



DIVISION OF  
CORPORATION FINANCE

UNITED STATES  
SECURITIES AND EXCHANGE COMMISSION  
WASHINGTON, D.C. 20549

September 30, 2011

Via E-mail

Kevin D. Struzeski  
Chief Financial Officer  
Carbon Natural Gas Company  
1700 Broadway, Suite 2020  
Denver, Colorado 80290

**Re: Carbon Natural Gas Company  
Amendment No. 1 to Registration Statement on Form S-1  
Filed August 12, 2011  
File No. 333-176287**

Dear Mr. Struzeski:

We have reviewed your amendment and have the following comments. In some of our comments, we may ask you to provide us with information so we may better understand your disclosure.

Please respond to this letter by amending your registration statement and providing the requested information. If you do not believe our comments apply to your facts and circumstances or do not believe an amendment is appropriate, please tell us why in your response.

After reviewing any amendment to your registration statement and the information you provide in response to these comments, we may have additional comments.

Risk Factors, page 5

Our estimates of proved reserves at June 30, 2011 and at December 31, 2010 and 2009..., page 7

1. We note your statement "The SEC has released only limited interpretive guidance regarding reporting of [proved undeveloped] reserve estimates under this new [begin within five years of booking] rule and may not issue further interpretive guidance on the new rule." The "five year rule" quantifies the allowable delay to initiation of a development project after the booking of its associated proved undeveloped reserves. Questions 108.01 and 131.03 to 131.06 at our website, [www.sec.gov/divisions/corpfin/guidance/oilandgas-interp.htm](http://www.sec.gov/divisions/corpfin/guidance/oilandgas-interp.htm), present criteria for a development project and guidance on matters relating to PUD reserves. Please explain to us the situations for which you require further guidance.

Drilling for and producing natural gas and oil are high risk activities..., page 11

2. Please amend your document to disclose the consequences of loss of hydrocarbon containment during drilling, transportation and processing.

We may suffer losses or incur environmental liability in hydraulic fracturing operations., page 12

3. We note your mitigating language, “These formations are generally geologically separated and isolated from fresh ground water supplies by protective rock layers. Over much of our acreage, wells are stimulated with nitrogen only, with no risk of a spill since nitrogen becomes a gas once released to atmospheric pressure.” Please amend your document to remove this and similar language elsewhere that mitigates the risk factor under discussion.

Description of the Business, page 26

Glossary of Natural Gas and Oil Terms, page 28

4. Your description of the Standardized Measure includes “...an estimate of the present value of the estimated future net revenues from proved natural gas or oil reserves at a date indicated after deducting estimated production and ad valorem taxes, future capital costs, and operating expenses, but before deducting any estimates of U.S. federal income taxes.” The Standardized Measure is net of estimated future federal income taxes. Please amend your document to disclose this.

Reserves, page 34

5. Please amend your document to present oil reserve figures separately from gas reserve figures.
6. Item 1203(c) of Regulation S-K requires that you discuss investments and progress made during the year to convert proved undeveloped reserves to proved developed reserves, including, but not limited to, capital expenditures. Please amend your document to comply with Regulation S-K.
7. Rule 4-10(a)(31)(ii) of Regulation S-X requires undrilled locations to be scheduled for drilling within five years in order for undeveloped reserves to be claimed. Please amend your document to explain, if true, the reasons material PUD reserves are scheduled for drilling beyond five years from booking.

Preparation of Reserve Estimates, page 35

8. We note your statement, “Undrilled locations can be classified as having proved undeveloped reserves if a development plan has been adopted indicating that they are scheduled to be drilled within five years, unless the specific circumstances justify a

longer time.” The five year schedule is a necessary but not sufficient condition for PUD reserves to be claimed. Please amend your document to clarify this statement.

9. Item 1202(a)(6) of Regulation S-K requires a general discussion of the technologies used to estimate material, disclosed reserves. Please amend your document to satisfy this requirement.
10. We note 90+ year projected economic lives in the projected cash flow summaries for the ING and NEC PDP properties as well as the nominal 3% terminal production decline rates used in your Kentucky and West Virginia largest PDP properties referenced in comment 21 in our letter dated September 9, 2011. With reasonable detail, please:
  - Explain to us the technical basis for these economic lives and decline rates. Include analogy wells that have achieved such productive durations and decline rates.
  - Address how such durations comply with the requirement for reasonable certainty for proved reserves, i.e. the recovery of the proved quantity is much more likely to be achieved than not.
  - Tell us the portion of your company reserves scheduled for production in the first 20, 30 and 40 years.
11. Please identify—including API number—and provide estimated ultimate recovery figures for producing wells supporting the largest PUD reserves in West Virginia and Illinois referenced in our prior comment 21.
12. We note that your June 30, 2011 reserve report presents ten entities scheduled for initial production by September, 2011 and requiring \$2.8 million in estimated development capital. Please amend your document to disclose the status of these properties as prescribed by Item 1206(a) of Regulation S-K.

Undeveloped Acreage Expirations, page 41

13. We note that the 2011 undeveloped lease expirations as of June 30, 2011 are approximately 11,000 net acres smaller than those as of December 31, 2010. Please affirm to us, if true, that the omitted acreage has expired.

Production, Average Sales Prices, and Production Costs, page 41

14. Please amend your document to present your historical oil production in units of barrels and your historical natural gas sales prices as dollars per MCF of gas. Reconcile the production/sales figures presented here with those in your supplemental oil and gas data on page F-25.

Director Independence, page 73

15. We note your response to comment 13 from our letter dated September 9, 2011. Although Nasdaq Listing Rule 5602(a)(2) would not automatically disqualify Messrs. Lawrence and Leidel as independent directors, their control of the company and their ability to influence corporate action to maintain this control appears to be at odds to your conclusion of independence. To the extent that you identify Messrs. Lawrence and Leidel as independent directors, please also provide context to this designation by disclosing why their majority ownership of the Company and recent participation in the June 2011 private placement, including the subsequent vote to authorize additional shares, does not disqualify them as independent directors.

Notes to Consolidated Financial Statements, page F-8

Note 17 — Supplemental Financial Data — Oil and Gas Producing Activities (unaudited) (continued), page F-25

16. FASB ASC Paragraph 932-235-50-5 requires “appropriate explanation of significant changes” for line items in the reconciliation of your disclosed proved reserves. Please amend your document to explain the details/circumstances of the 2009 revision and the 2010 extensions and discoveries.
17. Please explain to us the details of the 2010 addition of almost 24 BCFG with the 2010 development expenditure of \$2.8 million or 12¢/MCFE. Address the fact that it appears this development expenditure did not appreciably reduce PUD reserves.

Note 5. Property and Equipment, page F-15

18. We note your response to our prior comment 15 and the additional line item to the balance sheet for the years ended December 31, 2010 and December 31, 2009, along with your additional disclosure. Please revise your disclosure to include a description of the current status of the significant unproved properties or projects involved, including the anticipated timing of the inclusion of the costs in the amortization computation as required by Rule 4-10(c)(7) of Regulation S-X.

Standardized Measure of Discounted Future Net Cash Flows, page F-27

19. Please amend your document to disclose the 12 month average benchmark prices and the 12 month average adjusted prices you used to estimate your 2009 and 2010 proved reserves and associated standardized measure.
20. We note that the unit production cost (including production taxes) for the 2010 standardized measure is \$1.08/MCFE and the 2010 historical unit production cost is \$1.47/MCFE inclusive of production taxes. Please explain to us the reasons for this significant difference.

Exhibit 5.1

21. We note that the opinion states that the shares being registered “have been validly issued by the Company and are fully paid and non-assessable.” Please tell us whether the shares underlying the warrants have been issued, and obtain a revised opinion as needed.

Closing Comments

We urge all persons who are responsible for the accuracy and adequacy of the disclosure in the filing to be certain that the filing includes the information the Securities Act of 1933 and all applicable Securities Act rules require. Since the company and its management are in possession of all facts relating to a company’s disclosure, they are responsible for the accuracy and adequacy of the disclosures they have made.

Notwithstanding our comments, in the event you request acceleration of the effective date of the pending registration statement please provide a written statement from the company acknowledging that:

- should the Commission or the staff, acting pursuant to delegated authority, declare the filing effective, it does not foreclose the Commission from taking any action with respect to the filing;
- the action of the Commission or the staff, acting pursuant to delegated authority, in declaring the filing effective, does not relieve the company from its full responsibility for the adequacy and accuracy of the disclosure in the filing; and
- the company may not assert staff comments and the declaration of effectiveness as a defense in any proceeding initiated by the Commission or any person under the federal securities laws of the United States.

Please refer to Rules 460 and 461 regarding requests for acceleration. We will consider a written request for acceleration of the effective date of the registration statement as confirmation of the fact that those requesting acceleration are aware of their respective responsibilities under the Securities Act of 1933 and the Securities Exchange Act of 1934 as they relate to the proposed public offering of the securities specified in the above registration statement. Please allow adequate time for us to review any amendment prior to the requested effective date of the registration statement.

Kevin D. Struzeski  
Carbon Natural Gas Company  
September 30, 2011  
Page 6

You may contact Robert Carroll at (202) 551-3362 or Sandra Eisen at (202) 551-3864 if you have questions regarding comments on the financial statements and related matters. You may contact Ronald Winfrey, Petroleum Engineer, at (202) 551-3704 if you have questions regarding the engineering comments. Please contact Parker Morrill at (202) 551-3696 or me at (202) 551-3611 with any other questions.

Sincerely,

/s/ A.N. Parker

Anne Nguyen Parker  
Branch Chief

cc: Theresa M. Mehringer (via e-mail)