

APPENDIX II

**GUIDELINES FOR
RESEARCH AND DEVELOPMENT EXPENDITURES**

October 2004

Table of Contents

1.0	The Legislation	1
2.0	Required Expenditure Commitments.....	1
2.1	Exploration Phase	1
2.2	Development Phase and Production Phase	1
2.2.1	Development Phase.....	2
2.2.2	Production Phase.....	2
3.0	Eligibility Criteria	2
3.1	Location	2
3.2	Sources.....	2
3.3	Research and Development.....	3
3.4	Education and Training.....	3
4.0	Administrative Criteria and Expenditure Management	3
4.1	Administrative Criteria	3
4.2	Expenditure Management.....	4

1.0 The Legislation

The legislative requirement for expenditures related to R&D in the Province is contained in Section 45 of the Act, and reads as follows:

45(3)(c) ... expenditures shall be made for research and development to be carried out in the Province and for education and training to be provided in the Province;

Section 151.1(1) of the Act authorizes the Board to issue and publish in such manner as it deems appropriate guidelines and interpretation notes with respect to the application and administration of Section 45.

This document is intended to provide an operator engaged in petroleum exploration development and production activities in the Newfoundland Offshore Area with guidance parameters and criteria for R&D expenditures in the Province, which are required under Section 45 of the Legislation. Throughout this guideline the term “Research & Development” (R&D) includes “Education & Training”.

Research & Development represent one avenue whereby the exploration for, and the development and production of the petroleum resources in the Newfoundland Offshore area can make a contribution to the sustainable development of the Province. This was the vision or intent of the legislators at the time when they inserted the requirement for Research & Development and Education & Training “in the Province” into the Atlantic Accord legislation. The petroleum resource is finite and exhaustible, and it is the intent of this provision of the legislation that its exploitation create a lasting economic legacy for the people of the Province. This is best achieved by building on the intellectual capital and human resources of the Province. Achievement of this legislative intent is a key reason why some parameters or guidance are required in respect of the requirement in the Act that there be expenditures in the Province for R&D. These guidelines seek to establish such parameters.

The level of R&D expenditure by operators is expected to be consistent with the norms for such expenditures by the upstream petroleum industry in Canada. While the expenditures must be “in the Province”, Canadian tax criteria will be used as a general guide to determine other eligibility criteria.

R&D expenditures are viewed by the Board to be strategically important contributions to growth and sustainable development associated with the offshore petroleum sector in the Province.

2.0 Required Expenditure Commitments

R&D expenditures in the development phase of projects tend to focus primarily on education & training activities, whereas it is expected that in the production phase there will tend to be more focus on research & development activities. Both will be legitimate and eligible expenditures in either phase of a project. Further an operator, or group of operators, may propose an R&D program in lieu of the requirement of the guidelines. The acceptability of such a proposal will be assessed by the Board.

2.1 *Exploration Phase*

From 2003 on, during the exploration phase, R&D expenditures up to a maximum of 5 percent of the expenditure bid will be allowed.

2.2 *Development Phase and Production Phase*

In the absence of experience on which to base a benchmark for such expenditures, the C-NOPB examined the levels of such expenditures by petroleum companies in Canada. These data (Statistics Canada,

Catalogue No. 88-202-X1B) reveal that R&D expenditure by oil and gas extracting companies in Canada averaged about 0.6 percent of revenue between 1995 and 2000.

Establishing a benchmark (B) based on industry practice in Canada seems to be a reasonable approach and the Board will apply the most recent five-year data reported by Statistics Canada. The Total R&D expenditure ($TR_{r\&d}$) during the development and production phase will be determined by the Statistics Canada benchmark for oil and gas extraction companies, total recoverable oil (RO) as defined by the approved Development Plan and the long term oil price (LTOP) as follows:

$$TR_{r\&d} = B \times (RO \times LTOP)$$

A similar calculation will apply to the production of Natural Gas Liquids and Natural Gas.

2.2.1 Development Phase

Experience to date has been that R&D expenditures during the development phase of a project have amounted to approximately 0.5 percent of total project capital cost (C). The C-NOPB accepts this as a reasonable R&D expenditure level for the development phase of a project. The development phase R&D expenditure ($DP_{r\&d}$) will be calculated as follows:

$$DP_{r\&d} = 0.005 \times C$$

2.2.2 Production Phase

The production phase R&D expenditure requirement will be calculated for each project for the period covered by each Productions Operations Authorization (POA) issued by the Board.

The production phase R&D expenditure requirement ($PP_{r\&d}$) will be calculated as the difference between the Total Requirement ($TR_{r\&d}$) and the development phase requirement ($DP_{r\&d}$), as follows:

$$PP_{r\&d} = TR_{r\&d} - DP_{r\&d}$$

The production phase expenditure requirement will be distributed over each POA period during the production life of the project in proportion to production. In other words the requirement for each POA period will be the same proportion of the production phase R&D expenditure requirement as production in that POA period is of total anticipated project production.

At the end of each POA period, there will be a re-calculation based on actual production levels and prices.

3.0 Eligibility Criteria

The Board seeks a definition of R&D that is reasonable and consistent with that contemplated by the Legislation. The definitions suggested below are not considered exhaustive, and the Board will consider other reasonable areas of expenditure proposed by an operator as appropriate, on a case-by-case basis.

3.1 Location

In order to be eligible, any R&D expenditure must occur in the Province of Newfoundland & Labrador.

3.2 Sources

Expenditures by operators and their contractors and sub-contractors may be considered.

3.3 *Research and Development*

For the purposes of these guidelines R&D may include:

- R& D activity in the Province
- Increased R&D capacity in the Province
- Education & Training activity/capacity in the Province as discussed in 3.4 below

The definition of research and development, as referenced in Section 45 of the Legislation, includes, but is not limited to Section 248(1) of the Income Tax Act, which defines Scientific Research and Experimental Development as follows:

The systematic investigation or search that is carried out in a field of science or technology by means of experiment or analysis and that is:

- (a) basic research,
 - (b) applied research, or
 - (c) experimental development,
- and, in applying this definition, includes
- (d) work undertaken with respect to engineering, design, operations research, mathematical analysis, computer programming, data collection, testing or psychological research, where the work is commensurate with needs, and directly in support, of work described in (a), (b), or (c) that is undertaken in the Province.

In addition to the elements included in the above definition, eligible R&D expenditures may extend beyond science and technology to include research in such areas as fiscal regimes, business models and socio-economic and environmental matters.

3.4 *Education and Training*

For the purposes of these guidelines the definition of education and training in the Province, as contemplated in Section 45 of the Legislation, shall include expenditures for any or all of the following:

- Support for the establishment and/or maintenance of education and training infrastructure;
- Support for technology transfer or including the advancement of trades training;
- Support for Chairs and Fellowships
- Scholarships and work terms including provincial residents who may study or work outside the Province

Expenditure associated with wages and salaries of employees engaged in specific job training and regulatory training requirements are not considered to be an eligible category of expenditure.

4.0 *Administrative Criteria and Expenditure Management*

4.1 *Administrative Criteria*

The operator shall file an R&D and E&T Expenditure Application Form (see attached form) for each R&D and E&T activity it plans to undertake. The form shall be submitted to and reviewed by the Board for approval, prior to commencement of the activity. The Board will undertake to review an Application within five working days from receipt. The operator will be notified in writing of the results of this review.

1. A separate abstract of the activity, where applicable, shall be submitted with the Application Form.
2. A copy of the research report, where applicable, shall be submitted to the Board upon completion.
3. Written verification that an approved activity has been completed.

An Operator is required to submit a report in the 1st quarter of each calendar year describing its R&D expenditures in the previous year and its R&D expenditure plans for the current year. The Board will review this report in respect of the operator's plan for the period.

4.2 *Expenditure Management*

A successful R&D program should not fluctuate widely. Therefore, for any POA period in which there are not sufficient projects to absorb the required level of expenditure, the balance may be placed in a R&D fund. The fund will be managed by the Board in conjunction with the operator consistent with these guidelines. In a POA period where an operator overspends its R&D requirement, the excess may be applied against its requirement in the subsequent POA period.



R&D Work Expenditure Application Form

Project: _____

Phase: Exploration Development Production

Activity:

Research and Development Education and Training

Amount Expensed \$ _____

Source of Funding Operator Contractor Subcontractor

Location of Activity _____

Receiving Institution _____

Begin Date _____ End Date _____

Classification of R&D

Engineering	<input type="checkbox"/>	Testing or Psychological Research	<input type="checkbox"/>
Design	<input type="checkbox"/>	Fiscal Research	<input type="checkbox"/>
Operation Research	<input type="checkbox"/>	Business Models	<input type="checkbox"/>
Mathematical Analysis	<input type="checkbox"/>	Environmental Research	<input type="checkbox"/>
Computer Programming	<input type="checkbox"/>	Socio-Economic Research	<input type="checkbox"/>

Other _____

Description of R&D Activity:

Classification of E&T

Support of E&T Infrastructure	<input type="checkbox"/>	Scholarships	<input type="checkbox"/>
Technology Transfer in Trades	<input type="checkbox"/>	Work Terms for Students	<input type="checkbox"/>
Chairs and Fellowships	<input type="checkbox"/>		<input type="checkbox"/>

Other _____

Description of E&T Activity:

Signature: _____ Date: _____

<i>For C-NOPB Use Only</i>	<i>CNOPB File No.</i>
_____	<input type="checkbox"/>
Approved: Yes <input type="checkbox"/>	No