Kayne Anderson MLP Investment CO
Form 497
August 03, 2012
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Filed pursuant to Rule 497(e)

under the Securities Act of 1933,

as amended, File No. 333-177550

PROSPECTUS SUPPLEMENT

(To Prospectus dated February 16, 2012)

5,000,000 Shares

Common Stock

$29.75 per share

Kayne Anderson MLP Investment Company (the Company, we, us or our) is a non-diversified, closed-end management investment company. Our investment objective is to obtain a high after-tax total return by investing at least 85% of our total assets in energy-related partnerships and their affiliates (collectively, master limited partnerships or MLPs), and in other companies that, as their principal business, operate assets used in the gathering, transporting, processing, storing, refining, distributing, mining or marketing of natural gas, natural gas liquids, crude oil, refined petroleum products or coal (collectively with MLPs, Midstream Energy Companies).

We are offering 5,000,000 shares of our common stock in this prospectus supplement. This prospectus supplement, together with the accompanying prospectus dated February 16, 2012, sets forth the information that you should know before investing.

Our shares of common stock are listed on the New York Stock Exchange under the symbol KYN. The last reported sale price of our common stock on August 2, 2012 was $31.21 per share. The net asset value per share of our common stock at the close of business on August 2, 2012 was $28.08.

Investing in our common stock involves risk. See Risk Factors beginning on page 16 of the accompanying prospectus.

Neither the Securities and Exchange Commission nor any state securities commission has approved or disapproved of these securities or passed upon the adequacy or accuracy of this prospectus supplement or the accompanying prospectus. Any representation to the contrary is a criminal offense.

	Per Share	Total(1)
Public offering price	$ 29.75	$ 148,750,000
Underwriting discounts and commissions	$ 1.16	$ 5,800,000
Proceeds, before expenses, to us	$ 28.59	$ 142,950,000

(1) We have granted the underwriters an option exercisable for a period of 45 days from the date of this prospectus supplement to purchase up to 750,000 additional shares of common stock at the public offering price, less the underwriting discount, to cover over-allotments, if any. If the underwriters exercise the option in full, the total underwriting discounts and commissions will be $6,670,000, and the total proceeds, before expenses, to us will be $164,392,500.

The underwriters are offering the shares of common stock as described in Underwriting. Delivery of the shares of common stock will be made on or about August 8, 2012.

Joint Book-Running Managers

Citigroup

BofA Merrill Lynch

Morgan Stanley

UBS Investment Bank

Wells Fargo Securities

Co-Managers

Baird **RBC Capital Markets** **Stifel Nicolaus Weisel**

August 3, 2012

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You should rely only on the information contained or incorporated by reference in this prospectus supplement and the accompanying prospectus. The accompanying prospectus was originally filed with the Securities and Exchange Commission (SEC) as part of a Registration Statement on Form N-2, as amended (Nos. 333-177550 and 811-21593) relating to the issuance of our common stock and preferred stock up to $500,000,000 (the Initial Registration Statement). This prospectus supplement relates to an offering of shares of our common stock which have been registered on the Initial Registration Statement and of additional shares of our common stock which have been registered on another Registration Statement on Form N-2 (Nos. 333-183024 and 811-21593) in an amount not to exceed $28,735,000 which has been filed with the SEC pursuant to Rule 462(b) of the Securities Act of 1933, as amended. This prospectus supplement and the accompanying prospectus set forth certain information about us that a prospective investor should carefully consider before making an investment in our securities. This prospectus supplement, which describes the specific terms of this offering, also adds to and updates information contained in the accompanying prospectus and the documents incorporated by reference in the accompanying prospectus. The accompanying prospectus gives more general information, some of which may not apply to this offering. If the description of this offering varies between this prospectus supplement and the accompanying prospectus, you should rely on the information contained in this prospectus supplement; provided that if any statement in one of these documents is inconsistent with a statement in another document having a later date and incorporated by reference into the accompanying prospectus or prospectus supplement, the statement in the incorporated document having the later date modifies or supersedes the earlier statement. We have not authorized anyone to provide you with different information. If anyone provides you with different or inconsistent information, you should not rely on it. We are not making an offer to sell these securities in any jurisdiction where the offer or sale is not permitted or where the person making the offer or sale is not qualified to do so or to any person to whom it is not permitted to make such offer or sale. The information contained in or incorporated by reference in this prospectus supplement and the accompanying prospectus is accurate only as of the respective dates on their front covers, regardless of the time of delivery of this prospectus supplement, the accompanying prospectus, or the sale of the common stock. Our business, financial condition, results of operations and prospects may have changed since that date.

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Prospectus Supplement

Prospectus

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You should read this prospectus supplement and the accompanying prospectus before deciding whether to invest and retain it for future reference. A statement of additional information, dated February 16, 2012 (SAI), as supplemented from time to time, containing additional information about us, has been filed with the SEC and is incorporated by reference in its entirety into this prospectus supplement. You may request a free copy of our SAI by calling toll-free at (877) 657-3863, or by writing to us at 717 Texas Avenue, Suite 3100, Houston, Texas 77002. Electronic copies of the accompanying prospectus, our stockholder reports and our SAI are also available on our website (http://www.kaynefunds.com). You may also obtain copies of these documents (and other information regarding us) from the SEC s web site (http://www.sec.gov).

CAUTIONARY NOTICE REGARDING FORWARD-LOOKING STATEMENTS

This prospectus supplement, the accompanying prospectus and the SAI contain forward-looking statements. All statements other than statements of historical facts included in this prospectus that address activities, events or developments that we expect, believe or anticipate will or may occur in the future are forward-looking statements including, in particular, the statements about our plans, objectives, strategies and prospects regarding, among other things, our financial condition, results of operations and business. We have identified some of these forward-looking statements with words like believe, may, could, might, forecast, possible, potential, project, will, should, expect, intend, estimate, approximate or continue and other words and terms of similar meaning and the negative of such terms. Such forward-looking statements may be contained in this prospectus supplement as well as in the accompanying prospectus. These forward-looking statements are based on current expectations about future events affecting us and are subject to uncertainties and factors relating to our operations and business environment, all of which are difficult to predict and many of which are beyond our control. Many factors mentioned in our discussion in this prospectus supplement and the accompanying prospectus, including the risks outlined under Risk Factors, will be important in determining future results. In addition, several factors that could materially affect our actual results are the ability of the MLPs and other Midstream Energy Companies in which we invest to achieve their objectives, our ability to source favorable private investments, the timing and amount of distributions and dividends from the MLPs and other Midstream Energy Companies in which we intend to invest, the dependence of our future success on the general economy and its impact on the industries in which we invest and other factors discussed in our periodic filings with the SEC.

Although we believe that the expectations reflected in our forward-looking statements are reasonable, we do not know whether our expectations will prove correct. They can be affected by inaccurate assumptions we might make or by known or unknown risks and uncertainties. The factors identified above are believed to be important factors, but not necessarily all of the important factors, that could cause our actual results to differ materially from those expressed in any forward-looking statement. Unpredictable or unknown factors could also have material adverse effects on us. Since our actual results, performance or achievements could differ materially from those expressed in, or implied by, these forward-looking statements, we cannot give any assurance that any of the events anticipated by the forward-looking statements will occur or, if any of them do, what impact they will have on our results of operations and financial condition. All forward-looking statements included in this prospectus supplement, the accompanying prospectus or the SAI are expressly qualified in their entirety by the foregoing cautionary statements. You are cautioned not to place undue reliance on these forward-looking statements, which speak only as of the date of such documents. We do not undertake any obligation to update, amend or clarify these forward-looking statements or the risk factors contained therein, whether as a result of new information, future events or otherwise, except as may be required under the federal securities laws. We acknowledge that, notwithstanding the foregoing statements, the Private Securities Litigation Reform Act of 1995 does not apply to investment companies such as us.

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PROSPECTUS SUPPLEMENT SUMMARY

This summary does not contain all of the information you should consider before investing in our common stock. You should read carefully the entire prospectus supplement, the accompanying prospectus, including the section entitled Risk Factors and the financial statements and related notes, before making an investment decision.

THE COMPANY

Kayne Anderson MLP Investment Company, a Maryland corporation, is a non-diversified, closed-end management investment company registered under the Investment Company Act of 1940, as amended (the 1940 Act). Our investment objective is to obtain a high after-tax total return by investing at least 85% of our total assets in MLPs and other Midstream Energy Companies. We also must comply with the SEC s rule regarding investment company names, which requires us, under normal market conditions, to invest at least 80% of our total assets in MLPs so long as MLP is in our name. Our shares of common stock are listed on the New York Stock Exchange (NYSE) under the symbol KYN.

We began investment activities in September 2004 following our initial public offering. As of July 31, 2012, we had net assets applicable to our common stock of approximately $2.4 billion and total assets of approximately $4.3 billion.

PORTFOLIO INVESTMENTS

Our investments are principally in equity securities issued by MLPs. Generally, we invest in equity securities of (i) master limited partnerships, including preferred, common and subordinated units and general partner interests, (ii) owners of such interests in master limited partnerships and (iii) other Midstream Energy Companies. We may also invest in debt securities of MLPs and other Midstream Energy Companies with varying maturities of up to 30 years.

We are permitted to invest up to 50% of our total assets in unregistered or otherwise restricted securities of MLPs and other Midstream Energy Companies, including securities issued by private companies. We may invest up to 15% of our total assets in any single issuer.

We are permitted to invest up to 20% of our total assets in debt securities of MLPs and other Midstream Energy Companies, including below investment grade debt securities (commonly referred to as junk bonds or high yield bonds) rated, at the time of investment, at least B3 by Moody s Investors Service, Inc., B- by Standard & Poor s Financial Services LLC, a division of the McGraw-Hill Companies, Inc., or Fitch Ratings, Inc., comparably rated by another rating agency or, if unrated, determined by Kayne Anderson to be of comparable quality. In addition, up to one-quarter of our permitted investments in debt securities (or up to 5% of our total assets) may be invested in unrated debt securities or debt securities that are rated less than B3/B- of public or private companies.

As of July 31, 2012, we held $4.2 billion in equity investments and $46 million in fixed income investments. Our top 10 largest holdings by issuer as of that date were:

	Company	Sector	Amount ($ millions)	Percent of Long-Term Investments
1.	Enterprise Products Partners L.P.	Midstream MLP	$ 399.2	9.4%
2.	Kinder Morgan Management, LLC	MLP Affiliate	315.2	7.4
3.	Plains All American Pipeline, L.P.	Midstream MLP	301.5	7.1
4.	MarkWest Energy Partners, L.P.	Midstream MLP	233.7	5.5
5.	Energy Transfer Equity, L.P.	General Partner MLP	201.4	4.8
6.	Regency Energy Partners L.P.	Midstream MLP	185.2	4.4
7.	Williams Partners L.P.	Midstream MLP	163.2	3.9
8.	EI Paso Pipeline Partners, L.P.	Midstream MLP	163.1	3.9
9.	ONEOK Partners, L.P.	Midstream MLP	145.7	3.4
10.	Magellan Midstream Partners, L.P.	Midstream MLP	143.6	3.4

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INVESTMENT ADVISER

KA Fund Advisors, LLC (KAFA) is our investment adviser and is responsible for implementing and administering our investment strategy. KAFA is a subsidiary of Kayne Anderson Capital Advisors, L.P. (KACALP and together with KAFA, Kayne Anderson). Both KAFA and KACALP are SEC-registered investment advisers. As of June 30, 2012, Kayne Anderson and its affiliates managed approximately $15.5 billion, including approximately $9.1 billion in MLPs and other Midstream Energy Companies. Kayne Anderson has invested in MLPs and other Midstream Energy Companies since 1998. We believe that Kayne Anderson has developed an understanding of the MLP market that enables it to identify and take advantage of public MLP investment opportunities. In addition, Kayne Anderson s senior professionals have developed a strong reputation in the energy sector and have many long-term relationships with industry managers, which we believe gives Kayne Anderson an important advantage in sourcing and structuring private investments.

DISTRIBUTIONS

We have paid distributions to our common stockholders every fiscal quarter since inception and intend to continue to pay quarterly distributions to our common stockholders. Our quarterly distribution per share has increased by 41% since inception and we have increased our distribution in each of the last seven quarters. Our most recent quarterly distribution of $0.5275 per share, paid in July 2012, was 6.0% higher than the corresponding distribution paid in July 2011. Our next regularly scheduled quarterly distribution will be for our fiscal quarter ending August 31, 2012 and, if approved by our Board of Directors, will be paid to common stockholders on or about October 15, 2012. Payment of future distributions is subject to approval by our Board of Directors, as well as meeting the covenants of our senior debt, meeting the terms of our preferred stock and the asset coverage requirements of the 1940 Act. The distributions we have paid since the beginning of fiscal 2010 are as follows:

Payment Date	Distribution per Share ($)
July 13, 2012	$ 0.5275
April 13, 2012	0.5175
January 13, 2012	0.5100
October 14, 2011	0.5025
July 15, 2011	0.4975
April 15, 2011	0.4900
January 14, 2011	0.4850
October 15, 2010	0.4800
July 9, 2010	0.4800
April 16, 2010	0.4800
January 15, 2010	0.4800

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THE OFFERING

Common stock we are offering	5,000,000 shares
Common stock to be outstanding after this offering	88,240,873 shares(1)
Use of proceeds after expenses	We estimate that our net proceeds from this offering after expenses without exercise of the over-allotment option will be approximately $143 million. We intend to use the net proceeds to make investments in portfolio companies in accordance with our investment objective and policies and for general corporate purposes. See Use of Proceeds.
Risk factors	See Risk Factors and other information included in the accompanying prospectus for a discussion of factors you should carefully consider before deciding to invest in shares of our common stock.
NYSE Symbol	KYN

The shareholder transaction expenses can be summarized as follows:

Underwriting discounts and commissions (as a percentage of offering price)	3.90%
Net offering expenses borne by us (as a percentage of offering price)	0.13%
Dividend reinvestment plan fees(2)	None

(1) The number of shares outstanding after the offering assumes the underwriters over-allotment option is not exercised. If the over-allotment option is exercised in full, the number of shares outstanding will increase by 750,000 shares.

(2) You will pay brokerage charges if you direct American Stock Transfer & Trust Company, as agent for our common stockholders, to sell your common stock held in a dividend reinvestment account.

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USE OF PROCEEDS

We estimate that the net proceeds from the sale of the 5,000,000 shares of common stock that we are offering will be approximately $143 million, after deducting the underwriting discounts and commissions and estimated offering expenses payable by us, or approximately $164 million if the underwriters exercise the over-allotment option in full.

We intend to use the net proceeds of the offering to make investments in portfolio companies in accordance with our investment objective and policies and for general corporate purposes. We anticipate that we will be able to invest the net proceeds within two to three months.

Pending such investments, we anticipate (i) repaying all or a portion of the indebtedness owed under our existing unsecured revolving credit facility and (ii) investing the remaining net proceeds in short-term securities issued by the U.S. government or its agencies or instrumentalities or in high quality, short-term or long-term debt obligations or money market instruments. A delay in the anticipated use of proceeds could lower returns, reduce our distribution to common stockholders and reduce the amount of cash available to make dividend and interest payments on preferred stock and debt securities, respectively.

At July 31, 2012, we had outstanding borrowings on the revolving credit facility of $10 million and the interest rate was 4.00%. Any borrowings under our revolving credit facility will be used to fund investments in portfolio companies and for general corporate purposes. Amounts repaid under our revolving credit facility will remain available for future borrowings. Affiliates of some of the underwriters are lenders under our revolving credit facility and will receive a pro rata portion of the net proceeds from this offering, if any, used to reduce amounts outstanding under our revolving credit facility. See Underwriting Affiliations Conflicts of Interests.

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CAPITALIZATION

The following table sets forth our capitalization: (i) as of May 31, 2012 and (ii) as of May 31, 2012, as adjusted to give effect to the issuance of the shares of common stock offered hereby. As indicated below, common stockholders will bear the offering costs associated with this offering.

	As of May 31, 2012 Actual	As Adjusted
	(Unaudited) ($ in 000s, except per share data)	
Repurchase Agreements, Cash and Cash Equivalents	$ 22,807	$ 156,557(1)
Short-Term Debt:		
Revolving Credit Facility	9,000	(1)
Long-Term Debt:		
Senior Notes Series K(2)	125,000	125,000
Senior Notes Series M(2)	60,000	60,000
Senior Notes Series N(2)	50,000	50,000
Senior Notes Series O(2)	65,000	65,000
Senior Notes Series P(2)	45,000	45,000
Senior Notes Series Q(2)	15,000	15,000
Senior Notes Series R(2)	25,000	25,000
Senior Notes Series S(2)	60,000	60,000
Senior Notes Series T(2)	40,000	40,000
Senior Notes Series U(2)	60,000	60,000
Senior Notes Series V(2)	70,000	70,000
Senior Notes Series W(2)	100,000	100,000
Senior Notes Series X(2)	14,000	14,000
Senior Notes Series Y(2)	20,000	20,000
Senior Notes Series Z(2)	15,000	15,000
Senior Notes Series AA(2)	15,000	15,000
Senior Notes Series BB(2)	35,000	35,000
Senior Notes Series CC(2)	76,000	76,000
Total Long-Term Debt:	$ 890,000	$ 890,000
Mandatory Redeemable Preferred Stock:		
Series A MRP Shares, $0.001 par value per share, liquidation preference $25.00 per share (4,160,000 shares issued and outstanding, 4,160,000 shares authorized)(2)	$ 104,000	$ 104,000
Series B MRP Shares, $0.001 par value per share, liquidation preference $25.00 per share (320,000 shares issued and outstanding, 320,000 shares authorized)(2)	8,000	8,000
Series C MRP Shares, $0.001 par value per share, liquidation preference $25.00 per share (1,680,000 shares issued and outstanding, 1,680,000 shares authorized)(2)	42,000	42,000
Series D MRP Shares, $0.001 par value per share, liquidation preference $25.00 per share (4,000,000 shares issued and outstanding, 4,000,000 shares authorized)(2)	100,000	100,000
Series E MRP Shares, $0.001 par value, liquidation preference $25.00 per share (4,800,000 shares issued and outstanding, 4,800,000 shares authorized)(2)	120,000	120,000
Common Stockholders Equity:		
Common stock, $0.001 par value per share, 185,040,000 shares authorized (83,060,342 shares issued and outstanding; 88,060,342 shares issued and outstanding as adjusted)(2)(3)(4)	$ 83	$ 88
Paid-in capital(5)	1,543,924	1,686,669
Accumulated net investment loss, net of income taxes, less dividends	(380,870)	(380,870)
Accumulated realized gains on investments, options, and interest rate swap contracts, net of income taxes	231,673	231,673
Net unrealized gains on investments and options, net of income taxes	796,189	796,189
Net assets applicable to common stockholders	$ 2,190,999	$ 2,333,749

(1) As described under Use of Proceeds, we intend to use the net proceeds from this offering to make investments in portfolio companies in accordance with our investment objective and policies, to repay indebtedness and for general corporate purposes. Pending such investments, we anticipate either investing the proceeds in short-term securities issued by the U.S. government or its agencies or instrumentalities or in high quality, short-term or long-term debt obligations, money market instruments or cash.

(2) We do not hold any of these outstanding securities for our account.

(3) This does not include shares that may be issued in connection with the underwriters over-allotment option.

(4) On July 13, 2012, we issued 180,531 shares of common stock pursuant to our dividend reinvestment plan which are not reflected in the as adjusted shares issued and outstanding.

(5) As adjusted, additional paid-in capital reflects the issuance of shares of common stock offered hereby ($148,750), less $0.001 par value per share of common stock ($5), less the underwriting discounts and commissions ($5,800) and less the net estimated offering costs borne by us ($200) related to the issuance of shares.

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UNDERWRITING

We are offering the shares of our common stock described in this prospectus supplement through the underwriters named below. Citigroup Global Markets Inc., Merrill Lynch, Pierce, Fenner & Smith Incorporated, Morgan Stanley & Co. LLC, UBS Securities LLC and Wells Fargo Securities, LLC are the joint book-running managers of the offering and representatives of the underwriters. We have entered into an underwriting agreement with the representatives. Subject to the terms and conditions of the underwriting agreement, each of the underwriters has severally agreed to purchase the number of shares of common stock listed next to its name in the following table.

Underwriters	**Number of Shares**
Citigroup Global Markets Inc.	964,500
Merrill Lynch, Pierce, Fenner & Smith Incorporated	964,500
Morgan Stanley & Co. LLC	964,500
UBS Securities LLC	964,500
Wells Fargo Securities, LLC	551,000
Robert W. Baird & Co. Incorporated	197,000
RBC Capital Markets, LLC	197,000
Stifel, Nicolaus & Company, Incorporated	197,000
Total	5,000,000

The underwriting agreement provides that the obligations of the underwriters to purchase the shares included in this offering are subject to approval of legal matters by counsel and to other conditions. The underwriting agreement provides that the underwriters must buy all of the shares if they buy any of them. However, the underwriters are not required to take or pay for the shares covered by the underwriters over-allotment option described below.

Our common stock is offered subject to a number of conditions, including:

- receipt and acceptance of our common stock by the underwriters; and

- the underwriters right to reject orders in whole or in part.

In connection with this offering, certain of the underwriters or securities dealers may distribute prospectuses electronically.

OVER-ALLOTMENT OPTION

We have granted the underwriters an option to buy up to an aggregate of 750,000 additional shares of common stock. The underwriters may exercise this option solely for the purpose of covering over-allotments, if any, made in connection with this offering. The underwriters have 45 days from the date of this prospectus supplement to exercise this option. If the underwriters exercise this option, they will each purchase additional shares approximately in proportion to the amounts specified in the table above.

COMMISSIONS AND DISCOUNTS

Shares sold by the underwriters to the public will be offered at the public offering price set forth on the cover page of this prospectus supplement. Any shares sold by the underwriters to securities dealers may be sold at a discount of up to $0.70 per share from the public offering price. Any of these securities dealers may resell any shares purchased from the underwriters to other brokers or dealers at a discount of up to $0.10 per share from the public offering price. Sales of shares made outside of the U.S. may be made by affiliates of the underwriters. If all of the shares are not sold at the public offering price, the representatives may change the offering price and the other selling terms. Upon execution of the underwriting agreement, the underwriters will be obligated to purchase the shares at the prices and upon the terms stated therein and, as a result, will thereafter bear any risk

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associated with changing the offering price to the public and other selling terms. The sales load and underwriting discount is equal to 3.90% of the initial offering price. Investors must pay for their shares of common stock on or before August 8, 2012.

The following table shows the per share and total underwriting discounts and commissions we will pay to the underwriters assuming both no exercise and full exercise of the underwriters option to purchase up to an additional 750,000 shares of common stock.

	No Exercise	Full Exercise
Per share	$ 1.16	$ 1.16
Total	$ 5,800,000	$ 6,670,000

We estimate that the total expenses of this offering payable by us, not including the underwriting discounts and commissions, will be approximately $200,000.

NO SALES OF SIMILAR SECURITIES

We, our Adviser and certain officers of our Adviser, including all of our officers, and our directors who own shares of our common stock and/or purchase shares of our common stock in this offering, have entered into lock-up agreements with the underwriters. Under these agreements, subject to certain exceptions, we and each of these persons may not, without the prior written consent of the representatives, offer, sell, contract to sell or otherwise dispose of, directly or indirectly, or hedge our common stock or securities convertible into or exchangeable or exercisable for our common stock for a period of 60 days after the date of this prospectus supplement. In the event that either (x) during the last 17 days of the 60-day period referred to above, we issue an earnings release or (y) prior to the expiration of such 60 days, we announce that we will release earnings during the 16-day period beginning on the last day of such 60-day period, the restrictions described above shall continue to apply until the expiration of the 18-day period beginning on the date of the earnings or the press release.

We have agreed to indemnify the underwriters against certain liabilities, including certain liabilities under the Securities Act of 1933, as amended (the Securities Act). If we are unable to provide this indemnification, we have agreed to contribute to payments the underwriters may be required to make in respect of those liabilities.

NYSE LISTING

Our currently outstanding shares of common stock are, and the shares of common stock sold pursuant to this prospectus supplement and the accompanying prospectus, subject to notice of issuance, will be listed on the NYSE under the symbol KYN.

PRICE STABILIZATION, SHORT POSITIONS

In connection with this offering, the underwriters may engage in activities that stabilize, maintain or otherwise affect the price of our common stock, including:

- stabilizing transactions;
- short sales;
- purchases to cover positions created by short sales;
- imposition of penalty bids; and

syndicate covering transactions.

Stabilizing transactions consist of bids or purchases made for the purpose of preventing or retarding a decline in the market price of our common stock while this offering is in progress. These transactions may also include making short sales of our common stock which involve the sale by the underwriters of a greater number of shares of common stock than they are required to purchase in this offering.

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Short sales may be covered short sales, which are short positions in an amount not greater than the underwriters over-allotment option referred to above, or may be naked short sales, which are short positions in excess of that amount.

The underwriters may close out any covered short position by either exercising their over-allotment option, in whole or in part, or by purchasing shares in the open market. In making this determination, the underwriters will consider, among other things, the price of shares available for purchase in the open market as compared to the price at which they may purchase shares through the over-allotment option.

The underwriters may close out any naked short sale position by purchasing shares in the open market. A naked short position is more likely to be created if the underwriters are concerned that there may be downward pressure on the price of the common stock in the open market that could adversely affect investors who purchased in this offering.

The underwriters may also impose a penalty bid. This occurs when a particular underwriter repays to the underwriters a portion of the underwriting discounts and commissions received by it because the representatives have repurchased shares sold by or for the account of that underwriter in stabilizing or short covering transactions.

As a result of these activities, the price of our common stock may be higher than the price that otherwise might exist in the open market. If these activities are commenced, they may be discontinued by the underwriters at any time. The underwriters may carry out these transactions on the NYSE or in the over-the-counter market, or otherwise.

Neither we nor any of the underwriters make any representation or prediction as to the direction or magnitude of any effect that the transactions described above may have on the price of the common stock. In addition, neither we nor any of the underwriters make any representation that the underwriters will engage in these stabilizing transactions or that any transaction, if commenced, will not be discontinued without notice.

NOTICE TO PROSPECTIVE INVESTORS IN THE EUROPEAN ECONOMIC AREA

In relation to each member state of the European Economic Area (the EEA) that has implemented the Prospectus Directive (each, a relevant member state), with effect from and including the date on which the Prospectus Directive is implemented in that relevant member state (the relevant implementation date), an offer of shares described in this prospectus supplement has not been made and may not be made to the public in that relevant member state other than:

- to any legal entity which is a qualified investor as defined in the Prospectus Directive;

- to fewer than 150 natural or legal persons (other than qualified investors as defined in the Prospectus Directive), as permitted under the Prospectus Directive, subject to obtaining the prior consent of the relevant Dealer or Dealers nominated by us for any such offer; or

- in any other circumstances falling within Article 3(2) of the Prospectus Directive,

provided that no such offer of shares shall require us or any underwriter to publish a prospectus pursuant to Article 3 of the Prospectus Directive.

For purposes of this provision, the expression an offer of securities to the public in any relevant member state means the communication in any form and by any means of sufficient information on the terms of the offer and the securities to be offered so as to enable an investor to decide to purchase or subscribe for the securities, as the expression may be varied in that member state by any measure implementing the Prospectus Directive in that member state, and the expression Prospectus Directive means Directive 2003/71/EC (and amendments thereto, including the 2010 PD Amending Directive) and includes any relevant implementing measure in the relevant member state. The expression 2010 PD Amending Directive means Directive 2010/73/EU.

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This prospectus supplement is not a prospectus for the purposes of the Prospectus Directive as implemented in member states of the EEA. This prospectus supplement has been prepared on the basis that all offers of the shares will be made pursuant to an exemption under the Prospectus Directive from the requirement to produce a prospectus in connection with offers of the shares. Accordingly, any person making or intending to make any offer within the EEA of shares which are the subject of the offering contemplated in this prospectus supplement should only do so in circumstances in which no obligation arises for us or any of the underwriters to produce a prospectus for such offers. Neither we nor the underwriters have authorized, nor do we or they authorise, the making of any offer of the shares through any financial intermediary, other than offers made by underwriters which constitute the final placement of the shares contemplated in this prospectus supplement.

NOTICE TO PROSPECTIVE INVESTORS IN THE UNITED KINGDOM

This prospectus supplement and the accompanying prospectus (this Communication) has not been approved by an authorized person under section 21 of the Financial Services and Markets Act 2000 and is only being distributed to, and is only directed at, persons in the United Kingdom that are qualified investors within the meaning of Article 2(1)(e) of the Prospectus Directive that are also (i) investment professionals falling within Article 19(5) of the Financial Services and Markets Act 2000 (Financial Promotion) Order 2005 (the Order) or (ii) high net worth entities, and other persons to whom it may lawfully be communicated, falling within Article 49(2)(a) to (d) of the Order (each such person being referred to as a relevant person).

This Communication and its contents are confidential and provided on a personal basis to the recipients and should not be distributed, published or reproduced (in whole or in part) or disclosed by recipients to any other persons in the United Kingdom. Any investment or investment activity to which this Communication relates is available only to relevant persons and will only be engaged with relevant persons. Any person in the United Kingdom that is not a relevant person should not act or rely on this Communication or any of its contents.

AFFILIATIONS CONFLICTS OF INTERESTS

Some of the underwriters and their affiliates may from time to time in the future engage in transactions with us and perform services for us in the ordinary course of their business.

Affiliates of some of the underwriters are lenders under our revolving credit facility and will receive a pro rata portion of the net proceeds from this offering, if any, used to reduce amounts outstanding thereunder. See Use of Proceeds.

KA Associates, Inc., an affiliate of ours and Kayne Anderson, is a member of the selling group for this offering.

The respective addresses of the representatives are Citigroup Global Markets Inc., 388 Greenwich Street, New York, New York 10013; Merrill Lynch, Pierce, Fenner & Smith Incorporated, One Bryant Park, New York, New York 10036; Morgan Stanley & Co. LLC, 1585 Broadway, New York, New York 10036; UBS Securities LLC, 299 Park Avenue, New York, NY 10171; and Wells Fargo Securities, LLC, 301 S. College Street, Charlotte, North Carolina 28288.

LEGAL MATTERS

Certain legal matters in connection with our common stock will be passed upon for us by Paul Hastings LLP, Costa Mesa, California, and for the underwriters by Sidley Austin LLP, New York, New York. Paul Hastings LLP and Sidley Austin LLP may rely as to certain matters of Maryland law on the opinion of Venable LLP, Baltimore, Maryland.

WHERE YOU CAN FIND MORE INFORMATION

We are subject to the informational requirements of the Securities Exchange Act of 1934, as amended (the Exchange Act) and the 1940 Act, and are required to file reports, including annual and semi-annual reports, proxy statements and other information with the SEC. We voluntarily file quarterly shareholder reports. Our most recent shareholder report filed with the SEC is for the six-month period ended May 31, 2012. These documents are available on the SEC s EDGAR system and can be inspected and copied for a fee at the SEC s public reference room, 100 F Street, N.E., Room 1580, Washington, D.C. 20549. Additional information about the operation of the public reference room facilities may be obtained by calling the SEC at (202) 551-5850.

This prospectus supplement and the accompanying prospectus do not contain all of the information in our registration statement, including amendments, exhibits and schedules. Statements in this prospectus supplement and the accompanying prospectus about the contents of any contract or other document are not necessarily complete and in each instance reference is made to the copy of the contract or other document filed as an exhibit to the registration statement, each such statement being qualified in all respects by this reference. Additional information about us can be found in our registration statement (including amendments, exhibits, and schedules) on Form N-2 filed with the SEC. The SEC maintains a web site (http://www.sec.gov) that contains our registration statement, other documents incorporated by reference, and other information we have filed electronically with the SEC, including proxy statements and reports filed under the Exchange Act.

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UNAUDITED FINANCIAL STATEMENTS AS OF AND FOR THE SIX MONTHS ENDED MAY 31, 2012 AND FINANCIAL HIGHLIGHTS FOR THE PERIOD SEPTEMBER 28, 2004 THROUGH NOVEMBER 30, 2004, FOR THE FISCAL YEARS ENDED NOVEMBER 30, 2005 THROUGH 2011 AND FOR THE SIX MONTHS ENDED MAY 31, 2012

CONTENTS

CAUTIONARY NOTE REGARDING FORWARD-LOOKING STATEMENTS: This report of Kayne Anderson MLP Investment Company (the Company) contains forward-looking statements as defined under the U.S. federal securities laws. Generally, the words believe, expect, intend, estimate, anticipate, project, will and similar expressions identify forward-looking statements, which generally are not hist in nature. Forward-looking statements are subject to certain risks and uncertainties that could cause actual results to materially differ from the Company s historical experience and its present expectations or projections indicated in any forward-looking statements. These risks include, but are not limited to, changes in economic and political conditions; regulatory and legal changes; master limited partnership industry risk; leverage risk; valuation risk; interest rate risk; tax risk; and other risks discussed in the Company s filings with the Securities and Exchange Commission (SEC). You should not place undue reliance on forward-looking statements, which speak only as of the date they are made. The Company undertakes no obligation to update or revise any forward-looking statements made herein. There is no assurance that the Company s investment objectives will be attained.

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KAYNE ANDERSON MLP INVESTMENT COMPANY

MANAGEMENT DISCUSSION

(UNAUDITED)

Company Overview

Kayne Anderson MLP Investment Company is a non-diversified, closed-end fund that commenced operations in September 2004. Our investment objective is to obtain a high after-tax total return by investing at least 85% of our total assets in energy-related master limited partnerships and their affiliates (MLPs) and in other companies that operate assets used in the gathering, transporting, processing, storing, refining, distributing, mining or marketing of natural gas, natural gas liquids, crude oil, refined petroleum products or coal (collectively with MLPs, Midstream Energy Companies).

As of May 31, 2012, we had total assets of $4.0 billion, net assets applicable to our common stock of $2.2 billion (net asset value per share of $26.38), and 83.1 million shares of common stock outstanding.

Our investments are principally in equity securities issued by MLPs, but we also invest in debt securities of MLPs and debt/equity securities of Midstream Energy Companies. As of May 31, 2012, we held $3.9 billion in equity investments and $52.5 million in debt investments.

Results of Operations For the Three Months Ended May 31, 2012

Investment Income. Investment income totaled $9.1 million for the quarter and consisted primarily of net dividends and distributions and interest income on our investments. Interest and other income was $1.4 million, and we received $57.2 million of cash dividends and distributions, of which $49.5 million was treated as return of capital during the quarter. During the quarter, we received $8.1 million of paid-in-kind dividends, which are not included in investment income, but are reflected as an unrealized gain.

Operating Expenses. Operating expenses totaled $29.8 million, including $14.2 million of investment management fees, $9.9 million of interest expense (including non-cash amortization of debt issuance costs of $0.4 million), and $0.6 million of other operating expenses. Management fees are calculated based on the average total assets under management. Preferred stock distributions for the quarter were $5.1 million (including non-cash amortization of $0.3 million and a $0.5 million redemption payment associated with the repurchase of a portion of Series A mandatory redeemable preferred stock).

Net Investment Loss. Our net investment loss totaled $14.4 million and included a deferred income tax benefit of $6.2 million.

Net Realized Gains. We had net realized gains from our investments of $14.9 million, net of $8.7 million of deferred tax expense.

Net Change in Unrealized Losses. We had a net change in unrealized losses of $264.8 million. The net change consisted of $420.2 million of unrealized losses from investments and a deferred tax benefit of $155.4 million.

Net Decrease in Net Assets Resulting from Operations. We had a decrease in net assets resulting from operations of $264.3 million. This decrease was comprised of a net investment loss of $14.4 million; net realized gains of $14.9 million; and net change in unrealized losses of $264.8 million, as noted above.

Distributions to Common Stockholders

We pay quarterly distributions to our common stockholders, funded in part by net distributable income (NDI) generated from our portfolio investments. NDI is the amount of income received by us from our portfolio investments less operating expenses, subject to certain adjustments as described below. NDI is not a financial measure under the accounting principles generally accepted in the United States of America (GAAP). Refer to the Reconciliation of NDI to GAAP section below for a reconciliation of this measure to our results reported under GAAP.

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KAYNE ANDERSON MLP INVESTMENT COMPANY

MANAGEMENT DISCUSSION

(UNAUDITED)

Income from portfolio investments includes (a) cash dividends and distributions, (b) paid-in-kind dividends received (i.e., stock dividends), (c) interest income from debt securities and commitment fees from private investments in public equity (PIPE investments) and (d) net premiums received from the sale of covered calls.

Operating expenses include (a) investment management fees paid to our investment adviser, (b) other expenses (mostly attributable to fees paid to other service providers), (c) interest expense and preferred stock distributions and (d) deferred income tax expense/benefit on net investment income/loss.

Net Distributable Income (NDI)

(amounts in millions, except for per share amounts)

	Three Months Ended May 31, 2012
Distributions and Other Income from Investments	
Dividends and Distributions	$ 57.2
Paid-In-Kind Dividends	8.1
Interest and Other Income	1.4
Net Premiums Received from Call Options Written	0.7
Total Distributions and Other Income from Investments	67.4
Expenses	
Investment Management Fee	(14.2)
Other Expenses	(0.6)
Total Management Fee and Other Expenses	(14.8)
Interest Expense	(9.5)
Preferred Stock Distributions	(4.3)
Income Tax Benefit	6.2
Net Distributable Income (NDI)	**$ 45.0**
Weighted Shares Outstanding	83.0
NDI per Weighted Share Outstanding	**$ 0.543**
Distributions paid per Common Share[(1)]	**$ 0.5275**

(1) The distribution of $0.5275 per share for the second quarter of fiscal 2012 was paid to common stockholders on July 13, 2012.

Payment of future distributions is subject to Board of Directors approval, as well as meeting the covenants of our debt agreements and terms of our preferred stock. In determining our quarterly distribution to common stockholders, our Board of Directors considers a number of factors that include, but are not limited to:

- NDI generated in the current quarter;
- Expected NDI over the next twelve months; and
- Realized and unrealized gains generated by the portfolio.

On June 13, 2012, we declared a quarterly distribution of $0.5275 per common share for the fiscal second quarter (a total distribution of $43.8 million). The distribution represents an increase of 1.9% from the prior quarter s distribution and an increase of 6.0% from the distribution for the quarter ended May 31, 2011. The distribution was paid on July 13, 2012 to common stockholders of record on July 5, 2012.

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KAYNE ANDERSON MLP INVESTMENT COMPANY

MANAGEMENT DISCUSSION

(UNAUDITED)

Reconciliation of NDI to GAAP

The difference between distributions and other income from investments in the NDI calculation and total investment income as reported in our Statement of Operations is reconciled as follows:

GAAP recognizes that a significant portion of the cash distributions received from MLPs is characterized as a return of capital and therefore excluded from investment income, whereas the NDI calculation includes the return of capital portion of such distributions.

NDI includes the value of dividends paid-in-kind, whereas such amounts are not included as investment income for GAAP purposes, but rather are recorded as unrealized gains upon receipt.

NDI includes commitment fees from PIPE investments, whereas such amounts are generally not included in investment income for GAAP purposes, but rather are recorded as a reduction to the cost of the investment.

Many of our investments in debt securities were purchased at a discount or premium to the par value of such security. When making such investments, we consider the security s yield to maturity, which factors in the impact of such discount (or premium). Interest income reported under GAAP includes the non-cash accretion of the discount (or amortization of the premium) based on the effective interest method. When we calculate interest income for purposes of determining NDI, in order to better reflect the yield to maturity, the accretion of the discount (or amortization of the premium) is calculated on a straight-line basis to the earlier of the expected call date or the maturity of the debt security.

We may sell covered call option contracts to generate income or to reduce our ownership of certain securities that we hold. In some cases, we are able to repurchase these call option contracts at a price less than the fee that we received, thereby generating a profit. The amount we received from selling call options, less the amount that we pay to repurchase such call option contracts is included in NDI. For GAAP purposes, premiums received from call option contracts sold is not included in investment income. See Note 2 Significant Accounting Policies for a full discussion of the GAAP treatment of option contracts.

The treatment of expenses included in NDI also differs from what is reported in the Statement of Operations as follows:

The non-cash amortization or write-offs of capitalized debt issuance costs and preferred stock offering costs related to our financings is included in interest expense and distributions on mandatory redeemable preferred stock for GAAP purposes, but is excluded from our calculation of NDI. Interest or dividend premiums paid associated with the redemption of senior unsecured notes or preferred stock are included in interest expense and distributions on mandatory redeemable preferred stock for GAAP purposes, but excluded from our calculation of NDI.

NDI also includes recurring payments (or receipts) on interest rate swap contracts (excluding termination payments) whereas for GAAP purposes, these amounts are included in the realized gains/losses section of the Statement of Operations.

Liquidity and Capital Resources

Total leverage outstanding at May 31, 2012 of $1,273 million was comprised of $890.0 million of senior unsecured notes (Senior Notes), $374.0 million of mandatory redeemable preferred stock and $9.0 million outstanding under our senior unsecured revolving credit facility (the Credit Facility). Total leverage represented 32% of total assets at May 31, 2012. As of July 23, 2012, we had $18.0 million borrowed under our Credit Facility, and we had $1.9 million of cash.

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KAYNE ANDERSON MLP INVESTMENT COMPANY

MANAGEMENT DISCUSSION

(UNAUDITED)

At May 31, 2012, the Credit Facility had a $200.0 million commitment and matures on June 11, 2013. During the fiscal second quarter, we increased the size of our Credit Facility from $175.0 million to $200.0 million by adding a new lender to the syndicate. The interest rate may vary between LIBOR plus 1.75% and LIBOR plus 3.00%, depending on our asset coverage ratios. Outstanding loan balances accrue interest daily at a rate equal to one-month LIBOR plus 1.75% based on current asset coverage ratios. We pay a commitment fee of 0.40% per annum on any unused amounts of the Credit Facility. A full copy of our Credit Facility is available on our website, www.kaynefunds.com.

At May 31, 2012, our asset coverage ratios under the Investment Company Act of 1940, as amended (the 1940 Act), were 385% and 272% for debt and total leverage (debt plus preferred stock), respectively. We currently target an asset coverage ratio with respect to our debt of 375%, but at times may be above or below our target depending on market conditions.

On May 3, 2012, we completed a private placement of $175.0 million of Senior Notes. Net proceeds from the offering were used to repay borrowings under our Credit Facility, to refinance the Series I Senior Notes ($60.0 million), to make new portfolio investments and for general corporate purposes. On March 21, 2012, we completed a public offering of Series E mandatory redeemable preferred stock (Series E MRP Shares) for $120.0 million. Net proceeds of the Series E MRP Shares offering were used to repay borrowings under the Credit Facility and to purchase $6.0 million of our Series A mandatory redeemable preferred stock. We had $890.0 million of Senior Notes outstanding at May 31, 2012. The Senior Notes mature between 2013 and 2022. As of the same date, we had $374.0 million of mandatory redeemable preferred stock, which is subject to mandatory redemption at various dates from 2017 through 2020.

As of May 31, 2012, our total leverage consisted of both fixed rate (87%) and floating rate (13%) obligations. At such date, the weighted average interest rate on our total leverage was 4.3%.

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KAYNE ANDERSON MLP INVESTMENT COMPANY

PORTFOLIO SUMMARY

(UNAUDITED)

Portfolio Investments by Category

May 31, 2012 **November 30, 2011**

Top 10 Holdings by Issuer

Holding	Sector	Percent of Total Investments* as of May 31, 2012	Percent of Total Investments* as of November 30, 2011
1. Enterprise Products Partners L.P.	Midstream MLP	9.3%	9.3%
2. Kinder Morgan Management, LLC	MLP Affiliate	7.2	7.4
3. Plains All American Pipeline, L.P.	Midstream MLP	6.8	5.3
4. MarkWest Energy Partners, L.P.	Midstream MLP	5.4	5.6
5. Regency Energy Partners LP	Midstream MLP	4.2	4.1
6. Energy Transfer Equity, L.P.	General Partner MLP	4.0	3.8
7. Magellan Midstream Partners, L.P.	Midstream MLP	3.9	4.4
8. Williams Partners L.P.	Midstream MLP	3.9	4.6
9. El Paso Pipeline Partners, L.P.	Midstream MLP	3.9	3.5
10. ONEOK Partners, L.P.	Midstream MLP	3.4	3.3

* *Includes cash and repurchase agreement (if any).*

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KAYNE ANDERSON MLP INVESTMENT COMPANY

SCHEDULE OF INVESTMENTS

MAY 31, 2012

(amounts in 000 s, except number of option contracts)

(UNAUDITED)

Description	No. of Shares/Units	Value
Long-Term Investments 180.2%		
Equity Investments[1] 177.8%		
Midstream MLP[2] 122.6%		
Boardwalk Pipeline Partners, LP	1,089	$ 28,260
Buckeye Partners, L.P.	1,542	73,292
Buckeye Partners, L.P. Class B Units[3][4]	883	38,721
Chesapeake Midstream Partners, L.P.	2,096	52,468
Copano Energy, L.L.C.	1,453	38,952
Crestwood Midstream Partners LP	2,439	61,598
Crestwood Midstream Partners LP Class C Units[3][4]	1,154	27,249
Crosstex Energy, L.P.	312	4,857
DCP Midstream Partners, LP	2,361	92,875
El Paso Pipeline Partners, L.P.	4,676	153,432
Enbridge Energy Partners, L.P.	4,050	118,407
Energy Transfer Partners, L.P.	1,266	54,913
Enterprise Products Partners L.P.	7,612	371,164
Global Partners LP	1,974	42,747
Holly Energy Partners, L.P.	336	19,031
Inergy, L.P.	3,510	60,131
Inergy Midstream, L.P.	1,064	22,185
Magellan Midstream Partners, L.P.	2,279	156,848
MarkWest Energy Partners, L.P.[5]	4,442	212,942
Niska Gas Storage Partners LLC	1,748	20,764
NuStar Energy L.P.	400	20,900
ONEOK Partners, L.P.	2,456	134,099
PAA Natural Gas Storage, L.P.	876	15,730
Penn Virginia Resource Partners, L.P.[5]	3,093	71,788
Penn Virginia Resource Partners, L.P. Unregistered[3][5]	1,401	29,847
Plains All American Pipeline, L.P.[5]	3,426	269,036
Regency Energy Partners LP	7,684	165,357
Rose Rock Midstream, L.P.	315	7,489
Spectra Energy Partners, L.P.	596	18,588
Targa Resources Partners L.P.[6]	1,780	69,808
TC PipeLines, LP	113	4,629
Tesoro Logistics LP	365	11,499
Transmontaigne Partners L.P.	203	6,395
Western Gas Partners L.P.	1,227	54,105
Williams Partners L.P.	2,958	156,472
		2,686,578

MLP Affiliate[2] 16.2%

Enbridge Energy Management, L.L.C.[4]	2,147	66,969
Kinder Morgan Management, LLC[4]	4,050	287,649
		354,618
General Partner MLP [2] 11.0%		
Alliance Holdings GP L.P.	1,903	79,090
Energy Transfer Equity, L.P.	4,425	160,742
NuStar GP Holdings, LLC	45	1,440
		241,272

See accompanying notes to financial statements.

KAYNE ANDERSON MLP INVESTMENT COMPANY

SCHEDULE OF INVESTMENTS

MAY 31, 2012

(amounts in 000 s, except number of option contracts)

(UNAUDITED)

Description	No. of Shares/Units	Value
Shipping MLP 9.5%		
Capital Product Partners L.P.	2,841	$ 20,767
Navios Maritime Partners L.P.	1,876	25,420
Teekay LNG Partners L.P.	1,904	71,053
Teekay Offshore Partners L.P.	3,263	90,395
		207,635
Midstream 9.3%		
Kinder Morgan, Inc.	1,015	34,693
Kinder Morgan, Inc. Warrants[7][8]	795	1,812
ONEOK, Inc.	643	53,321
Plains All American GP LLC Unregistered[3][5]	24	47,538
Targa Resources Corp.	301	13,364
The Williams Companies, Inc.	1,725	52,673
		203,401
Upstream MLP & Income Trust 5.3%		
BreitBurn Energy Partners L.P.	1,937	32,161
Chesapeake Granite Wash Trust	479	9,331
Legacy Reserves L.P.	535	13,212
LRR Energy, L.P.	308	4,463
Memorial Production Partners LP	339	5,811
Mid-Con Energy Partners, LP	537	10,813
Pacific Coast Oil Trust	500	8,415
SandRidge Mississippian Trust II	333	6,741
SandRidge Permian Trust	893	17,801
VOC Energy Trust	344	6,558
		115,306
Other MLP 3.4%		
Exterran Partners, L.P.	2,878	56,782
PetroLogistics LP[9]	1,350	18,900
		75,682
Coal MLP & Other 0.5%		
Alliance Resource Partners, L.P.	156	8,899
Clearwater Trust[3][5][10]	N/A	2,520

				11,419
Total Equity Investments (Cost — $2,627,544)				3,895,911

	Interest Rate	Maturity Date	Principal Amount	
Debt Investments — 2.4%				
Midstream — 2.1%				
Crestwood Midstream Partners LP	7.750%	4/1/19	$ 11,750	11,897
Niska Gas Storage Partners LLC	8.875	3/15/18	29,000	27,767
Penn Virginia Resource Partners, L.P.(5)	8.250	4/15/18	6,250	6,281
				45,945

See accompanying notes to financial statements.

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KAYNE ANDERSON MLP INVESTMENT COMPANY

SCHEDULE OF INVESTMENTS

MAY 31, 2012

(amounts in 000 s, except number of option contracts)

(UNAUDITED)

Description	Interest Rate	Maturity Date	Principal Amount	Value
Upstream 0.3%				
BreitBurn Energy Partners L.P.	7.875%	4/15/22	$ 2,250	$ 2,216
EP Energy LLC	9.375	5/1/20	4,250	4,362
				6,578
Total Energy Debt Investments (Cost $52,005)				52,523
Total Long-Term Investments (Cost $2,679,549)				3,948,434

	No. of Contracts	
Liabilities		
Call Option Contracts Written[7]		
Midstream		
Targa Resources Partners L.P., call option expiring 6/15/12 @ $43.00 (Premiums Received $64)	1,000	(5)
Credit Facility		(9,000)
Senior Unsecured Notes		(890,000)
Mandatory Redeemable Preferred Stock at Liquidation Value		(374,000)
Deferred Tax Liability		(492,643)
Other Liabilities		(39,704)
Total Liabilities		(1,805,352)
Other Assets		47,917
Total Liabilities in Excess of Other Assets		(1,757,435)
Net Assets Applicable to Common Stockholders		$ 2,190,999

(1) Unless otherwise noted, equity investments are common units/common shares.

(2) Includes limited liability companies.

(3) Fair valued securities, restricted from public sale. See Notes 2, 3 and 7 in Notes to Financial Statements.

(4) Distributions are paid-in-kind.

(5) The Company believes that it is an affiliate of the Clearwater Trust, MarkWest Energy Partners, L.P., Penn Virginia Resource Partners, L.P., Plains All American Pipeline, L.P. and Plains All American GP LLC. See Note 5 Agreements and Affiliations.

(6) Security or a portion thereof is segregated as collateral on option contracts written.

(7) Security is non-income producing.

(8) Each warrant entitles the holder to purchase one Kinder Morgan, Inc. common unit for $40.00 until May 25, 2017.

(9) Security is not currently paying cash distributions but is expected to pay cash distributions within the next 12 months.

(10) The Company owns an interest in the Creditors Trust of Miller Bros. Coal, LLC (Clearwater Trust) consisting of a coal royalty interest. See Notes 5 and 7 in Notes to Financial Statements.

See accompanying notes to financial statements.

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KAYNE ANDERSON MLP INVESTMENT COMPANY

STATEMENT OF ASSETS AND LIABILITIES

MAY 31, 2012

(amounts in 000 s, except share and per share amounts)

(UNAUDITED)

ASSETS	
Investments at fair value:	
Non-affiliated (Cost $2,350,445)	$ 3,314,763
Affiliated (Cost $329,104)	633,671
Total investments (Cost $2,679,549)	3,948,434
Cash	22,807
Deposits with brokers	261
Receivable for securities sold	11,686
Interest, dividends and distributions receivable	946
Deferred debt issuance and preferred stock offering costs and other assets	12,217
Total Assets	3,996,351
LIABILITIES	
Credit facility	9,000
Payable for securities purchased	8,762
Investment management fee payable	14,181
Accrued directors fees and expenses	81
Call option contracts written (Premiums received $64)	5
Accrued expenses and other liabilities	16,680
Deferred tax liability	492,643
Senior unsecured notes	890,000
Mandatory redeemable preferred stock, $25.00 liquidation value per share (14,960,000 shares issued and outstanding)	374,000
Total Liabilities	1,805,352
NET ASSETS APPLICABLE TO COMMON STOCKHOLDERS	$ 2,190,999
NET ASSETS APPLICABLE TO COMMON STOCKHOLDERS CONSIST OF	
Common stock, $0.001 par value (83,060,342 shares issued and outstanding, 184,800,000 shares authorized)	$ 83
Paid-in capital	1,543,924
Accumulated net investment loss, net of income taxes, less dividends	(380,870)
Accumulated realized gains on investments, options, and interest rate swap contracts, net of income taxes	231,673
Net unrealized gains on investments and options, net of income taxes	796,189
NET ASSETS APPLICABLE TO COMMON STOCKHOLDERS	$ 2,190,999
NET ASSET VALUE PER COMMON SHARE	$ 26.38

See accompanying notes to financial statements.

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KAYNE ANDERSON MLP INVESTMENT COMPANY

STATEMENT OF OPERATIONS

(amounts in 000 s)

(UNAUDITED)

	For the Three Months Ended May 31, 2012	For the Six Months Ended May 31, 2012
INVESTMENT INCOME		
Income		
Dividends and distributions:		
Non-affiliated investments	$ 47,716	$ 91,227
Affiliated investments	9,528	17,628
Total dividends and distributions	57,244	108,855
Return of capital	(49,528)	(94,538)
Net dividends and distributions	7,716	14,317
Interest and other income	1,406	2,218
Total Investment Income	9,122	16,535
Expenses		
Investment management fees	14,179	27,512
Administration fees	203	414
Professional fees	151	288
Custodian fees	114	216
Reports to stockholders	85	186
Directors fees and expenses	79	169
Insurance	53	106
Other expenses	(94)	178
Total Expenses Before Interest Expense, Preferred Distributions and Taxes	14,770	29,069
Interest expense and amortization of debt issuance costs	9,904	18,845
Distributions on mandatory redeemable preferred stock and amortization of offering costs	5,086	8,645
Total Expenses Before Taxes	29,760	56,559
Net Investment Loss Before Taxes	(20,638)	(40,024)
Deferred tax benefit	6,219	12,075
Net Investment Loss	(14,419)	(27,949)
REALIZED AND UNREALIZED GAINS (LOSSES)		
Net Realized Gains (Losses)		
Investments non-affiliated	25,605	57,240
Investments affiliated	(29)	1,532
Options	649	1,005
Payments on interest rate swap contracts	(2,606)	(2,606)
Deferred tax expense	(8,739)	(21,153)

Net Realized Gains	14,880	36,018
Net Change in Unrealized Gains (Losses)		
Investments non-affiliated	(359,150)	(35,447)
Investments affiliated	(61,094)	28,614
Options	21	(34)
Deferred tax expense	155,483	2,541
Net Change in Unrealized Losses	(264,740)	(4,326)
Net Realized and Unrealized Gains (Losses)	(249,860)	31,692
NET INCREASE (DECREASE) IN NET ASSETS APPLICABLE TO COMMON STOCKHOLDERS RESULTING FROM OPERATIONS	$ (264,279)	$ 3,743

See accompanying notes to financial statements.

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KAYNE ANDERSON MLP INVESTMENT COMPANY

STATEMENT OF CHANGES IN NET ASSETS APPLICABLE TO COMMON STOCKHOLDERS

(amounts in 000 s, except share amounts)

	For the Six Months Ended May 31, 2012 (Unaudited)	For the Fiscal Year Ended November 30, 2011
OPERATIONS		
Net investment loss, net of tax	$ (27,949)	$ (49,953)
Net realized gains, net of tax	36,018	110,193
Net change in unrealized gains (losses), net of tax	(4,326)	91,626
Net Increase in Net Assets Resulting from Operations	3,743	151,866
DIVIDENDS AND DISTRIBUTIONS TO COMMON STOCKHOLDERS[(1)]		
Dividends	(17,147)[(2)]	(89,963)[(3)]
Distributions return of capital	(64,054)[(2)]	(51,663)[(3)]
Dividends and Distributions to Common Stockholders	(81,201)	(141,626)
CAPITAL STOCK TRANSACTIONS		
Issuance of common stock offerings of 7,500,000 and 5,700,000 shares of common stock, respectively	236,325	174,306
Underwriting discounts and offering expenses associated with the issuance of common stock	(9,812)	(7,322)
Issuance of 430,133 and 958,808 newly issued shares of common stock from reinvestment of dividends and distributions, respectively	12,341	26,488
Net Increase in Net Assets Applicable to Common Stockholders from Capital Stock Transactions	238,854	193,472
Total Increase in Net Assets Applicable to Common Stockholders	161,396	203,712
NET ASSETS ATTRIBUTABLE TO COMMON STOCKHOLDERS		
Beginning of period	2,029,603	1,825,891
End of period	$ 2,190,999	$ 2,029,603

(1) Distributions on the Company s mandatory redeemable preferred stock are treated as an operating expense under GAAP and are included in the calculation of net investment loss. See Note 2 Significant Accounting Policies. The Company estimates that the distribution in the amount of $8,214 paid to mandatory redeemable preferred stockholders during the six months ended May 31, 2012 will be a dividend (ordinary income). This estimate is based solely on the Company s operating results during the period and does not reflect the expected result during the fiscal year. The actual characterization of the mandatory redeemable preferred stock distributions made during the period will not be determinable until after the end of the fiscal year when the Company can determine earnings and profits. Therefore, the characterization may differ from the preliminary estimates. Distributions in the amount of $11,451 paid to mandatory redeemable preferred stockholders for the fiscal year ended November 30, 2011, were characterized as qualified dividend income. This characterization is based on the Company s earnings and profits.

See accompanying notes to financial statements.

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KAYNE ANDERSON MLP INVESTMENT COMPANY

STATEMENT OF CHANGES IN NET ASSETS APPLICABLE TO COMMON STOCKHOLDERS

(amounts in 000 s, except share amounts)

(2) This is an estimate of the characterization of the distributions paid to common stockholders for the six months ended May 31, 2012 as either a dividend (eligible to be treated as qualified dividend income) or distributions (return of capital). This estimate is based on the Company s operating results during the period. The actual characterization of the common stock distributions made during the period will not be determined until after the end of the fiscal year when the Company can determine earnings and profits. Therefore, the characterization may differ from the preliminary estimates.

(3) The information presented in each of these items is a characterization of a portion of the total dividends and distributions paid to common stockholders for the fiscal year ended November 30, 2011 as either dividends (eligible to be treated as qualified dividend income) or distributions (return of capital). This characterization is based on the Company s earnings and profits.

See accompanying notes to financial statements.

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KAYNE ANDERSON MLP INVESTMENT COMPANY

STATEMENT OF CASH FLOWS

FOR THE SIX MONTHS ENDED MAY 31, 2012

(amounts in 000 s)

(UNAUDITED)

CASH FLOWS FROM OPERATING ACTIVITIES	
Net increase in net assets resulting from operations	$ 3,743
Adjustments to reconcile net increase in net assets resulting from operations to net cash used in operating activities:	
Net deferred tax expense	6,537
Return of capital distributions	94,538
Net realized gains	(57,171)
Net unrealized losses	6,867
Accretion of bond discounts, net	(58)
Purchase of long-term investments	(863,108)
Proceeds from sale of long-term investments	394,065
Decrease in deposits with brokers	13
Increase in receivable for securities sold	(10,434)
Increase in interest, dividends and distributions receivable	(63)
Amortization of deferred debt issuance costs	921
Amortization of mandatory redeemable preferred stock issuance costs	431
Decrease in other assets, net	67
Increase in payable for securities purchased	80
Increase in investment management fee payable	2,267
Increase in accrued directors fees and expenses	2
Decrease in call option contracts written, net	(57)
Decrease in accrued expenses and other liabilities	(1,229)
Net Cash Used in Operating Activities	(422,589)
CASH FLOWS FROM FINANCING ACTIVITIES	
Proceeds from credit facility	9,000
Issuance of shares of common stock, net of offering costs	226,513
Proceeds from offering of senior unsecured notes	175,000
Proceeds from issuance on mandatory redeemable preferred stock	120,000
Redemption of senior unsecured notes	(60,000)
Redemption of mandatory redeemable preferred stock	(6,000)
Costs associated with issuance of credit facility	(75)
Costs associated with issuance of senior unsecured notes	(1,411)
Costs associated with issuance of mandatory redeemable preferred stock	(2,600)
Cash distributions paid to common stockholders	(68,861)
Net Cash Provided by Financing Activities	391,566
NET DECREASE IN CASH	(31,023)
CASH BEGINNING OF PERIOD	53,830
CASH END OF PERIOD	$ 22,807

Supplemental disclosure of cash flow information:

Non-cash financing activities not included herein consist of reinvestment of distributions of $12,340 pursuant to the Company s dividend reinvestment plan.

During the six months ended May 31, 2012, interest paid was $18,999 and there were no income taxes paid.

The Company received $15,076 paid-in-kind dividends during the six months ended May 31, 2012. See Note 2 Significant Accounting Policies.

See accompanying notes to financial statements.

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	For the Six Months Ended May 31, 2012 (Unaudited)	For the Fiscal Year Ended November 30, 2011	2010	2009	2008	2007	2006	2005	For the Period September 28, 2004[1] through November 30, 2004
Per Share of Common Stock[2]									
Net asset value, beginning of period	$ 27.01	$ 26.67	$ 20.13	$ 14.74	$ 30.08	$ 28.99	$ 25.07	$ 23.91	$ 23.70[3]
Net investment income/(loss)[4]	(0.35)	(0.69)	(0.44)	(0.33)	(0.73)	(0.73)	(0.62)	(0.17)	0.02
Net realized and unrealized gain/(loss)	0.73	2.91	8.72	7.50	(12.56)	3.58	6.39	2.80	0.19
Total income/(loss) from operations	0.38	2.22	8.28	7.17	(13.29)	2.85	5.77	2.63	0.21
Auction rate preferred dividends[4][5]						(0.10)		(0.05)	
Auction rate preferred distributions return of capital[5]				(0.01)	(0.10)		(0.10)		
Total dividends and distributions auction rate preferred				(0.01)	(0.10)	(0.10)	(0.10)	(0.05)	
Common dividends[5]	(0.22)	(1.26)	(0.84)			(0.09)		(0.13)	
Common distributions return of capital[5]	(0.81)	(0.72)	(1.08)	(1.94)	(1.99)	(1.84)	(1.75)	(1.37)	
Total dividends and distributions common	(1.03)	(1.98)	(1.92)	(1.94)	(1.99)	(1.93)	(1.75)	(1.50)	