

April 12, 2021

Memorandum

To: Montana PSC

From: Gary Duncan – Program Manager – Revenue Requirements

Subject: Utility Investment Valuation and Senate Bill 379

PURPOSE:

Staff has prepared and issued two Staff Memorandum regarding SB 379. Those two memos were compiled based on the knowledge of the Commission's Legal and Regulatory staff, including myself. Hopefully, they have provided valuable information regarding staff's perspective on SB 379. This memo expands on the existing staff memos. It reflects my concerns, from a revenue requirement perspective, about the SB 379 language mandating how the Commission would be required to value additional shares of Colstrip acquired by NorthWestern Energy. The valuation language of SB 379 is fairly clear. What is not entirely clear, is does the bill really require any Colstrip additional share investments valued per the bill, to also be subject to depreciation, and the associated potential annual revenue requirement and stranded investment costs to ratepayers? For this memo, I assume depreciation is a requirement of the bill.

BACKGROUND

Montana Public Service Commission Utility Valuation – Background, Theory, and Practice

Two of the general standards of utility regulation followed by the Montana Commission are that a utility is entitled to a “return on its investment” and a “return of its investment”. The “return on investment” is the result of the Commission approving a valuation for the utility investment and then approving a “rate of return” to be applied to the amount of that investment. The “return of the investment” is accomplished by the Commission approving annual depreciation expenses such that over the useful life of the investment, the value of that investment approved by the Commission is returned to the utility. The customers of the utility, or “ratepayers”, are responsible for paying for both the return on, and return of, the approved valuation of utility investments.

The term “net book” is the value of the investment, less the amount of depreciation that has been booked over time, which is termed Accumulated Depreciation. When an investment is made in a utility asset, that asset will appear on the books of the utility as “Plant in Service”. Thus, the net book of an investment is Plant in Service minus the Accumulated Depreciation. The return dollars to the utility are based on the net book of the investment¹ while the depreciation expense is based on initial valuation of the investment booked as plant in service.

^{11 1} In reality the return dollars are calculated by taking the allowed rate of return times “rate base.” Rate base is essentially the net book amount plus and minus certain other adjustments. The biggest of these is a deduction from the net book amount of “Accumulated Deferred Income Taxes.” In the last NWE electric general rate case,

The valuation of the utility investments by the Commission **is critical** in the establishment of just and reasonable rates. That valuation can drive millions of dollars in rate revenues to be recovered from utility customers, or in this case, NWE customers.

Montana has a statute which guides the valuation of utility investments. This statute has been in effect since 1975 and controls all Commission decisions regarding the valuation of utility investments.

Montana Code Annotated 2019

TITLE 69. PUBLIC UTILITIES AND CARRIERS

CHAPTER 3. REGULATION OF UTILITIES

Part 1. Role of Commission and Power of Eminent Domain

Ascertaining Property Values

69-3-109. Ascertaining property values. The commission may, in its discretion, investigate and ascertain the value of the property of each public utility actually used and useful for the convenience of the public. The commission is not bound to accept or use any particular value in determining rates. However, if any value is used, the value may not exceed the original cost of the property, except that the commission may include all or some of an acquisition adjustment for certain property purchased by a public utility in the purchasing utility's rate base if the transfer of the property to the purchasing utility is in the public interest. In making the investigation, the commission may avail itself of all information contained in the assessment rolls of various counties or in the public records of the various branches of the state government or of any other information obtainable, and the commission may at any time on its own initiative make a revaluation of the property.

History: En. Sec. 6, Ch. 52, L. 1913; re-en. Sec. 3884, R.C.M. 1921; re-en. Sec. 3884, R.C.M. 1935; amd. Sec. 1, Ch. 28, L. 1975; R.C.M. 1947, 70-106; amd. Sec. 1, Ch. 373, L. 1995.

All utility investment valuations approved by this Commission since 1975 adhere to this statute. The valuations of different utility investments included as Plant in Service are based mostly on the original cost standard. However, in the case of several NWE examples, the Commission has used the purchase price as the basis for the valuation. The “original cost” standard uses the actual cost of the investment by the utility and its shareholders to value any investment. A simple example would be if it cost NWE \$3,000 to buy and install a utility pole, that would be

the net book amount for NWE's current 30% share of CU4 was \$340 million while rate base was \$304 million. Offsetting the Deferred Income Tax Deduction would be capital additions made to Plant in Service over the useful life of the asset. However, for this analysis we will focus solely on the net book valuation method proposed in SB 379.

the original cost of the investment and NWE would be allowed to earn a return on the \$3,000 original cost of that pole.

For NWE, there are several examples of the purchase price being used as the valuation of an investment. Two prime examples of this methodology are its investments in its current share of CU4 and its Hydro Assets.

MCA 69-3-103 is the basis for all utility valuations in Montana approved by this Commission for all water, telecommunications, gas, and electric utilities. There have been no significant issues or concerns voiced by Montana regulated utilities regarding the statute itself, or the application of the statute by the Commission. The statute applies a fair standard to investment valuation, and this is recognized by the Commission, the Montana regulated utilities, and obviously the legislature itself which approved the statute.

The fundamental foundation and cornerstone of this Montana statute is that the valuation of utility investment is based on the actual amount of real dollars invested by the utility. Both the original cost and purchase price methods reflect the actual amount of utility investment.

ANALYSIS

Estimated Impacts of SB 379 Mandated Investment Valuation Methodology

The language in the following section of SB 379 mandates how the Commission is to value additional shares of Colstrip acquired by NWE, in direct contradiction to MCA 69-3-103.

SB 379, NEW SECTION. Section 1. (2)

“The Commission shall also allow for a rate of return on an equity interest, lease, or power purchase agreement. The Commission must determine the rate of return based on the value attributed to the additional interest, lease, or power purchase agreement according to the book value of the existing ownership interest prorated by size in megawatts.”

The estimates of the costs that could be incurred by NWE customers because of the seemingly innocuous language of the last fifteen words of that section are discussed below.

- 1.) The existing ownership referenced in the section can only apply to one ownership share and one company, Northwestern’s current 30% ownership share of CU4.
- 2.) In the last NWE general electric rate case (Docket 2018.02.012) the Commission approved a net book value for NWE’s 30% share of \$339.29 million. Subtracting three years of additional depreciation since that value was approved, the estimated net book value is now \$298.24 million.
- 3.) To prorate that net book based on the size in megawatts, as mandated in SB 379, you simply divide the estimated net book value of \$298.24 million by 222 MW which then means that additional shares, leases, or power purchase agreements must be valued at \$1.34 million per MW.
- 4.) The Commission approved an 8.7% pre-tax rate of return for NWE in that docket. This excludes the special rate of return granted to NWE for its CU4 ownership in 2008 in

Docket 2008.6.69. If additional Colstrip shares are acquired by NWE by 2022, the service life of those shares through 2042 would be 21 years. So, the annual return required on the prorated \$1.34 million per MW is \$.117 million in the first year and the annual depreciation expense is \$.064 million which would be collected every year for the 21-year assumed life of Colstrip. Together, the annual revenue requirement to be paid by NWE customers for every additional MW share acquired by NWE is \$.181 million in the first year. As the Net Book value decreases year over year during the 21-year plant life, the return revenue requirement will eventually decrease to zero.

- 5.) The actual dollar meaning of NEW SECTION 1.(2) becomes a simple formula. For every additional Colstrip MW acquired by NWE, the valuation used by the Commission for plant in service is required to be \$1.34 million per MW and the associated annual NWE customer revenue requirement is \$.181 million in the first year, decreasing to just the depreciation amount of \$.064 million at the end of year 21 or 2042..

The impact of that simple formula mandated by SB 379 results in significant customer rate impacts. Take the following example. In 2019, Docket No. 2019.212.101, NWE filed with the Commission to approve the acquisition of Puget Sound Energies' 185 MW share of CU4. The purchase price paid by NWE was to be \$1. Per existing statute and past practice, NWE filed to have the investment valued at \$1 and \$1 was to be shown as plant in service, with zero accumulated depreciation yielding a filed net book valuation of \$1. The first-year total rate of return and depreciation revenue requirement **was \$0.13 annually**. If NWE filed exactly the same proposal today, to purchase the 185 MW from Puget for \$1, SB 379 would require the Commission to assign a valuation to that plant of \$248.5 million. The total annual return and depreciation revenue requirement would be \$33.5 million in the first year. The first-year annual revenue requirement per NWE customer under the \$1 NWE actual filing was measured in the **thousandths of a cent**. Under SB 379 the first-year annual revenue requirement per NWE customer is **\$86**.

The initial \$248.5 million valuation mandated by SB 379 would be the initial net book value in 2022. That net book value would decrease each year because of increasing accumulated depreciation, such that the value by 2043 equals zero. Therefore, the annual revenue requirement also would decrease annually from the initial \$33.5 million in 2022 (\$86/customer, to zero in 2043. This must be recognized in calculating the total customer revenue requirement for the 21-year assumed life of Colstrip. Over the 21-year life of the 185 Puget MW share, at the initial NWE filing valuation of \$1, the total return plus depreciation revenue requirement would have been **\$1.96**. That same 21-year total revenue requirement, using the valuation method mandated in SB 379, is **\$487 million or \$1,250 per customer**.

These numbers obviously get much larger the more MWs added by NWE. If NWE was to acquire the remaining CU4 shares, under SB 379 the total valuation of those 518 MW (this includes the 185 MW of Puget) would be mandated at almost **\$696 million** with a first-year annual revenue requirement of **\$241 per customer** and a 21-year revenue requirement per customer of **\$3,501**. Acquisition of all of Colstrip including CU3 easily more than doubles these CU4 acquisition numbers.

One final SB 379 cost to ratepayers that is extremely significant because of the valuation language in the bill, is that the bill allows NWE to recover the undepreciated book value if Colstrip is retired early. If the undepreciated book value is not recovered it is referred to as “stranded investment”. Using the Puget 185 MW example, under NWE’s original \$1 filing, if CU4 was to close in 2027, the stranded investment to be recovered from ratepayers would have been less than \$1. Under the valuation method mandated in SB 379, the stranded investment which would be required to be paid by NWE customers would be **\$189.4 million or \$487** per NWE customer. Under the same 2027 closing scenario, the stranded investment per customer if NWE acquired all remaining CU4 shares would be **\$1,363**, and if NWE acquired all remaining CU3 and CU4 the stranded investment per customer would be **\$3,310**.

The SB 379 valuation that would be assigned to additional Colstrip shares completely ignores NWE’s own estimated valuation of additional Colstrip shares, as was evidenced by its 2019 proposal to buy 185 MW for \$1. In addition, in the 2013 NWE Hydro Acquisition docket, in which NWE acquired the hydroelectric generating facilities from Pennsylvania Power and Light (“PPL”), NWE valued the 222 MW of CU3 owned by PPL, which were for sale initially as a package with the hydro assets, at negative \$340 million. Obviously NWE does not subscribe to a market value of additional Colstrip shares that is anywhere close to, or even in the ballpark with the \$1.34 million per MW mandated in SB 379.

Summary

NEW SECTION 1(2) of SB 379, when approving a valuation for additional shares of Colstrip that could be acquired by NWE, appears to be in direct conflict with current statute MCA 69-3-10. It completely ignores 45 years of Commission practice and precedent in the valuation of utility investments, a practice that has been acceptable to all regulated Montana utilities, including NWE. **It is a fundamental principle of regulation in Montana that the valuation of utility assets should be based on the actual, real amount of dollars invested in those assets by the utility and its shareholders. SB 379 completely ignores that principle and assigns an artificial and fictional value to additional Colstrip shares.**

There has been no reason articulated in SB 379, or in public by the bills’ proponents for the deviation from existing statute regarding the valuation issue. In my opinion, the SB 379 valuation language should not be acceptable to the Commission.