Via E-mail

United States Securities and Exchange Commission Division of Corporation Finance Washington, D.C. 20549

Attn: Catherine T. Brown for

H. Christopher Owings, Assistant Director

Re: Enterprise Products Partners L.P. Registration Statement on Form S-4 Filed May 18, 2011 File No. 333-174321

Dear Ms. Brown:

Set forth below are the responses of Enterprise Products Partners L.P., a Delaware limited partnership ("Enterprise," "we," "us," or "our"), to the comments received from the staff of the Division of Corporation Finance (the "Staff") of the Securities and Exchange Commission (the "Commission") by letter dated June 17, 2011, with respect to Enterprise's Registration Statement on Form S-4 initially filed with the Commission on May 18, 2011, File No. 333-174321 (the "Registration Statement"). Each response below has been prepared and is being provided by Enterprise, which has authorized Andrews Kurth LLP to respond to the Staff's comments on its behalf.

Concurrently with the submission of this response letter, we are filing, through EDGAR, Amendment No. 1 to the Registration Statement ("Amendment No. 1"). For the Staff's convenience, we have hand-delivered three copies of Amendment No. 1, together with three copies of Amendment No. 1 that are marked to show all revisions to the Registration Statement since the initial filing.

For the Staff's convenience, each response is prefaced by the exact text of the Staff's corresponding comment in bold, italicized text. All references to page numbers and captions correspond to Amendment No. 1, unless indicated otherwise.

General

1. Please note that we will not be in a position to declare your filing effective until you have satisfactorily replied to and we have cleared all outstanding comments on your Form 10- K for the fiscal year ended December 31, 2010.

Response:

We acknowledge the Staff's comment and advise the Staff that we have submitted a response letter to the Staff's comment letter, dated June 17, 2011, regarding our Form 10-K for the fiscal year ended December 31, 2010 on June 30, 2011. We acknowledge that the Staff will not be in a position to declare our Form S-4 filing effective until the Staff has cleared all outstanding comments on our Form 10-K.

2. We note that you have not filed certain exhibits to the registration statement. We request that you file these exhibits as early as possible so that we will have sufficient time to review them before you submit a request for acceleration of effectiveness of your registration statement.

Response:

We acknowledge the Staff's comment and will undertake to file with future amendments to the Registration Statement all omitted exhibits. We will allow sufficient time for the Staff to review all new disclosure and newly filed exhibits and for us to respond to any comments that may result from the Staff's review.

3. In an appropriate place in your filing, please provide the information required by Item 402(t) of Regulation S-K or tell us why you think it is not appropriate to do so.

Response:

There are no agreements or understandings relating to compensation that will result in payments to or on behalf of any of the named executive officers of Duncan Energy Partners L.P. ("*Duncan*") based on or otherwise relating to the merger. All of the named executive officers of Duncan are employees of Enterprise Products Company ("*EPCO*"), an affiliate of Enterprise, and will remain employees of EPCO following the merger. Accordingly, we do not believe any additional disclosures are required under Section 14A of the Exchange Act, Rule 14a-21 or Item 402(t) of Regulation S-K.

The Merger, page 39

Background of the Merger, page 39

4. We note references on pages 41, 42 and 43 to discussions regarding the evaluation by Duncan's ACG Committee of possible alternatives to the proposed transaction with Enterprise. Please revise your disclosure to provide more detail about the alternatives considered by Duncan's ACG Committee.

Response:

The reference to Duncan's other alternatives on page 41 is a reference to a discussion of the issues that the Duncan ACG Committee would need to consider in evaluating the proposal and Duncan's alternatives, and not to a discussion of the alternatives themselves. Therefore, no additional disclosure has been added to the discussion of the Duncan ACG Committee's March 9th meeting. Additional disclosure regarding consideration of alternatives has been added to the discussion of the Duncan ACG Committee's April 4th and April 14th meetings, which revisions are underlined (or shown with strikethrough) below in the applicable revised paragraphs:

(p.42) On April 4, 2011, the Duncan ACG Committee met with representatives of Morgan Stanley, Baker Hostetler and Potter Anderson to discuss Morgan Stanley's initial evaluation of the proposal letter, including Enterprise's proposed exchange ratio of 0.9545 Enterprise common units for each outstanding Duncan common unit. The Morgan Stanley representatives observed that they had been given ready access to information they had requested regarding Duncan and Enterprise. The meeting participants reviewed Enterprise's proposal letter, discussed the analyses that would be used to evaluate the proposed transaction, analyses pertaining to assets owned jointly by Duncan and Enterprise, the relationship between Duncan's and Enterprise's unit trading prices since Duncan's initial public offering, preliminary valuation perspectives regarding Duncan and Enterprise based on management projections and investment banking research analysts' projections, and Duncan's possible alternatives to a transaction with Enterprise, including the possible acquisition of Duncan by a third party and Duncan's continuing business as a stand-alone entity focused on internal growth and future drop down transactions from Enterprise. In discussing Duncan's alternatives, the participants also discussed Enterprise's statement in its proposal letter that it would not support a sale of Duncan or its assets to a third party and the proposal letter's observation that Duncan's prospects for growth from future drop down transactions were diminished because of the recent elimination of Enterprise's IDRs. Morgan Stanley noted that Duncan's common units were trading near a 12-month high price when Enterprise's initial offer was made, and responded to the committee's inquiries regarding, among other things, multiples paid in comparable transactions, the terminal growth rates used for Duncan and for Enterprise in various analyses, and the growth prospects of each entity on near-term and long-term bases.

(p. 43) On April 14, 2011, the Duncan ACG Committee met with representatives of Morgan Stanley, Baker Hostetler and Potter Anderson to review financial analyses supporting various exchange ratios, Duncan's alternatives and future business expansion prospects if it chose not to proceed with a transaction with Enterprise (noting the obstacles to transactions with third parties and to growth from future drop down transactions), and issues pertaining to a majority of the minority voting condition. At the conclusion of the meeting, the committee determined to propose to Enterprise a 1.165x exchange ratio and to reiterate the committee's desire for a majority of the minority voting condition.

Opinion of the Duncan ACG Committee's Financial Advisor, page 53

General, page 62

5. We note your disclosure that in the two years prior to the date of Morgan Stanley's opinion, Morgan Stanley provided financing services for Enterprise and Duncan and received fees in connection with such services. Please revise your disclosure to include the amounts of any such fees received or to be received required by Item 4(b) of Form S- 4 and Item 1015(b)(4) of Regulation M-A.

Response:

In response to the Staff's comment, we have revised the disclosure to include the amounts of fees received.

The Merger Agreement, page 65

6. We note your disclaimer regarding the representations and warranties in your merger agreement. Please note that general disclaimers regarding the accuracy and completeness of disclosure, or investor use of that information, may not be effective when you are aware of material contradictory information. Please revise your disclosure to include a clear statement of the company's disclosure obligations with respect to material contradictory information. In addition, please remove language that states that the representations and warranties in the agreements are qualified by additional information — particularly additional non-public information — not disclosed in your registration statement. The company's obligation to consider whether additional disclosure is necessary in order to make the statements made not misleading applies to the representations and warranties as contained in the agreement filed as an exhibit to the registration statement.

Response:

Our inclusion of the above-referenced disclaimer, as well as the disclaimer relating to non-public information contained in confidential disclosure schedules exchanged between the parties, result from the fact that the representations and warranties in the executed Merger Agreement were the product of negotiations between the parties as part of a contractual allocation of risk, and were applicable as of the date of the signing of the Merger Agreement. Many of the representations and warranties are also qualified by information disclosed and included in SEC filings incorporated by reference into the Registration Statement. Thus, the representations and warranties included in the Merger Agreement do not, and are not intended to, provide full and complete disclosure of factual matters required to be included in the Registration Statement. Accordingly, we believe that it is necessary to include the disclaimer so that Duncan unitholders are not misled and fully understand the limitations of the representations and warranties in the Merger Agreement in the light of its inclusion in the Registration Statement. Further, we also believe that Duncan unitholders should be clearly advised that they should not merely rely on the representations and warranties in the Merger Agreement; but instead, they should read the proxy statement/prospectus as well as documents incorporated by reference.

Neither Enterprise nor Duncan is aware of material, contradictory information for which additional disclosure would be necessary. However, in response to the Staff's comment, we have included the following disclosure in the proxy statement/prospectus:

"Enterprise and Duncan will provide additional disclosure in their public reports to the extent needed to provide Duncan unitholders with a materially complete understanding of the matters addressed in the merger agreement. To the extent there are any conflicts between any representations and warranties in the merger agreement and the additional information included or incorporated by reference in the proxy statement/prospectus, the information included or incorporated by reference herein shall control. Accordingly, the representations, warranties and covenants in the merger agreement and the description of them in this proxy statement/prospectus should not be read alone but instead should be read in conjunction with the other information contained in the reports, statements and filings of Enterprise and Duncan filed with the SEC."

Item 22. Undertakings, page II-3

7. Please revise to include the undertaking required by Item 512(a)(6) of Regulation S-K.

Response:

We acknowledge the Staff's comment and have revised the Undertakings section of the Registration Statement to include the undertaking required by Item 512(a)(6) of Regulation S-K.

In responding to the foregoing Staff comments, Enterprise acknowledges that:

- the partnership is responsible for the adequacy and accuracy of the disclosure in the filing;
- Staff comments or changes to disclosure in response to Staff comments do not foreclose the Commission from taking any action with respect to the filing; and
- the partnership may not assert Staff comments as a defense in any proceeding initiated by the Commission or any person under the federal securities laws of the United States.

Please direct any questions you have with respect to the foregoing or with respect to the Registration Statement or Amendment No. 1 to Stephanie C. Hildebrandt, Esq. at (713) 381-6861 or Christopher S. Wade, Esq. at (713) 381-4847, or the undersigned at (713) 220-4301.

Sincerely,
/s/ David C. Buck
David C. Buck

cc: Ramin Olson, Securities and Exchange Commission Stephanie C. Hildebrandt, Esq., Enterprise Products Partners L.P. Christopher S. Wade, Esq., Duncan Energy Partners L.P. Donald W. Brodsky, Esq., Baker & Hostetler LLP Douglas E. McWilliams, Esq., Vinson & Elkins L.L.P.