

APPENDIX 18

CONTENT OF A COMPETENT PERSON'S REPORT FOR PETROLEUM RESERVES AND RESOURCES

(See rule 18A.20)

The Competent Person's Report for Petroleum Reserves and Resources must include the following:–

1. (1) Table of contents
- (2) Executive summary
- (3) Introduction:–
 - (a) the Competent Person's terms of reference;
 - (b) a statement by the Competent Person confirming his details including his full name, address, professional qualifications, expertise, years of experience, professional society affiliations, and membership details of a relevant Recognised Professional Organisation;
 - (c) a statement by the Competent Person that he is independent of the Mineral Company, its directors, senior management, and advisers, in compliance with GEM Listing Rule 18A.22.
 - (d) a description of the nature and source of any information used in the preparation of the Competent Person's Report including any limitations on the availability of information;
 - (e) details of any information used in the preparation of the Competent Person's Report that was provided by the Mineral Company;
 - (f) a statement that the Resources and Reserves have been substantiated by evidence (from a site visit, if appropriate) that:–
 - (i) is supported by analyses; and
 - (ii) takes account of information supplied to the Competent Person;
 - (g) if a site visit has been undertaken, when the site visit was undertaken and by whom;
 - (h) if a site visit has not been undertaken, a satisfactory reason as to why not;

Note: It is for the Competent Person to determine whether or not a site visit is necessary.
 - (i) the effective date of the estimates;
 - (j) the effective date of the Competent Person's Report;
 - (k) the Reporting Standard used in the Competent Person's Report, and an explanation of any departure from the relevant Reporting Standard;

(l) abbreviated definitions of the categories of Reserves and Resources used in the Competent Person's Report.

(4) Summary of Assets:–

(a) a description or table of assets held by the Mineral Company including:–

(i) the percentage ownership by the Mineral Company; and

(ii) the gross and net acreage of the assets;

(b) a summary of gross and net:–

(i) Proved Reserves; and

(ii) Proved Reserves plus Probable Reserves,

(net of any revenue interest and/or entitlement interests, as appropriate) as of [date];

(c) gross (100% of field) production profiles for:–

(i) Proved Reserves; and

(ii) Proved Reserves plus Probable Reserves (optional),

(listed separately)

(d) a summary of any upside in respect of Possible Reserves, Contingent Resources, and Prospective Resources (optional);

(e) a summary of net present values (“NPVs”) attributable to:–

(i) Proved Reserves; and

(ii) Proved Reserves plus Probable Reserves;

including any caveats. This disclosure is optional.

Note: Volumetric or monetary results of differing classes of Reserves and Resources with other classes must not be combined. Prospective Resources must not be summed (either to each other or to other classes).

(5) Discussion:–

(a) general description of the region's petroleum history;

(b) details of the regional and basin generalized geology and evident petroleum system;

(6) Field(s), licence(s) and asset(s):–

(a) For each field, licence and asset (or a number of fields, licences, and assets), reporting shall be divided into four explicitly different sections:–

(i) Reserves;

- (ii) Contingent Resources;
- (iii) Prospective Resources; and
- (iv) other assets material to the Mineral Company;

Note: Examples of other assets material to a Mineral Company are: a pipeline which is not part of the producing assets facilities, an evacuation pipeline, or a petrochemical plant.

(b) For each of 6(a)(i), (ii) and (iii) the following information must be provided, as applicable:–

- (i) the nature and extent of any rights to explore and extract hydrocarbons and a description of the properties to which those rights attach, including the duration and other principal terms and conditions of the concessions and any necessary licences and consents and the responsibility for any rehabilitation and/or abandonment costs;
- (ii) a description of geological characteristics including a stratigraphic column;
- (iii) the characteristics of the reservoir (including thickness, porosity, permeability, pressure, and any recovery mechanism), or that judged to be expected in the case of Prospective Resources;
- (iv) details of any exploration drilling including the depth of zone tested, rock formation encountered, and any liquids and/or gases encountered and/or recovered;
- (v) the date production commenced;
- (vi) details of any developments;
- (vii) details of any commercial risks for any Contingent Resources;
- (viii) details of any geological risk assessment for any Prospective Resources;
- (ix) the methods employed for exploration and/or extraction;
- (x) plans and maps for each field demonstrating any geological characteristics, platforms, pipelines, wells, bore holes, sample pits, trenches and similar characteristics;
- (xi) discussion on the field development plan;
- (xii) comments on plant and machinery including suitability and expected life capability in terms of rates, conditions, and costs of maintaining;
- (xiii) production schedules and the basis for any estimations;
- (xiv) comments on any production forecasts made by the Mineral Company; and

(xv) a statement of:–

- (A) Proved Reserves;
- (B) Proved Reserves plus Probable Reserves;
- (C) Possible Reserves; (optional)

including the method of estimation and the expected recovery factor;

Note: Information on Possible Reserves must be stated separately and not combined with information on any other Reserves. A clear statement must be provided that any Possible Reserves are entirely excluded from any asset valuation or statement of Reserves.

(7) Business:–

- (a) the general nature of the business of the Mineral Company, distinguishing between different activities which are material to the business having regard to the profits or losses, assets employed and any factors affecting the importance of the activity;
- (b) a statement about the Mineral Company's long term prospects;
- (c) an assessment of the technical staff employed by the Mineral Company;
- (d) any other factors that might affect value perceptions;

Note: Examples of other factors that might affect value perceptions are transportation difficulties and marketing.

(8) Economic evaluation:–

If a Mineral Company provides an economic evaluation based on Discounted Cash Flow analyses, the following additional requirements should be complied with:–

- (a) separate NPVs must be calculated for:–
 - (i) Proved Reserves; and
 - (ii) Proved Reserves plus Probable Reserves; (optional)
- (b) the oil prices or gas prices used in forecast cases and constant cases must be clearly stated, including any discounts or premiums of quality, transportation, or logistics, if applicable;
- (c) a summary of the fiscal terms under which the licence(s) or permit(s) are held must be stated;
- (d) varying discount rates (including the weighted average cost of capital or the minimum acceptable rate of return that applies to the Mineral Company when the evaluation is made) or a fixed discount rate of 10% must be applied;

- (e) if the NPVs attributable to Reserves are disclosed, they are presented using a forecast price as a base case or using a constant price as a base case. Under the base case:–
 - (i) any assumptions made by the Competent Person must be stated including:–
 - (A) the cost inflation rate;
 - (B) if applicable, the exchange rate;
 - (C) the effective date; and
 - (D) any salient fiscal terms and assumptions;
 - (f) a table of NPV results for the Mineral Company's net economic interests must be included, which must not combine volumes or monetary conclusions for different categories;
 - (g) sensitivity analyses for oil and gas prices, must be included, if appropriate, clearly stating the parameters chosen;
 - (h) separate economic evaluation of plant and machinery must be included if not used in the extraction of Reserves;

Note: Pipelines are an example of plant and machinery not used in the extraction of Reserves.

(9) Social and Environmental:–

Discussion on any social and/or environmental issues, which are relevant to the exploration or exploitation of the hydrocarbons must be included, if material.

Note: Examples of social and environmental issues include difficulties of access, difficulties in laying pipelines, and special environmental concerns such as fishing grounds.

(10) Basis of opinion:–

- (a) a statement that the Competent Person's Report has been prepared within the context of the Competent Person's understanding of the effects of petroleum legislation, taxation, and other regulations, that currently apply to assets;
- (b) a statement that the Competent Person is in a position to attest to the rights of the Mineral Company to explore, mine, or explore and mine, the relevant Resources and Reserves;
- (c) a statement that the Competent Person's Report is, and must remain, an independent opinion despite certain information used in the preparation of the Competent Person's Report having been given to it by the Mineral Company;

(11) Illustrations – of sufficient clarity to graphically present the material within the text. Maps must include a geographical reference system and scale bar for clarity. Technical drawings must include a legend to explain features within the diagram.