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SPEE Recommended Evaluation Practice #1 – Elements of a Reserve and Resource Report

Section #1 - Recommendations for Reporting Estimated Reserves and Resources of Oil and Gas

Issue:

It is widely accepted that a formal report is a necessary part of most engineering studies or evaluations. What guidance does the SPEE provide to assist engineers in completing a report?

SPEE Recommended Practice:

The wide variation in types of evaluation reports prohibits the development of strict report standards. Individual standards that are generally desirable in most instances will sometimes be inappropriate for specific circumstances. Nonetheless, a set of recommendations has been developed to assist preparers of reserve and resource reports¹ present their findings. It is anticipated that these recommendations will also encourage discussion among preparers of reserve and resource reports and that the recommendations will be revised from time to time.

The Preparer's Responsibility

The preparer should provide a report that presents projections and opinions that fairly reflect the available factual data without a bias to be optimistic or conservative. A series of steps will normally be required to understand engineering and geology, prepare an economic projection, and produce a report. The preparer has a professional responsibility to:

1. Determine the proper engineering procedures and techniques to fairly estimate future producing rates for hydrocarbons;
2. Work with the client to determine financial and economic projections to fairly estimate future cash flow and economic limits; and
3. Prepare a report for the use of the client, which presents the findings in a manner that promotes understanding and does not obscure uncertainties.

¹ The terms "Preparers of Reserve and Resource Reports" or "Preparer" are used herein to signify the person(s) responsible for the contents of the report.

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Contents of a Typical Reserve Report

Most Reserve Reports will include these three components:

1. A cover letter and discussion section, which may be combined or separated;
2. A copy of the reserve and resource definitions used in preparing the report and any requirements of governing regulatory bodies, if applicable; and
3. Tabular data showing summary results and detailed projections.

Most of the preparer's time and attention will be devoted to understanding the available data and preparing the detailed projections shown in the tabular data section. Most of the reader's time might well be spent studying the discussion section and summary tables in an effort to understand the entirety of the work performed. Thus, the preparer is encouraged to give careful consideration to the narrative and summary tables.

Basic information that should be included in virtually every report includes:

1. The client for whom the report was prepared;
2. The purpose of the report;
3. The date the report was completed;
4. The effective date of the report;
5. A discussion of reserve and resource definitions, assumptions, methods, procedures, and sources of data;
6. Disclaimers to warn the reader of limitations;
7. A statement of independence of the preparer; and
8. The signature of the preparer or firm responsible for the report.

Sections #2 and #3 of this REP provide additional guidance for the Discussion Section and the Tabular Data included in evaluation reports.

Reserves versus Resources

The term "Reserve Report" is somewhat generic and often used interchangeably with "Evaluation Report." It is acceptable to refer to a report that contains both reserves and resources as a "Reserve Report", but if a report only contains resource volumes, calling it a "Resource Report" or "Report of Resources other than Reserves" would make the contents of the report clear to users. If a report only contains resources, a statement to the effect that "the resource volumes

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included in this report are not considered to be reserves at the effective date of this report" is recommended to help users of the report avoid mistakes.

Section #2 -- Information Typically Found in the Discussion Section of an Evaluation Report

Issue:

Users of an evaluation report depend on the cover letter or discussion section of a report to gain understanding of the preparer's work. What information should the preparer include in this section?

SPEE Recommended Evaluation Practice:

(See also Sections #1 and #3)

The discussion is sometimes included in the cover letter and sometimes included as a separate section of the report. In either case the preparer should include narrative and tabular data as necessary to allow the reader to address the following items:

1. The preparer should clearly state the purpose for which the report is being prepared and for whom it is prepared.
2. The preparer should clearly present the effective date of the report and the date on which the report was completed. The effective date is the beginning date for projections. Every effort should be made to include historic data as near as possible to the effective date. The reader will appreciate finding the cut-off date, the date after which no new data was available to the preparer. Based on the purpose of the report, the preparer might want to include a discussion of events occurring between the effective date and the report date. Generally, the effective date will occur before the date of the report. In situations where the preparer is requested to provide reports with effective dates after the date of the report, the preparer might include discussion calling attention to the premature nature of the report. If the report is a "roll forward" or a "mechanical update" of an earlier report, the preparer should include a discussion of all the assumptions involved and material changes considered in the roll forward process.
3. The preparer should state the definitions, assumptions, methods, and procedures used, and state that these are appropriate for the purpose.

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- a. Reports prepared to assist in screening acquisition prospects might use the Petroleum Resources Management System (PRMS) (definitions jointly sponsored by the Society of Petroleum Engineers / World Petroleum Council / American Association of Petroleum Geologists / Society of Petroleum Evaluation Engineers) reserve and resource definitions or the client might provide definitions and assumptions for a specific project evaluation.
 - b. When reports are prepared for year-end filing with the U.S. Securities and Exchange Commission (SEC), it is the responsibility of the preparer to know, follow, and state compliance with SEC reserve definitions and all requirements of the SEC.
 - c. For reports prepared for filing with regulators of the London, Canadian, or other stock markets, it is the responsibility of the preparer to use the applicable definitions and follow proper requirements.
 - d. Because reports done for Fair Market Valuation purposes may utilize various approaches, a thorough discussion of the definitions and assumptions is essential.
 - e. Reports should clearly identify the data provided by the client. Such data might include maps, production histories, projections of pricing, and operating costs, and the cost and timing of any development plans.
4. The preparer should present summary data for each of the reserve and/or resource categories that have been estimated:
- a. Proved category subdivisions:
 - i. Proved developed producing (PDP);
 - ii. Proved developed non-producing (PDNP), proved developed shut-in (PDSI), and proved developed behind pipe (PDBP) may be combined or separated, as the client or preparer believes appropriate);
 - iii. Proved undeveloped (PUD); and
 - iv. Total proved (PR).
 - b. Probable (PB) and Possible (PO) reserve categories, if estimated, should be reported separately. If the scenario method is used, Probable is the difference between Proved and 2P; Possible is the difference between 2P and 3P estimates. If a probabilistic approach

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has been used, P90, P50, and P10 (or other probability levels) reserves should be reported separately.

- c. Reports may contain prospective and / or contingent resources. If resources are included, care should be taken to clearly distinguish those volumes from reserves, and a discussion of the resources, along with the assumptions of chance of commerciality and other relevant assumptions, should be clearly distinguished from the discussion and assumptions for the reserves.
 - d. At a minimum the summary table should include net² reserves of oil and gas, and the present value at the stated discount rate. The preparer may also include summaries of revenues, lease operating expenses, capital investments, and undiscounted cash flow. In the case of resources, net volumes and net present values may not be determinable at the time of evaluation. Separate summary tables that show category and gross volumes may be appropriate for resources.
 - e. Other reserve and resource categories may be used as appropriate; however, the preparer should define the use of any probabilistic or less frequently encountered deterministic category in the narrative of the report.
5. The preparer should provide a discussion of the data, technology, evaluation methods, and procedures used to estimate reserve and/or resource quantities. This discussion should note that the methods used are appropriate for the purpose and relevant reserve and resource definitions. When a relatively small number of properties are evaluated, this discussion might be detailed; when a very large amount of properties are evaluated the discussion will be more general. Generally, the length and level of detail will be tailored to the needs of the client, with relevant information to facilitate clear understanding of the report. Items for the discussion may include, but are not limited to:
- a. Dependence on seismic data.
 - b. Drive mechanisms.
 - c. Production problems such as paraffin or hydrogen sulfide.
 - d. Performance data available for analysis.

² Net and Gross are generally taken to represent the owner's share after and before deduction of royalties, respectively. Under PSC and similar contacts the net volumes are the owner's entitlement as defined in the contact. Variations required by regulatory or local custom should be appropriately identified.

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- e. Use of probabilistic or deterministic methods.
 - f. Estimation methods used, or those used most frequently.
 - g. Use and description of reliable technology, if necessary.
 - h. Statement of knowledge and consideration of imbalances or hedges.
 - i. Statement of quality of data and consideration for ownership reversions, required contracts or regulatory approvals.
 - j. Discussion of any tests, inquiries, field inspections, or concerns about data accuracy.
 - k. Caveat about the varying degrees of uncertainty in the reserve and resource classifications and caution against summation of the various classifications, categories or sub-categories
 - l. A discussion on the assumptions used for a probabilistic approach, if applied.
6. The preparer should discuss primary economic assumptions. Items for such consideration include, but are not limited to:
- a. The source of data for ownership information.
 - b. The source of price projections for oil, gas, and other products sold. Discuss how projections relate to an index such as WTI or Henry Hub. What assumptions are made for initial prices? Are prices escalated? Are any prices based on long term contracts or hedges? If alternate pricing and cost scenarios are presented, what were the assumptions?
 - c. A discussion of assumptions for monetization of production. Do gross production quantities include non-hydrocarbon products? Does revenue include sources other than from the sale of hydrocarbons? Are sales quantities reduced for shrinkage? Are volumes net of lease fuel or inclusive, and are the fuel volumes considered as reserves? Are product revenues projected separately? Are gathering or transportation fees deducted from the sales price or included in operating costs?
 - d. A discussion of all taxes that are deducted from revenues. Preparer should indicate if ad valorem (US) or similar local taxes are present and if so, whether they are included with the identified tax stream shown separately, or included with lease operating costs as is customary in some instances. The basis for calculating ad valorem taxes should be discussed. If income taxes have been included, it should be noted. Any other unusual tax situation(s) should be discussed.
 - e. A discussion of lease operating costs. Preparer should identify the source of data used to estimate operating costs and note if non-recurring costs are omitted. What is the philosophy and methodology

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- for omitting costs? Did the preparer include estimated costs for repair and maintenance? The preparer should include a discussion of the method for projecting future operating costs noting the fixed and variable portion. The preparer should identify the treatment of COPAS (Council of Petroleum Accounting Societies, as is sometimes specified in the Joint Operating Agreement) and corporate overhead.
- f. A discussion of the source of data for capital expenditures. Include a discussion of any efforts to independently test data provided by client. If certain proved undeveloped locations have been previously reported for several years, a comment by the preparer might be appropriate. If the reserve definitions include specific guidance regarding the age or limit the time to develop undeveloped locations, a more detailed discussion may be required.
 - g. A discussion of assumptions for plugging, abandonment and salvage should be included. The discussion of assumptions should address the projected costs, the source of funds, the status of any abandonment funds or escrow accounts, and the timing considerations. In cases where ownership reverts to a host government, clarify who is obligated for abandonment. Any restoration and remediation costs that have been independently verified by a "Phase II" assessment or other such assessment should be included, with appropriate discussion.
 - h. The preparer should state the discount factor used and the reason for its use.
 - i. If the rights to the properties are not held by a simple lease / royalty agreement that grant the right to produce for the economic life, the preparer should summarize the terms of the concession, production sharing agreement, or other such relevant contract.
 - j. If probabilistic methods have been used, the preparer should identify the aggregation level used in the report.
7. The preparer should provide a statement of independence or a disclosure of matters impairing independence. Ownership in the properties evaluated, certain business relationships with the client, contingency payments, or other events may impair independence. If required or desirable, discuss the qualifications of the primary person responsible for the report or the name of the competent person.
8. The report should contain a representation about fair market value. Most reserve reports will not attempt to represent fair market value, and the preparer will typically state that dollar amounts shown in the report do not represent fair market value. However, some reports will be prepared for that purpose. If the report includes an estimate of fair market value, the

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- estimator will be guided by his professional training to provide a clear presentation of those estimates.
9. The preparer should discuss environmental considerations that could reasonably be expected to affect the ability of the operator to recover the estimated reserves or resources, or which would have a material impact on the cash flow projections or value. Generally, this will be a comment regarding the level of investigation, if any, that the preparer has made to assess environmental uncertainty or the effect of regulation on the ability of the operator to recover the estimated reserves.
 10. The report should contain a caveat or disclaimer to ensure that the reader is properly advised of the inherent uncertainties of reserve and resource estimates. This caveat should contain statements similar to the following, at a minimum:
 - a. Any reserve or resource estimate is a function of engineering and geoscience judgment and interpretation, and should be accepted with the understanding that events subsequent to the effective date could necessitate revisions, some or all of which may be material.
 - b. This report was prepared utilizing conventional petroleum engineering and geoscience procedures and techniques that are accepted as good practice and were considered appropriate and necessary in the circumstances.
 11. A definition of acronyms used in the report may be helpful to the reader. A glossary may be included if necessary. The glossary from the PRMS may be an acceptable alternative.

Section #3 -- Information Typically Found in the Tabular Data Section of an Evaluation Report

Issue:

Users of an evaluation report depend on the tabular data included in the report to gain understanding of the preparer's work. What information should the preparer include in this section?

SPEE Recommended Evaluation Practice:

(See also Sections #1 and #2)

The tabular data included in an evaluation report will be a function of the number of properties evaluated, the requests of the client, the preferences of the

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preparer, and, where appropriate, the requirements of any legal or regulatory authority. In some cases the inclusion of individual projections for thousands of properties is unnecessary. In other cases the failure to show specific data might significantly reduce the user's ability to understand the report. The preparer should work with the client and then use sound judgment in determining how to present tabular data in the evaluation report. SPEE offers the following recommendations as issues that the preparer should consider in determining the format of the tabular data section of an evaluation report.

Summary Tables should be provided to show the summary of data for all properties by each reserve category subdivision (PDP, PDNP, etc) in the report, as well as by each reserve category (Proved, Probable, etc.). The preparer might choose to include summaries for other groupings of properties, such as by fields, districts, states, countries, or other such groupings. In some cases, subtotals for countries or continents may be required for regulatory filings.

The presentation of Subtotal, Total, and Aggregation reserve and resource volumes may result in misunderstandings by users of the report. For deterministic type reports, the summation of volumes of different categories or subcategories may not reflect the different uncertainties associated with each category or subcategory.

Recognizing that it is common for deterministic reports to sum the various reserve category subdivisions (i.e. Total Proved equal to the sum of Proved Producing, Proved Shut In, Proved Behind Pipe, Proved Undeveloped), this presentation is acceptable but the report should clearly identify the various category subdivisions that comprise the summation.

The summation of different deterministic reserve categories (Proved, Probable, Possible, or classifications (reserves and resources)) into a "Grand Total" is generally discouraged due to the different uncertainties associated with each. The use of such reserve summations as a 1P, 2P, or 3P presentation, where it is clearly labeled as such, is the preferred presentation, as the inclusion of the 1P, 2P, or 3P descriptor should give clear indication that the summation includes volumes from different categories. The summation of reserves and resources is generally discouraged.

For probabilistic reports, the arithmetic aggregation of P90 reserve estimates almost always results in an aggregate value which has a much higher probability of occurring than 90%. Conversely, the arithmetic aggregation of P10 reserve estimates almost always results in an aggregate value that has a much lower probability of occurring than 10%. Because of the complexities associated with

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probabilistic aggregation, the report should clearly discuss the assumptions and methodology used for aggregation

Tabular data is often provided to show annual projections for:

- Gross (100% or 8/8ths) production for each of the hydrocarbon products sold;
- Net production of each product to the ownership interest being evaluated;
- Revenues;
- Production and ad valorem taxes as appropriate;
- Where production is under a Production Sharing Agreement or similar arrangement, volumes expected to be delivered to the licensee in lieu of taxes;
- Lease operating expenses;
- Capital costs;
- Income taxes as appropriate;
- Resulting cash flow; and
- Discounted cash flow (a profile showing results with different discount rates is recommended).

At least ten years of annual projections should be provided unless reserves and resources are depleted earlier. If the reserve or resource life exceeds the number of annual projections, the remainder should be shown on a single line, and the total of all years should be shown.

The amount of data that is provided will be a function of the client's request and the preparer's preference. The following data should generally be considered a minimum for the tabular section of the report:

1. Property identification and location;
2. Initial and final revenue and expense interests;
3. Gross and net future production;
4. Product pricing at the level of detail to match the production;
5. Deductions including taxes, operating costs, capital costs, royalties, or other obligations to the lessor/licensor;
6. Future net income before income taxes (undiscounted);
7. Discounted cash flow and discount rate; and
8. Estimated life of production.

The preparer should consider if additional information is appropriate to aid the reader of the report in better understanding the estimate. Such additional information might include:

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1. Producing horizon or perforated interval;
2. Drive mechanism;
3. Production method: such as flowing, pumping, gas lift, or compression;
4. Secondary or enhanced recovery;
5. Maps, cross sections, or type logs; and
6. Other such specific information as the situation warrants.

Section #4 -- Reserve Reports provided to the SEC

Issue:

While evaluation reports are typically requested for any number of reasons, the year-end reports requested by clients for purposes of meeting reporting requirements of the SEC must follow SEC requirements and use SEC reserve definitions.

SPEE Recommended Evaluation Practice:

Prior to December 31, 2009, SEC reserve definitions and requirements for year-end reports were contained in the Federal Securities Laws Regulation S-X Section 210.4-10 with additional interpretations in Staff Accounting Bulletins Topic 12. Additional rules were provided in Financial Accounting Standards Board (FASB) Statements of Financial Accounting Standards Numbers 19, 69, and 121 or 144³. After December 31, 2009, the new SEC reserve definitions are amendments to Regulation S-X and items 102, 801, and 802 of Regulation S-K, along with Subpart 1200, Items 1201 through 1208. The regulations are supplemented with FASB Topic 932, which replaces FASB 69. It is the responsibility of the preparer to understand the requirements for the reserve estimates and the requests of the client.

The following recommendations should be read in combination with the documents from the SEC and FASB that are listed above. These recommendations are intended only to discuss and enhance understanding of the SEC requirements by highlighting some of the areas that are of importance to preparers and users of reserve reports provided to the SEC.

Comments in Sections #1, #2, and #3 can also be considered for general guidance to the extent that they do not conflict with requirements of the SEC.

³ FASB 144 replaced FASB 121 for reporting years beginning after 12/15/2001. FASB Topic 932 was adopted in response to the amended SEC regulations effective December 31, 2009 and is intended to address all oil and gas accounting topics.

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1. The effective date for a year-end report filed with the SEC should be the last day of the fiscal year, not the first day of the next year.
2. The preparer should state that the report is being prepared for the client's use in filing with the SEC.
3. The cover letter or discussion section should clearly and concisely state that the report conforms to SEC requirements. A statement that "the report uses constant pricing and discounts cash flow at 10% as required by the SEC" is not sufficient. Similarly, the use of any definitions other than the SEC reserve definitions is not acceptable. It is a good practice to include the SEC reserve definitions and an explanation of any departures from those definitions or reliance on other sources.
4. A report following SEC requirements may include probable, or probable and possible reserves, at the option of the registrant. With certain exceptions, it is not permitted to report resources
5. The report should contain a discussion of how the preparer determined the sales prices for oil, gas, and any other products and how these prices were applied to the various individual properties in projecting reserves and related cash flow.
 - a. As a result of the new regulations effective December 31, 2009, the year-end price will be based on the first of the month averages from the preceding 12 months (typically the registrant's fiscal year) adjusted for transportation and quality to estimate wellhead price. Adjustments made to estimate wellhead price are worthy of discussion.
 - b. Future prices are not to be escalated unless conditions acceptable to the SEC are met. Special consideration should be given to long-term contracts and price hedges.
 - c. Gains and losses from hedging are addressed in the SPEE Recommended Evaluation Practice #4 (Hedging Positions).
6. The preparer should state any knowledge of imbalances and whether or not imbalances have been considered in the projections of net production.
7. The staff of the SEC would like to see a comment on the preparer's knowledge of the ability of the client to fund the development of proved undeveloped reserves.
8. Undeveloped projects that are not scheduled for development within five years, or projects that have been previously booked but have been delayed such that they will remain undeveloped for five or more years will require discussion under § 229.1203. Preparers should consider a brief discussion in their cover letter, including commentary of material (PUD) projects from undeveloped to developed status.

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9. If the report contains non-traditional volumes, such as synthetic oil or gas, the cover letter should contain a brief description of the process(es) and valuation basis involved, and such volumes identified separately.
10. Reserve volumes should be reported according to the SEC prescription for geographic disclosure.
11. Qualifications of the person primarily responsible for the evaluation must be disclosed, as must the controls on accuracy of reporting.

References

SEC Amended Regulations: <http://www.sec.gov/rules/final/2008/33-8995.pdf>

FASB Topic 932:

<http://www.fasb.org/cs/BlobServer?blobcol=urldata&blobtable=MungoBlobs&blobkey=id&blobwhere=1175820075990&blobheader=application/pdf>

Section #5 – Reserve Reports prepared for Disclosure under Canadian National Instrument NI 51-101 Standards of Disclosure for Oil and Gas Activities (NI 51-101)

NOTE: this provides only a brief summary of the main features of Canadian oil and gas disclosure requirements. The documents listed in the references below should be consulted for full information.

Reports prepared for disclosure by a company that is a reporting issuer⁴ engaged in oil and gas activities in Canada must be done under evaluation and disclosure standards that may differ from those used elsewhere. These differences may include:

- Evaluation and classification of all classes of reserve and resource must be done in accordance with the Canadian Oil and Gas Evaluation Handbook (COGEH),
- All practicing engineers, geologists and geophysicists in Canada must belong to a professional association and in Alberta, where most Canadian evaluators can be found, this is the Association of Professional Engineers,

⁴ For a definition of “reporting issuer” refer to Canadian Securities legislation. A simple description is that it is anyone who offers securities to the public in Canada. This may not necessarily be through an exchange.

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Geologists and Geophysicists of Alberta (APEGGA), and there are similar organizations in other provinces. COGEH is the practice standard recognized by APEGGA.

- Reports must be prepared by a Qualified Reserves Evaluator or Auditor who satisfies the requirements of:
 - Requisite training and experience for carrying out an evaluation or audit.
 - At least five years of relevant experience for an evaluator and ten years for an auditor.
 - Membership of a relevant Professional Association. (A list of currently recognized Professional Organizations, including those in the USA, is given in Companion Policy 51-101CP Standards of Disclosure for Oil and Gas Activities. Applications to be recognized may be made by other professional organizations. One of the key requirements is that the organization has a disciplinary process.)
 - Reports prepared for annual filings must be prepared by an Independent Qualified Reserves Evaluator or Auditor.

Report contents are generally similar to those described above, but must contain the information specified in COGEH Volume 1 Section 11, Contents of a Reserves Report. This generally requires more information than is included in a reserves report prepared for use in the US, particularly on major properties. If the required information is not contained in a report submitted to a Canadian securities regulatory authority, the reporting issuer is likely to be asked to provide it.

Disclosure of oil and gas activities by a reporting issuer must be done in accordance to the requirements of National Instrument 51-101, Standards of Disclosure for Oil and Gas Activities. NI 51-101 and supporting documents should be consulted for details, but key points are:

- It refers to COGEH as the required evaluation and disclosure standard.
- NI 51-101 is continuous disclosure legislation that applies to all disclosure by reporting issuers, including regulatory filings, news releases and corporate presentations. This differs from the corresponding US SEC legislation, which only applies to filings with the SEC.

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- Annual filings of reporting issuers engaged in oil and gas activities require three forms:

- FORM 51-101 F1: Statement of Reserves Data and Other Oil and Gas Information.

This form contains the detailed information on a reporting issuer's oil and gas activities. This includes mandatory disclosure on volumes and values of reserves data (defined as Proved and Probable reserves) at a forecast price and information on other aspects of oil and gas activities. Voluntary disclosure of reserves data at a constant price, and of volumes and values of other resource classes, such as contingent resources, may also be made. This form is always required whether or not the reporting issuer has reserves.

- FORM 51-101 F2: Report on Reserves Data by Independent Qualified Reserves Evaluator or Auditor

This form is signed by the Independent Qualified Reserves Evaluator or Auditor to confirm that the evaluations have been carried out according to the standards of the COGEH and to provide an opinion on the reserves. At least 75% of the 10% NPV of the reporting issuer's reserves data must have been evaluated or audited, and the balance reviewed. This form is required only if the reporting issuer has proved and/or probable reserves.

- FORM 51-101F3: Report of Management and Directors on Oil and Gas Disclosure.

This form is signed by two officers and two directors of the reporting issuer to confirm that they have carried out a due diligence review of the preparation of the reserves estimate. This form is always required.

REFERENCES

Canadian Oil and Gas Evaluation Handbook (COGEH), which consists of three volumes (available from the SPE Canada, http://www.spe.org/canada/pages/general/canadian_pubs.php)

- Volume 1: Reserves Definitions and Evaluation Practices and Procedures
- Volume 2: Detailed Guidelines for Estimation and Classification of Oil and Gas Resources and Reserves

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- Volume 3: CBM Reserves and Resources, International Properties, Bitumen Reserves and Resources (currently unavailable awaiting completion of the latter section).

Information on Canadian oil and gas disclosure requirements can be found on the website of the Alberta Securities Commission includes:

- The legislation, National Instrument 51-101.
- Forms required for annual filings: F1, F2 and F3 (a modified version of the F3 is available on request from the ASC for reporting issuers that do not have any reserves).
- A Companion Policy that provides guidance on interpretation of the legislation.
- CSA Staff Notices that provide additional guidance, usually on topical issues. Current Staff Notices include:
 - CSA Staff Notice 51-324 - Glossary to NI 51-101 Standards of Disclosure for Oil and Gas Activities.
 - CSA Staff Notice 51-327 Oil and Gas Disclosure: Resources Other Than Reserves Data
- Section 5 of Volume 1 of the Canadian Oil and Gas Evaluation Handbook (COGEH), Definitions of Reserves and Resources (reproduced by permission of the copyright holders of the COGEH)
- Annual Oil and Gas Reports, published by the ASC since 2004, with reports and comments on reviews of reserves reports and other disclosures
- Additional information, such as papers published by ASC Staff.

Staff of the Petroleum Department of the Alberta Securities Commission may be contacted for additional information by calling the ASC public information line (403) 355 4151 and asking to speak to a member of the Department.

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Document Control

Version 1.1 was approved by the SPEE Board of Directors for publication on the SPEE website in February, 2012. This document supersedes Version 1.0.

Changes from Version 1.0 include:

- Discussions and commentary on Resources as well as Reserves.
- Updated Version 1.0 in areas pertaining to the Amended U.S. Securities and Exchange Commission's Modernization of Oil and Gas Reporting, effective January 1, 2010.
- Attempts to adopt more standard nomenclature in line with the Petroleum Resource Management System.
- A section pertaining to Canadian National Instrument NI 51-101.

