



Report on the Potential Impact of Diving Roles on the Classification of Positions Classified under A Number of Classification Standards (RES, REM, BI, ENG, EG-ESS, GT and AS)

Prepared by

Philémon Paquette, Ph.D.  
Paquette Consulting  
103 Westpark Drive  
Ottawa, ON K1B 3G4

For

The Departmental Diving Safety Officer  
Department of Fisheries and Oceans  
Winnipeg, Manitoba

Under Contract F2408-090023

12 August 2009

**Table of Contents**

	<b>Page</b>
Executive Summary .....	3
Purpose .....	5
The Issue .....	5
Classification Perspective .....	6
An Overview of the Detailed Analysis .....	7
Conclusion .....	8
Analytical Table .....	9
Scientific Research – Research Scientists (RES) and Research Management (REM) .....	9
Biological Sciences (BI) .....	10
Engineering (ENG) .....	20
Engineering and Scientific Support (EG-ESS) .....	20
General Technical (GT) .....	27
Administrative Services (AS) .....	34

## Executive Summary

This report was commissioned to provide individuals who have roles as divers, are managers of individuals who have roles as divers, or human resources advisors and others involved in the rating of work descriptions written under a variety of classification standards for positions responsible for diving roles with a tool which can assist them in providing appropriate recognition for the skills, effort, responsibilities, and working conditions associated with those diving roles.

The reason such a tool is required is that there are many employees of DFO who carry out one of the five diving roles defined in the Departmental Diving Safety Procedures normally in addition to other duties they might have, e.g. the research scientist who also dives as part of the duties of the position. Under the Canadian Human Rights Act all the responsibilities, skills, effort, and working conditions required of work is to be measured. This requirement is echoed by the Treasury Board Secretariat's 2004 "*Guidelines on work description writing*". An earlier version of this report written in 2000 with respect to the application of the Universal Classification Standard (UCS) demonstrated that the impact of these roles when properly evaluated could add a full level to the classification of a position carrying out diving roles under the UCS.

In looking at six classification standards and seeing how the skills, effort, responsibilities, and working conditions associated with five of the eight potential diving roles<sup>1</sup>, ratings for these roles can be obtained, as is shown in the table below.

Occupational Group/Classification Standard	Diver	Diver In Charge	Area Diving Officer	Regional Diving Officer	Departmental Diving Officer
Scientific Research (RES)	No impact – incumbent based level description				
Biological Sciences (BI)	2	2	3	3	4
Engineering (ENG)	No impact – Level Description				
Engineering and Scientific Support (EG-ESS)	4	4	5	5	6
General Technical (GT)	3	3	5	5	6
Administrative Services (AS)	2	2	4	5	7

These ratings are obtained by treating the diving role being considered as the primary role of the position. In most cases, divers, divers-in-charge, and Area Diving Safety Officers do not have these roles as their primary roles; their diving roles are secondary to the primary roles as biologists, research scientists, scientific support technicians, technologists or administrators. In the case of the

<sup>1</sup> The study does not carry out an assessment of three of the diving roles defined in the Departmental Diving Safety Procedures. These are the roles of Diving Tender, Standby Diver, and Dive Boat Operator. They are not included on the grounds that the first two are variants of the diver which is included, and on the grounds that the dive boat operator, is a boat operator that has but to understand what a boat operator must do in support of a dive.

National Diving Safety Officer, that role is the primary role of the position, and in the case of one or more Regional Diving Safety Officers, the diving role is the primary role.

The study concludes that the potential for adding to the rating of a position evaluated under the current classification standards is not as clear or uniform as it was under the UCS. However, it remains important for employees that are required to carry out one of the diving roles that the skills, effort, responsibilities, and working conditions associated with the diving role be incorporated into the work description, and taken into account in evaluation

It also reminds the reader that where a diving role is not a requirement of a position, such as the case where a biologist is a qualified diver, but diving is not a required activity of the position that person occupies, then the diving skills are an asset qualification of the individual, not a key activity of the position. In a case like this, the skills, effort, responsibility, or working conditions of a diver should not be incorporated into the work description, and should not be evaluated a part of the classification evaluation of the position.

Thus managers should ensure that the requirements associated with diving roles assigned to positions are fully reflected in those work descriptions as it could contribute to the rating of the position. Further in all cases where the diving role is a requirement of the position it provides a basis for adding the relevant diving role qualifications as mandatory merit criteria in writing the statement of merit criteria for staffing purposes.

This can be accomplished either by incorporating requirements associated with a diving role directly into a unique work description, or through creating a diving variant to a National Model Work Description.

The report provides detailed comments and suggestions on how the five diving roles can impact on the rating of work under the six most common occupational groups involved in the diving program of the Department of Fisheries and Oceans.

Philémon Paquette, Ph.D.  
Paquette Consulting  
12 August 2009

**Purpose:**

The purpose of this report is to provide individuals who have roles as divers, are managers of individuals who have roles as divers, or human resources advisors and others involved in the rating of work descriptions for positions responsible for diving roles with a tool which can assist them in providing appropriate recognition for the responsibilities, skills, effort, and working conditions associated with those diving roles under the most commonly used current classification standards for positions occupied in the diving program of DFO.

**The Issue:**

There are many employees of DFO who carry out one of the diving roles described below usually in addition to other duties they might have. Under the Under the Canadian Human Rights Act all the responsibilities, skills, effort, and working conditions required of work is to be measured. This requirement is echoed by the Treasury Board Secretariat's 2004 "*Guidelines on work description writing*". In writing work descriptions, or in evaluating work descriptions of positions which require carrying out one or more of the diving roles, there are aspects of diving which can contribute to the rating of the work description, and hence to the rating of the position.

In the diving function of the Department of Fisheries and Oceans, there are eight "diving" roles apart from non-diving management roles responsible for the function:<sup>2</sup>

1. Departmental Diving Safety Officer
2. Regional Diving Safety Officer
3. Area Diving Safety Officer
4. Diver-In-Charge
5. Diver
6. Dive Tender
7. Standby Diver, and
8. Diving Boat Operator

Each of these "diving" roles have specific requirements for skills, effort, responsibility, and working conditions which inform the assigned work the role is charged with carrying out. The impact of a position being responsible for any of the diving roles is determined by two major factors. The first is that with the exception of the Departmental Diving Safety Officer, and possibly a regional diving safety officer, the "diving" role of a position is not the primary purpose of that position, but a secondary purpose of that position.

---

<sup>2</sup> For a full description of all roles and responsibilities for the Departmental diving function, i.e., for department diving operations, see Chapter 3 of the Departmental Diving Safety Procedures (April 29, 2002) p. 6 ff.

## The Classification Perspective

The importance of this statement is that from a classification perspective it is the primary purpose of a position which will determine its allocation to an occupational group, and will determine to a large extent the level of the position within that occupational group. However, requirements relating to a secondary role of a position can influence the ultimate level of that position within an occupational group owing to additional skills, effort, responsibility, or working conditions required by the secondary role which in fact may be greater than the skills, effort, responsibility, or working conditions required by the primary role.

The “diving” role of a position will most likely influence the level of a position if the “diving” role is a required component of a position. That is if a position is a marine biologist/diver, or a fisheries research technician/diver, then the “secondary” role is an integral component of the particular position and the skills, effort, responsibilities and working conditions of the “diving” role must be taken into account in the evaluation of the position, and could influence the ultimate rating of the position.

If on the other hand a position of biologist, or of fisheries research technician does not “require” diving as an integral component of the job, then the skills, effort, responsibilities, and working condition associated with the diving roles as such should not be considered in evaluating the position.

The impact of the “diving” role on the rating of a position then depends on whether the “diving” role is integral to the work of the position, and it also depends on the classification standard that applies.

The extent to which the secondary role will influence the level of a position will vary based on the classification standard used to classify the primary role of a position. The reason for this variance is that different occupational groups have different requirements for skills, effort, responsibility and working conditions and the requirements related to the primary role can simply be far greater than the requirements of the secondary “diving” role relegating the impact of the “diving” role to an insubstantial or cosmetic difference. At the same time in other cases the requirements of the secondary role could be sufficiently strong to determine a higher level classification is warranted.

A table follows which details how each of the requirements for skill/knowledge, effort, responsibility, and working conditions, the common measures on which all work must be evaluated according to the Canadian Human Rights Act, and consequently according to the Treasury Board Secretariat 2004 “**Guidelines on work description writing**”. The table however, uses the language of the classification standard for each of the groups considered which is interpreted as, or mapped onto, the CHRA factors of skills, effort, responsibility, and working conditions.

The occupational groups considered in this report are:

1. Scientific Research (RES and REM)
2. Biological Sciences (BI)
3. Engineering (ENG)
4. Engineering and Scientific Support (EG-ESS)

- 5. General Technical (GT) and
- 6. Administrative Services (AS).

The reason for including the ENG is that engineers are used in both the Pacific Region and the Quebec Region, and consequently there is a possibility of one of these being required to take on one of the diving roles. The AS is included because while “diving” is a technical activity, “diving safety” is an administrative activity, and since there are a number of positions classified as AS involved in diving operations, and even more in other departmental safety programs it seemed appropriate to include the AS Group in this study.

**An Overview Of The Detailed Analysis:**

The bulk of this report is the table developed, with the analysis by occupational group of how each of the diving roles could or would be evaluated if that diving role were the primary role of a position. It should be borne in mind that this is a fictional proposition to the extent that for instance a biologist is classified as such based on the principal that the primary purpose of that position is the application of a comprehensive knowledge of biology to some range of activities. Consequently one could not have a diving role as a primary purpose of a biologist position. However, if a BI position were evaluated say as a BI-01, and the position was that of a biologist/diver, then the diving role could in fact change some of the ratings of the BI-01, and could increase its level to a BI-02.

The table below will illustrate the potential ratings of each of the diving roles under each of the standards considered in this study.

<b>Occupational Group/Classification Standard</b>	<b>Diver</b>	<b>Diver In Charge</b>	<b>Area Diving Officer</b>	<b>Regional Diving Officer</b>	<b>Departmental Diving Officer</b>
Scientific Research(RES)	No impact – incumbent based level description				
Biological Sciences (BI)	2	2	3	3	4
Engineering (ENG)	No impact – Level Description				
Engineering and Scientific Support (EG-ESS)	4	4	5	5	6
General Technical (GT)	3	3	5	5	6
Administrative Services (AS)	2	2	4	5	7

Diving, or the diving function is both technical and scientific in nature. Diving safety is administrative in nature, while granting that it is the administration of technical procedures and processes to ensure the safe conduct of a technical activity. When these two activities, which alone do not constitute occupational groups, are assessed under classification standards that are designed for specific occupational groups, one must emphasize either the scientific or technical aspects of the work, or the administrative policy

and procedures aspects of the work. When one does emphasize these different aspects, one can classify these roles under these standards.

**Conclusion:**

Only the Departmental Diving Safety Officer and possibly the Regional Diving Safety Officer positions are full time positions. All others are components of, or secondary roles, of other RES, BI, EG-ESS, or GT positions. If the respective diving roles of other positions are integral parts of those positions, then the skills, effort, responsibilities and working conditions that the diving role brings to a position must be taken into account in evaluating that position. Whether the diving role will change the rating of a position being classified depends on the classification standard that applies and the merits of the primary role of the position versus that of the diving role, and which best reflects the requirements of the position.



## ANALYTICAL TABLE

This table will define the potential impact under the Scientific Research (RES and REM), Biological Sciences (BI), Engineering (ENG), Engineering and Scientific Support (EG-ESS), General Technical (GT) and Administrative Services (AS) Classification Standards. The reason for choosing these specific classification standards is that incumbents with diving roles occupy positions classified to each of these occupational groups except for the AS, and the AS is included on the grounds that it could be used for an appropriate position given the secondary role the “diving” role is for most Public Service positions..

### **Scientific Research – Research Scientists (RES) and Research Management (REM)**

In the case of the Research Scientist or the Research Manager, the approach to classifying these positions renders the secondary “diving” role as irrelevant to the classification of the position. The reason for this is the definition of the approach itself as quoted from page 6 of the Scientific Research Classification Standard:

*Method of Classifying Positions and Incumbents*

*When an authorized person-year is to be utilized for employing a research scientist, a position is to be described by management in summary form, augmented by a normal statement of qualifications.*

*The allocation of the position to this sub-group is determined by the classification authority, but the classification level is not formally assigned at this stage.*

*The candidate is appointed by a staffing action to a classification level designated in relation to the individual qualifications of the candidate. The classification level of the position is then formally assigned, and the classification action is complete.*

*When a scientist is promoted to the next higher classification level while still remaining in the same position, the position classification level will be adjusted to correspond to ensure classification coincidence between the incumbent and the position.*

*When a position classified in this sub-group is vacated, management must reconsider the classification and future utilization of the authorized person-year before the position is filled. When a new person is appointed to the position, the classification level is to be re-evaluated based on the preceding process.*

When one considers the factors used for determining if a position/individual should be promoted, described as follows (also from page 6 of the Standard):

*Promotion is based on both the continuing and cumulative productivity and achievement of the individual. To facilitate application of the classification plan, productivity and achievement are assessed through the PRODUCTIVITY criterion as well as the supplementary criteria CREATIVITY, RECOGNITION, LEADERSHIP, and SCOPE OF DECISION-MAKING, to confirm evidence of the required productivity.*

It can be seen that the technical knowledge and skills, effort, responsibility, and working conditions of a diving role that might be part of the responsibilities of an RES or REM are such that this secondary “diving” role will already be taken into account as part of the job, or are such a small part of the job as to be inconsequential. In seeking a new incumbent for a position, if the nature of the work required of the position includes the requirement to be a diver, it would simply be included in the definition of the qualities of candidates, not as a primary requirement, but possibly as an asset requirement that will permit the candidate or the incumbent, but not a defining characteristic.

## **Biological Sciences (BI)**

The Biological Sciences (BI) positions are classified based on the “predominant degree” that best represents the primary purpose of the work of a position. The BI has a five level structure, i.e. BI-01 through BI-05, and a five factor standard for job evaluation and each of those factors has a number of elements. What is meant by “predominant degree” is that a position must be evaluated against each of the five factors to determine what level ( level 1 to level 5) best represents the work of the subject position; once all five factors have been assessed, the “predominant degree” (or statistically, the mode of the five ratings), is deemed to be the level of the position. The five factors that must be assessed are 1) Kinds of Assignment, 2) Complexity of Work, 3) professional responsibility, 4) management responsibility, and 5) Impact of Recommendations and Activities.

Thus in a predominant degree evaluation system, three out of five factors will determine the level. In the four examples below the first shows a benchmark with four of the five levels at degree 1, so it is a BI-01. The second example shows a position with three out of five factors earning a degree 3 with the other two earning degree 2, so it is a BI-03. The third case shows a position which earns a degree 3 for all factors except management responsibility for which earns a basic degree 1, but it is also a BI-03 – management alone not being strong will not negate the higher rating.

The last case is one which would probably not occur for a job as a whole, but could occur for a factor and that is where there is no “predominant” factor or characteristic. In this last case there is one of each, so what is the rating? Since all factors or characteristics are equal, the midpoint (or mean rating) may be the most representational rating to use. The issue does come up with the Professional Responsibility factor given its six characteristics which can lead to a tie for predominant factor, and it can come up with Impact of Recommendations and Activities where one can encounter a 1, 2, and 3 for the three characteristics -- and no predominant degree. Where it is a tie one has to choose which of the two possible degrees best represent the position.

<b>Factor</b>	<b>Case 1</b>	<b>Case 2</b>	<b>Case 3</b>	<b>Case 4</b>
1) Kinds of Assignment	1	3	3	1
2) Complexity of Work	2	3	3	2
3) professional responsibility	1	2	3	3

4) management responsibility	1	2	1	4
5) Impact of Recommendations and Activities	1	3	3	5
<b>Predominant Degree</b>	1	3	3	3

In practice of course a factor is determined by the rating of the predominant degree of the elements that make up that factor. When all of the elements are listed, there are twenty-eight (28) of them. Rather than provide another benchmark or hypothetical example, a series of tables, one per factor will follow showing how each of the diving roles should be measured under each of the elements.

The following tables will demonstrate how the requirements for each of the five (5) principal diving roles, i.e. the Departmental Diving Safety Officer, the Regional Diving Safety Officer, Area Diving Safety Officer, Diver-In-Charge, and Diver. The Standby Diver is a special case of the Diver as is the case of the Dive Tender, and the Boat Operator is a qualified boat operator knowledgeable about the Departmental Diving Safety Procedures, specifically as it relates to the responsibilities of a boat operator.

**Nota Bene:** It must be remembered that a BI position will be evaluated on its primary purpose first; evaluation as a BI required to carry out a diving role is in addition, i.e. is a secondary role. Where this is important is where the diving role carries a higher rating than the primary role might earn. Consistent with best practices in job evaluation if two ratings apply to the same element for the same job, the higher rating will be applied if it better reflects the relative value of the position.

### Definitions:

In order to assist in mapping diving roles and responsibilities onto the BI Classification Standard a number of definitions need to be established to assist the writer, reader, and evaluator.

Dive = work, a “project”, a “study”, or an “investigation” as evaluated under the BI Classification Standard

Diving = a specialized subject area, would constitute a second area of specialization of a biologist

Diving program = a significant program activity

### **Factor 1: Kinds of Assignment- Assessment**

Characteristic	Diver		Diver In Charge		Area Diving Officer		Regional Diving Officer		Departmental Diving Officer	
A. Objectives established by others for the conduct of the work	2	Objectives of the work are clearly defined.	2	Objectives of the work are clearly defined	4	Objectives of the work are stated in terms of operational goals.	4	Objectives of the work are stated in terms of operational goals.	4	Objectives of the work are stated in terms of operational goals.
B Extent of work	2	Work normally consists of a number of discrete	2	.Work normally consists of a number of discrete	3	Work involves comprehensive investigations, projects or studies	3	Work involves comprehensive investigations, projects or studies	4	Work involves the application of a number of scientific principles and

		projects, studies or investigations.		projects, studies or investigations.		within a specialized subject area.		within a specialized subject area.		theories to complex investigations or studies, within a specialized subject area that constitutes a significant program activity.
C. Variety of Activities	1	Activities closely resemble one another in most aspects and consist of a limited number of straight-forward tasks performed successively.	3	supervising the work of staff engaged in the conduct of analyses or investigations; and providing advice.	3	providing functional direction; coordinating the work with other activities; supervising the work of staff engaged in the conduct of analyses or investigations; and providing advice	3	providing functional direction; coordinating the work with other activities; supervising the work of staff engaged in the conduct of analyses or investigations; and providing advice	3	providing functional direction; coordinating the work with other activities; supervising the work of staff engaged in the conduct of analyses or investigations; and providing advice
D. Scope for planning and conducting work	2	Planning activities, determining approaches and selecting methods to ensure that the work meets clearly defined objectives.	2	.Planning activities, determining approaches and selecting methods to ensure that the work of the dive meets clearly defined objectives.	3	Planning and assigning tasks for the ongoing work of a number of project or study teams in the area to ensure that the objectives are met within established guidelines	3	Planning and assigning tasks for the ongoing work of a number of project or study teams in the region to ensure that the objectives are met within established guidelines	5	Planning, coordinating and implementing a significant program activity or major scientific studies.
Predominant Degree	2		2		3		3		4	

**Factor 2: Complexity of Work**

Characteristic	Diver		Diver In Charge		Area Diving Officer		Regional Diving Officer		Departmental Diving Officer	
A: The availability of, and the problems involved in obtaining information and data	2	The work requires obtaining information and data by direct observation, collection or selection from	2	The work requires obtaining information and data by direct observation, collection or selection from	2	The work requires obtaining information and data by direct observation, collection or selection from established	2	The work requires obtaining information and data by direct observation, collection or selection from established	2	The work requires obtaining information and data by direct observation, collection or selection from established recognized sources.

		established recognized sources.		established recognized sources.		recognized sources.		recognized sources.		
B. The Validity of information and data	1	Information and data of known validity are obtained from recognized reliable sources or by standardized procedures.	1	Information and data of known validity are obtained from recognized reliable sources or by standardized procedures.	1	Information and data of known validity are obtained from recognized reliable sources or by standardized procedures.	1	Information and data of known validity are obtained from recognized reliable sources or by standardized procedures.	1	Information and data of known validity are obtained from recognized reliable sources or by standardized procedures.
C. The number and variability of the variables and the ambiguity of information and data	2	Information and data are characterized by several variables requiring interpretation, but of known implications and variability.	2	Information and data are characterized by several variables requiring interpretation, but of known implications and variability.	2	Information and data are characterized by several variables requiring interpretation, but of known implications and variability.	2	Information and data are characterized by several variables requiring interpretation, but of known implications and variability.	2	Information and data are characterized by several variables requiring interpretation, but of known implications and variability.
D. The relationships of the variables	1	Relationships between the variables are simple and known.	1	Relationships between the variables are simple and known.	1	Relationships between the variables are simple and known.	1	Relationships between the variables are simple and known.	1	Relationships between the variables are simple and known.
E. The effect of the activities others on the work	2	Work is normally affected by the activities of others within the organizational unit and occasionally by the activities of others outside the organizational unit.	2	Work is normally affected by the activities of others within the organizational unit and occasionally by the activities of others outside the organizational unit.	2	Work is normally affected by the activities of others within the organizational unit and occasionally by the activities of others outside the organizational unit.	2	Work is normally affected by the activities of others within the organizational unit and occasionally by the activities of others outside the organizational unit.	2	Work is normally affected by the activities of others within the organizational unit and occasionally by the activities of others outside the organizational unit.
F. The nature and purpose of contacts with others	2	Contacts are with others working in the same or closely related subject areas for obtaining and exchanging information and discussing problems. <i>May</i> provide information and facts to the	2	Contacts are with others working in the same or closely related subject areas for obtaining and exchanging information and discussing problems. <i>May</i> provide	2	Contacts are with others working in the same or closely related subject areas for obtaining and exchanging information and discussing problems. <i>May</i> provide information and facts to the public and the media.	2	Contacts are with others working in the same or closely related subject areas for obtaining and exchanging information and discussing problems. <i>May</i> provide information and facts to the public and the	5	Contacts are with scientists and officials outside the organizational unit for arranging co-operative projects, negotiating terms of agreements, establishing standards, implementing regulations, and for providing advice based

		public and the media.		information and facts to the public and the media.			media.		on recognized expertise. May provide scientific and technical information to the public and the media on contentious issues.	
G. The requirement for the development of concepts and approaches, procedures, techniques and practices, their adaptation and application.	2	The work requires adapting practices, techniques, and procedures.	2	The work requires adapting practices, techniques, and procedures.	3	The work requires developing new techniques and procedures using known approaches and existing precedents.	3	The work requires developing new techniques and procedures using known approaches and existing precedents.	5	The work requires approving or recommending new procedures and developing new concepts and approaches. Work is characterized by the absence of precedents.
H. The theoretical and practical knowledge which must be applied	2	The work requires the application of a sound knowledge of the principles, theories and practices of a discipline and some familiarity with the practices in related disciplines.	3	The work requires the application of a thorough knowledge of the principles, theories and practices of a subject area and its pertinent disciplines, and familiarity with the practices in related disciplines, subject areas or supervisory practices.	4	The work requires the application of a thorough knowledge of the principles, theories and practices of a specialized subject area, and a knowledge of related scientific disciplines, subject areas or of management practices.	4	The work requires the application of a thorough knowledge of the principles, theories and practices of a specialized subject area, and a knowledge of related scientific disciplines, subject areas or of management practices.	4	The work requires the application of a thorough knowledge of the principles, theories and practices of a specialized subject area, and a knowledge of related scientific disciplines, subject areas or of management practices.
Predominant Degree	2		2		2		2		3	(best fit)

### Factor 3: Professional Responsibility

Characteristic	Diver		Diver In Charge		Area Diving Officer		Regional Diving Officer		Departmental Diving Officer	
A. The extent to which work is checked by others	1	Work is reviewed for consistency and accuracy while in	3	Work approaches, recommendations and conclusions	3	Work approaches, recommendations and conclusions are	4	Key recommendations and conclusions are reviewed for	4	Key recommendations and conclusions are reviewed for

		progress and on completion.		are reviewed for soundness of judgment in terms of the attainment of study or project objectives.		reviewed for soundness of judgment in terms of the attainment of study or project objectives.		effectiveness. Results are periodically reviewed in terms of the attainment of objectives.		effectiveness. Results are periodically reviewed in terms of the attainment of objectives.
B. The professional guidance received	2	Professional guidance is received on new aspects of the work.	3	Professional guidance is received on the resolution of difficult problems.	3	Professional guidance is received on the resolution of difficult problems.	3	Professional guidance is received on the resolution of difficult problems.	5	Guidance is received on policy intent and program implications. Professional guidance may be received from other scientific authorities.
C. The requirement to exercise initiative and judgment in defining objectives and dealing with problems and establishing scientific guidelines	1	Work requires indicating problems and selecting methods, techniques according to established procedure manuals, guidelines or precedents	2	Work requires identifying problems and determining approaches and suitable methods for their resolution.	2	Work requires identifying problems and determining approaches and suitable methods for their resolution.	2	Work requires identifying problems and determining approaches and suitable methods for their resolution.	2	Work requires identifying problems and determining approaches and suitable methods for their resolution.
D. The requirement to exercise judgment in reviewing and assessing the work of others	3	Work of subordinate staff or project team members is reviewed for completeness and compliance with standards and guidelines. Within own subject area, results and findings of other scientists are reviewed for validity or for applicability to own subject area.	3	Work of subordinate staff or project team members is reviewed for completeness and compliance with standards and guidelines. Within own subject area, results and findings of other scientists are reviewed for validity or for applicability to own subject area.	3	Work of subordinate staff or project team members is reviewed for completeness and compliance with standards and guidelines. Within own subject area, results and findings of other scientists are reviewed for validity or for applicability to own subject area.	3	Work of subordinate staff or project team members is reviewed for completeness and compliance with standards and guidelines. Within own subject area, results and findings of other scientists are reviewed for validity or for applicability to own subject area.	3	Work of subordinate staff or project team members is reviewed for completeness and compliance with standards and guidelines. Within own subject area, results and findings of other scientists are reviewed for validity or for applicability to own subject area.
E. The requirement to exercise judgement in interpreting the results of work	1	Own observations are reviewed to ensure reliability and consistency.	2	Scientific observations and results are interpreted to produce	2	Scientific observations and results are interpreted to produce meaningful information, conclusions,	2	Scientific observations and results are interpreted to produce meaningful information,	2	Scientific observations and results are interpreted to produce meaningful information, conclusions,

				meaningful information, conclusions, recommendations or reports		recommendations or reports		conclusions, recommendations or reports		recommendations or reports
F. The requirement to exercise judgment in giving advice.	2	Advice is provided to colleagues and support staff on matters closely related to own area of work.	3	Specific technical advice within own subject area is provided to other scientists and officials and immediate superior. Guidance on scientific matters is provided to subordinate staff or to other scientists contributing to the work.	3	Specific technical advice within own subject area is provided to other scientists and officials and immediate superior. Guidance on scientific matters is provided to subordinate staff or to other scientists contributing to the work.	3	Specific technical advice within own subject area is provided to other scientists and officials and immediate superior. Guidance on scientific matters is provided to subordinate staff or to other scientists contributing to the work.	4	Advice based on a recognized expertise within a specialized subject area, is given to other scientists and officials.
Predominant Degree	1		3		3		3		4	Best fit

**Factor 4: Management Responsibility**

Characteristic	Diver		Diver In Charge		Area Diving Officer		Regional Diving Officer		Departmental Diving Officer	
A. Responsibility for control of staff	1	The work occasionally requires assigning work to non-subordinate support staff.	3	The work requires the supervision of a unit normally including professional staff.	4	The work requires the operational management of professional staff including specialists or subordinate supervisors.	4	The work requires the operational management of professional staff including specialists or subordinate supervisors.	4	The work requires the operational management of professional staff including specialists or subordinate supervisors.
B. Responsibility for control of physical resources	2	Ensuring proper use of allocated equipment, supplies and facilities –for diving team	2	Ensuring proper use of allocated equipment, supplies and facilities –for diving team	3	Controlling the use and the maintenance of allocated equipment, supplies and facilities, - specifically: responsible to ensure that area diving equipment is inventoried, inspected, tested, maintained, and calibrated as required by the federal diving regulation, and for the	3	Controlling the use and the maintenance of allocated equipment, supplies and facilities, - specifically: responsible to ensure that area diving equipment is inventoried, inspected, tested, maintained, and calibrated as required by the federal diving	-	There is no specific departmental level responsibility



					service, and repair of aluminum boats, motors, and underwater camera systems for use by qualified departmental employees (FTE, contractors, or casuals) and employees of partner departments. there are a number of specialized units that are specially designed, and would be difficult and very expensive to replace.		regulation, and for the service, and repair of aluminum boats, motors, and underwater camera systems for use by qualified departmental employees (FTE, contractors, or casuals) and employees of partner departments. there are a number of specialized units that are specially designed, and would be difficult and very expensive to replace.			
C. Responsibility for committing departmental resources	2	Identifying the - requirement for equipment, material and services for assigned work.	2	Identifying the - requirement for equipment, material and services for assigned work.	4	Assessing requirements and developing and recommending plans for the acquisition and use of resources, and the expenditure of funds to meet work priorities and Objectives – specifically: develops and recommends budgets and forecasts for training, equipment requirements, and travel, to support development and control of the budget of the area	4	Assessing requirements and developing and recommending plans for the acquisition and use of resources, and the expenditure of funds to meet work priorities and Objectives. Specifically: - develops and recommends budgets and forecasts for training, equipment requirements, and travel, and prepares detailed cost benefit/risk management analyses to support the development and control of the budget of the Regional Diving Office. - negotiates collaborative initiatives with external partners (HC, RCMP, DOE) and negotiates and manages joint funding	-	There is no specific departmental level responsibility

							and cost recovery to accomplish joint operations. Manages procurement of goods and services for the regional diving office.			
D. Responsibility for Obtaining outside assistance	2	Recommending on the need for assistance.	3	Substantiating the need for, defining specific requirements, and identifying suitable sources of assistance; and, arranging for readily available assistance.	3	Substantiating the need for, defining specific requirements, and identifying suitable sources of assistance; and, arranging for readily available assistance.	3	Substantiating the need for, defining specific requirements, and identifying suitable sources of assistance; and, arranging for readily available assistance.	-	There is no specific departmental level responsibility
E. Responsibility for the administrative control of work	2	Ensuring that quality, quantity, safety and other standards for own responsibility are maintained.	3	Implementing quality assurance, performance measurement and safety procedures to meet unit's objectives.	4	Controlling and coordinating project schedules and establishing and implementing performance and safety standards and controls to meet priorities and objectives	4	Controlling and coordinating project schedules and establishing and implementing performance and safety standards and controls to meet priorities and objectives	5	Preparing budgets and workplans, <b>planning and implementing safety, quality</b> and cost controls, and recommending objectives and priorities for a significant program activity.
F. Responsibility for the coordination of work performed, or in conjunction with other organizational units	3	Coordinating related activities with those of others.	3	Coordinating related activities with those of others.	3	Coordinating related activities with those of others.	3	Coordinating related activities with those of others.	3	Coordinating related activities with those of others.
G. Responsibility for implementing or developing administrative procedures, safety and management directives and guidelines	2	Implementing office or field administrative Procedures – specifically diving safety procedures.	3	Interpreting and implementing guidelines and directives – specifically diving safety procedures for a dive team	3	Interpreting and implementing guidelines and directives – specifically diving safety procedures for an area and all of its dive teams	3	Interpreting and implementing guidelines and directives – specifically diving safety procedures for an region, its areas and dive teams	4	Recommending and developing internal administrative, safety and management directives and guidelines – specifically departmental diving safety policy, due diligence guidelines and procedures.
Predominant Degree	2		3		3		3		4	

### Factor 5: Impact of Recommendations and Activities

Characteristic	Diver		Diver In Charge		Area Diving Officer		Regional Diving Officer		Departmental Diving Officer	
A. Impact – Governmental: Impact of recommendations and activities on departmental work or other government programs in terms of changes to on-going activities, programs, or policies	2	As a participant on a diving team, the information and results of the work (i.e. diving, leading a diving team), affect the continued operation of diving teams for the conduct of research, and the use of diving as such in relation to the conduct of biological work.	2	Information and results of the work (i.e. diving, leading a diving team), affect the continued operation of diving teams for the conduct of research, and the use of diving as such in relation to the conduct of biological work.	2	Information and results of the work (i.e. diving and diving coordination and management and, leading a diving team), affect the continued operation of diving teams for the conduct of research, and the use of diving as such in relation to the conduct of biological work of the Area for which responsible.	2	Information and results of the work (i.e. diving and diving coordination and management), affect the continued operation of diving teams for the conduct of research, and the use of diving as such in relation to the conduct of biological work of the Region for which responsible.	5	Authoritative recommendations, advice or consultations affect the development of departmental policies on diving and diving safety and the departmental diving and diving safety program; decisions and activities affect the diving and diving safety program and or activities of other government organizations.
B. Impact External i) the impact of recommendations and activities on an industrial or commercial process, operation or product in terms of the contributor or regulatory effect	1	Information and results of the work (i.e. diving) have limited effects on an industrial or commercial product, process or operation	1	Information and results of the work (i.e. diving) have limited effects on an industrial or commercial product, process or operation	1	Information and results of the work (i.e. diving) have limited effects on an industrial or commercial product, process or operation	1	Information and results of the work (i.e. diving) have limited effects on an industrial or commercial product, process or operation	1	Information and results of the work (i.e. diving) have limited effects on an industrial or commercial product, process or operation
B. ii) The impact of recommendations and activities in terms of the contribution to or control of the state of natural resources or the environment	1	Information and results of the work (i.e. diving) have limited effects on the state of a natural resource or the environment.	1	Information and results of the work (i.e. diving) have limited effects on the state of a natural resource or the environment.	1	Information and results of the work (i.e. diving) have limited effects on the state of a natural resource or the environment.	1	Information and results of the work (i.e. diving) have limited effects on the state of a natural resource or the environment.	1	Information and results of the work (i.e. diving) have limited effects on the state of a natural resource or the environment.
B. iii) The impact of recommendations and activities in terms of the contribution to public health and the reduction or control of health and safety hazards.	1	Information and results of the work (i.e. diving) have limited effects on public health or safety.	1	Information and results of the work (i.e. diving) have limited effects on public health or safety.	1	Information and results of the work (i.e. diving) have limited effects on public health or safety.	1	Information and results of the work (i.e. diving) have limited effects on public health or safety.	1	Information and results of the work (i.e. diving) have limited effects on public health or safety.
B iv) The impact of recommendations and	1	Information and results of the work	1	Information and results of the work	1	Information and results of the work i.e. diving)	1	Information and results of the work i.e. diving) have	1	Information and results of the work i.e. diving) have

activities in terms of the contributory or regulatory effect on other specifically identified areas directly affected by the position, given its particular purpose or mission.		(i.e. diving) have limited effects on the specifically identified area directly affected by the position.		i.e. diving) have limited effects on the specifically identified area directly affected by the position.		have limited effects on the specifically identified area directly affected by the position.		limited effects on the specifically identified area directly affected by the position.		limited effects on the specifically identified area directly affected by the position.
C. The impact of recommendations and activities in terms of the contribution to the development and understanding of a body of knowledge	2	Information and results of the work contribute to improvements in methods and procedures in own area of work, i.e. diving, diving safety or related.	2	Information and results of the work contribute to improvements in methods and procedures in own area of work, i.e. diving, diving safety or related.	2	Information and results of the work contribute to improvements in methods and procedures in own area of work, i.e. diving, diving safety or related.	2	Information and results of the work contribute to improvements in methods and procedures in own area of work, i.e. diving, diving safety or related.	3	Development of new methods and procedures and the investigation, analysis and interpretation of scientific information provide knowledge and improved understanding in own subject area, i.e. diving, diving safety or related.
Predominant Degree	2		2		2		2		3	

## ENGINEERING AND LAND SURVEY - Sub-Group Engineering (EN-ENG)

In the case of the Engineer (EN-ENG), the method used to classify these positions renders the secondary “diving” role as having no measurable impact on the classification of the position. The reason for this is the definition of the method itself as quoted from page 1 of the Engineering Classification Standard:

### Level Description Method

*The level description method of classification is a non-quantitative method of determining the relative difficulty of jobs. The level descriptions, written in terms of the factor characteristics, are reflective of the demands of jobs found at each level. In progressing from lower to higher levels of work, job demands tend to be cumulative; the descriptions of successive levels of a level description plan usually include some factor characteristics of similar degree, with the significant differences in job demands being indicated by characteristics of a higher degree than those of the preceding level. A position is assigned that level which best corresponds on the whole with its duties and responsibilities*

### Factors

*The combined factors in the classification plan do not describe all aspects of jobs in the sub-group but deal only with those characteristics that can be defined and distinguished and that are useful in determining the relative value of jobs.*

*The Engineering Sub-group level description plan makes use of five factors: Scope for Initiative and Judgement; Responsibility for Recommendations, Decisions and Commitments; Knowledge and Skill; Responsibility for Contacts; and Responsibility for Supervision.*

*A definition and a list of characteristics are included for each factor. **These characteristics, describing the lowest demand or requirement and the highest, are not exclusive, but indicate features of the work that are to be considered when evaluating a position (highlighting by the author).***

The level method is a method of job evaluation that is based on identifying a correspondence between a work description and the most appropriate benchmark level. There are five factors that are used to assess a position. Two points are important in this assessment for the question of identifying the impact of an ENG position being responsible for one or more of the diving roles.

The first is that the work description need not be a perfect match to one of the benchmark positions, just that in comparison with the benchmark positions, on the whole, the position is closer to one level benchmark description than to any other.

The second point is that highlighted in the final paragraph quoted above, that is, that **These characteristics . . . are not exclusive, but indicate features of the work that are to be considered when evaluating a position.** Thus even if the “Scope for Initiative and Judgement; Responsibility for Recommendations, Decisions and Commitments; Knowledge and Skill; Responsibility for Contacts; and Responsibility for Supervision” that relate to the various diving roles are added to an ENG work description, they will not have an impact on the rating, since they are not features which must be considered in the classification of the position.

## **ENGINEERING AND SCIENTIFIC SUPPORT (EG-ESS)**

The Engineering and Scientific Support Group (EG-ESS) lends itself to permitting the work required by a position required to carry out one of the “diving” roles to influence the classification of the position. The reason for this is that as defined on page 1 of the EG-ESS Classification Standard this standard uses a point rating system:

*The classification standard for the Engineering and Scientific Support Group is a point-rating plan. . . Point rating is an analytical, quantitative method of determining the relative values of jobs. Point-rating plans define characteristics or factors common to the jobs being evaluated, define degrees of each factor and allocate point values to each degree. The total value determined for each job is the sum of the point values assigned by the raters . . . The point-rating method facilitates rational discussion and resolution of differences in determining the relative values of jobs.*

### Factors

*The combined factors may not describe all aspects of jobs. They deal only with those characteristics that can be defined and distinguished and that are useful in determining the relative worth of jobs. five factors are used in this plan.*

Factor Weighting and Point Distribution

The weighting of each factor reflects its relative importance. Similarly, points are distributed to the factors or elements in an arithmetic progression.

Rating Scales

In the rating plan the following factors, factor weights and point values are used.

Factors	Factor Weights	Point Values	
		Minimum	Maximum
(1) Knowledge	35%	35	350
(2) Technical Responsibility	33%	30	330
(3) Responsibility for Contacts	8%	8	80
(4) Conditions of Work	12%	10	30
Concentration	3%	10	30
Physical Effort	3%	6	30
Environment	3%	6	30
Hazards	3%		
(5) Supervision	12%	5	120

**Nota Bene:** It must be remembered that an EG-ESS position will be evaluated on its primary purpose first; evaluation as a BI required to carry out a diving role is in addition, i.e. is a secondary role. Where this is important is where the diving role carries a higher rating than the primary role might earn. Consistent with best practices in job evaluation if two ratings apply to the same element for the same job, the higher rating will be applied if it better reflects the relative value of the position.

Given the above, then what is being rated here is the knowledge, technical responsibility, responsible for contacts, conditions of work, and supervisory responsibilities of a position in the conduct of its diving role. That evaluation may be greater or less than that of the position in its primary role, and at the risk of being repetitive, again the rating that best reflects the relative value of the work under the factor being considered should be that applied.

Factor/sub-	Diver	Diver In Charge	Area Diving Officer	Regional Diving Officer	Departmental Diving
-------------	-------	-----------------	---------------------	-------------------------	---------------------

Factor								Officer		
1. Knowledge	4 = 170 pts	Must know theories, principles and practices of the physiology the human body in an underwater environment and gas laws, and of diving and potential dangers to the individual diver at various depths at a level of understanding to develop proper procedures and practices to ensure the safety of divers; theories, principles and practices of the medical treatment of diving related injury, including treatment protocols to assist other divers; theories, principles and practices of common law as applied in health and safety at a level of understanding to interpret statutes and regulations and operate in compliance with them; theories, principles, practices, and techniques of diving at a level of understanding to carry out diving operations under all underwater conditions and do so at a depth to have competency in (a) occupational (open-circuit) SCUBA diving; (b) surface-supplied diving: (i) air	4 = 170 pts	Must know theories, principles and practices of the physiology the human body in an underwater environment and gas laws, and of diving and potential dangers to the individual diver at various depths at a level of understanding to develop proper procedures and practices to ensure the safety of divers; theories, principles and practices of the medical treatment of diving related injury, including treatment protocols to assist other divers; theories, principles and practices of common law as applied in health and safety at a level of understanding to interpret statutes and regulations and operate in compliance with them; theories, principles, practices, and techniques of	5 = 215 pts	Must know theories, principles and practices of the physiology the human body in an underwater environment and gas laws, and of diving and potential dangers to the individual diver at various depths at a level of understanding to develop proper procedures and practices to ensure the safety of divers; theories, principles and practices of the medical treatment of diving related injury, including treatment protocols to assist other divers; theories, principles and practices of common law as applied in health and safety at a level of understanding to interpret statutes and regulations and ensure area diving operations are in compliance with them; theories, principles, practices, and techniques of diving at a level of understanding to carry out diving operations under all underwater conditions and do so at a depth to have	5= 215 pts	Must know theories, principles and practices of the physiology the human body in an underwater environment and gas laws, and of diving and potential dangers to the individual diver at various depths at a level of understanding to develop proper procedures and practices to ensure the safety of divers; theories, principles and practices of the medical treatment of diving related injury, including treatment protocols to assist other divers; theories, principles and practices of common law as applied in health and safety at a level of understanding to interpret statutes and regulations to ensure regional diving operations are in compliance with them; theories, principles, practices, and techniques of diving at a level of understanding to carry out diving operations under all underwater conditions and do so at a depth to have competency in (a) occupational (open-circuit) SCUBA diving; (b) surface-supplied diving: (i) air (1)	6 = 260 pts	Must know theories, principles and practices of the physiology the human body in an underwater environment and gas laws, and of diving and potential dangers to the individual diver at various depths at a level of understanding to develop proper procedures and practices to ensure the safety of divers; theories, principles and practices of the medical treatment of diving related injury, including treatment protocols (including hyperbaric chamber operation), long term health problems at a level of understanding to develop in collaboration with Health Canada physicians, treatment criteria; theories, principles and practices of common law as applied in health and safety at a level of understanding to interpret statutes and regulations, and to develop diving safety protocols; theories, principles, practices, and techniques of diving at a level of understanding to carry out diving

		(1) restricted surface-supplied; and (2) unrestricted surface-supplied; and (ii) mixed gas; (c) deep diving: (i) bell techniques (bell); (ii) saturation techniques (SAT); and (iii) atmospheric diving system techniques (ADS) etc.  Cf: BM-09		diving at a level of understanding to carry out diving operations under all underwater conditions and do so at a depth to have competency in (a) occupational (open-circuit) SCUBA diving; (b) surface-supplied diving: (i) air (1) restricted surface-supplied; and (2) unrestricted surface-supplied; and (ii) mixed gas; (c) deep diving: (i) bell techniques (bell); (ii) saturation techniques (SAT); and (iii) atmospheric diving system techniques (ADS) etc. Cf: BM-09		competency in (a) occupational (open-circuit) SCUBA diving; (b) surface-supplied diving: (i) air (1) restricted surface-supplied; and (2) unrestricted surface-supplied; and (ii) mixed gas; (c) deep diving: (i) bell techniques (bell); (ii) saturation techniques (SAT); and (iii) atmospheric diving system techniques (ADS) etc. Cf: BM-09		restricted surface-supplied; and (2) unrestricted surface-supplied; and (ii) mixed gas; (c) deep diving: (i) bell techniques (bell); (ii) saturation techniques (SAT); and (iii) atmospheric diving system techniques (ADS) etc. Cf: BM-09		operations under all underwater conditions - At a sufficient depth to have competency in (a) occupational (open-circuit) SCUBA diving; (b) surface-supplied diving: (i) air (1) restricted surface-supplied; and (2) unrestricted surface-supplied; and (ii) mixed gas; (c) deep diving: (i) bell techniques (bell); (ii) saturation techniques (SAT); and (iii) atmospheric diving system techniques (ADS); and (d) diving and hyperbaric physicians.  Cf: BM-17
2. Technical Responsibility	A2=80	The work is performed according to specific instructions and by applying standard procedures and practices. It requires some initiative and judgement. Impacts on safety and performance of others as buddy	B2=131	The work is performed according to general instructions and by applying standard procedures and practices requiring interpretation, and the selection of	C2=182	The work is performed according to general guidelines and instructions and requires the development or modification of plans, procedures, standards or practices involving a considerable degree of analysis, initiative and	C2=182	The work is performed according to general guidelines and instructions and requires the development or modification of plans, procedures, standards or practices involving a considerable degree of analysis, initiative and judgement.	C3=232	The work is performed according to general guidelines and instructions and requires the development or modification of plans, procedures, standards or practices involving a considerable degree of analysis, initiative and



		Cf: BM-04		courses of action. This requires a moderate degree of initiative and judgement.procedures and. Impacts on safety and performance of others as buddy and diver in charge of the diving team Cf: BM-04		judgement.  Impacts on safety and performance of others in dive teams and of dive ops in Area, hence on effectiveness of work on area supported by dive ops Cf: BM-17		Impacts on safety and performance of others in dive teams and of dive ops in Region, and hence on effectiveness of work of region supported by dive ops  Cf: BM-17		judgement.  Impacts on safety and performance of others in dive teams and of dive ops in all Regions, and hence on effectiveness of work of DFO supported by dive ops  Cf:BM-26
3. Responsibility for Contacts	A1 = 8 pts	To provide or exchange information relating to the work being performed, the area under study, or the methods and techniques used.  Level of persons is employees in own diving team	A1 = 8 pts	To provide or exchange information relating to the work being performed, the area under study, or the methods and techniques used.  Level of persons is employees in own diving team	A2 = 26 pts	To provide or exchange information relating to the work being performed, the area under study, or the methods and techniques used. Such persons as officials in own department e.g. Area Director or RDG; employees other than officials of other departments, other levels of government, outside agencies, companies and associations with which diving ops are done in partnership	A2 = 26 pts	To provide or exchange information relating to the work being performed, the area under study, or the methods and techniques used. Such persons as officials in own department e.g. RDG; employees other than officials of other departments, other levels of government, outside agencies, companies and associations with which diving ops are done in partnership	A3 = 44 pts	To provide or exchange information relating to the work being performed, the area under study, or the methods and techniques used.  Such persons as officials of other departments, outside agencies, companies, associations and other governments on codes of practice to promote diving safety and to facilitate partnerships during joint operations.
4. Conditions of Work										
a. Concentration	2 = 20 pts	The work continually requires moderate attention and concentration, or mental-sensory coordination. Some	2= 20 pts	The work continually requires moderate attention and concentration,	2= 20 pts	The work continually requires moderate attention and concentration, or mental-sensory coordination. Some	2= 20 pts	The work continually requires moderate attention and concentration, or mental-sensory coordination. Some	2= 20 pts	The work continually requires moderate attention and concentration, or mental-sensory coordination. Some

		duties may occasionally require greater attention for short periods.		or mental-sensory coordination. Some duties may occasionally require greater attention for short periods.		duties may occasionally require greater attention for short periods.		duties may occasionally require greater attention for short periods.		duties may occasionally require greater attention for short periods.
b. Physical Effort	2 = 20 pts	The work requires continual standing or walking, (actually treading water or diving and swimming for periods of an hour or more) where only limited periods of relief are possible, or continually handling light-weight objects. The duties occasionally require greater physical effort for short periods.	2 = 20 pts	The work requires continual standing or walking, (actually treading water or diving and swimming for periods of an hour or more) where only limited periods of relief are possible, or continually handling light-weight objects. The duties occasionally require greater physical effort for short periods.	1 = 10 pts	The work requires intermittent standing, walking or handling of light-weight objects. The duties occasionally require greater physical effort for short periods.	1 = 10 pts	The work requires intermittent standing, walking or handling of light-weight objects. The duties occasionally require greater physical effort for short periods.	1 = 10 pts	The work requires intermittent standing, walking or handling of light-weight objects. The duties occasionally require greater physical effort for short periods.
c. Environment	3 = 20 pts	Significant exposure to several disagreeable conditions or to one very disagreeable condition. Cf: BM-09	3 = 20 pts	Significant exposure to several disagreeable conditions or to one very disagreeable condition. Cf: BM-09	2 = 13 pts	Significant exposure to one disagreeable condition, or occasional exposure to several disagreeable conditions or to one very disagreeable condition.	1 = 6 pts	Few disagreeable conditions. Cf: BM-25	1 = 6 pts	Few disagreeable conditions. Cf: BM-25
d. Hazards	C2 = 30 pts	Incapacitating injuries or illness such as loss of limbs; or other permanent impairment.	C2 = 30 pts	Incapacitating injuries or illness such as loss of limbs; or other	C2 = 30 pts	Incapacitating injuries or illness such as loss of limbs; or other permanent	A1 = 6 pts	Minor injuries or illness such as cuts, abrasions and bruises. Cf: BM-14	A1 = 6 pts	Minor injuries or illness such as cuts, abrasions and bruises. Cf: BM-14

		Cf: BM-19		permanent impairment. Cf: BM-19		impairment. Cf: BM-19				
(5) Supervision	1 = 5 pts	Shows other staff how to perform tasks or duties.	2 = 15 pts	Assigns work, checks on completion and reports on staff performance.	2 = 15 pts	Assigns work, checks on completion and reports on staff performance.	2 = 15 pts	Assigns work, checks on completion and reports on staff performance.	3 = 60 pts	Organizes and controls the work of staff on a continuing basis and formally evaluates performance of subordinate staff.
<b>TOTAL</b>	<b>353</b>		<b>414</b>		<b>511</b>		<b>480</b>		<b>638</b>	
<b>Level</b>	<b>4</b>	<b>(340 - 419)</b>	<b>4</b>	<b>(340 - 419)</b>	<b>5</b>	<b>(420 - 529)</b>	<b>5</b>	<b>(420 - 529)</b>	<b>6</b>	<b>(530 – 699)</b>

## GENERAL TECHNICAL (GT)

The General Technical (GT) Group lends itself to permitting the work required by a position required to carry out one of the “diving” roles to influence the classification of the position. The reason for this is that as defined on page 1 of the GT Classification Standard this standard uses a point rating system:

*This standard describes the point-rating plan to be used to evaluate jobs allocated to the General Technical Group. . . . Point rating is an analytical, quantitative method of determining the relative value of jobs. It is particularly suited to heterogeneous occupational groups in which jobs consist of varied combinations of tasks. Essentially, point-rating plans define characteristics or factors common to the jobs being evaluated. They define degrees of each factor and allocate point values to each degree. The total value determined for each job is the sum of the point values assigned by the raters. . . . The point-rating method facilitates rational discussion and resolution of differences in determining the relative values of jobs.*

### Factors

*The combined factors do not describe all aspects of jobs. They deal only with those characteristics that can be defined and distinguished and that are useful in determining the relative values of jobs. Five factors are used in this plan. Three of these are two-dimensional and all five are defined in terms of two or more related elements.*

### Point Values

*The maximum point value assigned to each factor reflects its relative importance. Similarly, point values have been assigned to the degrees of the factors.*

*Point values of the degree of each factor increase arithmetically. The minimum point value assigned to four of the factors is one-fifth of the maximum value, and for the fifth, Supervision, it is one-tenth.*

### Rating Plan

*In the rating plan the factors, elements, weights and point values shown on the Text page are used.*

<u>Factor</u>	<u>Element</u>	<u>Percentage of Total Points</u>	<u>Point Minimum</u>	<u>Values Maximum</u>
Knowledge		35	70	350
	Training and Experience			
Technical Responsibility		30	60	300
	Scope for Initiative and Judgement Impact of Action Taken			
Responsibility For Contacts		10	20	100
	Purpose and Nature of Contacts Persons Contacted			
Conditions of Work		15	30	150
	Concentration		10	50
	Physical Effort		10	50
	Environment and Hazards		10	50
Supervision		100	10	100
	Nature of Supervisory Responsibility Number of Employees			
		100		

NOTA: In the following table demonstrating the probable impact of diving roles under each factor a benchmark is cited for reference. In assessing diving roles under the GT standard the benchmark referenced is suggested as analogous to the diving role owing to the nature of diving in comparison to the characteristics of the benchmark work descriptions.

Accounting Officer	Dive Roles under various Classification Standards, Paquetta Diving Officer August 2009	Regional Diving Officer	Departmental Diving Officer
--------------------	--	-------------------------	-----------------------------

1. Knowledge	3= 140 pts	Must know <b>theories, principles and practices of the physiology the human body in an underwater environment and gas laws, and of diving and potential dangers to the individual diver at various depths at a level of understanding to develop proper procedures and practices to ensure the safety of divers; theories, principles and practices of the medical treatment of diving related injury, including treatment protocols to assist other divers; theories, principles and practices of common law as applied in health and safety at a level of understanding to interpret statutes and regulations and operate in compliance with them; theories, principles, practices, and techniques of diving at a level of understanding to</b>	3= 140 pts	Must know theories, principles and practices of the physiology the human body in an underwater environment and gas laws, and of diving and potential dangers to the individual diver at various depths at a level of understanding to develop proper procedures and practices to ensure the safety of divers; theories, principles and practices of the medical treatment of diving related injury, including treatment protocols to assist other divers; theories, principles and practices of common law as applied in health and safety at a level of understanding to interpret statutes and regulations and operate in compliance with them; theories, principles, practices, and techniques of diving at a level of understanding to	5= 210 pts	Must know theories, principles and practices of the physiology the human body in an underwater environment and gas laws, and of diving and potential dangers to the individual diver at various depths at a level of understanding to develop proper procedures and practices to ensure the safety of divers; theories, principles and practices of the medical treatment of diving related injury, including treatment protocols to assist other divers; theories, principles and practices of common law as applied in health and safety at a level of understanding to interpret statutes and regulations to ensure area diving operations are in compliance with them; theories, principles, practices, and techniques of diving at a level of understanding to carry out diving operations under all underwater conditions and do so at a depth to have competency in (a)	5= 210 pts	Must know theories, principles and practices of the physiology the human body in an underwater environment and gas laws, and of diving and potential dangers to the individual diver at various depths at a level of understanding to develop proper procedures and practices to ensure the safety of divers; theories, principles and practices of the medical treatment of diving related injury, including treatment protocols to assist other divers; theories, principles and practices of common law as applied in health and safety at a level of understanding to interpret statutes and regulations to ensure that regional diving operations are in compliance with them; theories, principles, practices, and techniques of diving at a level of understanding to carry out diving operations under all underwater conditions and do so at a depth to have competency in (a) occupational (open-circuit) SCUBA diving; (b) surface-supplied diving: (i) air (1) restricted surface-	7= 280 pts	Must know theories, principles and practices of the physiology the human body in an underwater environment and gas laws, and of diving and potential dangers to the individual diver at various depths at a level of understanding to develop proper procedures and practices to ensure the safety of divers; theories, principles and practices of the medical treatment of diving related injury, including treatment protocols (including hyperbaric chamber operation), long term health problems at a level of understanding to develop in collaboration with Health Canada physicians, treatment criteria; theories, principles and practices of common law as applied in health and safety at a level of understanding to interpret statutes and regulations, and to develop diving safety protocols; theories, principles, practices, and techniques of diving at a level of understanding to carry out diving operations under all
--------------	------------------	---	------------------	--	------------------	--	------------------	--	------------------	---

		carry out diving operations under all underwater conditions and do so at a depth to have competency in (a) occupational (open-circuit) SCUBA diving; (b) surface-supplied diving: (i) air (1) restricted surface-supplied; and (2) unrestricted surface-supplied; and (ii) mixed gas; (c) deep diving: (i) bell techniques (bell); (ii) saturation techniques (SAT); and (iii) atmospheric diving system techniques (ADS) etc. Cf: BM-01		carry out diving operations under all underwater conditions and do so at a depth to have competency in (a) occupational (open-circuit) SCUBA diving; (b) surface-supplied diving: (i) air (1) restricted surface-supplied; and (2) unrestricted surface-supplied; and (ii) mixed gas; (c) deep diving: (i) bell techniques (bell); (ii) saturation techniques (SAT); and (iii) atmospheric diving system techniques (ADS) etc. Cf: BM-01		occupational (open-circuit) SCUBA diving; (b) surface-supplied diving: (i) air (1) restricted surface-supplied; and (2) unrestricted surface-supplied; and (ii) mixed gas; (c) deep diving: (i) bell techniques (bell); (ii) saturation techniques (SAT); and (iii) atmospheric diving system techniques (ADS) etc.  Cf: BM-02		supplied; and (2) unrestricted surface-supplied; and (ii) mixed gas; (c) deep diving: (i) bell techniques (bell); (ii) saturation techniques (SAT); and (iii) atmospheric diving system techniques (ADS) etc.  Cf: BM-02		underwater conditions - At a sufficient depth to have competency in (a) occupational (open-circuit) SCUBA diving; (b) surface-supplied diving: (i) air (1) restricted surface-supplied; and (2) unrestricted surface-supplied; and (ii) mixed gas; (c) deep diving: (i) bell techniques (bell); (ii) saturation techniques (SAT); and (iii) atmospheric diving system techniques (ADS); and (d) diving and hyperbaric physicians. Cf: BM-12
2. Technical Responsibility	A1 = 60 pts	The work is performed according to specific instructions and by applying standard procedures and practices. It requires some initiative and judgement. Impacts on safety and performance of others as buddy	A1 = 60 pts	The work is performed according to specific instructions and by applying standard procedures and practices. It requires some initiative and judgement. Impacts on safety and performance of others as buddy and diver in charge of the diving team Cf: no BM	C2 = 164 pts	The work is performed according to specific instructions and by applying standard procedures and practices. It requires some initiative and judgement.  Impacts on safety and performance of others in dive teams and of dive ops in Area, hence on effectiveness of work on area supported by dive ops	C2 = 164 pts	The work is performed according to specific instructions and by applying standard procedures and practices. It requires some initiative and judgement.  Impacts on safety and performance of others in dive teams and of dive ops in Region, and hence on effectiveness of work of region supported by dive ops  Cf: BM-02	D4= 264	The work is performed according to general instructions. A considerable degree of initiative and judgement is required in developing, issuing and maintaining diving safety, training and competency procedures, and facilitating their implementation throughout the

					Cf: BM-02					Department; advising senior management on issues pertaining to diving safety and health and obtaining authorization for departmental diving safety procedures; and representing the Department in negotiations with Human Resources Development Canada, Treasury Board, Health Canada, Provincial regulatory authorities, the Canadian Association for Underwater Sciences and the Canadian Standards Association on issues pertaining to diving safety; e) chairing the Departmental Diving Safety Committee; Cf: BM-12
3. Responsibility for Contacts	B2 = 60 pts	To discuss work, methods and procedures requiring elaboration and understanding with officials and	B2 = 60 pts	To discuss work, methods and procedures requiring elaboration and understanding with officials and	C2 = 85 pts	To discuss such matters as interpretation of specifications, objectives, definitions and priorities requiring	C2 = 85 pts	To discuss such matters as interpretation of specifications, objectives, definitions and priorities requiring	C3 = 100 pts	To discuss such matters as interpretation of specifications, objectives, definitions and priorities requiring

		professional staff in own department, employees other than officials and professional staff of other departments and outside agencies ,e.g., other divers, standby divers, dive boat operators, etc.		professional staff in own department, employees other than officials and professional staff of other departments and outside agencies ,e.g., other divers, standby divers, dive boat operators, etc.		resolution of conflicting views, with authority to recommend solutions to Area senior management and to the regional diving officer.		resolution of conflicting views, with authority to recommend solutions to Regional senior management and to the Departmental diving safety officer.		resolution of conflicting views, with authority to recommend solutions to Departmental senior management and to other departments and national and international organizations
4. Conditions of Work										
a. Concentration	1= 10 pts	The work requires a moderate level of attention and concentration, or mental-sensory coordination. Some duties may occasionally require greater attention for short periods.	1= 10 pts	The work requires moderate attention and concentration, or mental-sensory coordination. Some duties may occasionally require greater attention for short periods.	1= 10 pts	The work requires a moderate level of attention and concentration, or mental-sensory coordination. Some duties may occasionally require greater attention for short periods.	1= 10 pts	The work requires a moderate level of attention and concentration, or mental-sensory coordination. Some duties may occasionally require greater attention for short periods.	1= 10 pts	The work requires a moderate level of attention and concentration, or mental-sensory coordination. Some duties may occasionally require greater attention for short periods.
b. Physical Effort	2= 30 pts	The work requires moderate physical effort as in continual standing or walking, (actually treading water or diving and swimming for periods of an hour or more) where only limited periods of relief are possible, or continually handling light-weight objects. The	2 = 30 pts	The work requires moderate physical effort as in continual standing or walking, (actually treading water or diving and swimming for periods of an hour or more) where only limited periods of relief are possible, or continually handling light-weight objects. The duties	1= 10 pts	The work requires little physical effort as in intermittently standing, walking or handling of light-weight objects. The duties occasionally require greater physical effort for short periods.	1= 10 pts	The work requires little physical effort as in intermittently standing, walking or handling of light-weight objects. The duties occasionally require greater physical effort for short periods.	1= 10 pts	The work requires little physical effort as in intermittently standing, walking or handling of light-weight objects. The duties occasionally require greater physical effort for short periods.



		duties occasionally require greater physical effort for short periods.		occasionally require greater physical effort for short periods.						
c. Environment and hazards	C2 = 35 pts	Fair working environment such as significant exposure to one disagreeable condition, OR occasional exposure to either several disagreeable conditions or to one very disagreeable condition which can lead to incapacitating injuries or death.	C2 = 35 pts	Fair working environment such as significant exposure to one disagreeable condition, OR occasional exposure to either several disagreeable conditions or to one very disagreeable condition which can lead to incapacitating injuries or death.	C2 = 35 pts	Fair working environment such as significant exposure to one disagreeable condition, OR occasional exposure to either several disagreeable conditions or to one very disagreeable condition which can lead to incapacitating injuries or death.	A1 = 10 pts	Good working environment, with few disagreeable conditions.	A1 = 10 pts	Good working environment, with few disagreeable conditions.
(5) Supervision	A1 = 10 pts	Shows other staff how to perform tasks or duties.	B2 = 15 pts	Assigns work, checks on completion and reports on staff performance.- 1-3 members of dive teams	C3 = 44 pts	The Area Diving Safety Officer shall have the authority to suspend divers who fail to comply with Departmental Procedures, and to restrict or prohibit any diving activity that is considered unsafe or imprudent. The Regional Diving Safety Committee shall be immediately informed of any such restrictive actions for review and further action as necessary and	C5 = 72 pts	Ensures that regional dive programs comply with the Federal Diving Regulation and the procedures outlined in the DDSP through the Area Diving Safety Officers, hence for up to three areas is responsible for 12- 24 Area Diving Safety Officers, divers-in-charge and divers.	C2 = 30 pts	Assigns work, checks on completion and reports on staff performance.

						does so through - 4-8 divers-in-charge and divers				
<b>TOTAL</b>	<b>345</b>		<b>350</b>		<b>558</b>		<b>561</b>		<b>704</b>	
<b>Level</b>	<b>3</b>	<b>(341-430)</b>	<b>3</b>	<b>(341-430)</b>	<b>5</b>	<b>(521-620)</b>	<b>5</b>	<b>(521-620)</b>	<b>6</b>	<b>(621-720)</b>

## ADMINISTRATIVE SERVICES (AS)

The Administrative Services (AS) Group lends itself to permitting the work required by a position required to carry out one of the "diving" roles to influence the classification of the position. The reason for this is that as defined on page 2 of the AS Classification Standard this standard uses a point rating system:

*This standard describes the point-rating plan to be used to evaluate jobs allocated to the General Technical Group. . . . Point rating is an analytical, quantitative method of determining the relative value of jobs. It is particularly suited to heterogeneous occupational groups in which jobs consist of varied combinations of tasks. Essentially, point-rating plans define characteristics or factors common to the jobs being evaluated. They define degrees of each factor and allocate point values to each degree. The total value determined for each job is the sum of the point values assigned by the raters. . . . The point-rating method facilitates rational discussion and resolution of differences in determining the relative values of jobs.*

### Factors

*The combined factors do not describe all aspects of jobs. They deal only with those characteristics that can be defined and distinguished and that are useful in determining the relative value of jobs.*

*Four factors are used in this plan. All the factors have more than one dimension and have been defined in terms of two or three related elements. The factors and elements . . . with their point values are*

	<u>Minimum</u>	<u>Maximum</u>
Knowledge Education and Experience	60	300
Continuing Study	10	50
Decision Making	70	350
Responsibility for Contacts	26	130
Supervision	-	170
	166	1,000

Factor and Element	Diver	Diver In Charge	Area Diving Officer	Regional Diving Officer	Departmental Diving
--------------------	-------	-----------------	---------------------	-------------------------	---------------------

									<b>Officer</b>	
Knowledge: Education and Experience	B2 = 124 pts	Completion of Secondary School Education plus Specialized Training in various aspects of diving sufficient to qualify when combined with experience (up to 4 years)	B3 = 151 pts	Completion of Secondary School Education plus Specialized Training in various aspects of diving sufficient to qualify when combined with experience (up to 6 years)	C3 = 189 pts	Education and experience equivalent to university graduation providing knowledge of theories, principles and practices of the physiology the human body in an underwater environment and gas laws, and of diving and potential dangers to the individual diver at various depths at a level of understanding to ensure the safety of divers; theories, principles and practices of the medical treatment of diving related injury, including treatment protocols to assist other divers; theories, principles and practices of common law as applied in health and safety at a level of understanding to interpret statutes and regulations to ensure that area diving operations are in compliance with them; theories, principles, practices, and techniques of diving at a level of understanding to carry out diving operations under all	C3 = 189 pts	Education and experience equivalent to university graduation providing knowledge of theories, principles and practices of the physiology the human body in an underwater environment and gas laws, and of diving and potential dangers to the individual diver at various depths at a level of understanding to to ensure the safety of divers; theories, principles and practices of the medical treatment of diving related injury, including treatment protocols to assist other divers; theories, principles and practices of common law as applied in health and safety at a level of understanding to interpret statutes and regulations to ensure that regional diving operations are in compliance with them; theories, principles, practices, and techniques of diving at a level of understanding to carry out diving operations under all underwater conditions based on having up to 6 years experience	C4 = 216 pts	Education and experience equivalent to university graduation providing knowledge of theories, principles and practices of the physiology the human body in an underwater environment and gas laws, and of diving and potential dangers to the individual diver at various depths at a level of understanding to develop proper procedures and practices to ensure the safety of divers; theories, principles and practices of the medical treatment of diving related injury, including treatment protocols to assist other divers; theories, principles and practices of common law as applied in health and safety at a level of understanding to interpret statutes and regulations to ensure that national diving operations are in compliance with them; theories, principles, practices, and techniques of diving at a level of understanding to carry out diving operations under all underwater conditions based on having up to 8 to ten years experience

						underwater conditions based on having up to 6 years experience				
Knowledge: Continuing Study	2 = 30 pts	Work requires knowledge of trends and developments in an administrative or technical specialty directly related to the duties performed, gained by continuing study of texts, journals and periodicals.	2= 30 pts	Work requires knowledge of trends and developments in an administrative or technical specialty directly related to the duties performed, gained by continuing study of texts, journals and periodicals.	2= 30 pts	Work requires knowledge of trends and developments in an administrative or technical specialty directly related to the duties performed, gained by continuing study of texts, journals and periodicals.	2= 30 pts	Work requires knowledge of trends and developments in an administrative or technical specialty directly related to the duties performed, gained by continuing study of texts, journals and periodicals.	3= 50 pts	Work requires development and maintenance of knowledge in depth in an administrative or technical specialty through broad-ranging, intensive study, AND knowledge of the nature and interrelationships of trends and developments in a number of fields through study of a wide variety of texts, journals and periodicals.
Decision Making	A1 = 70 pts	Decisions require some judgement, initiative and discretion. Individual problems are solved by the selection of a course of action indicated by established methods and instructions. The implications of possible courses of action are usually apparent from precedents. Unusual problems are referred to superiors, e.g.	A1 = 70 pts	Decisions require some judgement, initiative and discretion. Individual problems are solved by the selection of a course of action indicated by established methods and instructions. The implications of possible courses of action are usually apparent from precedents. Unusual problems are referred to superiors, e.g.	B2 = 163 pts	Decisions require a moderate degree of judgement, initiative and discretion, Problems are solved by selection of courses of action that may require some modification of established methods. The implications of possible courses of action may not be readily apparent. Direction is sought from and recommendations made to the Regional Diving Safety Officer, Area Director, or client project or area	B3 = 210 pts	Decisions require a moderate degree of judgement, initiative and discretion, Problems are solved by selection of courses of action that may require some modification of established methods. The implications of possible courses of action may not be readily apparent. Direction is sought from and recommendations made to the National Diving Safety Officer, Regional Director General, or client program managers	C3 = 256	Decisions require a high degree of judgement, initiative and discretion. Duties of the position require the development of solutions to diverse and interrelated problems. Substantial contributions are made to planning, developing and changing programs in response to recommendations, in anticipation of changing conditions or to achieve objectives established by superiors. Implications of actions taken or

		the diving supervisor or client scientist or manager. Impact is on the dive, the diving team, and the project		the Area Diving Safety Officer, or other supervisor or client scientist or manager. Impact is on dives for which responsible, the diving teams, and the project		manager when the apparent solutions to problems are not within the intent of established practices.  Impact is on all diving operations within the area for which functionally responsible, and on all projects and programs thereby affected.		served when the apparent solutions to problems are not within the intent of established practices.  Impact is on all diving operations within the area for which functionally responsible, and on all projects and programs thereby affected.		proposed are complex and often cannot be determined with certainty. Recommendations are made to the ADM Science as the departmental official responsible for developing and implementing the departmental diving safety program  Impact is on the departmental diving program and on all projects and programs for which diving services are required, as well as on Canadian and international diving safety policy and procedures. Cf: BM14
Responsibility for Contacts	A2 = 38 pts	To give, obtain and exchange information requiring discussion, explanation and co-operation. ; and do so in contact with members of diving teams which may be employees in the same department, colleagues in other departments, and members of private partner	A2 = 38 pts	To give, obtain and exchange information requiring discussion, explanation and co-operation. ; and do so in contact with members of diving teams which may be employees in the same department, colleagues in other departments, and members of private partner	B2 = 64 pts	To persuade and obtain assistance or agreement of others ; and do so in contact with such persons as officials in other departments and agencies whose primary duties are not related to the provision of administrative services but wishing to partner in Area diving operations; officials in other departments or agencies who have authority to control or affect the extent	C2= 91 pts	To act as a representative of the department or agency at formal meetings where differences in interest may be expected, with authority to discuss problems and seek common ground on which to base solutions with respect to diving operations in a region in contact with officials in other departments or agencies who have authority to control or affect the extent and scope of the department's	C3 = 103 pts	To act as a representative of the department or agency at formal meetings where differences in interest may be expected, with authority to discuss problems and seek common ground on which to base solutions and do so with Officials of other levels of government, other countries, private organizations or industry responsible for diving safety programs.

		organizations or the public.		organizations or the public.		and scope of the department's Area diving operations; and associates in other levels of government, other countries, private organizations or industry wishing to partner in Area diving operations.		Regional diving operations; and associates in other levels of government, other countries, private organizations or industry wishing to partner in a Region's diving operations. .		
Supervision	Nil	The diver has no continuing supervisory responsibility	A1 = 17 pts	A typical diving supervisor would have functional supervision of the equivalent of from one to three FTEs each year	B2 = 53 pts	A typical Area diving safety officer would have functional supervision of divers through diving supervisors of the equivalent of from four to ten FTEs each year	C2 = 73 pts	A typical Regional diving safety officer would have functional supervision of divers through diving supervisors of the equivalent of from eleven to twenty-five FTEs each year	E2 = 113 pts	The current National diving safety officer would have functional supervision of divers through diving supervisors of the equivalent of from seventy-six to a hundred plus FTEs each year
<b>TOTAL</b>	<b>262</b>		<b>306</b>		<b>499</b>		<b>593</b>		<b>738</b>	
<b>Level</b>	<b>2</b>	<b>(241-320)</b>	<b>2</b>	<b>(241-320)</b>	<b>4</b>	<b>(401-500)</b>	<b>5</b>	<b>(501-600)</b>	<b>7</b>	<b>(701-800)</b>

Philémon Paquette, Ph.D.  
Paquette Consulting  
12 August 2009