MONTANA DEPARTMENT OF REVENUE

GOVERNOR GREG GIANFORTE
DIRECTOR BRENDAN BEATTY

TO: **Bwembya Chikolwa, Property Tax Manager**
Lumen Technologies, Inc.

FROM: **Doug Roehm, Unit Manager**
Centrally Assessed Property

DATE: **April 23, 2024**

SUBJECT: **Response to Comments on the 2024 Capitalization Rate Study, Medium and Small Telecommunications**

Dear Mr. Chikolwa:

The department would like to thank you for taking the time to review our study and for providing additional information for us to consider. We received your submission email provided on April 3, 2024, along with a Cost of Capital Study prepared by Kroll for Wireline Carriers (Small & Mid Cap) received via email on March 14, 2024.

The comments received along with these responses will be published on our website at:

https://mtrevenue.gov/dor-publications/cap-rate-studies/

Based on the comments and our analysis discussed below, we did incorporate the additional Bloomberg and Capital IQ cost of debt information from the Kroll study. This resulted in a new cost of debt of 8.06% previously 7.46% and a corresponding Weighted Average Cost of Capital of 9.00% previously 8.75%. We also did re-consider our selection of the Direct Capitalization Rates and put more weight on the median equity capitalization rate indicator which resulted in a new NOI Direct Capitalization Rate of 4.95% previously 4.55% and a new GCF Direct Capitalization Rate of 12.30% previously 11.75%.

A more detailed discussion on how we arrived at these conclusions follows.

Cost of Equity

The primary concerns raised in reference to the cost of equity was to give more weight to the Dividend Discount Model based on earnings growth and to consider a Build-Up Method.

Dividend Discount Model

We did not put additional weight on the Dividend Discount Model based or earnings growth. Only two of the six guideline public companies pay dividends leaving us with very few inputs to consider for this model. Furthermore, when performing additional review of Shenandoah Telecommunications, it appears their information is likely impacted by acquisition activity in addition to being an extreme outlier. For example, Shenandoah's projected earnings growth is from 2.8 times to 13.7 times greater than every other guideline company and appears to be more of a recovery to historical norms as opposed to real growth. As a result, we do not feel additional weight should be applied to this indicator.

Build-Up Method

A similar request to consider a Build-Up Method was made in the prior year. An initial review indicates the circumstances have not materially changed from the prior year to the current year. For a more in-depth analysis, our prior year response can be reviewed on our website:

> https://mtrevenue.gov/wp-content/uploads/dlm_uploads/2023/04/Response-to-Lumen-Capitalization-Rate-Comments_04.28.23.pdf

We continue to believe that when industry risk is properly addressed through an industry risk premium or a company specific risk premium, the resulting rate is not materially different from the equity rate the department has concluded to. We also continue to consider size through selection of the guideline companies, not by adding additional risk premiums to the cost of equity.

Cost of Debt

It was requested we consider additional sources when selecting our cost of debt. We did incorporate the additional Bloomberg and Capital IQ cost of debt information provided in the Kroll cost of capital study when finalizing our own study.

The revised cost of debt by rating are included below, (the highlighted values represent the additional cost of debt information included):

Rating		Corporate Bond Yields			
Moody's	S&P	MTDOR	Bloomberg	Capital IQ	Avg YTM
Aaa	AAA	4.74%			4.74%
Aa	AA	5.05%			5.05%
A	A	5.25%			5.25%
Baa	BBB	5.64%			5.64%
Ba	BB	6.85%	6.72%	6.53%	6.70%
B	B	7.46%	7.59%	7.95%	7.67%
Caa	CCC	8.07%		13.09%	10.58%

Weighted Average Cost of Capital

It was requested we consider the Kroll Cost of Capital study that was provided. We did review the provided study and did incorporate the cost of debt information in the study. Ultimately Kroll concludes to an after-tax WACC of 9.70% while the department concluded on 9.00% in our final study.

Direct Capitalization

It was requested we place no weight on direct capitalization models due to conceptual flaws based on finance theory that equity rates should be higher than debt rates. We agree with the referenced theory that equity *discount rates* are higher than debt *discount rates* due to their greater risk. However, it's important to understand that this theory is directly applicable to *discount rates*. There are many additional considerations and adjustments that must be made when making this same comparison to *capitalization rates.* The two most prominent being, long-term expected growth needs to be added to the equity capitalization rate and a consideration of the level of income the rate was developed for must be considered.

After increasing our equity capitalization rates for expected growth and recognition of the difference in the level of income for each rate compared to net cash flow, we do not believe there are conceptual flaws in the concluded rates.