

MPLX LP
Form 424B5
December 02, 2014
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The information in this preliminary prospectus supplement is not complete and may be changed. This preliminary prospectus supplement and the accompanying prospectus are not an offer to sell these securities and are not soliciting an offer to buy these securities in any jurisdiction where the offer or sale is not permitted.

Subject to Completion,

Preliminary Prospectus Supplement dated December 2, 2014

**Filed Pursuant to Rule 424(B)(5)
Registration No. 333-200621**

PROSPECTUS SUPPLEMENT

(To prospectus dated November 26, 2014)

3,000,000 Common Units

Representing Limited Partner Interests

MPLX LP

We are selling 3,000,000 common units representing limited partner interests in MPLX LP, which we refer to as our common units.

Our common units trade on the New York Stock Exchange under the symbol MPLX. On December 1, 2014, the last sale price of our common units as reported on the New York Stock Exchange was \$65.78 per common unit.

Investing in our common units involves risks. Limited partnerships are inherently different than corporations. See Risk Factors on page S-8 of this prospectus supplement.

	Per Common Unit	Total
Public offering price	\$	\$
Underwriting discount	\$	\$
Proceeds (before expenses) to us	\$	\$

The underwriters may also exercise their option to purchase up to 450,000 additional common units from us, at the public offering price, less the underwriting discount, for 30 days after the date of this prospectus. If the underwriters exercise the option in full, the total underwriting discounts will be \$ and the total proceeds to us, before estimated expenses payable by us, will be \$.

Neither the Securities and Exchange Commission nor any state securities commission has approved or disapproved of these securities or determined if this prospectus supplement or the accompanying prospectus is truthful or complete. Any representation to the contrary is a criminal offense.

The common units will be ready for delivery on or about December , 2014.

Joint Book-Running Managers

BofA Merrill Lynch	J.P. Morgan	UBS Investment Bank	Wells Fargo Securities
Barclays		Citigroup	Morgan Stanley
		<i>Co-Managers</i>	

DNB Markets	Fifth Third Securities	MUFG	PNC Capital Markets LLC	RBS
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The date of this prospectus supplement is December , 2014.

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ABOUT THIS PROSPECTUS SUPPLEMENT

We provide information to you about this offering in two separate documents. The accompanying prospectus provides general information about us and the securities we may offer from time to time, some of which may not apply to this offering. This prospectus supplement describes the specific details regarding this offering and the common units offered hereby. Additional information is incorporated by reference in this prospectus supplement. If information in this prospectus supplement is inconsistent with the accompanying prospectus, you should rely on this prospectus supplement.

You should rely only on the information contained or incorporated by reference in this prospectus supplement, in the accompanying prospectus or in any free writing prospectus that we may provide to you. We have not, and the underwriters have not, authorized anyone to provide you with different information. You should not assume that the information contained in this prospectus supplement, the accompanying prospectus or any document incorporated by reference is accurate as of any date other than the date mentioned on the cover page of these documents. Our business, financial condition, results of operations and prospects may have changed since those respective dates. We are not, and the underwriters are not, making offers to sell the common units in any jurisdiction in which an offer or solicitation is not authorized or in which the person making such offer or solicitation is not qualified to do so or to anyone to whom it is unlawful to make an offer or solicitation.

In this prospectus supplement, unless stated otherwise or the context otherwise requires, references to:

MPLX, we, us and our refers to MPLX LP and its consolidated subsidiaries; and

MPC refers to Marathon Petroleum Corporation and its consolidated subsidiaries, excluding MPLX.

WHERE YOU CAN FIND MORE INFORMATION

We are subject to the informational reporting requirements of the Securities Exchange Act of 1934, which we refer to as the Exchange Act. We file reports and other information with the U.S. Securities and Exchange Commission, which we refer to as the SEC. Our SEC filings are available over the Internet at the SEC's web site at <http://www.sec.gov>. You may read and copy any reports, statements and other information filed by us at the SEC's Public Reference Room at 100 F Street, N.E., Washington, D.C. 20549. Please call 1-800-SEC-0330 for further information about the Public Reference Room. You may also inspect our SEC reports and other information at our web site at <http://www.mplx.com>. We do not intend for information contained in, or accessible through, our web site to be part of this prospectus supplement or the accompanying prospectus, other than documents that we file with the SEC that are incorporated by reference in this prospectus supplement or the accompanying prospectus.

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INFORMATION WE INCORPORATE BY REFERENCE

The SEC allows us to incorporate by reference the information we file with it, which means:

incorporated documents are considered part of this prospectus supplement and the accompanying prospectus;

we can disclose important information to you by referring you to those documents; and

information that we file with the SEC after the date of this prospectus supplement will automatically update and supersede the information contained in this prospectus supplement and the accompanying prospectus and incorporated filings.

We incorporate by reference the documents listed below that we filed with the SEC under the Exchange Act:

our Annual Report on Form 10-K for the year ended December 31, 2013;

our Quarterly Reports on Form 10-Q for the quarterly periods ended March 31, 2014, June 30, 2014 and September 30, 2014;

our Current Reports on Form 8-K filed on March 4, 2014, June 3, 2014, August 5, 2014, November 26, 2014 and December 2, 2014; and

the description of the common units representing limited partner interests in MPLX as set forth in MPLX's Registration Statement on Form 8-A (Registration No. 001-35714), filed with the SEC on October 23, 2012 under the Exchange Act, and all amendments or reports filed with the SEC for the purpose of updating such description.

We also incorporate by reference each of the documents that we file with the SEC under Sections 13(a), 13(c), 14 or 15(d) of the Exchange Act on or after the date of this prospectus supplement and prior to the termination of the offering under this prospectus supplement. We will not, however, incorporate by reference in this prospectus supplement or the accompanying prospectus any documents or portions thereof that are not deemed filed with the SEC, including any information furnished pursuant to Item 2.02 or Item 7.01 of our Current Reports on Form 8-K, after the date of this prospectus supplement unless, and except to the extent, specified in such Current Reports.

We will provide you with a copy of any of these filings (other than an exhibit to these filings, unless the exhibit is specifically incorporated by reference into the filing requested) at no cost, if you submit a request to us by writing or telephoning us at the following address or telephone number:

MPLX LP

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200 E. Hardin Street

Findlay, Ohio 45840

Attention: Investor Relations

Telephone: (419) 672-6500

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FORWARD-LOOKING STATEMENTS

This prospectus supplement and the accompanying prospectus, including the documents incorporated herein and therein by reference, include forward-looking statements within the meaning of Section 27A of the Securities Act of 1933, which we refer to as the Securities Act, and Section 21E of the Exchange Act. You can identify our forward-looking statements by words such as anticipate, believe, estimate, expect, forecast, goal, intend, project, seek, target, could, may, should, will, would or other similar expressions that convey the uncertainty of events or outcomes. When considering these forward-looking statements, you should keep in mind the risk factors and other cautionary statements contained in this prospectus supplement, the accompanying prospectus and the documents we have incorporated by reference.

Forward-looking statements include, but are not limited to, statements that relate to, or statements that are subject to risks, contingencies or uncertainties that relate to:

future levels of revenues and other income, income from operations, net income attributable to MPLX, earnings per unit, Adjusted EBITDA or Distributable Cash Flow;

anticipated volumes of throughput of crude oil, refined products or other hydrocarbon-based products;

anticipated levels of regional, national and worldwide prices of crude oil and refined products;

future levels of capital, environmental or maintenance expenditures, general and administrative and other expenses;

changes in maintenance capital expenditure requirements or changes in costs of planned capital projects;

the success or timing of completion of ongoing or anticipated capital or maintenance projects;

expectations regarding the acquisition or divestiture of assets;

the effect of restructuring or reorganization of business components;

the potential effects of judicial or other proceedings on our business, financial condition, results of operations and cash flows;

the potential effects of changes in tariff rates on our business, financial condition, results of operations and cash flows;

the adequacy of our capital resources and liquidity, including, but not limited to, availability of sufficient cash flow to pay distributions and execute our business plan;

our ability to successfully implement our growth strategy, whether through organic growth or acquisitions;

capital market conditions and our ability to raise adequate capital to execute our business plan and implement our growth strategy; and

the anticipated effects of actions of third parties such as competitors, or federal, foreign, state or local regulatory authorities, or plaintiffs in litigation.

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We have based our forward-looking statements on our current expectations, estimates and projections about our industry and our partnership. We caution that these statements are not guarantees of future performance, and you should not rely unduly on them, as they involve risks, uncertainties, and assumptions that we cannot predict. In addition, we have based many of these forward-looking statements on assumptions about future events that may prove to be inaccurate. While our management considers these assumptions to be reasonable, they are inherently subject to significant business, economic, competitive, regulatory and other risks, contingencies and uncertainties, most of which are difficult to predict and many of which are beyond our control. Accordingly, our actual results may differ materially from the future performance that we have expressed or forecast in our forward-looking statements. Differences between actual results and any future performance suggested in our forward-looking statements could result from a variety of factors, including the following:

changes in general economic, market or business conditions;

domestic and foreign supplies of crude oil and other feedstocks;

domestic and foreign supplies of refined products such as gasoline, diesel fuel, jet fuel, home heating oil and petrochemicals;

foreign imports of refined products;

refining industry overcapacity or under capacity;

changes in the cost or availability of third-party vessels, pipelines and other means of transportation for crude oil, feedstocks and refined products;

the price, availability and acceptance of alternative fuels and alternative-fuel vehicles and laws mandating such fuels or vehicles;

fluctuations in consumer demand for refined products, including seasonal fluctuations;

political and economic conditions in nations that consume refined products, including the United States, and in crude oil producing regions, including the Middle East, Africa, Canada and South America;

actions taken by our competitors and the expansion and retirement of pipeline capacity in response to market conditions;

changes in fuel and utility costs for our facilities;

failure to realize the benefits projected for capital projects, or cost overruns associated with such projects;

the ability to successfully implement growth strategies, whether through organic growth or acquisitions;

accidents or other unscheduled shutdowns affecting our pipelines or equipment, or those of our suppliers or customers;

unusual weather conditions and natural disasters;

disruptions due to equipment interruption or failure;

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acts of war, terrorism or civil unrest that could impair our ability to transport crude oil or refined products;

legislative or regulatory action, which may adversely affect our business or operations;

rulings, judgments or settlements in litigation or other legal, tax or regulatory matters, including unexpected environmental remediation costs, in excess of any reserves or insurance coverage;

labor and material shortages;

the ability and willingness of parties with whom we have material relationships, including MPC, to perform their obligations to us;

changes in the availability of unsecured credit and changes affecting the credit markets generally; and

the other factors described in Item 1A. Risk Factors of our Annual Report on Form 10-K for the year ended December 31, 2013.

We do not undertake any obligation to update the forward-looking statements included or incorporated by reference in this prospectus supplement or the accompanying prospectus, unless we are required by applicable securities laws to do so.

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SUMMARY

The following summary information is qualified in its entirety by the information contained elsewhere in this prospectus supplement and the accompanying prospectus, including the documents we have incorporated by reference. Because this is a summary, it does not contain all the information that may be important to you. We urge you to read this entire prospectus supplement and the accompanying prospectus, including our consolidated financial statements, and the related notes, as well as the other documents incorporated by reference, carefully, including the Risk Factors section.

MPLX LP

We are a fee-based, growth-oriented master limited partnership formed by MPC to own, operate, develop and acquire pipelines and other midstream assets related to the transportation and storage of crude oil, refined products and other hydrocarbon-based products. As of September 30, 2014, our assets primarily consisted of a 69 percent indirect interest in a network of common carrier crude oil and product pipeline systems and associated storage assets in the Midwest and Gulf Coast regions of the United States. As of September 30, 2014, and before giving effect to the Transaction described below, MPC had retained a 31 percent interest in such network. We also own a 100 percent interest in a butane cavern in Neal, West Virginia with approximately one million barrels of storage capacity. Our assets are integral to the success of MPC's operations.

We generate revenue primarily by charging tariffs for transporting crude oil, refined products and other hydrocarbon-based products through our pipelines and at our barge dock and fees for storing crude oil and products at our storage facilities. We are also the operator of additional crude oil and product pipelines owned by MPC and third parties for which we are paid operating fees. We do not take ownership of the crude oil or products that we transport and store for our customers, and we do not engage in the trading of any commodities.

MPC historically has been the source of the substantial majority of our revenues. In connection with our initial public offering completed on October 31, 2012, we entered into multiple transportation and storage services agreements with MPC. These agreements are long-term, fee-based agreements with minimum volume commitments under which MPC will continue to be the source of the substantial majority of our revenues for the foreseeable future. We believe these transportation and storage services agreements will promote stable and predictable cash flows. MPC is one of the largest petroleum product refiners, transporters and marketers in the United States.

Recent Developments

Acquisition of Pipe Line Holdings Interest

On December 1, 2014, MPLX, MPLX Operations LLC, a Delaware limited liability company and subsidiary of MPLX, which we refer to as Operations, MPLX Logistics Holdings LLC, a Delaware limited liability company and subsidiary of MPC, which we refer to as Logistics, and MPL Investment LLC, a Delaware limited liability company and subsidiary of MPC, which we refer to as MPLI, entered into a Partnership Interests Purchase and Contribution Agreement, or the Purchase Agreement. Pursuant to the Purchase Agreement: (a) MPLI sold the majority of its limited partnership interests in MPLX Pipe Line Holdings LP, a Delaware limited partnership and subsidiary of MPLX, which we refer to as Pipe Line Holdings, representing 22.875% of the total partnership interests in Pipe Line Holdings, to Operations for \$600.0 million in cash; and (b) Logistics contributed all of its limited partnership interests in Pipe Line Holdings, representing 7.625% of the total partnership interests in Pipe Line Holdings, to MPLX for 2,924,104 of our common units calculated by dividing \$200 million by the average closing price for the common units for the 10 trading days preceding December 1, 2014.

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As a result of this transaction, which we refer to as the Transaction, we own 99.5% of the of the total partnership interests in Pipe Line Holdings and MPLI owns the remaining 0.5%. We funded the \$600.0 million

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cash purchase price of the Transaction with borrowings under our credit facility, which is described below. Through its subsidiaries, Pipe Line Holdings owns one of the largest networks of common carrier crude oil and product pipelines in the U.S. based on total volume delivered, a barge dock on the Mississippi River and crude oil and product storage facilities.

Credit Facility

On November 20, 2014, MPLX, as the borrower, entered into a credit agreement providing for a \$1 billion unsecured revolving credit facility, or revolving credit facility, and a \$250 million term loan facility, or term loan facility, which we refer to collectively as the credit facility. The revolving credit facility includes letter of credit issuing capacity of up to \$250 million and swingline loan capacity of up to \$100 million. The revolving credit facility may be increased by up to an additional \$500 million, subject to certain customary conditions, including the consent of the lenders whose commitments would increase.

The revolving credit facility is for a five-year term with a maturity date of November 20, 2019 that may be extended up to two additional one-year periods subject to the consent of the lenders holding a majority of the revolving credit facility commitments, provided that the commitments held by any non-consenting lenders will terminate on the original maturity date. The term loan facility was drawn in full on November 20, 2014 and also matures on November 20, 2019. The maturity date for the term loan facility may be extended up to two additional one-year periods subject to the consent of the lenders holding a majority of the outstanding term loan exposure, provided that the term loan borrowings held by any non-consenting lenders will continue to be due and payable on the original maturity date.

We pay interest on outstanding borrowings under the credit facility based upon either of the Adjusted LIBO Rate (as defined in the credit facility) or the Alternate Base Rate (as defined in the credit facility), at our election, plus, in each case, a specified margin. In addition, we pay various fees and expenses in connection with the credit facility, including administrative agent fees, commitment fees on the unused portion of the revolving credit facility and fees with respect to issued and outstanding letters of credit. The margins above the applicable benchmark interest rates and commitment fees fluctuate based on (i) prior to the Rating Date (as defined in the credit facility), MPLX's ratio of Consolidated Total Debt (as defined in the credit facility) as of the end of each fiscal quarter to Consolidated EBITDA (as defined in the credit facility) for the prior four fiscal quarters, and (ii) from and after the Rating Date, the credit ratings in effect from time to time on MPLX's long-term debt.

The credit facility includes certain representations and warranties, affirmative and restrictive covenants and events of default that we consider to be usual and customary for an agreement of this type, including a financial covenant that requires MPLX to maintain a ratio of Consolidated Total Debt as of the end of each fiscal quarter to Consolidated EBITDA for the prior four fiscal quarters of no greater than 5.0 to 1.0 (or 5.5 to 1.0 during the six-month period following certain acquisitions). Consolidated EBITDA is subject to adjustments for certain acquisitions completed and capital projects undertaken during the relevant period. Other covenants, among other things, restrict MPLX from incurring debt, creating liens on its assets and entering into transactions with affiliates.

On November 20, 2014, we made a revolving borrowing of \$15 million and a term loan borrowing of \$250 million under the credit facility. The proceeds from these borrowings were used to repay and terminate our previously existing \$500 million credit facility, dated as of September 14, 2012. On December 1, 2014, MPLX made a revolving borrowing in the amount of \$615 million, \$600 million of which was used to fund the cash purchase price of the Transaction and \$15 million of which was used for general partnership purposes. After giving effect to such borrowing, MPLX had \$630 million in borrowings outstanding under the revolving credit facility and a \$250 million term loan outstanding under the term loan facility as of December 1, 2014.

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We intend to use the net proceeds from this offering to repay a portion of the borrowings under the revolving credit facility and for general partnership purposes, such that, after giving effect to the repayment, the Transaction will have been funded approximately 50 percent with debt and approximately 50 percent with equity, split between common units issued to the public in this offering and new common units issued to MPC.

Corporate Information

Our principal executive offices are located at 200 E. Hardin Street, Findlay, Ohio 45840, and our telephone number at that location is (419) 672-6500.

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The Offering

Issuer	MPLX LP, a Delaware limited partnership.
Common Units Offered by Us	3,000,000 common units (or 3,450,000 common units if the underwriters exercise their option to purchase additional common units in full).
Units Outstanding Before this Offering	<p>19,910,479 common units held by the public.</p> <p>17,056,515 common units held by MPC (prior to giving effect to the issuance of 2,924,104 of our common units to MPC in connection with the Transaction).</p> <p>36,951,515 subordinated units held by MPC.</p> <p>1,508,541 general partner units held by our general partner.</p>
Units Outstanding After this Offering	<p> common units (or common units if the underwriters exercise their option to purchase additional common units in full), in each case after giving effect to the issuance of 2,924,104 of our common units to MPC in connection with the Transaction. The number of subordinated units and general partner units outstanding will not be affected by this offering.</p>
General Partner Units	<p>After the closing of this offering, our general partner may purchase newly issued general partner units to allow it to maintain its 2.0% general partner interest in us (including additional general partner units if the underwriters exercise their option to purchase additional common units). The sale of general partner units is not part of this offering.</p>
Use of Proceeds	<p>We expect to receive net proceeds from this offering of approximately \$ million, or approximately \$ million if the underwriters exercise their option to purchase additional common units in full, and after deducting the underwriting discount and estimated offering expenses payable by us. We intend to use the net proceeds from this offering to repay a portion of the amount outstanding under our revolving credit facility and for general partnership purposes, such that, after giving effect to the repayment, the Transaction will have been</p>

funded approximately 50 percent with debt and approximately 50 percent with equity, split between common units issued to the public in this offering and new common units issued to MPC. See Use of Proceeds.

Cash Distributions

Under our partnership agreement, we must distribute all of our cash on hand at the end of each quarter, less reserves established by our general partner. We refer to this cash as distributable cash, and we define its meaning in our partnership agreement.

On October 21, 2014, we declared a quarterly cash distribution attributable to the quarter ended September 30, 2014 of \$0.3575 per

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common unit, or \$1.43 per common unit on an annualized basis, which was paid on November 14, 2014 to unitholders of record as of November 4, 2014.

Issuance of Additional Units

Our partnership agreement authorizes us to issue an unlimited number of additional units without the approval of our unitholders.

Limited Voting Rights

Our general partner manages and operates us. Unlike the holders of common stock in a corporation, you will have only limited voting rights on matters affecting our business. You will have no right to elect our general partner or its directors on an annual or other continuing basis. Our general partner may not be removed except by a vote of the holders of at least 66 2/3% of the outstanding units, including common and subordinated units owned by MPC, voting together as a single class. Upon consummation of this offering and giving effect to our issuance of common units to MPC in the Transaction, MPC will own an aggregate of % of our common and subordinated units (or % of our common and subordinated units, if the underwriters exercise their option to purchase additional common units in full), in each case after giving effect to the issuance of 2,924,104 of our common units to MPC in connection with the Transaction. MPC will continue to have the ability to prevent the removal of our general partner.

Limited Call Right

If at any time our general partner and its affiliates own more than 85.0% of the outstanding common units, our general partner has the right, but not the obligation, to purchase all of the remaining common units at a price equal to the greater of (1) the average of the daily closing price of our common units over the 20 trading days preceding the date that is three business days before notice of exercise of the call right is first mailed and (2) the highest per-unit price paid by our general partner or any of its affiliates for common units during the 90-day period preceding the date such notice is first mailed.

Redemption of Ineligible Holders

Units held by persons who our general partner determines are not citizenship eligible holders or rate eligible holders will be subject to redemption. Citizenship eligible holders are individuals or entities whose nationality, citizenship or other related status does not create a substantial risk of cancellation or forfeiture of any property, including any governmental permit, endorsement or other authorization, in which we have an interest, and will generally include individuals and entities who are U.S. citizens. Rate eligible holders are:

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individuals or entities subject to U.S. federal income taxation on the income generated by us; or

entities not subject to U.S. federal income taxation on the income generated by us, so long as all of the entity's owners are domestic individuals or entities subject to such taxation.

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We have the right, which we may assign to any of our affiliates, but not the obligation, to redeem all of the common units of any holder that is not a citizenship eligible holder or a rate eligible holder or that has failed to certify or has falsely certified that such holder is a citizenship eligible holder or a rate eligible holder. The redemption price will be equal to the market price of the common units as of the date three days before the date the notice of redemption is mailed. The redemption price will be paid in cash or by delivery of a promissory note, as determined by our general partner. The units held by any person the general partner determines is not a citizenship eligible holder will not be entitled to voting rights.

Estimated Ratio of Taxable Income to Distributions

We estimate that if you own the common units you purchase in this offering through the record date for distributions for the period ending December 31, 2016, you will be allocated, on a cumulative basis, an amount of federal taxable income for that period that will be 20.0% or less of the cash distributed to you with respect to that period. For example, if you receive an annual distribution of \$1.05 per unit, we estimate that your average allocable federal taxable income per year will be no more than approximately \$0.21 per unit. Thereafter, the ratio of allocable taxable income to cash distributions to you could substantially increase. These estimates are based upon the assumption that gross income from operations will approximate the amount required to make the minimum quarterly distribution on all units and other assumptions with respect to capital expenditures, cash flow, net working capital and anticipated cash distributions. These estimates and assumptions are subject to, among other things, numerous business, economic, regulatory, legislative, competitive and political uncertainties beyond our control. Further, the estimates are based on current tax law and tax reporting positions that we have adopted and with which the IRS could disagree. Accordingly, we cannot assure you that these estimates will prove to be correct.

The actual percentage of distributions that will constitute taxable income could be higher or lower than expected, and any differences could be material and could materially affect the value of the common units. For example, the ratio of allocable taxable income to cash distributions to a purchaser of common units in an offering of securities hereunder will be greater, and perhaps substantially greater, than our estimate with respect to the period described above if:

gross income from operations exceeds the amount required to make minimum quarterly distributions on all units, yet we only distribute the minimum quarterly distributions on all units; or

we make a future offering of common units and use the proceeds of the offering in a manner that does not produce substantial additional deductions during the period described above, such as to repay indebtedness outstanding at the time of an offering of

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securities hereunder or to acquire property that is not eligible for depreciation or amortization for federal income tax purposes or that is depreciable or amortizable at a rate significantly slower than the rate applicable to our assets at the time of an offering of securities hereunder.

Material Federal Income Tax Consequences For a discussion of the material federal income tax consequences that may be relevant to prospective unitholders who are individual citizens or residents of the United States, please read **Material Federal Income Tax Consequences** in the accompanying prospectus.

Risk Factors See **Risk Factors** and other information in this prospectus supplement and the accompanying prospectus, including the documents we incorporate by reference, for a discussion of factors that should be carefully considered before investing in the common units.

New York Stock Exchange Symbol MPLX

Conflicts of Interest Affiliates of certain of the underwriters are lenders under our credit facility. Because more than 5% of the net proceeds of the common units may be paid to those affiliates, this offering will be conducted in compliance with the applicable requirements of FINRA Rule 5121. See **Underwriting (Conflicts of Interest)**.

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RISK FACTORS

An investment in the common units involves risk. Prior to making a decision about investing in the common units, and in consultation with your own financial and legal advisors, you should carefully consider the risk factors incorporated by reference in this prospectus supplement from our Annual Report on Form 10-K for the year ended December 31, 2013 under the heading Risk Factors, and other filings we may make from time to time with the SEC. You should also refer to the other information in this prospectus supplement and the accompanying prospectus, including our financial statements and the related notes incorporated by reference into this prospectus supplement and the accompanying prospectus. Additional risks and uncertainties that are not yet identified may also materially harm our business, operating results and financial condition and could result in a complete loss of your investment.

USE OF PROCEEDS

We expect to receive net proceeds of approximately \$ million from the sale of the 3,000,000 common units offered by this prospectus supplement, after deducting the underwriting discount and estimated offering expenses payable by us. If the underwriters exercise their option to purchase additional common units in full, we expect to receive total net proceeds of approximately \$ million, after deducting the underwriting discount and estimated offering expenses payable by us. We intend to use the net proceeds from this offering to repay a portion of the amount outstanding under our credit facility and for general partnership purposes, such that, after giving effect to the repayment, the Transaction will have been funded approximately 50 percent with debt and approximately 50 percent with equity, split between common units issued to the public in this offering and new common units issued to MPC. See Underwriting (Conflicts of Interest).

As of December 1, 2014, \$630 million of revolving borrowings and a \$250 million term loan were outstanding under our credit facility. Borrowings under our credit facility, which is scheduled to mature on November 20, 2019, bear interest based upon either the Adjusted LIBO Rate (as defined in the credit facility) plus a margin, or the Alternate Base Rate (as defined in the credit facility) plus a margin at MPLX's election. As of December 1, 2014, borrowings under our revolving credit facility bore interest at an average rate of 1.41% per annum, and the term loan bore interest at a rate of 1.41% per annum.

Affiliates of certain of the underwriters are lenders under our credit facility and, accordingly, will receive a portion of the net proceeds of this offering. Accordingly, this offering is being made in compliance with FINRA Rule 5121. See Underwriting (Conflicts of Interest).

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The following table shows our cash and cash equivalents and our capitalization as of September 30, 2014:

on an actual basis as of September 30, 2014;

on an as adjusted basis as of September 30, 2014 to give effect to the Transaction and our borrowing of approximately \$600 million under the revolving credit facility in connection with the Transaction and a \$15 million revolver borrowing and \$250 million term loan facility borrowing in connection with the repayment and termination of our prior revolving credit facility due 2017; and

on a further as adjusted basis as of September 30, 2014 to give effect to the transactions described in the immediately preceding bullet and our use of the net proceeds from this offering (assuming that the underwriters do not exercise their option to purchase additional common units in full). Please read Use of Proceeds.

You should read this table in conjunction with our consolidated financial statements, the related notes and other financial information contained in our Annual Report on Form 10-K for the fiscal year ended December 31, 2013, and our Quarterly Report on Form 10-Q for the quarter ended September 30, 2014, which are incorporated by reference into this prospectus supplement and the accompanying prospectus.

	As of September 30,⁽²⁾ 2014	As Adjusted for the Transaction and New Credit Facility (unaudited)	As of September 30, 2014 As Further Adjusted (unaudited)
(dollars in millions)	As of September 30, 2014 Actual (unaudited)	As of September 30, 2014 Actual (unaudited)	As of September 30, 2014 As Further Adjusted (unaudited)
Cash and equivalents	\$ 32.2	\$ 32.2	\$
Debt:			
Revolving credit facility due 2017 ⁽¹⁾	\$ 255.0	\$	\$
Revolving credit facility due 2019 ⁽¹⁾		615.0 ⁽²⁾	
Term loan due 2019 ⁽¹⁾		250.0	
Consolidated subsidiaries:			
Marathon Pipe Line LLC capital lease obligations due 2020	10.0	10.0	

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Total debt	\$	265.0	\$	875.0	\$
Equity/partners capital					
Held by public					
Common Units	\$	417.1	\$	417.1	\$
Held by MPC:					
Common Units		61.0		261.0	
Subordinated Units		217.1		217.1	
General Partner Units		(203.7)		(667.4) ⁽³⁾	
Total MPLX LP partners capital	\$	491.5	\$	227.8	\$
Non-controlling interest retained by MPC in Pipe Line Holdings	\$	341.8	\$	5.5	\$
Total equity/partners equity	\$	833.3	\$	233.3	\$
Total capitalization	\$	1,098.3	\$	1,108.3	\$

- (1) On November 20, 2014, we entered into a new credit facility, which matures in November 2019, and terminated the prior credit facility due September 2017.
- (2) As of December 1, 2014, the outstanding balance under the revolving credit facility was \$630 million.
- (3) Does not give effect to the purchase of additional general partner units by our general partner after the closing of this offering to maintain its 2.0% general partner interest in us.

Table of Contents**PRICE RANGE OF COMMON UNITS AND DISTRIBUTIONS**

Our common units are listed on the NYSE and traded under the symbol MPLX. As of December 1, 2014, there were three registered holders of 19,910,479 outstanding common units held by the public, including 19,908,679 common units held in street name. In addition, as of December 1, 2014, MPC and its affiliates owned 17,056,515 of our common units (prior to giving effect to the issuance of 2,924,104 of our common units to MPC in connection with the Transaction), 36,951,515 of our subordinated units and 1,508,541 of our general partner units (the 2.0 percent general partner interest), which together constitutes a 73.6 percent ownership interest in us. The following table reflects intraday high and low sales prices of and cash distributions declared on our common units by quarter since October 26, 2012, the date our units began trading on the NYSE.

	Price Range		Cash
	High	Low	Distributions Per Unit ⁽¹⁾
Year Ending December 31, 2014			
Fourth Quarter (through December 1, 2014)	\$ 73.00	\$ 46.08	\$ (2)
Third Quarter	\$ 68.05	\$ 55.00	\$ 0.3575
Second Quarter	\$ 66.49	\$ 48.14	\$ 0.3425
First Quarter	\$ 50.75	\$ 40.01	\$ 0.3275
Year Ending December 31, 2013			
Fourth Quarter	\$ 44.97	\$ 35.72	\$ 0.3125
Third Quarter	\$ 38.54	\$ 34.51	\$ 0.2975
Second Quarter	\$ 39.69	\$ 34.40	\$ 0.2850
First Quarter	\$ 38.61	\$ 31.48	\$ 0.2725
Year Ending December 31, 2012			
Fourth Quarter (from October 26, 2012)	\$ 34.51	\$ 25.35	\$ 0.1769

(1) Distributions are shown for the quarter with respect to which they were declared.

(2) The distribution with respect to the quarter ending December 31, 2014 has not been declared or paid. We expect to declare and pay a cash distribution within 45 days following the end of the quarter.

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MATERIAL FEDERAL INCOME TAX CONSEQUENCES

The tax consequences to you of an investment in our common units will depend in part on your own tax circumstances. For a discussion of the principal federal income tax considerations associated with our operations and the purchase, ownership and disposition of our common units, please read **Material Federal Income Tax Consequences** in the accompanying prospectus. The discussion presented therein is limited and does not address certain holders, in each case as described under the caption **Material Federal Income Tax Consequences** in the accompanying prospectus. Please also read **Risk Factors** in the accompanying prospectus.

Prospective unitholders are encouraged to consult with their own tax advisors about the federal, state, local and foreign tax consequences particular to their own circumstances. In particular, ownership of common units by tax-exempt entities, including employee benefit plans and IRAs, and foreign investors raises issues unique to such persons. The relevant rules are complex, and the discussions herein and in the accompanying prospectus do not address tax considerations applicable to tax-exempt entities and foreign investors, except as specifically set forth in the accompanying prospectus. Please read **Material Federal Income Tax Consequences Tax-exempt Organizations and Other Investors** in the accompanying prospectus.

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Table of Contents**UNDERWRITING (CONFLICTS OF INTEREST)**

Merrill Lynch, Pierce, Fenner & Smith Incorporated, J.P. Morgan Securities LLC, UBS Securities LLC and Wells Fargo Securities, LLC are acting as the representatives of each of the underwriters named below. Subject to the terms and conditions set forth in an underwriting agreement among us and the representatives, we have agreed to sell to the underwriters, and each of the underwriters has agreed, severally and not jointly, to purchase from us, the number common units set forth opposite its name below.

<u>Underwriter</u>	<u>Number of Common Units</u>
Merrill Lynch, Pierce, Fenner & Smith Incorporated	
J.P. Morgan Securities LLC	
UBS Securities LLC	
Wells Fargo Securities, LLC	
Barclays Capital Inc.	
Citigroup Global Markets Inc.	
Morgan Stanley & Co. LLC	
DNB Markets, Inc.	
Fifth Third Securities, Inc.	
Mitsubishi UFJ Securities (USA), Inc.	
PNC Capital Markets LLC	
RBS Securities Inc.	
Total	3,000,000

Subject to the terms and conditions set forth in the underwriting agreement, the underwriters have agreed, severally and not jointly, to purchase all of the common units sold under the underwriting agreement if any of these common units are purchased. If an underwriter defaults, the underwriting agreement provides that the purchase commitments of the nondefaulting underwriters may be increased or the underwriting agreement may be terminated.

We have agreed to indemnify the underwriters against certain liabilities, including liabilities under the Securities Act, or to contribute to payments the underwriters may be required to make in respect of those liabilities.

The underwriters are offering the common units, subject to prior sale, when, as and if issued to and accepted by them, subject to approval of legal matters by their counsel, including the validity of the common units, and other conditions contained in the underwriting agreement, such as the receipt by the underwriters of officer's certificates and legal opinions. The underwriters reserve the right to withdraw, cancel or modify offers to the public and to reject orders in whole or in part.

Commissions and Discounts

The representatives have advised us that the underwriters propose initially to offer the common units to the public at the public offering price set forth on the cover page of this prospectus supplement and to dealers at that price less a concession not in excess of \$ _____ per common unit. After the initial offering, the public offering price, concession or any other term of the offering may be changed.

The following table shows the public offering price, underwriting discount and proceeds before expenses to us. The information assumes either no exercise or full exercise by the underwriters of their option to purchase additional common units.

	Per Common Unit	Without Option	With Option
Public offering price	\$	\$	\$
Underwriting discount	\$	\$	\$
Proceeds, before expenses, to MPLX	\$	\$	\$

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The expenses of the offering, not including the underwriting discount, are estimated at \$1.0 million and are payable by us.

Option to Purchase Additional Common Units

We have granted an option to the underwriters, exercisable for 30 days after the date of this prospectus supplement, to purchase up to 450,000 additional common units at the public offering price, less (i) the underwriting discount and (ii) an amount per unit equal to any dividends or distributions declared by us and payable on the other common units but not payable on such additional common units. If the underwriters exercise this option, each underwriter will be obligated, subject to conditions contained in the underwriting agreement, to purchase a number of additional common units proportionate to that underwriter's initial amount reflected in the above table.

No Sales of Similar Securities

We, our general partner's executive officers and directors, Logistics and MPC have agreed not to sell or transfer any common units or securities convertible into, exchangeable for, exercisable for, or repayable with common units, for 45 days after the date of this prospectus supplement without first obtaining the written consent of Merrill Lynch, Pierce, Fenner & Smith Incorporated. Specifically, we and these other persons have agreed, with certain limited exceptions, not to directly or indirectly

offer, pledge, sell or contract to sell any common units,

sell any option to purchase or otherwise dispose of any common units,

file a registration statement related to the common units,

enter into any swap or other arrangement that transfers, in whole or in part, the economic consequence of ownership of any common units, whether any such swap or transaction is to be settled by delivery of common units or other securities, in cash or otherwise, or

publicly announce an intention to effect any transaction specified above.

This lock-up provision applies to common units and to securities convertible into or exchangeable or exercisable for or repayable with common units. It also applies to common units owned now or acquired later by the person executing the agreement or for which the person executing the agreement later acquires the power of disposition.

New York Stock Exchange Listing

The common units are listed on the New York Stock Exchange under the symbol MPLX.

Price Stabilization, Short Positions

Until the distribution of the common units is completed, SEC rules may limit underwriters and selling group members from bidding for and purchasing our common units. However, the representatives may engage in transactions that stabilize the price of the common units, such as bids or purchases to peg, fix or maintain that price.

In connection with the offering, the underwriters may purchase and sell our common units in the open market. These transactions may include short sales, purchases on the open market to cover positions created by short sales and stabilizing transactions. Short sales involve the sale by the underwriters of a greater number of common units than they are required to purchase in the offering. Covered short sales are sales made in an amount not greater than the underwriters' option to purchase additional common units described above. The underwriters may close out any covered short position by either exercising their option to purchase additional

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common units or purchasing common units in the open market. In determining the source of common units to close out the covered short position, the underwriters will consider, among other things, the price of common units available for purchase in the open market as compared to the price at which they may purchase common units through the option granted to them. Naked short sales are sales in excess of such option. The underwriters must close out any naked short position by purchasing common units 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 our common units in the open market after pricing that could adversely affect investors who purchase in the offering. Stabilizing transactions consist of various bids for or purchases of common units made by the underwriters in the open market prior to the completion of the offering.

Similar to other purchase transactions, the underwriters' purchases to cover the syndicate short sales may have the effect of raising or maintaining the market price of our common units or preventing or retarding a decline in the market price of our common units. As a result, the price of our common units may be higher than the price that might otherwise exist in the open market. The underwriters may conduct these transactions on the New York Stock Exchange, 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 our common units. In addition, neither we nor any of the underwriters make any representation that the representatives will engage in these transactions or that these transactions, once commenced, will not be discontinued without notice.

Electronic Distribution

In connection with the offering, certain of the underwriters or securities dealers may distribute prospectuses by electronic means, such as e-mail.

Conflicts of Interest

We intend to use a portion of the net proceeds from the offering to repay a portion of the amount outstanding under our revolving credit facility. Affiliates of certain of the underwriters are lenders under the revolving credit facility. Because such affiliates may receive more than 5% of the net proceeds of this offering, such underwriters are deemed to have a conflict of interest under FINRA Rule 5121. Accordingly, this offering is being made in compliance with the applicable provisions of Rule 5121. The appointment of a qualified independent underwriter is not required in connection with this offering as a bona fide public market, as defined in Rule 5121, exists for our common units. In accordance with Rule 5121, such underwriters will not confirm any sales to any account over which it exercises discretionary authority without specific written approval of the transaction from the account holder. See Use of Proceeds .

Other Relationships

Some of the underwriters and their affiliates have engaged in, and may in the future engage in, investment banking and other commercial dealings in the ordinary course of business with us or our affiliates. They have received, or may in the future receive, customary fees and commissions for these transactions. In addition, affiliates of certain of the underwriters are lenders, and in some cases agents or managers for the lenders, under the revolving credit facility and certain credit facilities of MPC.

In addition, in the ordinary course of their business activities, the underwriters and their affiliates may make or hold a broad array of investments and actively trade debt and equity securities (or related derivative securities) and financial

instruments (including bank loans) for their own account and for the accounts of their customers. Such investments and securities activities may involve securities and/or instruments of ours or our affiliates. The underwriters and their affiliates may also make investment recommendations and/or publish or express independent research views in respect of such securities or financial instruments and may hold, or recommend to clients that they acquire, long and/or short positions in such securities and instruments.

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Notice to Prospective Investors in Australia

No placement document, prospectus, product disclosure statement or other disclosure document has been lodged with the Australian Securities and Investments Commission (ASIC), in relation to the offering. This prospectus supplement does not constitute a prospectus, product disclosure statement or other disclosure document under the Corporations Act 2001 (the Corporations Act), and does not purport to include the information required for a prospectus, product disclosure statement or other disclosure document under the Corporations Act.

Any offer in Australia of the common units is only to be made to persons who are:

- (a) sophisticated investors (within the meaning of section 708(8) of the Corporations Act) or professional investors (within the meaning of section 708(11) of the Corporations Act); or
- (b) wholesale clients (within the meaning of section 761G of the Corporations Act).

The common units must not be offered for sale in Australia in the period of 12 months after the date of allotment under the offering, except in circumstances where disclosure under Chapters 6D and 7 of the Corporations Act would not be required pursuant to an exemption under both section 708 and Subdivision B of Division 2 of Part 7.9 of the Corporations Act or otherwise or where the offer is pursuant to a disclosure document which complies with Chapters 6D and 7 of the Corporations Act. Any person acquiring common units must observe such Australian on-sale restrictions.

This prospectus supplement contains general information only and does not take account of the investment objectives, financial situation or particular needs of any particular person. It does not contain any securities recommendations or financial product advice. Before making an investment decision, investors need to consider whether the information in this prospectus supplement is appropriate to their needs, objectives and circumstances, and, if necessary, seek expert advice on those matters.

Notice to Prospective Investors in Hong Kong

This prospectus supplement has not been approved by or registered with the Securities and Futures Commission of Hong Kong or the Registrar of Companies of Hong Kong. The common units have not been and will not be offered or sold in Hong Kong, by means of any document, other than (a) to professional investors as defined in the Securities and Futures Ordinance (Cap. 571) of Hong Kong and any rules made under that Ordinance; or (b) in other circumstances which do not result in the document being a prospectus as defined in the Companies (Winding Up and Miscellaneous Provisions) Ordinance (Cap. 32) of Hong Kong or which do not constitute an offer to the public within the meaning of that Ordinance. No person has issued or had in its possession for the purposes of issue, or will issue or have in its possession for the purposes of issue, whether in Hong Kong or elsewhere, any advertisement, invitation or document relating to the common units which is directed at, or the contents of which are likely to be accessed or read by, the public of Hong Kong (except if permitted to do so under the securities laws of Hong Kong) other than with respect to the common units which are or are intended to be disposed of only to persons outside Hong Kong or only to professional investors as defined in the Securities and Futures Ordinance (Cap. 571) of Hong Kong and any rules made under that Ordinance.

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LEGAL MATTERS

Jones Day will pass upon the validity of the common units being offered hereby. The underwriters have been represented in connection with this offering by Cravath, Swaine & Moore LLP.

EXPERTS

The financial statements and management's assessment of the effectiveness of internal control over financial reporting (which is included in Management's Report on Internal Control over Financial Reporting) incorporated in this prospectus supplement by reference to the Annual Report on Form 10-K for the year ended December 31, 2013 have been so incorporated in reliance on the report of PricewaterhouseCoopers LLP, an independent registered public accounting firm, given on the authority of said firm as experts in auditing and accounting.

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Prospectus

Common Units Representing Limited Partner Interests

Other Classes of Units Representing Limited Partner Interests

Debt Securities

MPLX LP

We may from time to time, in one or more offerings, offer and sell an unlimited number and amount of the following securities under this prospectus:

common units representing limited partner interests (which we refer to as common units in this prospectus);

other classes of units representing limited partner interests; and

debt securities.

We will provide specific terms of any offering in one or more supplements to this prospectus. You should read this prospectus and any prospectus supplement carefully before you invest in our common units or debt securities.

The common units are listed on the New York Stock Exchange under the symbol MPLX.

Unless otherwise specified in a prospectus supplement, the debt securities, when issued, will be senior unsecured debt securities and rank equally with our other unsecured and unsubordinated indebtedness.

If any offering involves underwriters, dealers or agents, arrangements with them will be described in the prospectus supplement that relates to that offering.

Investing in our securities involves risks. Limited partnerships are inherently different from corporations. You should carefully consider the risk factors on page 6 of this prospectus and in the applicable prospectus supplement before you make an investment in our securities.

Neither the Securities and Exchange Commission nor any state securities commission has approved or disapproved of these securities or determined if this prospectus is truthful or complete. Any representation to the contrary is a criminal offense.

The date of this prospectus is November 26, 2014.

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ABOUT THIS PROSPECTUS

This prospectus is part of a registration statement on Form S-3 that we filed with the Securities and Exchange Commission, or SEC, using a shelf registration process. Using this shelf registration process, we may offer, at any time and from time to time, in one or more offerings, the securities that this prospectus describes. This prospectus provides you with a general description of the securities that we may offer. Each time we use this prospectus to offer securities, we will provide a prospectus supplement that will describe the specific terms of the offering. The prospectus supplement may also add to, update or change the information contained in this prospectus. Please carefully read this prospectus and any prospectus supplement in addition to the information contained in the documents we refer to under the headings **Where You Can Find More Information** and **Information We Incorporate by Reference**.

You should rely only on the information contained or incorporated by reference in this prospectus and in any prospectus supplement or in any free writing prospectus that we may provide you. We have not authorized anyone to provide you with different information. We take no responsibility for, and can provide no assurance as to the reliability of, any other information that others may give you. You should not assume that the information contained in this prospectus, any prospectus supplement, any document incorporated by reference or any free writing prospectus is accurate as of any date, other than the date mentioned on the cover page of these documents. We are not making offers to sell securities in any jurisdiction in which an offer or solicitation is not authorized or in which the person making such offer or solicitation is not qualified to do so or to anyone to whom it is unlawful to make an offer or solicitation.

Except as otherwise indicated, references in this prospectus to **MPLX LP**, **MPLX**, **we**, **us** and **our** refer to **MPLX LP** and its consolidated subsidiaries. References in this prospectus to **Marathon Petroleum Corporation**, **Marathon Petroleum**, or **MPC** refer to **Marathon Petroleum Corporation** and its consolidated subsidiaries other than **MPLX LP**.

WHERE YOU CAN FIND MORE INFORMATION

We are subject to the informational reporting requirements of the Securities Exchange Act of 1934, or the Exchange Act. We file annual, quarterly and current reports and other information with the SEC. You can read and copy these materials at the SEC's public reference room at 100 F Street, N.E., Washington, D.C. 20549. You can obtain information about the operation of the SEC's public reference room by calling the SEC at 1-800-SEC-0330. The SEC also maintains an Internet site that contains information MPLX has filed electronically with the SEC, which you can access over the Internet at <http://www.sec.gov>. You can also obtain information about MPLX at our website at <http://www.mplx.com>. We do not intend for information contained on our website to be part of this prospectus, other than documents that we file with the SEC that are incorporated by reference in this prospectus.

This prospectus is part of a registration statement we have filed with the SEC relating to the securities we may offer. As permitted by SEC rules, this prospectus does not contain all the information we have included in the registration statement and the accompanying exhibits and schedules we have filed with the SEC. You may refer to the registration statement, exhibits and schedules for more information about us and the securities. The registration statement, exhibits and schedules are available at the SEC's public reference room or through its Internet site.

INFORMATION WE INCORPORATE BY REFERENCE

The SEC allows us to incorporate by reference into this prospectus the information in documents we have filed with it, which means that we can disclose important information to you by referring you to those documents. The

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information we incorporate by reference is considered to be a part of this prospectus, and information that we file later with the SEC will automatically update and supersede this information. Any statement contained in any document incorporated or deemed to be incorporated by reference herein shall be deemed to be modified or superseded for purposes of this prospectus to the extent that a statement contained in or omitted from this prospectus or any accompanying prospectus supplement, or in any other subsequently filed document that also is or is deemed to be incorporated by reference herein, modifies or supersedes such statement. Any such statement so modified or superseded shall not be deemed, except as so modified or superseded, to constitute a part of this prospectus. We incorporate by reference the following documents into this prospectus:

our Annual Report on Form 10-K for the year ended December 31, 2013;

our Quarterly Reports on Form 10-Q for the quarterly periods ended March 31, 2014, June 30, 2014 and September 30, 2014;

our Current Reports on Form 8-K filed on March 4, 2014, June 3, 2014, August 5, 2014 and November 26, 2014; and

the description of the common units representing limited partner interests in MPLX as set forth in MPLX's Registration Statement on Form 8-A (Registration No. 001-35714), filed with the SEC on October 23, 2012 under the Exchange Act, and all amendments or reports filed with the SEC for the purpose of updating such description.

We also incorporate by reference any future filings we make with the SEC under Section 13(a), 13(c), 14 or 15(d) of the Exchange Act (excluding information deemed to be furnished and not filed with the SEC) until the termination of this offering. We do not and will not, however, incorporate by reference in this prospectus any documents or portions thereof that are not deemed filed with the SEC, including any information furnished pursuant to Item 2.02 or Item 7.01 of our Current Reports on Form 8-K unless, and except to the extent, specified in such current reports.

You may request a copy of these filings, other than an exhibit to these filings unless we have specifically incorporated that exhibit by reference into the filing, at no cost, by writing or telephoning MPLX at the following address:

MPLX LP

200 E. Hardin Street

Findlay, Ohio 45840

Attention: Investor Relations

Telephone: (419) 672-6500

DISCLOSURES REGARDING FORWARD-LOOKING STATEMENTS

This prospectus, including the documents incorporated herein by reference, includes forward-looking statements within the meaning of Section 27A of the Securities Act of 1933, which we refer to as the Securities Act, and Section 21E of the Exchange Act. You can identify our forward-looking statements by words such as anticipate, believe, estimate, expect, forecast, goal, intend, plan, predict, project, seek, target, could, other similar expressions that convey the uncertainty of future events or outcomes. When considering these forward-looking statements, you should keep in mind the risk factors and other cautionary statements contained in this prospectus and the documents we have incorporated by reference.

Forward-looking statements include, but are not limited to, statements that relate to, or statements that are subject to risks, contingencies or uncertainties that relate to:

future levels of revenues and other income, income from operations, net income attributable to MPLX, earnings per unit, Adjusted EBITDA or Distributable Cash Flow;

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anticipated volumes of throughput of crude oil, refined products or other hydrocarbon-based products;

anticipated levels of regional, national and worldwide prices of crude oil and refined products;

future levels of capital, environmental or maintenance expenditures, general and administrative and other expenses;

changes in maintenance capital expenditure requirements or changes in costs of planned capital projects;

the success or timing of completion of ongoing or anticipated capital or maintenance projects;

expectations regarding the acquisition or divestiture of assets;

the effect of restructuring or reorganization of business components;

the potential effects of judicial or other proceedings on our business, financial condition, results of operations and cash flows;

the potential effects of changes in tariff rates on our business, financial condition, results of operations and cash flows;

the adequacy of our capital resources and liquidity, including, but not limited to, availability of sufficient cash flow to pay distributions and execute our business plan;

our ability to successfully implement our growth strategy, whether through organic growth or acquisitions;

capital market conditions and our ability to raise adequate capital to execute our business plan and implement our growth strategy; and

the anticipated effects of actions of third parties such as competitors, or federal, foreign, state or local regulatory authorities, or plaintiffs in litigation.

We have based our forward-looking statements on our current expectations, estimates and projections about our industry and our partnership. We caution that these statements are not guarantees of future performance, and you should not rely unduly on them, as they involve risks, uncertainties, and assumptions that we cannot predict. In addition, we have based many of these forward-looking statements on assumptions about future events that may prove to be inaccurate. While our management considers these assumptions to be reasonable, they are inherently subject to

significant business, economic, competitive, regulatory and other risks, contingencies and uncertainties, most of which are difficult to predict and many of which are beyond our control. Accordingly, our actual results may differ materially from the future performance that we have expressed or forecast in our forward-looking statements. Differences between actual results and any future performance suggested in our forward-looking statements could result from a variety of factors, including the following:

changes in general economic, market or business conditions;

domestic and foreign supplies of crude oil and other feedstocks;

domestic and foreign supplies of refined products such as gasoline, diesel fuel, jet fuel, home heating oil and petrochemicals;

foreign imports of refined products;

refining industry overcapacity or under capacity;

changes in the cost or availability of third-party vessels, pipelines and other means of transportation for crude oil, feedstocks and refined products;

the price, availability and acceptance of alternative fuels and alternative-fuel vehicles and laws mandating such fuels or vehicles;

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fluctuations in consumer demand for refined products, including seasonal fluctuations;

political and economic conditions in nations that consume refined products, including the United States, and in crude oil producing regions, including the Middle East, Africa, Canada and South America;

actions taken by our competitors and the expansion and retirement of pipeline capacity in response to market conditions;

changes in fuel and utility costs for our facilities;

failure to realize the benefits projected for capital projects, or cost overruns associated with such projects;

the ability to successfully implement new assets and growth strategies, whether through organic growth or acquisitions;

accidents or other unscheduled shutdowns affecting our pipelines or equipment, or those of our suppliers or customers;

unusual weather conditions and natural disasters;

disruptions due to equipment interruption or failure;

acts of war, terrorism or civil unrest that could impair our ability to transport crude oil or refined products;

legislative or regulatory action, which may adversely affect our business or operations;

rulings, judgments or settlements in litigation or other legal, tax or regulatory matters, including unexpected environmental remediation costs, in excess of any reserves or insurance coverage;

labor and material shortages;

the ability and willingness of parties with whom we have material relationships, including MPC, to perform their obligations to us;

changes in the availability of unsecured credit and changes affecting the credit markets generally; and

the other factors described in Item 1A. Risk Factors of our Annual Report on Form 10-K for the year ended December 31, 2013.

We do not undertake any obligation to update the forward-looking statements included or incorporated by reference in this prospectus, unless we are required by applicable securities laws to do so.

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THE COMPANY

We are a fee-based, growth-oriented master limited partnership formed by MPC to own, operate, develop and acquire pipelines and other midstream assets related to the transportation and storage of crude oil, refined products and other hydrocarbon-based products. As of September 30, 2014, our assets primarily consisted of a 69.0% indirect interest in a network of common carrier crude oil and product pipeline systems and associated storage assets in the Midwest and Gulf Coast regions of the United States. As of September 30, 2014, MPC had retained a 31.0% interest in such network. As of September 30, 2014, we also owned a 100.0% interest in a butane cavern in Neal, West Virginia with approximately 1.0 million barrels of storage capacity. Our assets are integral to the success of MPC's operations.

We generate revenue primarily by charging tariffs for transporting crude oil, refined products and other hydrocarbon-based products through our pipelines and at our barge dock and fees for storing crude oil and products at our storage facilities. We are also the operator of additional crude oil and product pipelines owned by MPC and third parties for which we are paid operating fees. We do not take ownership of the crude oil or products that we transport and store for our customers, and we do not engage in the trading of any commodities.

MPC historically has been the source of the substantial majority of our revenues. In connection with the MPLX LP initial public offering, which we refer to as the Initial Public Offering, completed on October 31, 2012, we entered into multiple transportation and storage services agreements with MPC. These agreements are long-term, fee-based agreements with minimum volume commitments under which MPC will continue to be the source of the substantial majority of our revenues for the foreseeable future. We believe these transportation and storage services agreements will promote stable and predictable cash flows. MPC is one of the largest petroleum product refiners, transporters and marketers in the United States.

Our principal executive offices are located at 200 E. Hardin Street, Findlay, Ohio 45840, and our telephone number at that location is (419) 672-6500.

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RISK FACTORS

You should carefully consider any specific risks set forth under the caption "Risk Factors" in the applicable prospectus supplement and under the caption "Risk Factors" included in our most recent Annual Report on Form 10-K filed with the SEC, in each case as these risk factors are amended or supplemented by subsequent Quarterly Reports on Form 10-Q that are incorporated by reference in this prospectus, before making an investment decision. For more information, see "Where You Can Find More Information" and "Information We Incorporate by Reference." The risks and uncertainties we have described are not the only ones we face. Additional risks and uncertainties that are not yet identified may also materially harm our business, operating results and financial condition and could result in a complete loss of your investment.

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Table of Contents**USE OF PROCEEDS**

Unless we inform you otherwise in the applicable prospectus supplement, the net proceeds from the sale of securities will be used for general partnership purposes, including repayment or refinancing of debt and funding for acquisitions, working capital requirements and capital expenditures. Pending any specific application, we may initially invest funds in short-term marketable securities or apply them to the reduction of short-term indebtedness.

RATIO OF EARNINGS TO FIXED CHARGES

Our ratios of earnings to fixed charges for each of the periods indicated are as follows:

	Nine Months Ended September 30, 2014	For the Years Ended December 31,				
	2013	2012	2011	2010	2009	
Ratio of earnings to fixed charges (total enterprise basis)	25.9x	34.3x	47.5x	90.3x	74.8x	102.8x

The term "earnings" is the amount resulting from adding the following items to the extent applicable:

pre-tax income from continuing operations before adjustment for income or loss from equity investees;

fixed charges;

amortization of capitalized interest;

distributed income of equity investees; and

pre-tax losses of equity investees for which charges arising from guarantees are included in fixed charges; and subtracting from the total the following:

interest capitalized;

preference security dividend requirements of consolidated subsidiaries; and

the non-controlling interest in pre-tax income of subsidiaries that have not incurred fixed charges; For this purpose, "fixed charges" consists of:

interest expense and amortization of discounts, premiums and capitalized expenses on indebtedness;

interest capitalized;

an estimate of the portion of annual rental expense on operating leases that represents interest attributable to rentals; and

preference security dividend requirements of consolidated subsidiaries.

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DESCRIPTION OF DEBT SECURITIES

In this summary description of debt securities, references to MPLX, Issuer, we, our or us mean only MPLX LP and not any of its subsidiaries.

The debt securities that MPLX may offer will be either senior debt securities or subordinated debt securities (including any debt securities that are senior subordinated debt securities). The senior debt securities will be issued under an indenture, which we refer to in this prospectus as the senior indenture, to be entered into between us and The Bank of New York Mellon Trust Company, N.A. The subordinated debt securities will be issued under a subordinated indenture, which we refer to in this prospectus as the subordinated indenture, to be entered into between us and The Bank of New York Mellon Trust Company, N.A. Each indenture will be subject to, and governed by, the Trust Indenture Act of 1939, as amended, and they may be amended, modified or supplemented from time to time after they are executed. We refer to the senior indenture and the subordinated indenture collectively as the indentures and to each trustee under the indentures as a trustee.

This prospectus summarizes the material provisions of the indentures and what we expect to be the material terms of the debt securities that MPLX may issue under the indentures. This summary is not complete and may not describe all of the provisions of the indentures or of any of the debt securities that might be important to you. For additional information, you should carefully read the forms of indenture that are incorporated by reference as an exhibit to the registration statement of which this prospectus forms a part.

At the time that MPLX offers to sell a particular series of debt securities, we will describe the specific terms of those debt securities in a supplement to this prospectus. We will also indicate in the supplement whether or not the general terms in this prospectus apply to a particular series of debt securities. Accordingly, for a description of the terms of a particular issue of debt securities, you should carefully read both this prospectus and the applicable prospectus supplement.

General

MPLX may issue an unlimited principal amount of debt securities in separate series. The maximum aggregate principal amount for the debt securities of any series may be specified. The debt securities will have terms that are consistent with the indentures. Senior debt securities will be unsecured and unsubordinated obligations of MPLX and will rank equal with all our other unsecured and unsubordinated debt of MPLX. Subordinated debt securities will be paid only if all payments due under our senior indebtedness, including any outstanding senior debt securities, have been made.

The applicable prospectus supplement for any issuance of debt securities will describe the debt securities and the price or prices at which MPLX will offer the debt securities. The description will include the following:

the title and form of the debt securities;

any limit on the aggregate principal amount of the debt securities or the series of which they are a part;

the person to whom any interest on a debt security of the series will be paid;

the date or dates on which we must repay the principal;

the rate or rates at which the debt securities will bear interest;

the date or dates from which interest will accrue, and the dates on which we must pay interest;

the place or places where we must pay the principal and any premium or interest on the debt securities;

the terms and conditions on which we may redeem any debt security, if at all;

any obligation to redeem or purchase any debt securities, and the terms and conditions on which we must do so;

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the denominations in which we may issue the debt securities;

the manner in which we will determine the amount of principal of or any premium or interest on the debt securities;

the currency in which we will pay the principal of and any premium or interest on the debt securities;

the principal amount of the debt securities that we will pay upon declaration of acceleration of their maturity;

the amount that will be deemed to be the principal amount for any purpose, including the principal amount that will be due and payable upon any maturity or that will be deemed to be outstanding as of any date;

if applicable, that the debt securities are defeasible and the terms of such defeasance;

if applicable, the terms of any right to convert debt securities into, or exchange debt securities for, our equity securities or other property;

whether we will issue the debt securities in the form of one or more global securities and, if so, the respective depositaries for the global securities and the terms of the global securities;

the subordination provisions that will apply to any subordinated debt securities;

any addition to or change in the events of default applicable to the debt securities and any change in the right of the trustee or the holders to declare the principal amount of any of the debt securities due and payable;

any addition to or change in the covenants in the indentures; and

any other terms of the debt securities not inconsistent with the applicable indentures.

MPLX may sell the debt securities at a substantial discount below their stated principal amount. The U.S. federal income tax considerations, if any, applicable to debt securities sold at an original issue discount will be described in the applicable prospectus supplement. An original issue discount security is any debt security sold for less than its face value. The applicable prospectus supplement relating to any original issue discount securities will describe the particular provisions relating to acceleration of the maturity upon the occurrence of an event of default. In addition, we will describe U.S. federal income tax or other considerations applicable to any debt securities that are denominated in a currency or unit other than U.S. dollars in the applicable prospectus supplement.

Conversion and Exchange Rights

The applicable prospectus supplement will describe, if applicable, the terms on which the holders may convert debt securities into or exchange them for common units or other classes of units representing limited partner interests. The conversion or exchange may be mandatory or may be at the holder's option. The applicable prospectus supplement will describe how the amount of debt securities and number of common units or other classes of units representing limited partner interests to be received upon conversion or exchange would be calculated.

Subordination of Subordinated Debt Securities

The indebtedness underlying any subordinated debt securities will be payable only if all payments due under our senior indebtedness, as defined in the applicable indenture and any indenture supplement, including any outstanding senior debt securities, have been made. If we distribute our assets to creditors upon any liquidation or dissolution or in bankruptcy, reorganization, insolvency, receivership or similar proceedings, we must first pay all amounts due or to become due on all senior indebtedness before we pay the principal of, or premium, if any, or interest on, the subordinated debt securities. In the event the subordinated debt securities are accelerated

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because of an event of default, we may not make any payment on the subordinated debt securities until we have paid all senior indebtedness or the acceleration is rescinded. If the payment of subordinated debt securities accelerates because of an event of default, we must promptly notify holders of senior indebtedness of the acceleration.

If we experience a bankruptcy, dissolution, liquidation, winding-up or reorganization, the holders of senior indebtedness may receive more, ratably, and holders of subordinated debt securities may receive less, ratably, than our other creditors. The indenture for subordinated debt securities may not limit our ability to incur additional senior indebtedness.

Form, Exchange and Transfer

MPLX will issue debt securities only in fully registered form, without coupons, and only in denominations of \$1,000 and integral multiples thereof, unless the applicable prospectus supplement provides otherwise. The holder of a debt security may elect, subject to the terms of the indentures and the limitations applicable to global securities, to exchange them for other debt securities of the same series of any authorized denomination and of similar terms and aggregate principal amount.

Holders of debt securities may present them for exchange as provided above or for registration of transfer, duly endorsed or with the form of transfer duly executed, at the office of the registrar we designate for that purpose. We will not impose a service charge for any registration of transfer or exchange of debt securities, but we may require a payment sufficient to cover any tax or other governmental charge payable in connection with the transfer or exchange. We will name the registrar in the applicable prospectus supplement. We may designate additional registrars or rescind the designation of any registrar or approve a change in the office through which any registrar acts, but we must maintain a registrar in each place where we will make payment on debt securities.

If we redeem the debt securities, we will not be required to issue, register the transfer of or exchange any debt security during a specified period prior to mailing a notice of redemption. We are not required to register the transfer of or exchange of any debt security selected for redemption, except the unredeemed portion of the debt security being redeemed.

Global Securities

The debt securities may be represented, in whole or in part, by one or more global securities that will have an aggregate principal amount equal to that of all debt securities of that series. Each global security will be registered in the name of a depositary identified in the applicable prospectus supplement or its nominee. We will deposit the global security with the depositary or a custodian, and the global security will bear a legend regarding the restrictions on exchanges and registration of transfer.

No global security may be exchanged in whole or in part for debt securities registered, and no transfer of a global security in whole or in part may be registered, in the name of any person other than the depositary or any nominee or successor of the depositary unless:

the depositary is unwilling or unable to continue as depositary; or

the depositary is no longer in good standing under the Exchange Act, or other applicable statute, rule or regulation.

The depositary will determine how all securities issued in exchange for a global security will be registered.

As long as the depositary o