Partners LLC, North Tarrant Express Managed Lanes Project, 6.88%, 12/31/39	2,775	3,224,217
		23,115,749
Utah 0.9%		
City of Riverton Utah, RB, IHC Health Services, Inc., 5.00%, 8/15/41	2,780	3,004,263
Virginia 2.6%		

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

County of Fairfax Virginia EDA, Refunding RB, Goodwin House, Inc. (c):		
5.13%, 10/01/17	500	520,035
5.13%, 10/01/17	3,440	3,577,841
Virginia Small Business Financing Authority, RB, Senior Lien, Elizabeth River Crossings OpCo LLC Project, AMT:		
5.25%, 1/01/32	1,615	1,814,630
6.00%, 1/01/37	2,365	2,753,262
		8,665,768
Washington 2.3%		
Port of Seattle Washington, RB, Series C, AMT, 5.00%, 4/01/40	755	856,699
Washington Health Care Facilities Authority, RB, Catholic Health Initiatives, Series A, 5.75%, 1/01/45	2,290	2,687,063
Washington Health Care Facilities Authority, Refunding RB, Catholic Health Initiatives, Series D, 6.38%, 10/01/36	3,700	4,031,372
		7,575,134
Wisconsin 3.7%		
State of Wisconsin, Refunding RB, Series A, 6.00%, 5/01/36	7,100	7,917,068
State of Wisconsin Health & Educational Facilities Authority, RB, Ascension Health Senior Credit Group, Series E, 5.00%, 11/15/33	2,465	2,732,872
Wisconsin Health & Educational Facilities Authority, Refunding RB, Medical College of Wisconsin, Inc., 4.00%, 12/01/46	1,810	1,904,554
		12,554,494
Total Municipal Bonds 121.0%		406,205,833
Municipal Bonds Transferred to Tender Option Bond Trusts (e)		
Alabama 0.5%		
Auburn University, Refunding RB, Series A, 4.00%, 6/01/41	1,680	1,810,284
California 6.2%		
Bay Area Toll Authority, Refunding RB, San Francisco Bay Area, Series F-1, 5.63%, 4/01/19 (c)	3,271	3,637,966
California Educational Facilities Authority, RB, University of Southern California, Series B, 5.25%, 10/01/18 (c)(f)	2,610	2,828,901
City & County of San Francisco California Public Utilities Commission, RB, Water Revenue, Series B, 5.00%, 11/01/19 (c)	9,480	10,602,811
Los Angeles Community College District California, GO, Election of 2001, Series A (AGM), 5.00%, 8/01/17 (c)	2,290	2,364,219
San Diego Community College District California, GO, Election of 2002, 5.25%, 8/01/19 (c)	1,077	1,202,275
		20,636,172

See Notes to Financial Statements.

Schedule of Investments (continued)

BlackRock MuniVest Fund II, Inc. (MVT)

Municipal Bonds Transferred to Tender Option Bond Trusts (e)	Par (000)	Value
Colorado 0.7%		
Colorado Health Facilities Authority, Refunding RB, Catholic Health Initiatives, Series A, 5.50%, 7/01/34 (f)	\$ 2,129	\$ 2,346,472
Connecticut 1.8%		
Connecticut State Health & Educational Facility Authority, RB, Yale University, Series Z-3, 5.05%, 7/01/42	6,000	6,163,620
Florida 1.9%		
County of Miami-Dade Florida, RB, Water & Sewer System, 5.00%, 10/01/34	5,679	6,408,704
Illinois 0.9%		
State of Illinois Toll Highway Authority, RB, Senior Priority, Series B, 5.50%, 1/01/18 (c)	2,999	3,162,465
Maryland 0.7%		
State of Maryland Transportation Authority, RB, Transportation Facilities Project (AGM), 5.00%, 7/01/41	2,290	2,431,179
Massachusetts 0.8%		
Massachusetts School Building Authority, RB, Senior, Series B, 5.00%, 10/15/41	2,266	2,634,704
New Hampshire 0.7%		
New Hampshire Health & Education Facilities Authority, RB, Dartmouth College, 5.25%, 6/01/19 (c)(f)	2,009	2,226,996
New York 8.0%		
City of New York New York Municipal Water Finance Authority, Refunding RB, Water & Sewer System, 2nd General Resolution, Series DD: 5.00%, 6/15/18 (c)	927	986,294
5.00%, 6/15/37	5,372	5,714,074
City of New York New York Municipal Water Finance Authority, Refunding RB, Water & Sewer System, 2nd General Resolution, Series FF-2, 5.50%, 6/15/40	1,575	1,751,180
Hudson Yards Infrastructure Corp., RB, Fiscal 2012, Series A, 5.75%, 2/15/47 (f)	1,610	1,880,942
Metropolitan Transportation Authority, Refunding RB, Series C-1, 5.25%, 11/15/56	4,720	5,674,456
New York Liberty Development Corp., Refunding RB, 4 World Trade Center Project, 5.75%, 11/15/51 (f)	6,440	7,555,340
Port Authority of New York & New Jersey, Refunding ARB, 194th Series, 5.25%, 10/15/55	2,595	3,106,604
		26,668,890
North Carolina 2.8%		
North Carolina Capital Facilities Finance Agency, Refunding RB, Duke University Project: Series A, 5.00%, 10/01/41	6,239	6,240,640
Series B, 5.00%, 10/01/55	2,550	2,989,900
		9,230,540
Ohio 5.2%		
Ohio Higher Educational Facility Commission, RB, Cleveland Clinic Health, Series A, 5.25%, 1/01/33	2,400	2,515,680
State of Ohio, Refunding RB, Cleveland Clinic Health System Obligated Group, Series A, 5.50%, 1/01/39	13,843	15,077,611
		17,593,291
Municipal Bonds Transferred to Tender Option Bond Trusts (e)	Par (000)	Value
South Carolina 1.6%		
South Carolina Public Service Authority, Refunding RB, Series A (c): 5.50%, 1/01/19 (f)	\$ 398	\$ 436,668
5.50%, 1/01/19	4,603	5,049,117
		5,485,785
Texas 2.8%		
City of San Antonio Texas Public Service Board, RB, Electric & Gas Systems, Junior Lien, 5.00%, 2/01/43	2,520	2,912,314
County of Harris Texas Metropolitan Transit Authority, Refunding RB, Series A, 5.00%, 11/01/41	3,400	3,917,412
Texas Department of Housing & Community Affairs, RB, S/F Housing Mortgage, Series B, AMT, 5.25%, 9/01/32	516	519,047

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

University of Texas, Refunding RB, Financing System, Series B, 5.00%, 8/15/43	1,831	2,155,916
		9,504,689
Washington 5.2%		
Central Puget Sound Regional Transit Authority, RB, Series A (c):		
5.00%, 11/01/17	4,500	4,692,330
5.00%, 11/01/17	4,500	4,692,330
(AGM), 5.00%, 11/01/17	7,693	8,022,258
		17,406,918
Wisconsin 0.8%		
Wisconsin Health & Educational Facilities Authority, Refunding RB, Froedtert & Community Health, Inc., Obligated Group, Series C, 5.25%, 4/01/39 (f)		
	2,499	2,676,995
Total Municipal Bonds Transferred to		
Tender Option Bond Trusts 40.6%		136,387,704
Total Long-Term Investments		
(Cost \$492,717,659) 161.6%		542,593,537

Short-Term Securities	Shares	
BlackRock Liquidity Funds, MuniCash, Institutional Class, 0.44% (g)(h)	1,381,488	1,381,626
Total Short-Term Securities		
(Cost \$1,381,488) 0.4%		1,381,626
Total Investments		
(Cost \$494,099,147) 162.0%		543,975,163
Other Assets Less Liabilities 1.7%		5,783,507
Liability for TOB Trust Certificates, Including Interest		
Expense and Fees Payable (22.0)%		(73,950,825)
VMTP Shares, at Liquidation Value (41.7)%		(140,000,000)
Net Assets Applicable to Common Shares 100.0%		\$ 335,807,845

Notes to Schedule of Investments

- (a) Security exempt from registration pursuant to Rule 144A under the Securities Act of 1933, as amended. These securities may be resold in transactions exempt from registration to qualified institutional investors.
- (b) Zero-coupon bond.
- (c) U.S. Government securities, held in escrow, are used to pay interest on this security, as well as to retire the bond in full at the date indicated, typically at a premium to par.

See Notes to Financial Statements.

Schedule of Investments (continued)

BlackRock MuniVest Fund II, Inc. (MVT)

- (d) Step-up bond that pays an initial coupon rate for the first period and then a higher coupon rate for the following periods. Rate as of period end.
- (e) Represent bonds transferred to a TOB Trust in exchange of cash and residual certificates received by the Fund. These bonds serve as collateral in a secured borrowing. See Note 4 of the Notes to Financial Statements for details.
- (f) All or a portion of security is subject to a recourse agreement. The aggregate maximum potential amount the Fund could ultimately be required to pay under the agreements, which expire between January 1, 2017 to November 15, 2019, is \$13,391,469. See Note 4 of the Notes to Financial Statements for details.
- (g) Current yield as of period end.
- (h) During the six months ended October 31, 2016, investments in issuers considered to be an affiliate of the Fund for purposes of Section 2(a)(3) of the Investment Company Act of 1940, as amended, were as follows:

Affiliate	Shares Held at April 30,	Net Activity	Shares Held at October 31,	Value at October 31,	Income	Realized Gain/Capital Gain
	2016		2016	2016		
BlackRock Liquidity Funds, MuniCash, Institutional Class	1,981,652	(600,164)	1,381,488	\$ 1,381,626	\$ 2,919	\$ 1,038

Derivative Financial Instruments Outstanding as of Period End

Futures Contracts

Contracts	Issue	Expiration	Notional Value	Unrealized Appreciation
Short				
(6)	5-Year U.S. Treasury Note	December 2016	\$ 724,781	\$ 5,431
(35)	10-Year U.S. Treasury Note	December 2016	\$ 4,536,875	62,589
(35)	Long U.S. Treasury Bond	December 2016	\$ 5,695,156	243,476
(7)	Ultra U.S. Treasury Bond	December 2016	\$ 1,231,563	71,384
Total				\$ 382,880

Derivative Financial Instruments Outstanding as of Period End

As of period end, the fair values of derivative financial instruments located in the Statements of Assets and Liabilities were as follows:

Assets	Derivative Financial Instruments	Commodity Contracts	Credit Contracts	Equity Contracts	Foreign Currency Exchange Contracts	Interest Rate Contracts	Other Contracts	Total
Futures contracts	Net unrealized appreciation ¹					\$ 382,880		\$ 382,880

¹ Includes cumulative appreciation (depreciation) on futures contracts, if any, as reported in the Schedule of Investments. Only current day's variation margin is reported within the Statements of Assets and Liabilities.

For the six months ended October 31, 2016, the effect of derivative financial instruments in the Statements of Operations was as follows:

	Commodity Contracts	Credit Contracts	Equity Contracts	Foreign Currency Exchange Contracts	Interest Rate Contracts	Other Contracts	Total
Net Realized Gain (Loss) from:							
Futures contracts					\$ 278,670		\$ 278,670
Net Change in Unrealized Appreciation (Depreciation) on:							
Futures contracts					\$ 282,847		\$ 282,847

Average Quarterly Balances of Outstanding Derivative Financial Instruments

Futures contracts:							
Average notional value of contracts	short						\$ 12,856,039

For more information about the Fund's investment risks regarding derivative financial instruments, refer to the Notes to Financial Statements.

Fair Value Hierarchy as of Period End

Various inputs are used in determining the fair value of investments and derivative financial instruments. For information about the Fund's policy regarding valuation of investments and derivative financial instruments, refer to the Notes to Financial Statements.

See Notes to Financial Statements.

Schedule of Investments (concluded)

BlackRock MuniVest Fund II, Inc. (MVT)

The following tables summarize the Fund's investments and derivative financial instruments categorized in the disclosure hierarchy:

	Level 1	Level 2	Level 3	Total
Assets:				
Investments:				
Long-Term Investments ¹		\$ 542,593,537		\$ 542,593,537
Short-Term Securities	\$ 1,381,626			1,381,626
Total	\$ 1,381,626	\$ 542,593,537		\$ 543,975,163

Derivative Financial Instruments²

Assets:				
Interest rate contracts	\$ 382,880			\$ 382,880

¹ See above Schedule of Investments for values in each state.

² Derivative financial instruments are futures contracts which are valued at the unrealized appreciation (depreciation) on the instrument.

The Fund may hold assets and/or liabilities in which the fair value approximates the carrying amount for financial statement purposes. As of period end, such assets and/or liabilities are categorized within the disclosure hierarchy as follows:

	Level 1	Level 2	Level 3	Total
Assets:				
Cash pledged for futures contracts	\$ 216,050			\$ 216,050
Liabilities:				
TOB Trust Certificates		\$ (73,814,588)		(73,814,588)
VMTP Shares at Liquidation Value		(140,000,000)		(140,000,000)
Total	\$ 216,050	\$ (213,814,588)		\$ (213,598,538)

During the six months ended October 31, 2016, there were no transfers between levels.

See Notes to Financial Statements.

Statements of Assets and Liabilities

	BlackRock MuniAssets Fund, Inc. (MUA)	BlackRock MuniEnhanced Fund, Inc. (MEN)	BlackRock MuniHoldings Fund, Inc. (MHD)	BlackRock MuniHoldings Fund II, Inc. (MUH)
October 31, 2016 (Unaudited)				
Assets				
Investments at value unaffiliated	\$ 577,257,403	\$ 571,022,293	\$ 398,078,544	\$ 287,981,071
Investments at value affiliated	165,111	1,191,451	864,761	1,171,159
Cash pledged for futures contracts	144,950	391,900	201,550	140,200
Receivables:				
Interest unaffiliated	10,030,530	7,396,312	5,656,212	4,047,307
Investments sold unaffiliated	1,175,450	960,000	23,861	24,336
Dividends affiliated	216	511	475	618
Prepaid expenses	3,412	63,621	15,365	15,174
Total assets	588,777,072	581,026,088	404,840,768	293,379,865
Accrued Liabilities				
Payables:				
Income dividends Common Shares	2,064,337	1,675,110	1,147,213	842,893
Investments purchased unaffiliated	651,104	5,791,094	1,258,229	910,426
Investment advisory fees	274,552	244,235	188,451	136,486
Interest expense and fees	134,438	128,315	118,756	92,324
Variation margin on futures contracts	18,672	51,422	27,859	19,141
Officers and Directors fees	5,153	5,410	3,300	2,380
Other accrued expenses	180,286	160,314	124,101	105,046
Total accrued liabilities	3,328,542	8,055,900	2,867,909	2,108,696
Other Liabilities				
TOB Trust Certificates	66,086,523	65,110,308	67,744,850	52,164,040
VRDP Shares, at liquidation value of \$100,000 per share, net of deferred offering costs ^{3,4}		142,302,234		
VMTP Shares, at liquidation value of \$100,000 per share ^{3,4}			83,700,000	55,000,000
Total other liabilities	66,086,523	207,412,542	151,444,850	107,164,040
Total liabilities	69,415,065	215,468,442	154,312,759	109,272,736
Net Assets Applicable to Common Shareholders	\$ 519,362,007	\$ 365,557,646	\$ 250,528,009	\$ 184,107,129
Net Assets Applicable to Common Shareholders Consist of				
Paid-in capital ^{5,6,7}	\$ 481,580,077	\$ 314,616,217	\$ 211,180,033	\$ 155,626,665
Undistributed net investment income	786,107	5,164,007	1,827,130	2,238,856
Accumulated net realized loss	(12,860,909)	(8,117,883)	(1,948,692)	(2,015,431)
Net unrealized appreciation (depreciation)	49,856,732	53,895,305	39,469,538	28,257,039
Net Assets Applicable to Common Shareholders	\$ 519,362,007	\$ 365,557,646	\$ 250,528,009	\$ 184,107,129
Net asset value per Common Share	\$ 14.47	\$ 12.33	\$ 17.69	\$ 16.27
¹ Investments at cost unaffiliated	\$ 527,633,426	\$ 517,779,728	\$ 358,940,950	\$ 259,953,117
² Investments at cost affiliated	\$ 165,101	\$ 1,191,332	\$ 864,675	\$ 1,171,042
³ Preferred Shares outstanding, par value \$0.10 per share		1,425	837	550
⁴ Preferred Shares authorized, including Auction Market Preferred Shares (AMPS)		8,905	5,837	4,030
⁵ Par value per Common Share	\$ 0.10	\$ 0.10	\$ 0.10	\$ 0.10
⁶ Common Shares outstanding	35,893,267	29,644,041	14,163,045	11,313,998
⁷ Common Shares authorized	200,000,000	199,991,095	199,994,163	199,995,970

See Notes to Financial Statements.

SEMI-ANNUAL REPORT

OCTOBER 31, 2016

69

Statements of Assets and Liabilities

October 31, 2016 (Unaudited)	BlackRock MuniHoldings Quality Fund, Inc. (MUS)	BlackRock Muni Intermediate Duration Fund, Inc. (MUI)	BlackRock MuniVest Fund II, Inc. (MVT)
Assets			
Investments at value unaffiliated	\$ 300,611,527	\$ 937,579,722	\$ 542,593,537
Investments at value affiliated	1,556,710	12,882,809	1,381,626
Cash pledged for futures contracts	126,150	442,900	216,050
Receivables:			
Interest unaffiliated	4,374,194	13,189,812	8,501,399
Investments sold unaffiliated	465,538	2,915,000	863,422
Dividends affiliated	478	4,804	668
Prepaid expenses	15,235	17,419	15,686
Total assets	307,149,832	967,032,466	553,572,388
Accrued Liabilities			
Payables:			
Investments purchased unaffiliated	4,100,720	2,169,940	1,723,671
Income dividends Common Shares	878,538	2,125,443	1,669,409
Investment advisory fees	136,794	450,194	234,095
Interest expense and fees	42,933	112,114	136,237
Variation margin on futures contracts	15,297	45,452	28,265
Officers and Directors fees	2,572	276,312	4,595
Other accrued expenses	105,943	216,300	153,683
Total accrued liabilities	5,282,797	5,395,755	3,949,955
Other Liabilities			
TOB Trust Certificates	25,313,395	63,101,848	73,814,588
VMTP Shares, at liquidation value of \$100,000 per share ^{3,4}	87,000,000	287,100,000	140,000,000
Total other liabilities	112,313,395	350,201,848	213,814,588
Total liabilities	117,596,192	355,597,603	217,764,543
Net Assets Applicable to Common Shareholders	\$ 189,553,640	\$ 611,434,863	\$ 335,807,845
Net Assets Applicable to Common Shareholders Consist of			
Paid-in capital ^{5,6,7}	\$ 175,203,065	\$ 543,452,920	\$ 286,796,232
Undistributed net investment income	2,223,512	3,202,832	2,393,519
Undistributed net realized gain (accumulated net realized loss)	(15,108,024)	1,924,109	(3,640,802)
Net unrealized appreciation (depreciation)	27,235,087	62,855,002	50,258,896
Net Assets Applicable to Common Shareholders	\$ 189,553,640	\$ 611,434,863	\$ 335,807,845
Net asset value per Common Share	\$ 14.56	\$ 15.97	\$ 15.89
¹ Investments at cost unaffiliated	\$ 273,558,784	\$ 875,399,329	\$ 492,717,659
² Investments at cost affiliated	\$ 1,556,554	\$ 12,881,708	\$ 1,381,488
³ Preferred Shares outstanding, par value \$0.10 per share	870	2,871	1,400
⁴ Preferred Shares authorized, including Auction Market Preferred Shares (AMPS)	6,230	15,671	8,400
⁵ Par value per Common Share	\$ 0.10	\$ 0.10	\$ 0.10
⁶ Common Shares outstanding	13,015,375	38,296,266	21,131,656
⁷ Common Shares authorized	199,993,770	199,984,329	199,991,600

See Notes to Financial Statements.

70

SEMI-ANNUAL REPORT

OCTOBER 31, 2016

Statements of Operations

Six Months Ended October 31, 2016 (Unaudited)	BlackRock MuniAssets Fund, Inc. (MUA)	BlackRock MuniEnhanced Fund, Inc. (MEN)	BlackRock MuniHoldings Fund, Inc. (MHD)	BlackRock MuniHoldings Fund II, Inc. (MUH)
Investment Income				
Interest unaffiliated	\$ 15,056,159	\$ 12,709,648	\$ 9,060,231	\$ 6,584,954
Dividends affiliated	2,151	3,339	2,798	3,119
Total income	15,058,310	12,712,987	9,063,029	6,588,073
Expenses				
Investment advisory	1,638,764	1,466,141	1,119,490	809,690
Professional	44,357	46,742	39,025	33,808
Accounting services	36,617	36,392	24,322	18,933
Transfer agent	32,155	20,775	13,793	12,480
Officer and Directors	27,277	20,392	13,619	9,962
Custodian	13,520	13,809	9,395	6,950
Registration	7,805	6,445	5,318	5,318
Printing	6,108	6,047	4,966	4,391
Rating agency		19,150	19,121	19,107
Miscellaneous	29,489	26,001	24,081	21,790
Total expenses excluding interest expense, fees and amortization of offering costs	1,836,092	1,661,894	1,273,130	942,429
Interest expense, fees and amortization of offering costs ¹	433,277	1,432,355	1,035,841	722,603
Total expenses	2,269,369	3,094,249	2,308,971	1,665,032
Less:				
Fees waived by the Manager	(627)	(930)	(828)	(820)
Fees paid indirectly	(60)	(2)	(30)	
Total expenses after fees waived and paid indirectly	2,268,682	3,093,317	2,308,113	1,664,212
Net investment income	12,789,628	9,619,670	6,754,916	4,923,861
Realized and Unrealized Gain (Loss)				
Net realized gain (loss) from:				
Investments unaffiliated	(7,469,159)	1,012,452	370,412	181,241
Investments affiliated	25	20	20	14
Futures contracts	306,265	79,817	315,342	276,618
Capital gain distributions from investment companies affiliated	1,167	685	589	1,486
	(7,161,702)	1,092,974	686,363	459,359
Net change in unrealized appreciation (depreciation) on:				
Investments unaffiliated	7,623,607	(6,547,413)	(4,429,207)	(3,142,708)
Investments affiliated	10	119	86	117
Futures contracts	65,535	541,271	204,630	170,680
	7,689,152	(6,006,023)	(4,224,491)	(2,971,911)
Net realized and unrealized gain (loss)	527,450	(4,913,049)	(3,538,128)	(2,512,552)
Net Increase in Net Assets Applicable to Common Shareholders Resulting from Operations	\$ 13,317,078	\$ 4,706,621	\$ 3,216,788	\$ 2,411,309

¹ Related to TOB Trusts, VRDP Shares and/or VMTP Shares.

See Notes to Financial Statements.

SEMI-ANNUAL REPORT

OCTOBER 31, 2016

71

Statements of Operations

Six Months Ended October 31, 2016 (Unaudited)	BlackRock MuniHoldings Quality Fund, Inc. (MUS)	BlackRock Muni Intermediate Duration Fund, Inc. (MUI)	BlackRock MuniVest Fund II, Inc. (MVT)
Investment Income			
Interest unaffiliated	\$ 6,716,043	\$ 18,286,489	\$ 12,827,298
Dividends affiliated	1,083	13,236	2,919
Total income	6,717,126	18,299,725	12,830,217
Expenses			
Investment advisory	847,571	2,701,209	1,398,041
Professional	36,134	60,395	45,263
Accounting services	21,911	56,116	31,857
Transfer agent	11,923	25,193	17,069
Officer and Directors	10,295	40,513	18,202
Custodian	8,153	22,051	12,833
Registration	5,318	8,348	5,435
Printing	4,418	8,123	5,863
Rating agency	19,123	19,222	19,149
Miscellaneous	18,122	29,778	23,437
Total expenses excluding interest expense, fees and amortization of offering costs	982,968	2,970,948	1,577,149
Interest expense, fees and amortization of offering costs ¹	831,047	2,585,501	1,529,019
Total expenses	1,814,015	5,556,449	3,106,168
Less:			
Fees waived by the Manager	(20,871)	(2,921)	(811)
Fees paid indirectly	(19)	(17)	(166)
Total expenses after fees waived and paid indirectly	1,793,125	5,553,511	3,105,191
Net investment income	4,924,001	12,746,214	9,725,026
Realized and Unrealized Gain (Loss)			
Net realized gain (loss) from:			
Investments unaffiliated	179,968	618,205	(912,078)
Investments affiliated	20	36	32
Futures contracts	93,428	485,825	278,670
Capital gain distributions from investment companies affiliated		10,454	1,006
	273,416	1,114,520	(632,370)
Net change in unrealized appreciation (depreciation) on:			
Investments unaffiliated	(3,701,807)	(8,872,682)	(5,106,347)
Investments affiliated	156	1,101	138
Futures contracts	132,651	418,871	282,847
	(3,569,000)	(8,452,710)	(4,823,362)
Net realized and unrealized loss	(3,295,584)	(7,338,190)	(5,455,732)
Net Increase in Net Assets Applicable to Common Shareholders Resulting from Operations	\$ 1,628,417	\$ 5,408,024	\$ 4,269,294

¹ Related to TOB Trusts and/or VMTP Shares.

See Notes to Financial Statements.

72

SEMI-ANNUAL REPORT

OCTOBER 31, 2016

Statements of Changes in Net Assets

	BlackRock MuniAssets Fund, Inc. (MUA)	
	Six Months Ended October 31, 2016 (Unaudited)	Year Ended April 30, 2016
Increase (Decrease) in Net Assets:		
Operations		
Net investment income	\$ 12,789,628	\$ 25,706,748
Net realized gain (loss)	(7,161,702)	1,159,369
Net change in unrealized appreciation (depreciation)	7,689,152	11,331,196
Net increase in net assets resulting from operations	13,317,078	38,197,313
Distributions to Shareholders¹		
From net investment income	(12,465,092)	(26,444,665)
Capital Share Transactions		
Reinvestment of distributions	812,598	603,849
Net Assets		
Total increase in net assets	1,664,584	12,356,497
Beginning of period	517,697,423	505,340,926
End of period	\$ 519,362,007	\$ 517,697,423
Undistributed net investment income, end of period	\$ 786,107	\$ 461,571

	BlackRock MuniEnhanced Fund, Inc. (MEN)		BlackRock MuniHoldings Fund, Inc. (MHD)	
	Six Months Ended October 31, 2016 (Unaudited)	Year Ended April 30, 2016	Six Months Ended October 31, 2016 (Unaudited)	Year Ended April 30, 2016
Increase (Decrease) in Net Assets Applicable to Common Shareholders:				
Operations				
Net investment income	\$ 9,619,670	\$ 20,603,138	\$ 6,754,916	\$ 14,211,504
Net realized gain (loss)	1,092,974	267,604	686,363	(788,818)
Net change in unrealized appreciation (depreciation)	(6,006,023)	7,915,622	(4,224,491)	6,631,201
Net increase in net assets applicable to Common Shareholders resulting from operations	4,706,621	28,786,364	3,216,788	20,053,887
Distributions to Common Shareholders¹				
From net investment income	(10,160,433)	(21,467,683)	(6,949,724)	(14,977,381)
Capital Share Transactions				
Reinvestment of common distributions	669,394	320,819	397,132	141,585
Net Assets Applicable to Common Shareholders				
Total increase (decrease) in net assets applicable to Common Shareholders	(4,784,418)	7,639,500	(3,335,804)	5,218,091
Beginning of period	370,342,064	362,702,564	253,863,813	248,645,722

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

End of period	\$ 365,557,646	\$ 370,342,064	\$ 250,528,009	\$ 253,863,813
Undistributed net investment income, end of period	\$ 5,164,007	\$ 5,704,770	\$ 1,827,130	\$ 2,021,938

¹ Distributions for annual periods determined in accordance with federal income tax regulations.

See Notes to Financial Statements.

SEMI-ANNUAL REPORT

OCTOBER 31, 2016

73

Statements of Changes in Net Assets

	BlackRock MuniHoldings Fund II, Inc. (MUH)		BlackRock MuniHoldings Fund, Inc. (MUS)	
	Six Months Ended October 31, 2016 (Unaudited)	Year Ended April 30, 2016	Six Months Ended October 31, 2016 (Unaudited)	Year Ended April 30, 2016
Increase (Decrease) in Net Assets Applicable to Common Shareholders:				
Operations				
Net investment income	\$ 4,923,861	\$ 10,317,643	\$ 4,924,001	\$ 10,353,759
Net realized gain (loss)	459,359	(190,418)	273,416	(169,645)
Net change in unrealized appreciation (depreciation)	(2,971,911)	3,796,031	(3,569,000)	3,870,246
Net increase in net assets applicable to Common Shareholders resulting from operations	2,411,309	13,923,256	1,628,417	14,054,360
Distributions to Common Shareholders¹				
From net investment income	(5,088,217)	(10,584,214)	(5,270,287)	(10,537,871)
Capital Share Transactions				
Reinvestment of common distributions	230,726		85,253	
Net Assets Applicable to Common Shareholders				
Total increase (decrease) in net assets applicable to Common Shareholders	(2,446,182)	3,339,042	(3,556,617)	3,516,489
Beginning of period	186,553,311	183,214,269	193,110,257	189,593,768
End of period	\$ 184,107,129	\$ 186,553,311	\$ 189,553,640	\$ 193,110,257
Undistributed net investment income, end of period	\$ 2,238,856	\$ 2,403,212	\$ 2,223,512	\$ 2,569,798
Increase (Decrease) in Net Assets Applicable to Common Shareholders:				
Operations				
Net investment income	\$ 12,746,214	\$ 27,875,664	\$ 9,725,026	\$ 20,552,412
Net realized gain (loss)	1,114,520	6,632,300	(632,370)	519,481
Net change in unrealized appreciation (depreciation)	(8,452,710)	13,784,860	(4,823,362)	3,314,874
Net increase in net assets applicable to Common Shareholders resulting from operations	5,408,024	48,292,824	4,269,294	24,386,767
Distributions to Common Shareholders¹				
From net investment income	(12,944,138)	(29,717,903)	(10,090,580)	(21,039,048)
From net realized gain		(7,044,253)		
Decrease in net assets resulting from distributions to shareholders	(12,944,138)	(36,762,156)	(10,090,580)	(21,039,048)

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

Capital Share Transactions

Reinvestment of common distributions			876,456	1,084,558
--------------------------------------	--	--	---------	-----------

Net Assets Applicable to Common Shareholders

Total increase (decrease) in net assets applicable to Common Shareholders	(7,536,114)	11,530,668	(4,944,830)	4,432,277
Beginning of period	618,970,977	607,440,309	340,752,675	336,320,398
End of period	\$ 611,434,863	\$ 618,970,977	\$ 335,807,845	\$ 340,752,675
Undistributed net investment income, end of period	\$ 3,202,832	\$ 3,400,756	\$ 2,393,519	\$ 2,759,073

¹ Distributions for annual periods determined in accordance with federal income tax regulations.

See Notes to Financial Statements.

Statements of Cash Flows

	BlackRock MuniAssets Fund, Inc. (MUA)	BlackRock MuniEnhanced Fund, Inc. (MEN)	BlackRock MuniHoldings Fund, Inc. (MHD)	BlackRock MuniHoldings Fund II, Inc. (MUH)
Six Months Ended October 31, 2016 (Unaudited)				
Cash Provided by (Used for) Operating Activities				
Net increase in net assets resulting from operations	\$ 13,317,078	\$ 4,706,621	\$ 3,216,788	\$ 2,411,309
Adjustments to reconcile net increase in net assets resulting from operations to net cash provided by (used for) operating activities:				
Proceeds from sales of long-term investments	30,214,327	24,721,772	14,441,333	11,754,080
Purchases of long-term investments	(35,798,774)	(23,630,273)	(23,316,683)	(17,935,003)
Net proceeds from sales (purchases) of short-term securities	4,131,040	942,043	711,188	(304,391)
Amortization of premium and accretion of discount on investments and other fees	37,131	(334,693)	111,909	(7,891)
Net realized (gain) loss on investments	7,469,134	(1,012,472)	(370,432)	(181,255)
Net unrealized (gain) loss on investments	(7,623,617)	6,547,294	4,429,121	3,142,591
(Increase) Decrease in Assets:				
Cash pledged for futures contracts	99,000	(191,000)	(9,000)	(50,000)
Receivables:				
Interest unaffiliated	(140,266)	(50,207)	(53,303)	34,563
Dividends affiliated	235	237	(283)	(538)
Prepaid expenses	13,699	18,212	18,043	(38,478)
Increase (Decrease) in Liabilities:				
Payables:				
Investment advisory fees	12,199	6,761	9,375	6,987
Interest expense and fees	96,246	90,645	90,084	69,951
Officers and Directors fees	385	1,151	428	281
Variation margin on futures contracts	(13,203)	23,469	609	6,547
Other accrued expenses	(7,466)	(13,614)	(17,524)	(16,167)
Net cash provided by (used for) operating activities	11,807,148	11,825,946	(738,347)	(1,107,414)
Cash Provided by (Used for) Financing Activities				
Proceeds from TOB Trust Certificates		4,296,503	7,477,032	6,076,172
Repayments of TOB Trust Certificates		(6,345,855)	(21,045)	(15,235)
Proceeds from Loan for TOB Trust Certificates		1,894,812	21,045	15,235
Repayments of Loan for TOB Trust Certificates		(1,894,812)	(21,045)	(15,235)
Cash dividends paid to Common Shareholders	(11,738,432)	(9,606,190)	(6,621,522)	(4,890,364)
Increase (decrease) in bank overdraft	(68,716)	(175,432)	(96,118)	(63,159)
Amortization of deferred offering costs		5,028		
Net cash provided by (used for) financing activities	(11,807,148)	(11,825,946)	738,347	1,107,414
Cash				
Net increase in cash				
Cash at beginning of period				
Cash at end of period				
Supplemental Disclosure of Cash Flow Information				
Cash paid during the period for interest expense	\$ 337,031	\$ 1,336,682	\$ 945,757	\$ 652,652
Non-Cash Financing Activities				
Capital shares issued in reinvestment of distributions paid to Common Shareholders	812,598	669,394	397,132	230,727

Edgar Filing: BLACKROCK MUNIASSETS FUND, INC. - Form N-CSRS

See Notes to Financial Statements.

SEMI-ANNUAL REPORT

OCTOBER 31, 2016

75

Statements of Cash Flows

	BlackRock MuniHoldings Quality Fund, Inc. (MUS)	BlackRock Muni Intermediate Duration Fund, Inc. (MUI)	BlackRock MuniVest Fund II, Inc. (MVT)
Six Months Ended October 31, 2016 (Unaudited)			
Cash Provided by (Used for) Operating Activities			