### **BEFORE THE PUBLIC SERVICE COMMISSION OF WISCONSIN**

Application of Northern States Power)Company, a Wisconsin Corporation, for)Authority to Adjust Electric and Natural Gas Rates)

### **REBUTTAL TESTIMONY OF JONATHAN WALLACH ON BEHALF OF THE CITIZENS UTILITY BOARD OF WISCONSIN**

October 31, 2012

#### 1 I. Introduction

- 2 Q: Please state your name, occupation, and business address.
- 3 A: My name is Jonathan F. Wallach. I am Vice President of Resource Insight, Inc.,
- 4 5 Water Street, Arlington, Massachusetts.
- 5 Q: Are you the same Jonathan Wallach that filed direct testimony in this 6 proceeding?
- 7 A: Yes.
- 8 Q: On whose behalf are you testifying?
- 9 A: I am testifying on behalf of CUB.
- 10 **Q:** What is the purpose of your testimony?
- 11 A: This rebuttal testimony addresses the following issues raised in direct testimony
- 12 filed in this proceeding:

- Amortization and recovery through rates of cleanup costs for the
   Ashland Site, as proposed by Commission staff member Christine A.
   Swailes.
- Allocation to the residential class of the revenue deficiency for the 2013
  test year, as proposed by Commission staff member Jerry Albrecht.
- Allocation of all production capacity costs on the basis of each customer
   class's contribution to the average of the four summer monthly peaks
   (4CP), as proposed by Richard A. Baudino on behalf of the Wisconsin
   Industrial Energy Group (WIEG).
- 10 II. Recovery of Ashland Site Cleanup Costs

# Q: How does Commission staff member Ms. Swailes respond to the Company's proposal for recovering the cost to clean up the Ashland Site?

- A: Ms. Swailes asserts that it "may be appropriate" to implement the Company's proposal to amortize cleanup costs over a ten-year period starting in the 2013 test year.<sup>1</sup> However, Ms. Swailes proposes that amortization start in 2013 only for those costs estimated to be incurred in 2012 and 2013 for the cleanup of the Upland Area, but not those estimated for cleaning up the bay.
- In addition, Ms. Swailes states that "it appears appropriate" to allow the
   Company to recover carrying costs on unamortized balances at the cost of debt.<sup>2</sup>

## Q: Did Ms. Swailes estimate the cost impact of implementing the Company's proposal?

<sup>&</sup>lt;sup>1</sup> Direct-PSC-Swailes-3, line 7 (PSC Ref #:175093).

<sup>&</sup>lt;sup>2</sup> Direct-PSC-Swailes-5, line 7.

A: Yes. Ms. Swailes's analysis confirms the finding in my direct testimony that,
compared to the Commission's current policy, the Company's proposal would
dramatically further shift the cleanup cost burden from shareholders to
ratepayers. Specifically, Ms. Swailes finds that the Company's proposed
modifications to the Commission's current policy would increase ratepayers'
share of cleanup costs from % to %.<sup>3</sup>

## Q: What is the basis for Ms. Swailes's observations regarding the appropriateness of the Company's proposal?

9 A: Ms. Swailes believes that it may be appropriate to make an exception to
10 Commission policy in this case, and only this case, because the Ashland Site
11 cleanup presents a unique situation:

12 The Ashland site is like no other in the state. It is an Environmental 13 Protection Agency (EPA) Superfund site, the cost of clean-up will be 14 significant in comparison to the size of NSPW, and several regulatory 15 agencies are involved in negotiating and planning for the clean-up. 16 Whatever is decided in this proceeding regarding Ashland MGP clean-up is 17 unique to that site.<sup>4</sup>

Furthermore, Ms. Swailes finds that the Company's proposal may be appropriate because the resulting cost sharing between ratepayers and shareholders falls within the range of results from application of the Commission's current policy in prior cases.

- 22 Q: Do you agree that the Ashland Site cleanup is exceptional?
- 23 A: Yes. What is exceptional in this case is the magnitude of the potential cost
- burden on the Company's natural-gas customers, and the fact that this burden is

<sup>&</sup>lt;sup>3</sup> Ex.-PSC-Swailes-1c, Schedule 1 (PSC REF #:175098).

<sup>&</sup>lt;sup>4</sup> Direct-PSC-Swailes-2, ll. 3-7.

the consequence of a merger which offered little in the way of compensating
 benefits to those customers.

Given these exceptional circumstances, it would not be appropriate to shift even more of the cleanup costs from shareholders to ratepayers, as would be the case under the Company's proposal. To the contrary, the appropriate and equitable response to the unique circumstances in this case would be to implement a cost-recovery mechanism that mitigates the potential cost burden on ratepayers.

9 Q: Are there alternatives to the Commission's current policy that might offer
10 benefits to both ratepayers and shareholders?

11 A: Yes. One option would be to amortize cleanup costs to rates starting in the 2013 test year, as with the Company's proposal, but to amortize those costs over more 12 than the ten years proposed by the Company and without the carrying costs 13 14 proposed by the Company. For example, cleanup costs could be amortized over fifteen years starting in 2013, without any carrying costs on unamortized 15 balances. In this case, I estimate that ratepayers' share of total cleanup costs 16 would decline from % under the Commission's current policy to % under 17 this alternative cost-recovery option.<sup>5</sup> Moreover, the maximum reduction to the 18 Company's return on equity (in 2015 and 2016) would decline from basis 19 points under the Commission's current policy to basis points under this 20 alternative. 21

<sup>&</sup>lt;sup>5</sup> According to the analysis by Ms. Swailes, this lower percentage is still well within the range of cost sharing resulting from application of the Commission's current policy in prior cases (i.e., where ratepayers have paid, on average, 50% to 85% of total MGP cleanup costs). Direct-PSC-Swailes-4.



1 A: Ms. Swailes proposes to exclude projected costs for cleaning up the bay because she believes that there is too much uncertainty at this time with regard to those 2 cost projections for 2013. Instead, Ms. Swailes suggests that recovery of bay 3 cleanup costs be deferred for another year to allow the regulatory process to 4 unfold and to gain greater certainty as to the magnitude of the costs required to 5 clean up the bay. 6

7 Ms. Swailes's proposal appears to be an appropriate and practical way to 8 address uncertainty at this time regarding the bay cleanup costs.

**III.** Revenue Allocation 9

#### 10 **Q**: Please summarize Commission staff member Mr. Albrecht's study of revenue allocations to customer classes. 11

12 A: Mr. Albrecht presents three variations on the Company's class cost of service 13 study (CCOSS) using Commission staff's proposed revenue requirements for the 2013 test year. Two of these studies vary the classification and allocation of 14 production capacity costs. One variant classifies 60% of production capacity 15 costs as demand-related and the remaining 40% as energy-related ("Time of Use 16 study"), while the other classifies all production capacity costs as demand-17 18 related ("Capacity study"). The third study modifies the allocator used for 19 distribution plant costs so that all such costs are allocated on demand ("Location 20 study").

#### **Q**:

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### What do you conclude from your review of Mr. Albrecht's analysis?

It would not be appropriate to rely on the results of the Capacity study to 22 A: 23 allocate Commission staff's proposed revenue increase. As I discussed in my direct testimony, classifying all production capacity costs as demand-related is 24 inconsistent with the investment decision-making that gave rise to such costs, 25

since such investments were driven by changes in both customer demand and
 energy requirements. In fact, I found in my direct testimony that it would be
 more appropriate and consistent with cost causation to classify 40% of
 production capacity costs as demand-related and 60% of such costs as energy related.

6 It would also not be appropriate to rely solely on the results of Mr. 7 Albrecht's Time of Use study to allocate the 2013 test year revenue deficiency, 8 since this study misclassifies demand-related distribution plant costs as 9 customer-related based on an unreliable minimum-system analysis. As is 10 indicated by the results of Mr. Albrecht's Location study, correcting for this 11 misclassification of distribution plant costs reduces the allocation of the 2013 12 test year revenue deficiency to the residential class by more than 50%.

13 On the other hand, Mr. Albrecht's Location study may overstate the portion 14 of distribution plant costs reasonably classified as demand-related, since it appears that this study classifies all services costs as demand-related. As I 15 discussed in my direct testimony, it may be more appropriate to classify all 16 17 services costs as customer-related for cost-allocation purposes. Taking into 18 consideration this potential classification issue, as well as the likely 19 overstatement of the appropriate demand-related portion of production capacity 20 costs, the results from Mr. Albrecht's Location study using Commission's staff's adjusted revenue requirement indicate that residential rates should be increased 21 22 by no more than 3%.

#### 23 IV. Classification and Allocation of Production Capacity Costs

Q: What does WIEG witness Mr. Baudino propose with regard to the
 classification and allocation of production capacity costs?

A: Mr. Baudino proposes that all production capacity costs be classified as demand related, and that all such demand-related costs be allocated using the 4CP
 allocator.

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### Q: What is the basis for Mr. Baudino's proposal that all production capacity costs be classified as demand-related?

A: Mr. Baudino offers three arguments in support of his proposal to classify all
 production capacity costs as demand-related. First, Mr. Baudino argues that only
 peak loads, and not system energy requirements, drive investments in
 production plant:

Fixed production costs should all be classified as demand-related and allocated to customer classes on the basis of class contribution to system peak demand. This latter approach recognizes the fact that all production plant must be available and on line to meet the peak demand requirements of NSPW's customers. Excess capacity exists during off-peak periods, indicating that off-peak loads and consumption do not contribute to the need for full production capacity throughout the year.<sup>6</sup>

17 Second, Mr. Baudino asserts that classifying fixed production costs as 18 energy-related would result in off-peak prices that exceed marginal off-peak 19 energy costs and therefore would "discourage the improvement of customer load 20 factors and the use of existing base load and intermediate load plant."<sup>7</sup>

<sup>&</sup>lt;sup>6</sup> Direct-WIEG-Baudino-6, line 14 through Direct-WIEG-Baudino-7, line 3 (PSC REF #: 175068).

<sup>&</sup>lt;sup>7</sup> Direct-WIEG-Baudino-7, ll. 7-9. Mr. Baudino also argues that energy classification of production capacity costs would penalize customers with high load factors, because these customers would incur higher costs than would be the case with demand classification if they were to shift usage to off-peak periods. However, this argument appears to be the same as his second argument that energy classification would drive off-peak prices above marginal energy costs.

1		Finally, Mr. Baudino argues that all production capacity costs should be
2		classified as demand-related, because such costs, once incurred, do not vary
3		with energy usage:
4 5 6 7		Further, fixed production costs do not vary with energy consumption throughout the year. In other words, NSPW does not incur less fixed production costs if energy usage falls. These costs by their very nature are fixed and so they must be allocated based on class demands. <sup>8</sup>
8	Q:	Are production capacity costs incurred solely for the purposes of meeting
9		peak demand, as Mr. Baudino contends?
10	A:	No. As I discussed in my direct testimony, under typical generation expansion
11		planning practice, plant investment is driven by both reliability requirements
12		and system energy requirements, with the overall goal of meeting both peak and
13		energy requirements at lowest total cost. System planners would likely invest
14		solely in peaking capacity if plant investment were driven solely by reliability
15		requirements, since peaking units would be the least-cost option for meeting an
16		increase in peak demand and planning reserve requirements. However, the
17		Company has also invested in baseload and intermediate capacity, even though
18		these units have higher fixed costs than peaking capacity, in order to minimize
19		the total cost of meeting an increase in energy requirements.
20		From a cost-causation perspective, the fixed costs incurred for baseload or
21		intermediate capacity over and above those incurred for peaking capacity are
22		appropriately classified as energy-related, since these additional fixed costs are
23		incurred to meet energy requirements at lowest total cost.

<sup>&</sup>lt;sup>8</sup> Direct-WIEG-Baudino-9, ll. 15-18.

Q: Do you agree that classifying fixed production costs as energy-related
 would dampen customer incentives to improve load factor or reduce peak
 demand?

4 A: I do not. The process of classifying and allocating costs has little bearing on
5 whether demand or energy rates provide efficient price signals.

Mr. Baudino's concern is one of rate design, not cost allocation. The cost-6 7 allocation process is primarily concerned with the assignment of system costs to 8 customer classes based on cost causation. Once those costs have been allocated 9 to customer classes, the rate-design process attempts to create rate structures that 10 recover those allocated costs while promoting efficient outcomes. In other words, it is the rate-design process, not the cost-allocation process, that 11 12 determines whether rates provide efficient price signals and promote economic 13 improvements to load factor or reductions in peak demand.

### Q: How do you respond to Mr. Baudino's assertion that fixed production costs do not vary with energy usage?

A: Mr. Baudino is correct in his assertion that fixed production costs do not vary
with energy usage. For that matter, neither do such costs vary with peak
demand. Thus, by Mr. Baudino's reasoning, it would not be appropriate to
classify production capacity costs as either demand-related or energy-related,
since investments in production plant do not vary with either peak demand or
energy usage.

From a cost-causation perspective, the relevant consideration for classifying production capacity costs is not the extent to which such costs vary with demand or energy once placed in ratebase, but the extent to which the Company's investments in production plant were driven by increases in planning-reserve or energy requirements. From this perspective, it would be unreasonable to classify all production plant costs as demand-related, since
 investments in baseload and cycling plant were driven by the need to meet both
 reliability and energy requirements.

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### Q: Why does Mr. Baudino recommend allocating demand-related production capacity costs using the 4CP allocator?

A: Mr. Baudino argues that using the 4CP allocator is justified by the fact that the
average peak demand over the four summer months is 25% higher than the
average peak demand over the winter months and by the fact that there is excess
capacity on the Company's system during the non-summer months. Mr.
Baudino's argument appears to be that the 4CP allocator is justified because
reliability requirements, and thus demand-related production capacity costs, are
driven solely by peak demands in the four summer months.

13 Q: Is this a valid argument?

A: No. Peak demands during non-summer months also contribute to annual loss of
load probability (LOLP) and thus system reserve requirements. For example, the
scheduling of plant maintenance during low-demand shoulder months can
reduce capacity margins during peak periods in those shoulder months and thus
increase annual LOLP and reserve requirements. Consequently, peak demands
in non-summer months also contribute to the need for investments in demandrelated production capacity.

In addition, the difference in capacity margins between the summer and winter periods may not be as large as implied by Mr. Baudino's comparison of summer to winter peak loads due to the impact of the Company's system diversity agreements with Manitoba Hydro. These agreements require Manitoba Hydro to make capacity available to the Company during the summer months and the Company to do the same for Manitoba Hydro during the winter. These diversity exchanges increase available capacity to serve the Company's peak
 demand in the summer, and thus increase summer capacity margins, but reduce
 available capacity and capacity margins in the winter.

The impact of these diversity exchanges on summer-winter peak 4 differentials appears to be significant. According to the forecast of 2013 monthly 5 demand on the NSP system provided in the Company's response to IDR FCP (S-6 7 13) (PSC REF #: 165817), the average peak demand for the four summer 8 months for the NSP system is forecast to exceed that for non-summer months by % before consideration of the diversity exchanges. However, the 9 about 10 Company's response to IDR FCP (S-13) also shows that the excess of summer over non-summer peaks falls below % once the impact of the diversity 11 12 exchanges are netted from gross monthly peaks.

### Q: What do you conclude from your review of Mr. Baudino's proposal for classifying and allocating production capacity costs?

A: Mr. Baudino has failed to offer a reasonable basis for his proposal. The
Commission should therefore reject Mr. Baudino's recommendations to classify
all production capacity costs as demand-related and to allocate such costs using
the 4CP allocator.

- 19 Q: Does this complete your rebuttal testimony?
- 20 A: Yes.