



IESO Staff Recommendation to Panel on Exemption Application (General)

All information submitted in this process will be used by the IESO solely in support of its obligations under the "Electricity Act, 1998", the "Ontario Energy Board Act, 1998", the "Market Rules" and associated policies, standards and procedures and its licence. All submitted information will be assigned the appropriate confidentiality level upon receipt.

Terms and acronyms used in this Form that are italicized have the meanings ascribed thereto in Chapter 11 of the "Market Rules".

PART 1 – GENERAL INFORMATION

Market Participant Name: Brookfield Power Prince Wind LP

Location/Site: Prince Wind Farm

Exemption Application ID: 1344

Market Participant ID: 109238

Description of Exemption Requested: Applicant is seeking exemption from specification in Market Manual 1.2, Appendix E that information must be provided to the IESO from MET towers and from the generator Nacelles.

Date Exemption Application Received: April 22, 2013

Date all relevant application information supplied by exemption applicant: April 23, 2013

Management Approvals Obtained: Yes No

Are there any outstanding disputes, compliance actions, or pending market rule amendments involving the subject matter of this exemption application? Yes No

Are there any outstanding disputes, compliance actions, or pending market rule amendments involving the exemption applicant? Yes No

Section of the Exemption Application and Assessment Procedure under which the exemption application is made: Market Rules, chapter 4, section 7.1.6

Market Rule(s) or related Market Manual(s) from which exemption is requested:

Third Party Submissions Received: Yes No

Supplemental Assessment Information Attached: Yes No

Exemption Application ID:

PART 1 – GENERAL INFORMATION

Related Historical *Exemption Application(s)* or Related *Exemption Application(s)* in Process:

Yes No

Note: If YES, list History of *Exemption Applications*:

Role of *exemption applicant* in the market as it relates to this *exemption application*: Variable
Generator

PART 2 – RECOMMENDATION

Recommendation: Grant the exemption to Brookfield Power Prince Wind LP for their Prince I and Prince II facilities for the provision of wind direction from their nacelles for 2 years and the provision of relative humidity from their meteorological towers for the life of their data acquisition system.

Criteria Used in Assessment of General Exemption Applications (Section 1.4.2 of Exemption Application and Assessment Procedure):

(If X appears in a box, the criterion is applicable to this *exemption application* and is evaluated in Part 3 - Details of Assessment; if X does not appear in a box, the criterion is not applicable to this *exemption application*.)

Whether the *exemption* that is the subject-matter of the *exemption application* would, if granted, materially:

[None of the next five criteria in the section below are considered to have any material impact and, as such are not selected]

- impact the ability of the *IESO* to direct the operations and maintain the *reliability* of the *IESO-controlled grid*;
- impact the ability of the *IESO* to ensure non-discriminatory access to the *IESO-controlled grid*;
- affect the ability of the *IESO* to operate the *IESO-administered markets* in an efficient, competitive, and reliable manner;
- increase costs of *market participants*; or
- increase costs of the *IESO*;

Whether the *exemption* that is the subject-matter of the *exemption application* would, if granted, give the *exemption applicant* an undue preference in the *IESO-administered markets*;

Whether the cost or delay to the *exemption applicant* of complying with the obligation or standard to which the *exemption application* relates is reasonable, having regard to the nature of the obligation or

PART 2 – RECOMMENDATION

standard, the nature of the <i>exemption application</i> and the anticipated impact of non-compliance by the <i>exemption applicant</i> in terms of the elements referred to above;	<input checked="" type="checkbox"/>
The adequacy of the <i>exemption</i> plan submitted by the <i>exemption applicant</i> ;	<input type="checkbox"/>
Where the <i>exemption applicant</i> is the <i>IESO</i> , the identification of the benefit to <i>market participants</i> of compliance with the obligation or standard relative to the financial and other resources required to achieve compliance within such deadlines as may be applicable;	<input type="checkbox"/>
Where the <i>exemption applicant</i> is the <i>IESO</i> , the manner in which it proposes to operate in the <i>IESO-administered markets</i> or direct the operations and maintain the <i>reliability</i> of the <i>IESO-controlled grid</i> during the period in which the <i>exemption</i> would be in effect;	<input type="checkbox"/>
Whether the <i>facility</i> or equipment that is the subject-matter of the <i>exemption application</i> :	
• was in service or was returned to service on the date on which the obligation or standard to which the <i>exemption</i> application relates came into force;	<input checked="" type="checkbox"/>
• was ordered by the <i>exemption applicant</i> on or prior to the date on which the obligation or standard to which the <i>exemption application</i> relates came into force; or	<input type="checkbox"/>
• was in the process of construction on or prior to the date on which the obligation or standard to which the <i>exemption application</i> relates came into force; and	<input type="checkbox"/>
The capability of the owner of the <i>facility</i> to operate the <i>facility</i> consistent with the terms of the proposed <i>exemption</i> .	<input type="checkbox"/>

PART 3 – DETAILS OF ASSESSMENT

SUMMARY:

PART 3 – DETAILS OF ASSESSMENT**1. Exemption Request:**

Brookfield Power Prince Wind LP is requesting an exemption from Market Rule Chapter 4 Section 7.1.6 which requires (via Market Manual 1.2 Appendix E) wind generation facilities to provide the following dynamic data: wind speed, wind direction, ambient air temperature, barometric pressure, MW output and relative humidity from both turbine nacelles and meteorological towers, the number of which being dependent on the size of the facility. More specifically Brookfield Power Prince Wind LP:

- 1) is requesting an exemption from providing wind direction from their wind turbines for a period of two years to allow for the recalibration of the nacelle position indication at each of their 126 turbines. The Prince Wind Farm (Prince I and Prince II) is currently providing wind direction from their meteorological towers.
- 2) is requesting an exemption for providing relative humidity measured in percentage from their meteorological towers for the remaining life of the meteorological tower data acquisition system. Their existing 4 channel acquisition system is only capable of collecting and transmitting 4 out of 5 requested data points and would require a complete upgrade/replacement of equipment and local SCADA software to be compliant with the IESO Market Rules.

The Prince Wind Farm (Prince I and Prince II) was in service prior to the date that the relevant IESO Market Rule came into effect.

ASSESSMENT:

The purpose of the data requested by Chapter 4 Section 7.1.6 and listed in Market Manual 1.2 Appendix E is for the purposes of deriving forecasts of the amount of energy that the variable generator is capable of producing. Wind direction is required to be measured from both the meteorological towers and turbine nacelles. Although there is benefit to having this data measured from both places, the centralized forecast should not be meaningfully impacted by these resources only providing this data from the meteorological towers for the next two years while they recalibrate their equipment.

In regards to their inability to provide relative humidity from their meteorological towers, although this data is helpful in producing an accurate forecast, this is a value that can be approximated from nearby weather stations for the purposes of generating an accurate centralized forecast. Given that the relative humidity can be approximated from nearby weather stations, and not all facilities in that area are exempt from providing this data, it is not felt that the cost to comply would outweigh any benefit that would be seen to the centralized forecast.

PART 3 – DETAILS OF ASSESSMENT

RECOMMENDATION:

The IESO is satisfied that granting both of these exemptions would not cause any significant forecast error and thus will cause no impact to reliability.

As such, IESO staff recommends that the exemption for Brookfield Power Prince Wind LP’s Prince I and II f wind generation facilities be granted for the two year period requested for the provision of wind direction from the turbine nacelles and for the provision of relative humidity from the meteorological towers for the life of the data acquisition system.

PART 4 – TERMS AND CONDITIONS

<p>Effective Date of Exemption (or event causing <i>exemption</i> to become effective)</p>	<p>The date when and if exemption is filed</p>
<p>Date of Expiration of Exemption</p> <ul style="list-style-type: none"> • If greater than 5 years, the Panel must be satisfied that the circumstances justify a later date. • Circumstances which will cause the <i>exemption</i> to immediately expire. 	<p>2 years for wind direction Life of the data acquisition system for relative humidity</p>
<p>Market Rule(s) or related Market Manual(s) from which the <i>Exemption</i> is granted.</p>	<p>Chapter 4, Section 7.1.6, and Market Manual 1.2, Appendix E</p>
<p>Restrictions on the manner of operation and/or additional obligations to be met during the term of the Exemption, if any.</p>	<p>None</p>

PART 4 – TERMS AND CONDITIONS

<p>Monitoring Information Required</p> <p>Information required to be provided by the <i>exemption applicant</i> for monitoring by the <i>IESO</i>.</p>	None
<p>Payment of Costs</p> <ul style="list-style-type: none"> • Processing Costs (when introduced) • Incremental <i>Exemption</i> Costs • <i>Settlement amounts</i> to be withheld or repaid. 	Not Applicable
<p>Reconsideration/Removal</p> <ul style="list-style-type: none"> • Date on which the <i>exemption</i> will be reconsidered (if applicable). • Circumstances under which the <i>exemption</i> will be reconsidered (if applicable) other than unforeseen future change in circumstances. 	N/A
<p>Transferability</p> <ul style="list-style-type: none"> • List the terms and conditions that need to be met to allow for a transfer of this <i>exemption</i> to be approved by <i>IESO</i> staff. 	None
<p>Other:</p>	