"Note: [30 Dec 2010] – The following is a consolidation of National Instrument 51-101. It incorporates the amendments to this document that came into effect on September 19, 2005, December 30, 2005, December 28, 2007 and December 30, 2010. This consolidation is provided for your convenience and should not be relied on as authoritative."

NATIONAL INSTRUMENT 51-101 STANDARDS OF DISCLOSURE FOR OIL AND GAS ACTIVITIES

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NATIONAL INSTRUMENT 51-101 STANDARDS OF DISCLOSURE FOR OIL AND GAS ACTIVITIES

PART 1 APPLICATION AND TERMINOLOGY¹

- **1.1 Definitions**² In this *Instrument*:
 - (a) "annual information form" has the same meaning as "AIF" in NI 51-102;
 - (a.1) "analogous information" means information about an area outside the area in which the reporting issuer has an interest or intends to acquire an interest, which is referenced by the reporting issuer for the purpose of drawing a comparison or conclusion to an area in which the reporting issuer has an interest or intends to acquire an interest, which comparison or conclusion is reasonable, and includes:
 - (i) historical information concerning *reserves*;
 - (ii) estimates of the volume or value of *reserves*;
 - (iii) historical information concerning resources;
 - (iv) estimates of the volume or value of *resources*;
 - (v) historical *production* amounts;
 - (vi) *production* estimates; or
 - (vii) information concerning a *field*, well, basin or *reservoir*;
 - (a.2) "anticipated results" means information that may, in the opinion of a reasonable person, indicate the potential value or quantities of resources in respect of the reporting issuer's resources or a portion of its resources and includes:
 - (i) estimates of volume;
 - (ii) estimates of value;
 - (iii) areal extent;

For the convenience of readers, CSA Staff Notice 51-324 Glossary to NI 51-101 Standards of Disclosure for Oil and Gas Activities sets out the meanings of terms, including those defined in this Part, that are printed in italics in this Instrument, Form 51-101F1, Form 51-101F2, Form 51-101F3 or Companion Policy 51-101CP.

A national definition instrument has been adopted as NI 14-101. It contains definitions of certain terms used in more than one national or multilateral instrument. NI 14-101 provides that a term used in a national or multilateral instrument and defined in the statute relating to securities of the applicable jurisdiction, the definition of which is not restricted to a specific portion of the statute, will have the meaning given to it in that statute unless the context otherwise requires. NI 14-101 also provides that a provision or a reference within a provision of a national or multilateral instrument that specifically refers by name to a jurisdiction other than the local jurisdiction shall not have any effect in the local jurisdiction, unless otherwise stated in that national or multilateral instrument.

- (iv) pay thickness;
- (v) flow rates; or
- (vi) hydrocarbon content;
- (b) "BOEs" means barrels of oil equivalent;
- (c) Repealed (December 30, 2010);
- (d) Repealed (December 30, 2010);
- (e) Repealed (December 30, 2010);
- (f) "COGE Handbook" means the "Canadian Oil and Gas Evaluation Handbook" prepared jointly by The Society of Petroleum Evaluation Engineers (Calgary Chapter) and the Canadian Institute of Mining, Metallurgy & Petroleum (Petroleum Society), as amended from time to time;
- (g) Repealed (December 28, 2007);
- (h) "effective date", in respect of information, means the date as at which, or for the period ended on which, the information is provided;
 - (i) Repealed (December 30, 2010);
 - (j) "forecast prices and costs" means future prices and costs that are:
 - (i) generally accepted as being a reasonable outlook of the future;
 - (ii) if, and only to the extent that, there are fixed or presently determinable future prices or costs to which the *reporting issuer* is legally bound by a contractual or other obligation to supply a physical product, including those for an extension period of a contract that is likely to be extended, those prices or costs rather than the prices and costs referred to in subparagraph (i);
 - (k) "foreign geographic area" means a geographic area outside North America within one country or including all or portions of a number of countries;
 - (1) "Form 51-101F1" means Form 51-101F1 Statement of Reserves Data and Other Oil and Gas Information;
 - (m) "Form 51-101F2" means Form 51-101F2 Report on Reserves Data by Independent Qualified Reserves Evaluator or Auditor;
 - (n) "Form 51-101F3" means Form 51-101F3 Report of Management and Directors on Oil and Gas Disclosure;

- (n.1) "Form 51-101F4" means Form 51-101F4 Notice of Filing of 51-101F1 Information;
- (o) "independent", in respect of the relationship between a reporting issuer and a person or company, means a relationship between the reporting issuer and that person or company in which there is no circumstance that could, in the opinion of a reasonable person aware of all relevant facts, interfere with that person's or company's exercise of judgment regarding the preparation of information which is used by the reporting issuer;
- (p) "McfGEs" means thousand cubic feet of gas equivalent;
- (q) "NI 14-101" means National Instrument 14-101 Definitions;
- (r) Repealed (December 30, 2005);
- (r.1) "NI 51-102" means National Instrument 51-102 Continuous Disclosure Obligations;
- (s) "oil and gas activities"
 - (i) include:
 - (A) the search for *crude oil* or *natural gas* in their natural states and original locations;
 - (B) the acquisition of *property* rights or *properties* for the purpose of exploring for or removing *oil* or *gas* from their natural locations;
 - (C) the construction, drilling and *production* activities necessary to retrieve *oil* and *gas* from their natural locations, and the acquisition, construction, installation and maintenance of *field* gathering and storage systems including lifting the *oil* and *gas* to the surface and gathering, treating, *field* processing and *field* storage; and
 - (D) the extraction of hydrocarbons from oil sands, shale, coal or other non-conventional sources and activities similar to those referred to in clauses (A), (B) and (C) undertaken with a view to such extraction; but
 - (ii) do not include:
 - (A) transporting, refining or marketing *oil* or *gas*;
 - (B) activities relating to the extraction of natural resources other than *oil* and *gas* and their by-products; or
 - (C) the extraction of geothermal steam or of hydrocarbons as a byproduct of the extraction of geothermal steam or associated geothermal resources;

- (t) "preparation date", in respect of written disclosure, means the most recent date to which information relating to the period ending on the *effective date* was considered in the preparation of the disclosure;
- (u) "production group" means one of the following together, in each case, with associated by-products:
 - (i) light and medium *crude oil* (combined);
 - (ii) heavy oil;
 - (iii) associated gas and non-associated gas (combined); and
 - (iv) bitumen, synthetic oil or other products from non-conventional oil and gas activities.
- (v) "product type" means one of the following:
 - (i) in respect of conventional *oil and gas activities*:
 - (A) light and medium *crude oil* (combined);
 - (B) *heavy oil*;
 - (C) natural gas excluding natural gas liquids; or
 - (D) natural gas liquids; and
 - (ii) in respect of non-conventional oil and gas activities:
 - (A) synthetic oil;
 - (B) bitumen;
 - (C) coal bed methane;
 - (D) hydrates;
 - (E) shale oil; or
 - (F) shale gas;
- (w) "professional organization" means a self-regulatory organization of engineers, geologists, other geoscientists or other professionals whose professional practice includes reserves evaluations or reserves audits, that:
 - (i) admits members primarily on the basis of their educational qualifications;
 - (ii) requires its members to comply with the professional standards of competence and ethics prescribed by the organization that are relevant to the estimation, *evaluation*, *review* or *audit* of *reserves data*;

- (iii) has disciplinary powers, including the power to suspend or expel a member; and
- (iv) is either:
 - (A) given authority or recognition by statute in a Canadian jurisdiction; or
 - (B) accepted for this purpose by the *securities regulatory authority* or the *regulator*;
- (x) "qualified reserves auditor" means an individual who:
 - (i) in respect of particular *reserves data, resources* or related information, possesses professional qualifications and experience appropriate for the estimation, *evaluation*, *review* and *audit* of the *reserves data, resources* and related information; and
 - (ii) is a member in good standing of a *professional organization*;
- (y) "qualified reserves evaluator" means an individual who:
 - (i) in respect of particular *reserves data, resources* or related information, possesses professional qualifications and experience appropriate for the estimation, *evaluation* and *review* of the *reserves data, resources* and related information; and
 - (ii) is a member in good standing of a *professional organization*;
- (z) "qualified reserves evaluator or auditor" means a qualified reserves auditor or a qualified reserves evaluator;
- (z.1) "reserves" means proved, probable or possible reserves;
- (aa) "reserves data" means an estimate of proved reserves and probable reserves and related future net revenue, estimated using forecast prices and costs; and
- (bb) "supporting filing" means a document filed by a reporting issuer with a securities regulatory authority.

1.2 COGE Handbook Definitions

- (1) Terms used in this *Instrument* but not defined in this *Instrument*, *NI 14-101* or the securities statute in the *jurisdiction*, and defined or interpreted in the *COGE Handbook*, have the meaning or interpretation ascribed to those terms in the *COGE Handbook*.
- (2) In the event of a conflict or inconsistency between the definition of a term in this *Instrument*, *NI 14-101* or the securities statute in the *jurisdiction* and the meaning ascribed to the term in the *COGE Handbook*, the definition in this *Instrument*, *NI 14-101* or the securities statute in the *jurisdiction*, as the case may be, applies.

1.3 Applies to *Reporting Issuers* **Only** - This *Instrument* applies only to *reporting issuers* engaged, directly or indirectly, in *oil and gas activities*.

1.4 Materiality Standard

- (1) This *Instrument* applies only in respect of information that is *material* in respect of a *reporting issuer*.
- (2) For the purpose of subsection (1), information is *material* in respect of a *reporting issuer* if it would be likely to influence a decision by a reasonable investor to buy, hold or sell a security of the *reporting issuer*.

PART 2 ANNUAL FILING REQUIREMENTS

- **2.1** Reserves Data and Other Oil and Gas Information A reporting issuer must, not later than the date on which it is required by securities legislation to file audited financial statements for its most recent financial year, file with the securities regulatory authority the following:
 - 1. **Statement of Reserves Data and Other Information** a statement of the reserves data and other information specified in Form 51-101F1, as at the last day of the reporting issuer's most recent financial year and for the financial year then ended;
 - 2. **Report of** *Independent Qualified Reserves Evaluator or Auditor* a report in accordance with *Form 51-101F2* that is:
 - (a) included in, or filed concurrently with, the document filed under item 1; and
 - (b) executed by one or more *qualified reserves evaluators or auditors* each of whom is *independent* of the *reporting issuer*, who must in the aggregate have:
 - (i) evaluated or audited at least 75 percent of the future net revenue (calculated using a discount rate of 10 percent) attributable to proved plus probable reserves, as reported in the statement filed or to be filed under item 1; and
 - (ii) reviewed the balance of such future net revenue; and
 - 3. **Report of Management and Directors** a report in accordance with *Form* 51-101F3 that:
 - (a) refers to the information filed or to be filed under items 1 and 2;
 - (b) confirms the responsibility of management of the *reporting issuer* for the content and filing of the statement referred to in item 1 and for the filing of the report referred to in item 2;

- (c) confirms the role of the board of directors in connection with the information referred to in paragraph (b);
- (d) is contained in, or filed concurrently with, the statement filed under item 1; and
- (e) is executed
 - (i) by two officers of the *reporting issuer*, one of whom is the chief executive officer, and
 - (ii) on behalf of the board of directors, by
 - (A) any two directors of the *reporting issuer*, other than the persons referred to in subparagraph (i) above, or
 - (B) if the issuer has only three directors, two of whom are the persons referred to in subparagraph (i), all of the directors of the *reporting issuer*.
- **2.2** Repealed (December 30, 2010)

2.3 Inclusion in Annual Information Form

- (1) The requirements of section 2.1 may be satisfied by including the information specified in section 2.1 in an *annual information form* filed within the time specified in section 2.1.
- (2) A reporting issuer that adopts the approach described in subsection (1) must, concurrently with filing its *annual information form*, file with the *securities regulatory authority* a notice of filing in accordance with *Form 51-101F4*.

2.4 Reservation in Report of Qualified Reserves Evaluator or Auditor

- (1) If a *qualified reserves evaluator or auditor* cannot report on *reserves data* without *reservation*, the *reporting issuer* must ensure that the report of the *qualified reserves evaluator or auditor* prepared for the purpose of item 2 of section 2.1 sets out the cause of the *reservation* and the effect, if known to the *qualified reserves evaluator or auditor*, on the *reserves data*.
- (2) A report containing a *reservation*, the cause of which can be removed by the *reporting issuer*, does not satisfy the requirements of item 2 of section 2.1.

PART 3 RESPONSIBILITIES OF REPORTING ISSUERS AND DIRECTORS

3.1 Interpretation - A reference to a board of directors in this Part means, for a *reporting issuer* that does not have a board of directors, those individuals whose authority and duties in respect of that *reporting issuer* are similar to those of a board of directors.

- **3.2** Reporting Issuer to Appoint Independent Qualified Reserves Evaluator or Auditor A reporting issuer must appoint one or more qualified reserves evaluators or auditors, each of whom is independent of the reporting issuer, to report to the board of directors of the reporting issuer on its reserves data.
- 3.3 Reporting Issuer to Make Information Available to Qualified Reserves Evaluator or Auditor A reporting issuer must make available to the qualified reserves evaluators or auditors that it appoints under section 3.2 all information reasonably necessary to enable the qualified reserves evaluators or auditors to provide a report that will satisfy the applicable requirements of this Instrument.
- **3.4 Certain Responsibilities of Board of Directors** The board of directors of a *reporting issuer* must
 - (a) review, with reasonable frequency, the *reporting issuer's* procedures relating to the disclosure of information with respect to *oil and gas activities*, including its procedures for complying with the disclosure requirements and restrictions of this *Instrument*;
 - (b) review each appointment under section 3.2 and, in the case of any proposed change in such appointment, determine the reasons for the proposal and whether there have been disputes between the appointed *qualified reserves evaluator or auditor* and management of the *reporting issuer*;
 - (c) review, with reasonable frequency, the *reporting issuer's* procedures for providing information to the *qualified reserves evaluators or auditors* who report on *reserves data* for the purposes of this *Instrument*;
 - (d) before approving the filing of *reserves data* and the report of the *qualified* reserves evaluators or auditors thereon referred to in section 2.1, meet with management and each *qualified reserves evaluator or auditor* appointed under section 3.2, to
 - (i) determine whether any restrictions affect the ability of the *qualified* reserves evaluator or auditor to report on reserves data without reservation; and
 - (ii) review the *reserves data* and the report of the *qualified reserves evaluator* or auditor thereon; and
 - (e) review and approve
 - (i) the content and filing, under section 2.1, of the statement referred to in item 1 of section 2.1;
 - (ii) the filing, under section 2.1, of the report referred to in item 2 of section 2.1; and
 - (iii) the content and filing, under section 2.1, of the report referred to in item 3 of section 2.1.

3.5 Reserves Committee

- (1) The board of directors of a *reporting issuer* may, subject to subsection (2), delegate the responsibilities set out in section 3.4 to a committee of the board of directors, provided that a majority of the members of the committee
 - (a) are individuals who are not and have not been, during the preceding 12 months:
 - (i) an officer or employee of the *reporting issuer* or of an affiliate of the *reporting issuer*;
 - (ii) a person who beneficially owns 10 percent or more of the outstanding voting securities of the *reporting issuer*; or
 - (iii) a relative of a person referred to in subparagraph (a)(i) or (ii), residing in the same home as that person; and
 - (b) are free from any business or other relationship which could reasonably be seen to interfere with the exercise of their independent judgement.
- (2) Despite subsection (1), a board of directors of a *reporting issuer* must not delegate its responsibility under paragraph 3.4(e) to approve the content or the filing of information.
- (3) A board of directors that has delegated responsibility to a committee pursuant to subsection (1) must solicit the recommendation of that committee as to whether to approve the content and filing of information for the purpose of paragraph 3.4(e).
- **3.6** Repealed (September 19, 2005)

PART 4 MEASUREMENT

- **4.1** Repealed (December 30, 2010)
- **4.2 Consistency in Dates** The date or period with respect to which the effects of an event or transaction are recorded in a *reporting issuer's* annual financial statements must be the same as the date or period with respect to which they are first reflected in the *reporting issuer's* annual *reserves data* disclosure under Part 2.

PART 5 REQUIREMENTS APPLICABLE TO ALL DISCLOSURE

- **5.1 Application of Part 5** -This Part applies to disclosure made by or on behalf of a *reporting issuer*
 - (a) to the public;
 - (b) in any document filed with a securities regulatory authority; or

- (c) in other circumstances in which, at the time of making the disclosure, the *reporting issuer* knows, or ought reasonably to know, that the disclosure is or will become available to the public.
- **5.2 Disclosure of** *Reserves* **and Other Information** If a *reporting issuer* makes disclosure of *reserves* or other information of a type that is specified in *Form 51-101F1*, the *reporting issuer* must ensure that the disclosure satisfies the following requirements:
 - (a) estimates of reserves or future net revenue must
 - (i) disclose the *effective date* of the estimate;
 - (ii) have been prepared or audited by a *qualified reserves evaluator or auditor*;
 - (iii) have been prepared or audited in accordance with the *COGE Handbook*;
 - (iv) have been made assuming that development of each *property* in respect of which the estimate is made will occur, without regard to the likely availability to the *reporting issuer* of funding required for that development; and
 - (v) in the case of estimates of *possible reserves* or related *future net revenue* disclosed in writing, also include a cautionary statement that is proximate to the estimate to the following effect:
 - "Possible reserves are those additional reserves that are less certain to be recovered than probable reserves. There is a 10% probability that the quantities actually recovered will equal or exceed the sum of proved plus probable plus possible reserves.";
 - (b) for the purpose of determining whether *reserves* should be attributed to a particular undrilled *property*, reasonably estimated future abandonment and reclamation costs related to the *property* must have been taken into account;
 - (c) in disclosing aggregate *future net revenue* the disclosure must comply with the requirements for the determination of *future net revenue* specified in *Form 51-101F1*; and
 - (d) the disclosure must be consistent with the corresponding information, if any, contained in the statement most recently filed by the *reporting issuer* with the *securities regulatory authority* under item 1 of section 2.1, except to the extent that the statement has been supplemented or superseded by a

report of a material change³ filed by the *reporting issuer* with the *securities regulatory authority*.

5.3 Classification of *Reserves* and of *Resources* Other than *Reserves*

- (1) Reserves or resources other than reserves must be disclosed using the applicable terminology and categories set out in the COGE Handbook and must be classified in the most specific category of reserves or resources other than reserves in which the reserves or resources other than reserves can be classified.
- (2) Despite subsection (1), where the applicable terminology set out in the *COGE Handbook* for the disclosure of *resources* is *total petroleum initially-in-place*, *discovered petroleum initially-in-place* or *undiscovered petroleum initially-in-place*, the *reporting issuer* may depart from the applicable terminology by substituting, for the word "*petroleum*", reference to the specific *product type* of the *resource*.
- **5.4** *Oil* and *Gas Reserves* and Sales Disclosure of *reserves* or of sales of *oil*, *gas* or associated by-products must be made only in respect of *marketable* quantities, reflecting the quantities and prices for the product in the condition (upgraded or not upgraded, processed or unprocessed) in which it is to be, or was, sold.
- **5.5** Natural Gas By-Products Disclosure concerning natural gas by-products (including natural gas liquids and sulphur) must be made in respect only of volumes that have been or are to be recovered prior to the point at which marketable gas is measured.
- **5.6** Future Net Revenue Not Fair Market Value -Disclosure of an estimate of future net revenue, whether calculated without discount or using a discount rate, must include a statement to the effect that the estimated values disclosed do not represent fair market value.

5.7 Consent of Qualified Reserves Evaluator or Auditor

- (1) A reporting issuer must not disclose a report referred to in item 2 of section 2.1 that has been delivered to the board of directors of the reporting issuer by a qualified reserves evaluator or auditor pursuant to an appointment under section 3.2, or disclose information derived from the report or the identity of the qualified reserves evaluator or auditor, without the written consent of that qualified reserves evaluator or auditor.
- (2) Subsection (1) does not apply to
 - (a) the filing of that report by a *reporting issuer* under section 2.1;
 - (b) the use of or reference to that report in another document filed by the *reporting issuer* under section 2.1; or

³ "Material change" has the meaning ascribed to the term under *securities legislation* of the applicable *jurisdiction*.

- (c) the identification of the report or of the *qualified reserves evaluator or* auditor in a news release referred to in section 2.2.
- **5.8 Disclosure of Less Than All** *Reserves* If a *reporting issuer* that has more than one *property* makes written disclosure of any *reserves* attributable to a particular *property*
 - (a) the disclosure must include a cautionary statement to the effect that
 - "The estimates of reserves and future net revenue for individual properties may not reflect the same confidence level as estimates of reserves and future net revenue for all properties, due to the effects of aggregation"; and
 - (b) the document containing the disclosure of any *reserves* attributable to one *property* must also disclose total *reserves* of the same classification for all *properties* of the *reporting issuer* in the same country (or, if appropriate and not misleading, in the same *foreign geographic area*).

5.9 Disclosure of Resources Other than Reserves

- (1) If a *reporting issuer* discloses *anticipated results* from *resources* which are not currently classified as *reserves*, the *reporting issuer* must also disclose in writing, in the same document or in a *supporting filing*:
 - (a) the *reporting issuer's* interest in the *resources*;
 - (b) the location of the *resources*;
 - (c) the *product types* reasonably expected;
 - (d) the risks and the level of uncertainty associated with recovery of the *resources*; and
 - (e) in the case of *unproved property*, if its value is disclosed,
 - (i) the basis of the calculation of its value; and
 - (ii) whether the value was prepared by an *independent* party.
- (2) If disclosure referred to in subsection (1) includes an estimate of a quantity of *resources* other than *reserves* in which the *reporting issuer* has an interest or intends to acquire an interest, or an estimated value attributable to an estimated quantity, the estimate must:
 - (a) have been prepared or audited by a *qualified reserves evaluator or auditor*;
 - (b) have been prepared or audited in accordance with the *COGE Handbook*;
 - (c) be classified in the most specific category of *resources* other than *reserves*, as required by section 5.3; and

- (d) be accompanied by the following information:
 - (i) a definition of the *resources* category used for the estimate;
 - (ii) the *effective date* of the estimate;
 - (iii) the significant positive and negative factors relevant to the estimate:
 - (iv) in respect of *contingent resources*, the specific contingencies which prevent the classification of the *resources* as *reserves*; and
 - (v) a cautionary statement that is proximate to the estimate to the effect that:
 - (A) in the case of *discovered resources* or a subcategory of *discovered resources* other than *reserves*:
 - "There is no certainty that it will be commercially viable to produce any portion of the resources."; or
 - (B) in the case of *undiscovered resources* or a subcategory of *undiscovered resources*:

"There is no certainty that any portion of the resources will be discovered. If discovered, there is no certainty that it will be commercially viable to produce any portion of the resources."

- (3) Paragraphs (1)(d) and (e) and subparagraphs (2)(c)(iii) and (iv) do not apply if:
 - (a) the *reporting issuer* includes in the written disclosure a reference to the title and date of a previously filed document that complies with those requirements; and
 - (b) the *resources* in the written disclosure, taking into account the specific *properties* and interests reflected in the *resources* estimate or other *anticipated result*, are *materially* the same *resources* addressed in the previously filed document.

5.10 Analogous Information

- (1) Sections 5.2, 5.3, 5.9 and 5.16 do not apply to the disclosure of *analogous information* provided that the *reporting issuer* discloses the following:
 - (a) the source and date of the *analogous information*;
 - (b) whether the source of the *analogous information* was *independent*;
 - (c) if the *reporting issuer* is unable to confirm that the *analogous information* was prepared by a *qualified reserves evaluator or auditor* or in accordance

- with the *COGE Handbook*, a cautionary statement to that effect proximate to the disclosure of the *analogous information*; and
- (d) the relevance of the *analogous information* to the *reporting issuer's oil* and gas activities.
- (2) For greater certainty, if a *reporting issuer* discloses information that is an *anticipated result*, an estimate of a quantity of *reserves* or *resources*, or an estimate of value attributable to an estimated quantity of *reserves* or *resources* for an area in which it has an interest or intends to acquire an interest, that is based on an extrapolation from *analogous information*, sections 5.2, 5.3, 5.9 and 5.16 apply to the disclosure of the information.
- 5.11 Net Asset Value and Net Asset Value per Share -Written disclosure of net asset value or net asset value per share must include a description of the methods used to value assets and liabilities and the number of shares used in the calculation.
- **5.12 Reserve Replacement** Written disclosure concerning *reserve* replacement must include an explanation of the method of calculation applied.
- **5.13** Netbacks Written disclosure of a netback must
 - (a) Repealed (December 28, 2007);
 - (b) reflect netbacks calculated by subtracting royalties and *operating costs* from revenues; and
 - (c) state the method of calculation.
- **5.14 BOEs** and **McfGEs** If written disclosure includes information expressed in **BOEs**, *McfGEs* or other units of equivalency between *oil* and *gas*
 - (a) the information must be presented
 - (i) in the case of *BOEs*, using *BOEs* derived by converting *gas* to *oil* in the ratio of six thousand cubic feet of *gas* to one barrel of *oil* (6 *Mcf*:1 *bbl*);
 - (ii) in the case of *McfGEs*, using *McfGEs* derived by converting *oil* to *gas* in the ratio of one barrel of *oil* to six thousand cubic feet of *gas* (1 *bbl*:6 *Mcf*); and
 - (iii) with the conversion ratio stated;
 - (b) if the information is also presented using *BOEs* or *McfGEs* derived using a conversion ratio other than a ratio specified in paragraph (a), the disclosure must state that other conversion ratio and explain why it has been chosen;

- (c) if the information is presented using a unit of equivalency other than *BOEs* or *McfGEs*, the disclosure must identify the unit, state the conversion ratio used and explain why it has been chosen; and
- (d) the disclosure must include a cautionary statement to the effect that:

"BOEs [or 'McfGEs' or other applicable units of equivalency] may be misleading, particularly if used in isolation. A BOE conversion ratio of 6 Mcf: 1 bbl [or 'An McfGE conversion ratio of 1 bbl: 6 Mcf'] is based on an energy equivalency conversion method primarily applicable at the burner tip and does not represent a value equivalency at the wellhead".

- **5.15 Finding and** *Development Costs* If written disclosure is made of finding and *development costs*:
 - (a) those costs must be calculated using the following two methods, in each case after eliminating the effects of acquisitions and dispositions:

Method 1: $\frac{a+b+c}{x}$

Method 2: $\frac{a+b+d}{y}$

where a = exploration costs incurred in the most recent financial year

b = development costs incurred in the most recent financial year

- c = the change during the most recent financial year in estimated future development costs relating to proved reserves
- d = the change during the most recent financial year in estimated future development costs relating to proved reserves and probable reserves
- x = additions to *proved reserves* during the most recent financial year, expressed in *BOEs* or other unit of equivalency
- y = additions to *proved reserves* and *probable reserves* during the most recent financial year, expressed in *BOEs* or other unit of equivalency
- (b) the disclosure must include
 - (i) the results of both methods of calculation under paragraph (a) and a description of those methods;
 - (ii) if the disclosure also includes a result derived using any other method of calculation, a description of that method and the reason for its use;
 - (iii) for each result, comparative information for the most recent financial year, the second most recent financial year and the averages for the three most recent financial years;

(iv) a cautionary statement to the effect that:

"The aggregate of the exploration and development costs incurred in the most recent financial year and the change during that year in estimated future development costs generally will not reflect total finding and development costs related to reserves additions for that year"; and

(v) the cautionary statement required under paragraph 5.14(d).

5.16 Restricted Disclosure: Summation of *Resource* Categories

- (1) A *reporting issuer* must not disclose a summation of an estimated quantity, or estimated value, of two or more of the following:
 - (a) reserves;
 - (b) contingent resources;
 - (c) prospective resources;
 - (d) the unrecoverable portion of discovered petroleum initially-in-place;
 - (e) the unrecoverable portion of *undiscovered petroleum initially-in-place*;
 - (f) discovered petroleum initially-in-place; and
 - (g) undiscovered petroleum initially-in-place.
- (2) Despite subsection (1), a *reporting issuer* may disclose an estimate of *total petroleum initially-in-place*, *discovered petroleum initially-in-place* or *undiscovered petroleum initially-in-place* if the *reporting issuer* includes, proximate to that disclosure, an estimate of each of the following, as applicable:
 - (a) reserves;
 - (b) contingent resources;
 - (c) prospective resources;
 - (d) the commercial portion of discovered petroleum initially-in-place;
 - (e) the sub-commercial portion of discovered petroleum initially-in-place;
 - (f) the unrecoverable portion of discovered petroleum initially-in-place;
 - (g) the unrecoverable portion of *undiscovered petroleum initially-in-place*;
 - (h) discovered petroleum initially-in-place; and
 - (i) undiscovered petroleum initially-in-place.

- (3) A reporting issuer may disclose an estimate of total petroleum initially-in-place, discovered petroleum initially-in-place or undiscovered petroleum initially-in-place as the most specific category that it can assign to its resources if, proximate to its disclosure, the reporting issuer
 - (a) explains why total petroleum initially-in-place, discovered petroleum initially-in-place or undiscovered petroleum initially-in-place, as the case may be, is the most specific assignable category; and
 - (b) includes
 - (i) in the case of disclosure of discovered petroleum initially-in-place, the cautionary statement required by clause 5.9(2)(c)(v)(A), or
 - (ii) in the case of disclosure of *total petroleum initially-in-place* or *undiscovered petroleum initially-in-place*, the cautionary statement required by clause 5.9(2)(c)(v)(B).

5.17 Disclosure of High-Case Estimates of Reserves and of Resources other than Reserves

- (1) If a *reporting issuer* discloses an estimate of *proved* plus *probable* plus *possible reserves*, the *reporting issuer* must also disclose the corresponding estimates of *proved* and *proved* plus *probable reserves* or of *proved* and *probable reserves*.
- (2) If a *reporting issuer* discloses a high-case estimate of *resources* other than *reserves*, the *reporting issuer* must also disclose the corresponding low and best-case estimates.

PART 6 MATERIAL CHANGE DISCLOSURE

6.1 Material Change⁴ from Information Filed under Part 2

- (1) This Part applies in respect of a material change that, had it occurred on or before the *effective date* of information included in the statement most recently filed by a *reporting issuer* under item 1 of section 2.1, would have resulted in a significant change in the information contained in the statement.
- (2) In addition to any other requirement of *securities legislation* governing disclosure of a material change, disclosure of a material change referred to in subsection (1) must discuss the *reporting issuer's* reasonable expectation of how the material change has affected its *reserves* data or other information.
 - (a) Repealed (December 27, 2007).
 - (b) Repealed (December 27, 2007).

In this Part, "material change" has the meaning ascribed to the term under *securities legislation* of the applicable *jurisdiction*.

PART 7 OTHER INFORMATION

7.1 Information to be Furnished on Request - A *reporting issuer* must, on the request of the *regulator*, deliver additional information with respect to the content of a document filed under this *Instrument*.

PART 8 EXEMPTIONS

8.1 Authority to Grant Exemption

- (1) The *regulator* or the *securities regulatory authority* may grant an exemption from this *Instrument*, in whole or in part, subject to such conditions or restrictions as may be imposed in the exemption.
- (2) Despite subsection (1), in Ontario only the *regulator* may grant an exemption.

8.2 Exemption for Certain Exchangeable Security Issuers

- (1) An exchangeable security issuer, as defined in subsection 13.3(1) of *NI 51-102*, is exempt from this *Instrument* if all of the requirements of subsection 13.3(2) of *NI 51-102* are satisfied;
- (2) For the purposes of subsection (1), the reference to "continuous disclosure documents" in clause 13.3(2)(d)(ii)(A) of *NI 51-102* includes documents filed under this *Instrument*.

PART 9 INSTRUMENT IN FORCE

- **9.1 Coming Into Force** -This Instrument comes into force on September 30, 2003.
- **9.2** Repealed (December 30, 2010)

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