

SIXTH FLOOR, 900 HOWE STREET, BOX 250
VANCOUVER, BC V6Z 2N3 CANADA
website: <http://www.bcuc.com>



**BRITISH COLUMBIA
UTILITIES COMMISSION**

**ORDER
NUMBER G-119-15**

TELEPHONE: (604) 660-4700
BC TOLL FREE: 1-800-663-1385
FACSIMILE: (604) 660-1102

IN THE MATTER OF
the *Utilities Commission Act*, RSBC 1996, Chapter 473

and

Creative Energy Vancouver Platforms Inc.
Application for a Certificate of Public Convenience and Necessity
for Northeast False Creek and Chinatown Neighbourhood Energy System

BEFORE: D. M. Morton, Panel Chair/Commissioner
C. A. Brown, Commissioner July 15, 2015
I. F. MacPhail, Commissioner

O R D E R

WHEREAS:

- A. On April 17, 2015, Creative Energy Vancouver Platforms Inc. (Creative Energy) applied to the British Columbia Utilities Commission (Commission) for an order approving the Northeast False Creek and Chinatown Neighbourhood Energy Agreement under section 45(7) and granting a Certificate of Public Convenience and Necessity under section 45(9) of the *Utilities Commission Act*;
- B. On July 13, 2015, the Commission issued Order G-118-15 which set out the remaining Regulatory Timetable and directed FEI to respond to certain information requests (IRs); and
- C. The Commission has concluded that the Regulatory Timetable should have included provisions for Panel IRs and allowed the Commission and interveners the opportunity to file IRs on intervenor Evidence. Further, the Commission has concluded that Directive 2 (c) and certain IRs in Directive 2 (d) were included in error.

NOW THEREFORE for reasons attached to this order, the British Columbia Utilities Commission orders as follows:

- 1. Pursuant to section 99 of the *Utilities Commission Act*, the Commission rescinds Directive 2 of Order G-118-15.
- 2. The Regulatory Timetable is amended and reissued as Appendix A to this order by removing reference to Creative Energy Vancouver Platforms Inc. (Creative Energy) in the Actions associated with the August 21 and September 4, 2015 filing dates and including provisions for Panel information requests to the City of Vancouver and City of Vancouver's response.

**BRITISH COLUMBIA
UTILITIES COMMISSION**

**ORDER
NUMBER** G-119-15

2

3. Creative Energy is directed to respond to the following information requests no later than Thursday, July 16, 2015:
- a. British Columbia Utilities Commission 1.35.1;
 - b. FortisBC Energy Inc. 1.8.2.2; and
 - c. Commercial Energy Consumers of British Columbia: 1.1.3, 1.1.8, 1.4.1, 1.4.6, 1.4.7, 1.12.1, 1.12.7, 1.43.5, 1.47.2, 1.51.1, 1.55.1, 1.59.1, 1.62.1, 1.65.1, 1.65.2, 1.67.1, 1.67.2, 1.67.3, and 1.67.4.

DATED at the City of Vancouver, in the Province of British Columbia, this 15th day of July 2015.

BY ORDER

Original signed by:

D. M. Morton
Commissioner

Attachments

Creative Energy Vancouver Platforms Inc.
Application for a Certificate of Public Convenience and Necessity
for Northeast False Creek and Chinatown Neighbourhood Energy System

REGULATORY TIMETABLE

ACTION	DATE (2015)
Creative Re-submission of Responses to IR No. 1	July 16
Commission and Intervener Information Request No. 2	July 21
Panel Information Request No. 1 to City of Vancouver	July 21
Intervener PACA Budget Deadline	July 21
Urban Development Institute Information Request No. 2	July 24
Creative Response to Commission and Intervener (including UDI) Information Request No. 2	August 5
City of Vancouver Response to Panel Information Request No. 1	August 5
Intervener Evidence Filing Deadline	August 7
Information Request on Intervener Evidence	August 21
Intervener Response to Information Request on Intervener Evidence	September 4
Creative Rebuttal Evidence Filing Deadline	September 9
Oral Hearing	September 14, 15 and 16
Written Final Argument	September 18
Written Intervener Final Argument	September 25
Written Reply Argument	September 28



IN THE MATTER OF

**CREATIVE ENERGY VANCOUVER PLATFORMS INC.
APPLICATION FOR A CERTIFICATE OF PUBLIC CONVENIENCE AND NECESSITY
FOR A LOW CARBON NEIGHBOURHOOD ENERGY SYSTEM
FOR NORTHEAST FALSE CREEK AND CHINATOWN NEIGHBOURHOODS OF VANCOUVER**

REASONS FOR DECISION

July 15, 2015

BEFORE:

D. M. Morton, Panel Chair / Commissioner
C.A. Brown, Commissioner
I. F. MacPhail, Commissioner

TABLE OF CONTENTS

	PAGE NO.
1.0 INTRODUCTION.....	3
2.0 THE NEED FOR INFORMATION REQUEST NO. 2.....	3
3.0 ARE INDICATIVE RATES WITHIN THE SCOPE OF THE APPLICATION?.....	3
4.0 PROCEEDING COSTS.....	5
5.0 OUTSTANDING INFORMATION REQUESTS	5
5.1 FEI IRs.....	5
5.2 FAES IRs.....	6
5.2.1 IRs which Creative Energy refused to respond	6
5.2.2 IRs which Creative Energy stated it does not understand	7
5.2.3 IRs that involve City of Vancouver related questions.....	7
5.2.4 BCUC IRs	8
5.3 CEC IRs.....	9

1.0 INTRODUCTION

On July 10, 2015, the British Columbia Utilities Commission held a procedural conference respecting Creative Energy Vancouver Platforms Inc.'s (Creative Energy) application for a Certificate of Public Convenience and Necessity (CPCN) and for approval of their corresponding Franchise Agreement with the City of Vancouver (CoV) (the Application). At the procedural conference, the Applicant and the Interveners were asked to provide submissions on the scope of the proceeding, the status of outstanding information requests (IRs), and the appropriate regulatory process moving forward.

The Commission issued Order G-118-15, with reasons to follow, on Monday, July 13, 2015, clarifying the scope of the proceeding, amending the regulatory timetable and directing Creative Energy to answer certain IRs. However, the Commission subsequently rescinded portions of G-118-15 and therefore appends these reasons to the revised order issued as G-119-15.

2.0 THE NEED FOR INFORMATION REQUEST NO. 2

A number of parties support a second round of IRs. In the view of Creative Energy, a second round of IRs "cannot be accommodated within the schedule."¹ It submits that it has already answered 987 IRs, contrasting that to a total of 150 IRs in the Corix UBC proceeding.²

Commission determination

The Panel is persuaded that a second round of IRs is required. While the Panel notes the need for timely adjudication, many outstanding questions were raised during the procedural conference that highlight the need for further discovery.

3.0 ARE INDICATIVE RATES WITHIN THE SCOPE OF THE APPLICATION?

Creative Energy seeks approval, among other items, for "the method for establishing the revenue requirement for the neighbourhood energy system (NES) as provided in Section 5.7 and consistent with the recent Commission decision in the Phase 2 Generic Cost of Capital proceeding applicable to small thermal energy utilities:

- A deemed capital structure of 57.5% debt and 42.5% equity;
- Long-term debt costs equal to Creative Energy's third party debt costs, currently projected as 4%;
- A return on equity (ROE) of 9.5%, which is based on the current benchmark equity return plus 75 basis points to account for the additional risk related to the development of small scale alternative energy utility and consistent with Creative Energy's requested ROE for its core steam system;
- Operating costs as provided in Section 5.5, which includes the proposed cost allocations for energy supplied from Creative Energy's existing infrastructure, including a share of corporate overheads;
- The Carbon Reduction Fund and associated Carbon Reduction Rider required in the Neighbourhood Energy Agreement with the CoV;

¹ T1:91.

² T1:93.

- A revenue deficiency deferral account (RDDA) which would be used to smooth rates and record those portions of the current revenue requirement associated with future growth (e.g., pre-built infrastructure);”

Creative Energy also requests approval for “the two part rate design proposed by Creative Energy consisting of a fixed charge and a variable energy recovery charge based on the approximate share of fixed and variable costs in the indicative NES pro forma, which is comparable to the rate design for other new hot water systems in B.C., including the City-owned SEFC NEU.”³

In the procedural conference, Creative Energy clarified that it is not seeking approval of a rate. Further, it characterized their request as approval of “rate parameters” (later referred to as “regulatory parameters”). It stated that “it would not be able to calculate a rate from those “rate parameters.” It further submitted that issues of allocation of costs, which is one of those “regulatory parameters” is relevant to its proposed January rate filing. Creative Energy also proposed that the issues with respect to “regulatory parameters” could be deferred to the January filing.⁴

FortisBC Energy Inc. (FEI) submits that the rate comparisons and benchmarking that has been done are not depicting the benchmarking accurately, the current benchmarking is showing that Creative Energy’s proposal is cheaper and that there will be dispute about that. FEI further submits that “while the indicative rates may not be rate approval that are being sought, they are relevant in terms of benchmarking.”⁵

Panel Determination

The Panel agrees with FEI that to the extent that indicative rates are used for comparisons that are relevant to the public interest determination, those indicative must be examined in this proceeding. **Accordingly, issues related to the approvals sought regarding the rate are within the scope of this hearing.** Specifically, the method for establishing the revenue requirement for the NES, including:

- A deemed capital structure of 57.5% debt and 42.5% equity;
- Long-term debt costs equivalent to Creative Energy’s overall projected third party debt costs (currently forecast at 4%);
- A return on equity (ROE) of 9.5%, which is based on the current benchmark equity return plus 75 basis points to account for the additional risk related to the development of a small-scale alternative energy utility and consistent with Creative Energy’s requested ROE for its core steam system;
- Operating costs as described in Section 5.5 of the Application, which includes the proposed allocation of costs for energy supplied from Creative Energy’s existing infrastructure, including an allocation of existing Creative Energy overheads;
- The creation of the Carbon Emission Rider and associated Carbon Reduction Fund, as required in the NEA;
- The two part rate design as described in Section 5.13 of the Application, consisting of a fixed charge and a variable energy recovery charge based on the approximate share of fixed and variable costs in the indicative NEFC pro forma, which is comparable to the rate design for other new hot water systems in B.C.;

³ Exhibit B-1, pp. 16-17.

⁴ T1:14-15.

⁵ T1:28.

4.0 PROCEEDING COSTS

Creative Energy raised the issue of whether FEI and FAES ought to bear a portion of the costs of this proceeding. In its view, FEI and FAES have already made this process “much more controversial than another would be.” Creative Energy further questions whether FEI should be advancing concerns about issues that the City of Vancouver has already addressed and reached a conclusion with respect to.” Creative Energy further submits that “costs should be a consideration in final submissions.”⁶

Commission determination

To date, the Commission Panel is of the initial view that the contributions by FEI and FAES have been reasonable under the circumstances. Therefore, up to this point in time in this process, the Panel is not persuaded that FEI or FAES should be parties responsible to bear proceeding costs.

The Panel notes that Creative Energy may wish to raise this issue in final submissions, with respect to the remaining regulatory process. The Panel reminds the Applicant that the burden of proof will be on the Applicant to show that any other party should bear a portion of the costs of the proceeding.

5.0 OUTSTANDING INFORMATION REQUESTS

The Commission Panel heard a number of Interveners’ submissions about IRs that they contended were unanswered, incomplete, or vague. In response, Creative Energy suggested that many IRs were irrelevant or unclear. The Panel has reviewed the record to date, has considered the concerns of the parties, and has made determinations as set out in the order, with reasons, where appropriate, below.

5.1 FEI IRs

By letter dated July 7, 2015 (Exhibit C7-3), FEI submitted a number of IRs that were posed by FEI and the Commission to which Creative Energy had, in FEI’s view, failed to provide an adequate response. By letter dated July 9, 2015 (Exhibit B-15), Creative Energy responded advising that it will provide supplemental responses to certain of those requests, including all BCUC IRs that FEI had identified.

FEI IR 8.2.2. Please provide a system extension analysis of connecting the closest NEFC customer to the existing Creative Energy Steam plant system. Please provide the analysis in a working excel spreadsheet.

The Panel considers this question to be relevant as it analyzes a potential alternative. Creative Energy is directed to respond.

FEI IR 1.8.2.3. Please conduct the same system extension analysis for each of the customers identified in the application for the NEFC. Please provide the analysis as if each customer was to connect individually as a stand-alone customer requiring a system extension (in other words, that each individual customer does not benefit from the connection of a previous customer who is closer to the existing Creative Energy Steam plant). Please provide the analysis in a working excel spreadsheet.

The Panel considers that although the answer may have relevance, the amount of work required to respond is onerous. The previous question provides sufficient analysis of this particular alternative.

⁶ T1:19-20.

FEI IR 1.33.1 Please complete the following table for each energy provider listed in Table 1 [i.e. the effective rate table that compares various energy providers].

This question requires specialized knowledge or access to information that may be onerous to obtain. Further, this information can be brought forward as evidence by any party that wishes to do so. FEI has not provided sufficient evidence of the need for this information for the Panel to require Creative Energy to provide it. However, if FEI wishes to resubmit this question in IR2, the Panel directs Creative Energy to answer to the best of its knowledge.

FEI IR 1.33.7.1 How did the CoV arrive at this proposed rate?

The Panel considers this question to be relevant. However, it is a question for the City of Vancouver, that was posed to Creative Energy and it is therefore not appropriate that Creative Energy respond. The Panel will be directing IRs to the City of Vancouver that will include this question in that IR set.

FEI IR 33.7.2 Please confirm that the CoV used the figure of \$89/MWh for its recommendation to City Council that is appended to the Application.

The Panel considers this question to be relevant. However, it is a question for the City of Vancouver, that was posed to Creative Energy and it is therefore not appropriate that Creative Energy respond. The Panel will be directing IRs to the City of Vancouver that will include this question in that IR set.

FEI 1.33.8 In addition to using the \$89/MWh comparison for natural gas in the CoV's recommendation to City Council and the article referenced in the previous question, has Creative Energy or CoV ever referenced the \$89/MWh number in public, in communications with developers or other stakeholders, or in materials available to the public? If so, when and to whom?

The Panel considers this question to be beyond the scope of this proceeding. Therefore, Creative Energy is not required to respond.

5.2 FAES IRs

By letter dated July 7, 2015 (Exhibit C4-4), FAES submitted a number of IRs that were posed by FAES and the BCUC to which Creative Energy had, in FAES' view, failed to provide an adequate response. By letter dated July 9, 2015 (Exhibit B-15), Creative Energy responded advising that it will provide supplemental responses to FAES 1.3.2.1, but objected to FAES' requests for supplemental responses to all other information requests identified in FAES' letter.

5.2.1 IRs which Creative Energy refused to respond

FAES IR 1.7.1 Please provide the results of the consultation with respect to the willingness of ratepayers to pay 10 per cent more than other sources of energy in the market today, including on-site Stream A TES.

This question relies on untested assumptions concerning the cost of energy. A response is not required.

FAES IR 1.31.7 Please compare the expected winter, summer and seasonal system efficiency for the provision of both space heating and DHW and for space heating only.

The Panel is not persuaded of the relevance of this question. FAES must establish the relevance if it wishes the question to be answered.

5.2.2 IRs which Creative Energy stated it does not understand

FAES IRs: 1.3.2.1, 1.3.2.3, 1.3.3, 1.7.1, 1.7.1.1, 1.12.2, 1.32.2.2

FAES stated that it intends to re-ask these questions in IR2, and, further, “to provide whatever clarification Creative Energy requires in order to enable it to provide meaningful responses to these requests.”⁷⁸

The Panel encourages the parties to work together to clarify these IRs.

5.2.3 IRs that involve City of Vancouver related questions

FAES IR 1.40.1 Please explain the COV’s position on the purchase of carbon offsets. Please provide a copy of relevant COV documents.

The Panel finds this question to lack relevance as presently framed and does not require the City of Vancouver to respond.

FAES IR 1.40.2 Please explain why the COV does not require Creative Energy to purchase carbon offsets to offer a Low-Carbon Alternative solution during Phase 1 of the NES.

The Panel considers this question to be relevant. However, it is a question for the City of Vancouver, that was posed to Creative Energy and it is therefore not appropriate that Creative Energy respond. The Panel will be directing IRs to the City of Vancouver that will include this question in that IR set.

FAES IR 1.41.1. Please describe the public consultations held by the COV, if any, with the stakeholders that may be affected by section 2.2 above, in particular the developers’ community, customer groups, other TES providers.

The Panel considers this question to be relevant. However, it is a question for the City of Vancouver, that was posed to Creative Energy and it is therefore not appropriate that Creative Energy respond. The Panel will be directing IRs to the City of Vancouver that will include this question in that IR set.

FAES IR 1.42.1. Please describe the Neighbourhood Energy Expert Panel and its role and mandate, and please indicate who the members of this panel are.

The Panel considers this question to be relevant. However, it is a question for the City of Vancouver, that was posed to Creative Energy and it is therefore not appropriate that Creative Energy respond. The Panel will be directing IRs to the City of Vancouver that will include this question.

⁷ T1:59

⁸ Exhibit C4-4, p. 2.

FAES IR 1.42.2. Please describe the nature of the consultation that took place with the Neighbourhood Energy Expert Panel to develop this by-law.

The Panel considers this question to be relevant. However, it is a question for the City of Vancouver, that was posed to Creative Energy and it is therefore not appropriate that Creative Energy respond. The Panel will be directing IRs to the City of Vancouver that will include this question.

FAES IR 1.42.3. If the Commission does not approve the exclusive nature of the NEA, and instead approved a non-exclusive franchise territory, will COV staff still bring the by-law forward for Council enactment in late 2015?

The Panel considers this question to be relevant. However, it is a question for the City of Vancouver, that was posed to Creative Energy and it is therefore not appropriate that Creative Energy respond. The Panel will be directing IRs to the City of Vancouver that will include this question.

FAES IR 1.42.4. Please list all other municipalities in the Metro Vancouver area that have enacted similar by-laws, and provide copies of those bylaws.

This question requires specialized knowledge or access to information that may be onerous to obtain. Further, this information can be brought forward as evidence by any party that wishes to do so. FAES has not provided sufficient evidence of the need for this information for the Panel to require Creative Energy to provide it. However, if FAES wishes to resubmit this question in IR2, the Panel directs Creative Energy to answer to the best of its knowledge.

FAES IR 1.42.5. Please confirm that COV's activities described above have presumed that the Commission would ultimately approve an exclusive Franchise Area for the designated utility. If not confirmed, please explain why the COV has required compatibility and connection to an NES through the rezoning policy since 2011.

The Panel does not consider this question be relevant and therefore does not require an answer.

FAES IR 1.42.6 Please confirm that the COV SEFC NEU has used a low-carbon renewable energy source from the start of its service.

The Panel considers this question to be relevant. However, it is a question for the City of Vancouver, that was posed to Creative Energy and it is therefore not appropriate that Creative Energy respond. The Panel will be directing IRs to the City of Vancouver that will include this question.

5.2.4 BCUC IRs

FAES also identified deficiencies related to Creative Energy's responses to some Commission IRs.

BCUC IR 1.35.1. Some concerns were identified which included concerns regarding the perceived cost premium, clarity around connection policies, concerns around lost opportunities in the absence of a strategy and concerns around sitting larger energy centers within the city. Please explain how Creative Energy mitigated these concerns.

During the procedural conference, Mr. Hobbs stated that if the Commission was to identify... information requests ... that are of concern to them, they're almost certainly going to get a speedy and fulsome response to those." **The Panel considers this question to be relevant as it deals with the issues of public interest and consultation. Creative Energy is directed to respond.**

BCUC IR 1.38.2. Please compare the benefits of providing Creative Energy an exclusive franchise in Chinatown at this time to the costs of reduced competition in Chinatown.

The Panel is unclear of the intent of the question and therefore does not require Creative Energy to respond. Commission Staff may wish to rephrasing and reissuing this question in IR2.

BCUC IR 1.40.1. Considering that the development of a new low carbon energy source is not expected until 2020, possibly through the conversion of the existing Downtown steam plant, and that a feasibility analysis for this conversion is currently underway, please discuss why it is appropriate, at this time, to propose that the NEFC and Chinatown NES be separate from the existing utility, rather than be considered extensions of the existing utility, with a separate rate class.

The Panel considers Creative Energy's response to be satisfactory.

BCUC IR 1.40.1.1. Please discuss the costs, risks and benefits of this alternative scenario.

The Panel is unclear of the intent of the question and therefore does not require Creative Energy to respond. Commission Staff may wish to rephrasing and reissuing this question in IR2.

BCUC IR 1.42.2. Should the fuel switch not go ahead how will this affect the agreement between the CoV and Creative Energy with regards to Phase 1?

The Panel considers Creative Energy's response to be satisfactory.

BCUC IR 1.44.1. Please discuss how Creative Energy proposes the Commission deal with the fact that the NEFC/Chinatown Neighbourhood Energy Agreement contains many provisions that relate to a subsequent phase of the proposed NES, and not just Phase 1.

The Panel considers Creative Energy's response to be satisfactory.

5.3 CEC IRs

In the procedural conference, CEC provided Exhibit C 2-3, which contained a number of CEC IR requests for which it considered Creative Energy's response to be inadequate. These IRs were grouped by CEC by topic. The Panel has retained that grouping.

MANDATORY CONNECTION	IR Question	Panel Comments
1.2.1	How many customers of what types would CE expect to serve with each of the NFES and the Chinatown ES and over which specific years for connection?	Creative Energy has provided a response. If CEC wishes to ask a follow-up question, it is free to do so in IR2.
1.3.3	Does CE anticipate that mandatory connection will be required for each district energy system that may be connected? Please explain why or why not.	This question does not require a response. It is hypothetical, requires Creative to speculate and is not relevant to the application.

MANDATORY CONNECTION	IR Question	Panel Comments
1.3.4	Does CE anticipate that mandatory connection to CE's future district/neighbourhood energy systems will be made available through a City of Vancouver bylaw? Please explain why or why	This question does not require a response. It is hypothetical, requires Creative to speculate and is not relevant
1.6.1	Please provide all the meeting notes, emails and other correspondence that has occurred between the City of Vancouver and Creative Energy in relation to this project and the proposed mandatory connection.	This question does not require a response. It is too broad. CEC has not established any specific need for this information.
1.67.2	Could the alternative energy system be economically implemented at 54% of target load? Please explain why or why not.	Creative Energy refuses to answer this question because it is not seeking approval of any low-carbon energy source costs and declines to provide more detailed analysis on the specific timing of a low-carbon energy source. While Creative Energy is not seeking approval for an alternative energy system at this time, the alternative energy system is an integral component of the proposed district energy systems. This is reflected, for example, in the title of this application. The Panel is of the view that consideration of the circumstances of the switch to the alternative energy system is warranted.
1.67.4	What percentages of build out load would CE expect without the ability to mandate connection and prevent alternative sources of energy from competing for customers in these areas?	This question addresses alternatives.
1.20.6	Please explain how users with specific uses for steam who are not within close proximity will be able to receive energy in the form of steam or other means to adequate to meet their requirements.	Creative Energy declines to answer this question because it is not clear what is being asked. The Panel suggests that CEC rephrase the question and resubmit it in IR2.

MANDATORY CONNECTION	IR Question	Panel Comments
COMMISSION APPROVAL APPROACHES		
1.1.8	If average costs lower than that for individual building systems are anticipated over the long term, could the incentive to connect be supplied through the use of deferral accounts to reduce initial costs? Please explain why or why not.	Creative Energy is directed to provide a response to this question The question addresses project alternatives. An analysis of project alternatives is part of the Commission's evaluation required under the CPCN guidelines. It assists the Commission in its consideration of public interest.
1.8.4	If the Commission decides to deny and or partially approve the CPCN based only on the NEFC loads and infrastructure, please explain what the CE's view of such a decision would be and under what circumstances it would proceed and how it would proceed in the event of a denial or partial approval of its plans.	The Panel considers Creative Energy's response to be satisfactory.
1.8.5	How would the application change if the Chinatown Neighbourhood aspects of the CPCN were eliminated from the scope of review for this CPCN? Please explain.	The Panel considers Creative Energy's response to be satisfactory.
1.8.6	What would be the effect of the Commission approving a CPCN only for the NEFC loads and infrastructure? Please explain.	Creative Energy answered this question adequately in response to CEC IR 1.8.4.
1.54.3	Will the NES proceed in the absence of approval of the Carbon Reduction Rider? Please explain why or why not.	The Panel considers this question to be relevant. However, it is a question for the City of Vancouver, that was posed to Creative Energy and it is therefore not appropriate that Creative Energy respond. The Panel will be directing IRs to the City of Vancouver that will include this question.
DISTRICT ENERGY SYSTEM EXTENT		
1.3.1	How many other systems will CE develop within 5-10 years	Creative Energy is not required to answer this question because it is speculative and not relevant to the current application.

MANDATORY CONNECTION	IR Question	Panel Comments
1.3.2	Please provide a brief overview of each extension that CE is currently contemplating with the location and boundaries of each anticipated district energy system, the forecast number of customers and incremental sales for each at full build out, the incremental annual steam demand at full build out and the anticipated timeframe of each likely addition.	Creative Energy is not required to answer this question because it is speculative and not relevant to the current application.
1.3.3	Does CE anticipate that mandatory connection will be required for each district energy system that may be connected? Please explain why or why not.	Creative Energy is not required to answer this question because it is speculative and not relevant to the current application.
1.12.9	To the extent that CE expands its energy systems to include multiple locations in the lower mainland would CE continue to consider that it requires an additional 75 basis points increase above it's the base regulated ROE as compensation? Please discuss.	Creative Energy is not required to answer this question because it is speculative and not relevant to the current application.
1.16.1	Does CE anticipate being the energy provider for all the Vancouver Neighbourhood Energy systems undertaken in the future? Please explain why or why not.	Creative Energy is not required to answer this question because it is speculative and not relevant to the current application.
1.16.2	Would CE expect to provide individual CPCNs for each neighbourhood energy system or would they be considered 'extensions' of others? Please explain.	Creative Energy is not required to answer this question because it is speculative and not relevant to the current application.
DES SYSTEMS COMPS		
1.4.1	Please elaborate further on the statement that hot water based systems are becoming standard in North America 'where steam is not typically required' and provide the evidence supporting this.	Creative Energy is directed to answer this question. This question has relevance, because Creative Energy is requesting approval for a hot water based DES, including capital to convert steam to hot water for its proposed DES.
1.4.4	How many hot water based DES	This question, along with 1.4.4.1, 1.4.4.2

MANDATORY CONNECTION	IR Question	Panel Comments
	systems are currently operating and/or planned in Canada?	and 1.4.4.4 requires specialized knowledge or access to information that may be onerous to obtain. CEC has not provided sufficient evidence of the need for this information for the Panel to require Creative Energy to provide it if it does not already have this information. This information can be brought forward as evidence by any party that wishes to do so. However, if CEC wishes to resubmit this question in IR2, the Panel directs Creative Energy to answer to the best of its knowledge.
1.4.4.1	Please provide a list of where these systems are operating/planned and identify when the systems were introduced.	See above
1.4.4.2	Please provide links to relevant websites if available.	See above
1.4.4.4	Of these systems, how many are mandated by municipal bylaw to require connection? How many are municipal owned as opposed to privately owned?	See above
1.4.6	Please provide a discussion of the pros and cons of a hot water based system from a commercial customer's perspective relative to: <ul style="list-style-type: none"> • Steam • Natural gas 	Creative Energy's response is very general and does not specifically address commercial customers as requested. Creative Energy is directed to provide a more fulsome response.
1.4.7	Please identify any regulations to which customers will be subject in the hot water based energy system that they would not be subject to in an alternative system.	Creative Energy states that it does not understand what is meant by "regulations". The Panel suggests that CEC rephrase the question and resubmit it in IR2.
1.50.6	There is no CEC IR 1.50.6	
COMPETITIVE ALTERNATIVES		
1.56.4	Please discuss the potential efficiency of various heating applications with electricity versus	Creative Energy declines to answer this question because it is not clear what is being asked.

MANDATORY CONNECTION	IR Question	Panel Comments
	hot water heating and whether or not these would be relevant to comparisons of heating from different sources.	The Panel suggests that CEC rephrase the question and resubmit it in IR2.
1.65.1	Please provide a cost comparison of solar hot water heating to the proposed NES Service costs tariffs.	This question addresses the economics of a building owner supplying their own heat vs. taking service from the DES. The Panel considers this relevant and directs Creative Energy to respond.
1.65.2	Please provide a cost comparison of in building heat recovery versus NES Service costs tariffs.	This question addresses the economics of a building owner supplying their own heat vs. taking service from the DES. The Panel considers this relevant and directs Creative Energy to respond.
FUEL SWITCHING PLANS		
1.60.2	Please discuss whether or not the economic justification for the large fuel switch is likely to require load from core customers.	The Panel is not persuaded of the relevancy of this question. The next series of IRs (1.67.1 through 1.67.4) addresses the circumstances of the switch, which will in all likelihood require some economic analysis of the fuel switch. If this question is relevant in that analysis, it can be addressed there.
1.67.1	At what target load is the optimal timing for the implementation of the alternative energy system?	Creative Energy refuses to answer this question because it is not seeking approval of any low-carbon energy source costs and declines to provide more detailed analysis on the specific timing of a low-carbon energy source. While Creative Energy is not seeking approval for an alternative energy system at this time, the alternative energy system is an integral component of the proposed district energy systems. This is reflected, for example, in the title of this application. The Panel is of the view that consideration of the circumstances of the switch to the alternative energy system is warranted.
1.67.2	Could the alternative energy system be economically implemented at 54% of target load? Please explain why or why not.	Creative Energy refuses to answer this question because it is not seeking approval of any low-carbon energy source costs and declines to provide

MANDATORY CONNECTION	IR Question	Panel Comments
		<p>more detailed analysis on the specific timing of a low-carbon energy source. While Creative Energy is not seeking approval for an alternative energy system at this time, the alternative energy system is an integral component of the proposed district energy systems. This is reflected, for example, in the title of this application.</p> <p>The Panel is of the view that consideration of the circumstances of the switch to the alternative energy system is warranted.</p>
1.67.3	If not, please provide the minimum% load at which the alternative energy system could be cost effectively implemented.	<p>Creative Energy refuses to answer this question because it is not seeking approval of any low-carbon energy source costs and declines to provide more detailed analysis on the specific timing of a low-carbon energy source. While Creative Energy is not seeking approval for an alternative energy system at this time, the alternative energy system is an integral component of the proposed district energy systems. This is reflected, for example, in the title of this application.</p> <p>The Panel is of the view that consideration of the circumstances of the switch to the alternative energy system is warranted.</p>
FINANCIAL ANALYSIS		
1.1.3	What is the minimum total load that would be necessary to establish a new hot water system in a district or neighbourhood? Please provide all calculations and assumptions.	The Panel considers this question to be relevant and directs Creative Energy to respond.
1.55.1	Please provide the minimum loads that would be necessary to implement the project.	The Panel considers this question to be relevant and directs Creative Energy to respond.
1.51.1	On what basis did CE calculate the NES-specific administration costs as 25% of maintenance costs? Please provide any evidence that CE relied upon in making this determination.	<p>Creative Energy responded: “</p> <p>The Administration costs can be driven by the volume of maintenance activities and administration costs drives approximately 25% of its costs. Creative</p>

MANDATORY CONNECTION	IR Question	Panel Comments
		Energy welcomes any other methodology that would provide a better gauge for determining administration costs. “ The Panel finds this response lacks detail and directs Creative Energy to provide a more fulsome response.
1.59.1	Please provide a sensitivity analysis assuming 5%, 10% and 15% reduction in NES sales.	The Panel considers this analysis to be useful in its assessment of alternatives and directs Creative Energy to respond.
1.62.1	Please provide sensitivities for the fixed and energy charges assuming a 5%, 10%, 15% reduction in NES sales.	The Panel considers this analysis to be useful in its assessment of alternatives and directs Creative Energy to respond.
COC RISK ISSUES/PREMIUMS		
1.12.1	Please provide a discussion of the general nature of the risks that accrue to CE and whether or not this risk is normally considered to be compensated for in its ROE of 9.5%.	The Cost of Capital forms part of the indicative rate, which is within the scope of this proceeding. The Panel directs Creative Energy to respond.
1.12.7	Please provide a discussion of why 75 basis points is the appropriate compensation for this presumed additional risk.	The Cost of Capital forms part of the indicative rate, which is within the scope of this proceeding. The Panel directs Creative Energy to respond.
COSTS & BENEFITS TO CUSTOMERS		
1.4.8	There is no CEC IR 1.4.8.	
1.17.1	Please provide an overview of the costs of connection that would accrue to a building owner and compare these to the costs of connection that would accrue to a building owner for other energy systems.	Creative Energy has provided a response concerning costs to its customers to connect. The Panel finds the part of the question requesting a comparison to lack specificity.
1.29.1	Please provide the cost comparisons for various potential service alternatives that were provided to the stakeholders as part of the consultation.	The Panel considers this question – along with 1.29.2 to 1.29.4 - to be relevant. However, it is a question for the City of Vancouver, that was posed to Creative Energy and it is therefore not appropriate that Creative Energy respond. The Panel will be directing IRs to the City of Vancouver and will include this question.
1.29.2	Please provide an estimate of the	See above

MANDATORY CONNECTION	IR Question	Panel Comments
	'cost premiums' about which the development community indicated concerns.	
1.29.3	What was the nature of the concerns around connection policies that required further clarification?	See above
1.29.4	Please provide an overview of the 'responsibilities' for the NES in Vancouver.	See above
1.43.5	How many customers on the core steam system are on the existing steam lines that will provide service to the NES and what is their combined load?	The Panel considers this question to be relevant to an assessment of the NES and directs Creative Energy to provide a response.
1.47.2	Please describe the conditions that could cause the boiler to 'trip out' or otherwise go down during a peak event.	Creative Energy's response is: There are several situations that could arise to cause a trip. The staff has been trained to mitigate these situations. The Panel finds this response lacks necessary detail and directs Creative Energy to provide a more fulsome response.
1.52.3.1	If yes, please provide the amount and value of any freed up square footage.	The Panel does not consider any further information to be required.
1.62.3	Please provide the estimated cost for an average residential user within the NEFC.	Creative Energy has responded that the Application clearly provides indicative rates. The Panel considers this question to have been answered adequately.
1.62.4	Please provide the estimated cost for an average commercial user within the NEFC.	Creative Energy as responded that the Application clearly provides indicative rates. The Panel considers this question to have been answered adequately.
OTHER BENEFITS TO UTILITY STAKEHOLDERS		
1.12.3	Will developers and or customers within the franchise area receive benefits from the City of Vancouver for participating in the NES?	Creative Energy declines to answer this question because it "does not understand what CEC means by 'benefits from the City of Vancouver'". The Panel suggests that CEC rephrase the question and resubmit it in IR2.