COMMONWEALTH OF KENTUCKY

BEFORE THE PUBLIC SERVICE COMMISSION

In the Matter of:

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| ELECTRONIC APPLICATION OF COLUMBIA GAS OF KENTUCKY, INC. FOR AN ADJUSTMENT OF RATES; APPROVAL OF DEPRECIATION STUDY; APPROVAL OF TARIFF REVISIONS; AND OTHER RELIEF | ) ) ) ) ) | CASE NO. 2024-00092 |

**THE ATTORNEY GENERAL'S RESPONSE TO COLUMBIA GAS OF KENTUCKY, INC.'S FIRST REQUEST FOR INFORMATION**

The Attorney General of the Commonwealth of Kentucky, through his Office of Rate Intervention ("Attorney General"), submits the following response to Columbia Gas of Kentucky, Inc.'s (hereinafter "Columbia Kentucky" or the "Company") First Request for Information in the above-styled matter.

Respectfully submitted,

RUSSELL COLEMAN
ATTORNEY GENERAL

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***<u>Certificate of Service and Filing</u>***

Pursuant to the Commission's Orders and in accord with all other applicable law, Counsel certifies that the foregoing electronic filing was transmitted to the Commission on September 11, 2024, and there are currently no parties that the Commission has excused from participation by electronic means in this proceeding.

This 11th day of September, 2024,

Angela M. Awad

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Assistant Attorney General

WITNESS RESPONSIBLE:
JOHN DEFEVER

QUESTION NO. 1
Page 1 of 1

Please refer to the Direct Testimony of Mr. Defever, specifically the table appearing on Page 4, Line Nos 3 and 4: In calculating the Rate of Return Impact of ($4,587,742), did Mr. Defever account for the fact that interest (Rate Base x Cost of Debt) is a deduction when computing taxable operating income (Taxable Income = Operating Income before Taxes, less Interest) in deriving income tax expense? If so, provide the calculation for the adjustment.

RESPONSE:

No. The amount of ($4,587,742) illustrates the standalone impact of the difference between the Company's requested rate of return ("ROR") and Mr. Richard Baudino's recommended ROR. The ($4,587,742) was calculated by taking the difference between the Company's requested ROR and Mr. Baudino's recommended ROR. The Company's requested rate base was multiplied by that difference and the gross revenue conversion factor. It is appropriate to calculate the impact on income taxes for interest synchronization. As an oversight, I did not include this calculation in my revenue requirement schedules. However, I will include the interest synchronization adjustment in an errata filing.

WITNESS RESPONSIBLE:
JOHN DEFEVER

QUESTION NO. 2
Page 1 of 1

Please refer to the Direct Testimony of Mr. Defever, specifically the table appearing on Page 4, Line Nos 3 and 4: In calculating the Rate of Return Impact on the Rate Base Adjustment for Cash Working Capital ("CWC") of ($925,857), did Mr. Defever account for interest synchronization? If so, provide the calculation for the adjustment.

RESPONSE:

No. It should be noted that in the referenced table, I calculated the revenue requirement impact for cash working capital. As stated in my response to Question 1, I will add an interest synchronization adjustment to my schedules in an errata filing.

WITNESSES RESPONSIBLE:
JOHN DEFEVER

QUESTION NO. 3
Page 1 of 1

Please refer to the Direct Testimony of Mr. Defever, specifically the table appearing on Page 4, Line Nos 3 and 4: In calculating the Rate of Return Impact on the Rate Base Adjustment for Customer Deposits of ($193,937), did Mr. Defever account for interest synchronization? If so, provide the calculation for the adjustment.

RESPONSE:

No. It should be noted that in the referenced table, I calculated the revenue requirement impact for customer deposits. As stated in my response to Question 1, I will add an interest synchronization adjustment to my schedules in an errata filing.

WITNESS RESPONSIBLE:
JOHN DEFEVER

QUESTION NO. 4
Page 1 of 1

Please refer to the Direct Testimony of Mr. Defever, specifically Page 8, Line Nos 5 and 6 where Mr. Defever states that his "recommended adjustments to O&M expenses, in the Company's cash working capital calculation." Did Mr. Defever account for interest and income tax synchronization in the calculation of Cash Working Capital? If so, provide the calculation for the adjustment.

RESPONSE:

I did not adjust the Company's interest and income tax synchronization amounts in the cash working capital calculation. As stated in my response to Question 1, I will add an interest synchronization adjustment to my schedules in an errata filing.

WITNESS RESPONSIBLE:
JOHN DEFEVER

QUESTION NO. 5
Page 1 of 1

Please refer to the Direct Testimony of Mr. Defever, specifically Page 10, Line Nos 5 and 6 where Mr. Defever states that "in this case the Company did include the interest expense associated with the customer deposits for recovery in the FTP." Confirm the schedule and/or workpaper that Mr. Defever relied upon in determining that the Company's proposed revenue requirement included interest on customer deposits in its calculation. If other sources were used, please provide the reference to the source data.

RESPONSE:

The above-referenced statement was based on the Company's response to the Attorney General's Second Request for Information ("Attorney General's Second Request"), Item 32(f). The Company was asked in this question to, "[p]rovide the interest expense paid to customers for each of the years 2019, 2020, 2021, 2022, and 2023, <u>and the amount included in the base period and the forecasted test period.</u>" (emphasis added). The Company's response stated that $88,731 in customer deposit interest expense was included in the base period and $85,473 was included in the forecasted test period.

As stated in my testimony, it is a mismatch for the Company to reflect the interest paid on customer deposits in the revenue requirement while not also reflecting the customer deposits.

WITNESS RESPONSIBLE:
JOHN DEFEVER

QUESTION NO. 6
Page 1 of 1

Please refer to the Direct Testimony of Mr. Defever, specifically the table appearing on Page 25, Line Nos 9 and 10: Confirm that Mr. Defever relied on information provided in Columbia's Response to Commission Staff's First Request for Information No. 38 and Columbia's Response to the Attorney General's Second Request for Information, No. 63. If other sources were used to create the table, please provide the reference to the source data.

RESPONSE:

Confirmed. For the table on page 25 of my direct testimony, I relied on the Company's response to the Attorney General's Second Request, Item 63, which in part referred to the Commission Staff's First Request for Information ("Staff's First Request"), Item 38, Attachment A. It should be noted that the Company did not provide the requested information for 2019 and 2020 in response to the Attorney General's Second Request, Item 63.

WITNESS RESPONSIBLE:
JOHN DEFEVER

QUESTION NO. 7
Page 1 of 1

Please refer to the Direct Testimony of Mr. Defever, specifically the table appearing on Page 25, Line Nos 9 and 10: Did Mr. Defever account for the fact that the amounts provided in Columbia's Response to Commission Staff's First Request for Information No. 38 and Columbia's Response to the Attorney General's Second Request for Information, No. 63 represent total gross payroll (per the Company's Payroll Department); in other words, that the gross payroll / labor amounts referenced and utilized in the Mr. Defever's adjustment to labor and payroll tax expense are inclusive of capital and operations and maintenance ("O&M") expense? If so, how?

RESPONSE:

No. The Company was asked in the Attorney General's First Request for Information ("Attorney General's First Request"), Item 130 to, "[p]rovide total (direct & allocated) Capital and O&M <u>budgeted and actual</u> payroll expense for each of the years 2018, 2019, 2020, 2021, 2022, 2023, the BP, and included in the FTP." (emphasis added). The Company's response stated, "[p]lease refer to Columbia's Response to Attorney General's Data Request 1-99." However, the response to Attorney General's First Request, Item 99 did not contain the requested historical budgeted amounts. As the response provided did not include the requested budgeted information, I utilized the information provided in the Company's responses to Staff's First Request, Item 38 and the Attorney General's Second Request, Item 63 in determining my payroll adjustments. The Company's responses to Staff's First Request, Item 38 and Attorney General's Second Request, Item 63 did not provide a breakout between capital and O&M. As such, the ratio used in my calculation of the percentage of the Company's underspending for payroll and the flowthrough to payroll tax is inclusive of capital and O&M expense.

WITNESS RESPONSIBLE:
JOHN DEFEVER

QUESTION NO. 8
Page 1 of 1

Please refer to the Direct Testimony of Mr. Defever, specifically the table appearing on Page 25, Line Nos 9 and 10: Did the Mr. Defever utilize the data that the Company provided its response to Columbia's Response to the Attorney General's First Request for Information, No. 99 for the actual general ledger and budgeted BP / FTP capital and O&M labor costs for the table on Page 25?

RESPONSE:

No. The Company was asked in the Attorney General's First Request, Item 130 to, "[p]rovide total (direct & allocated) Capital and O&M budgeted and actual payroll expense for each of the years 2018, 2019, 2020, 2021, 2022, 2023, the BP, and included in the FTP. (emphasis added). The Company's response stated, "[p]lease refer to Columbia's Response to Attorney General's Data Request 1-99." However, the Company's response to the Attorney General's First Request, Item 99 did not contain the requested historical budgeted amounts. As the response provided did not include the requested budgeted information, I utilized the information in the Company's responses to Staff's First Request, Item 38 and the Attorney General's Second Request, Item 63.

WITNESS RESPONSIBLE:
JOHN DEFEVER

QUESTION NO. 9
Page 1 of 1

Please refer to the Direct Testimony of Mr. Defever, specifically the table appearing on Page 25, Line Nos 9 and 10: Does Mr. Defever utilize the data that the Company provided in its response to Columbia's Response to Commission Staff's First Request for Information No. 39 of projected merit / union wage increases for 2024 and 2025 for the table on page 25?

RESPONSE:

My adjustment to payroll is based on the Company's requested forecasted test period amounts, which would presumably include the projected merit/union wage increases. As described in my previous responses, the information for the chart on page 25 of my testimony was based on the response to Attorney General's Second Request, Item 63 which also references Staff's First Request, Item 38.

WITNESS RESPONSIBLE:
JOHN DEFEVER

QUESTION NO. 10
Page 1 of 1

Please refer to the Direct Testimony of Mr. Defever, specifically Page 34, Line Nos 10 through 15 and Exhibit JD-1, Schedule C-10, Line 4. Did Mr. Defever adjust for the fact that the payroll / labor expense amount utilized to calculate a Benefits Expense Ratio from the Company's Schedule G-1 is inclusive of short- and long-term incentive compensation O&M expense? If so, provide the calculation for the adjustment.

RESPONSE:

No. My benefit expense adjustment is a high-level placeholder calculation to recognize that a corresponding adjustment to benefits must be made if payroll expense is adjusted.

WITNESS RESPONSIBLE:
JOHN DEFEVER

QUESTION NO. 11
Page 1 of 1

Please refer to the Direct Testimony of Mr. Defever, specifically Page 34, Line Nos 10 through 15 and Exhibit JD-1, Schedule C-10, Line 4. Did Mr. Defever adjust for the fact that FTP benefits expense in the Company's Schedule G-1 is inclusive of profit sharing, 401k (including grandfathered employee's defined benefits expense), and pension SERP, in addition to employees' insurance plans and pension / OPEB expenses? If so, provide the calculation for the adjustment.

RESPONSE:

No. My benefit adjustment is a high-level placeholder calculation to recognize that a corresponding adjustment to benefits must be made if payroll expense is adjusted.

WITNESS RESPONSIBLE:
JOHN DEFEVER

QUESTION NO. 12
Page 1 of 1

Please refer to the Direct Testimony of Mr. Defever, specifically Page 34, Line Nos 10 through 15 and Exhibit JD-1, Schedule C-10, Line 4. Did Mr. Defever adjust for the fact that the Benefits Expense Ratio calculated from Schedule G-1 represents Columbia Direct and is not representative of a Benefits Expense Ratio for NCSC allocated to Columbia? If so, provide the calculation for the adjustment.

RESPONSE:

No. My benefit adjustment is a high-level placeholder calculation to recognize that a corresponding adjustment to benefits must be made if payroll expense is adjusted.

WITNESS RESPONSIBLE:
JOHN DEFEVER

QUESTION NO. 13
Page 1 of 1

Please refer to the Direct Testimony of Mr. Defever, specifically Page 18, Line No. 30: Confirm that Mr. Defever relied on information provided Columbia's Response to the Attorney General's First Request for Information, No. 104, Attachment A. If the recommended adjustment was based on another source, please provide the reference to the source data.

RESPONSE:

Confirmed.

WITNESS RESPONSIBLE:
JOHN DEFEVER

QUESTION NO. 14
Page 1 of 1

Please refer to the Direct Testimony of Mr. Defever, specifically Page 18, Line No. 30: Did Mr. Defever account for the fact that the Investor Relations Department costs reported in Columbia's Response to the Attorney General's First Request for Information, No. 104, Attachment A include expenses also adjusted by Mr. Defever for labor, benefits, short-term incentive compensation, and profit sharing? If so, provide the adjustment, if not provided the rationale for not including the adjustment.

RESPONSE:

No. I recommended this adjustment because these expenses are not appropriately fully borne by ratepayers. Although there may be some overlap with other adjustments, as the forecasted test period amount of investor relations expense was not broken out by account (e.g., labor, benefits, etc.), the amount of overlap was not clear. If the Company believes any overlap exists with my investor relations and payroll adjustments then it can identify the same in its rebuttal testimony.

WITNESS RESPONSIBLE:
JOHN DEFEVER

QUESTION NO. 15
Page 1 of 1

Please refer to the Direct Testimony of Mr. Defever, specifically Page 21, Line No. 15: Please provide Mr. Defever's reasoning and associated support for the 80% input to the calculation to determine the recommended adjustment of $1,480,598 to Long Term Incentive.

RESPONSE:

My adjustment removes incentive compensation related to financial goals based on both Commission precedent and due to shareholders receiving most of the benefit.

To ascertain the amount related to financial goals, I asked the Company in the Attorney General's First Request, Item No. 97 to, "[p]rovide the amount of incentive compensation included in the BP and the FTP related to financial measures (direct & allocated)." The Company's response directed me to the Attorney General's First Request, Item 99. However, the Company's response to the Attorney General's First Request, Item 99 did not provide the requested information.

Additionally, the Company's response to the Attorney General's First Request, Item 45(b) stated that the amount of 2025 incentive compensation tied to financial measures was unknown to the Company at that time.

As the forecasted test period amounts were unknown, I based my recommended adjustment on the 2024 metrics that the Company provided in the Direct Testimony of Beth Owens, Attachment BO-5. According to Attachment BO-5, in 2024 the portion of long term incentive attributed to financial measures is 80%.

WITNESS RESPONSIBLE:
RICHARD BAUDINO

QUESTION NO. 16
Page 1 of 1

Please refer to the Direct Testimony of Mr. Baudino, specifically Page 26, Line 11 and Exhibit RAB-4, Page 2: Please provide supporting documentation for the 6.22% "supply side" historical Market Risk Premium. Please also show or provide the date that the 6.22% estimate was first reported or disseminated.

RESPONSE:

Mr. Baudino downloaded this information from Kroll's Cost of Capital Navigator, which is a paid subscription service. Mr. Baudino does not know when Kroll first reported or disseminated this information. The data file used by Mr. Baudino is protected by copyright. The Attorney General can make the Excel file used by Mr. Baudino available for review at its offices.

WITNESS RESPONSIBLE:
RICHARD BAUDINO

QUESTION NO. 17
Page 1 of 1

Please refer to the Direct Testimony of Mr. Baudino, specifically Pages 26 through 29: Please provide copies of the publication excerpts or website screen prints that Mr. Baudino references in Footnotes 14 through 21. Please also provide the dates that these publications or screen prints were issued or accessed.

RESPONSE:

Footnote 14: The Kroll cost of capital Navigator material is protected by copyright. The Attorney General will make the excerpt used by Mr. Baudino available for review at its offices.

Footnote 15: Please refer to the attachment to this data request. The year of publication is shown in the footnote.

Footnote 16: The book *Cost of Capital* by Pratt and Grabowski is publicly available for purchase and will contain the material cited by Mr. Baudino in this footnote. The date of publication is March 21, 2014.

Footnote 17: Please refer to the attachment to this data request. The date of the publication is shown in the footnote.

Footnote 18: This material is available using the link in the footnote. The publication date is June 5, 2024.

Footnote 19: This material is available using the link in the footnote. As Mr. Baudino stated on line 2, page 29 of his Direct Testimony, the date is June 30, 2024.

Footnote 20: Please refer to the attachment to this data request. The date it was accessed is shown in the footnote.

Footnote 21: This material is available using the link in the footnote. The date of the publication is stated in the footnote.

# HANDBOOK OF THE EQUITY RISK PREMIUM

*By*

**Rajnish Mehra**

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income return for the S&P stocks. The authors also used CRSP government bond data to include U.S. Treasury bond and bill indexes. They also included a corporate bond index constructed from bond yields, as well as inflation rates. Besides displaying total returns across all yearly hold periods, the paper was unique in that it explicitly measured historical risk premiums, not only for equities, but also including the horizon (maturity) premium, the default premium, and real interest rate. All results were presented in real (inflation-adjusted) terms as well. In Ibbotson Associates Yearbooks, they later added the small stock premium, the value premium, as well as various other data. These historical premiums came to be used as the risk premium input into the CAPM model, as well as for other models.

Later in 1976, Ibbotson and Sinquefield showed how historical data can be used to simulate probability distributions of future returns. They started with the then-current yield curve, with its implicit forward interest-rate structure. They added the various historical premiums using bootstrapping methods that retained the correlation structure among the asset classes. They used a historical equity risk premium that was measured during the previous half-century to be 6.3 percent geometrically relative to U.S. Treasury bills, but a lesser number relative to longer-term bonds that contained horizon risk premiums.

Interestingly, 1976 was also the year that Vanguard launched its market index trust, a passive, value-weighted portfolio of large-cap U.S. stocks designed to match the performance of the S&P500. The excellent excess performance of stocks from 1926 to 1974 reported in Ibbotson and Sinquefield may have helped build demand for a passive portfolio that sought to capture these historical returns. Just as the empirical study by Edgar Lawrence Smith demonstrated to investors in the 1920s the superiority of stocks over bonds and motivated a move toward equities, indexation made a lot of sense to investors in the 1970s when they had five decades of historical performance upon which to base their expectations for the future.

An important historical note is that the decade of the 1970s was one of the worst periods in U.S. capital market history for stocks. The crash of 1973–1974, the experience of double-digit inflation, and the erosion of capital were fresh in the public imagination in 1976. Equity returns had not exceeded debt returns over nearly the entire preceding decade. Thus, the historical equity premium appeared to most as a wildly optimistic forecast of the future expected return of stocks over T-bills. In fact it was not—the equity risk premium since 1976 has nearly matched the estimate made at the time.

There are several ways in which one might estimate an expected risk premium used for forecasting. One way is to extrapolate historical risk premiums, as did Ibbotson and Sinquefield. Another is to use investor demand models based upon investor risk aversion, as did Mehra and Precott. A third way is to look at the type of returns that the corporate sector supplies. Diermeir, Ibbotson, and Siegel (1984) and later Ibbotson and Chen (2003) used this supply approach. They extrapolated the cash flows and earnings growth generated by companies themselves. These forecasts tend to give somewhat lower historical risk premiums, primarily because part of the total return of the stock market has come from price-to-earnings ratio expansion. This expansion is not predicated to continue on indefinitely, and is removed from the expected risk premium.

## 4. HISTORY AS WRITTEN BY THE WINNERS?

A major conceptual problem with equating the *ex post* historical realization of the equity premium with its *ex ante* expectation is that history could simply have turned out better than people expected. Recall that in 1938, J. B. Williams calculated the market forecast of the equity risk premium as a mere 1 1/2 percent. He might have been shocked to see the realized premium over the following five decades exceed his forecast by a multiple of four. A more subtle problem is that historical records of successful markets tend to get preserved, but it is difficult to dig up the records of failed markets. To study these issues, Brown, Goetzmann, and Ross (1995) built a model of stock market performance that examined the *ex post* historical return conditional upon survival. Their analytical results showed that when a market is confronted with the continued possibility of failure (modeled statistically as an absorbing lower bound), the *ex post* realized growth can be substantially higher than the unconditional mean. The fact that the U.S. survived two world wars and periods of global political unrest that caused other major markets to fail would suggest that the mean return of the U.S. market is an overestimate of its true historical mean.

It is important to point out that this view of the equity risk premium is quite different than the critique of the equity premium puzzle posed by University of Iowa economist Thomas Rietz. Rietz (1988) theorized that a high *ex ante* equity premium could be justified by a fear of a huge crash. An equity premium of 6 percent would thus reflect the potential for an event that may not have been realized in America's financial history but that nevertheless was a possibility in people's minds. One limitation of the Rietz critique is that it conflicts with historical expectations of stock returns—most notably the J. B. William's forward-looking premium in 1938 of 1 1/2 percent. The survivorship story, on the other hand, is entirely consistent with low historical expectations of the future, although it would be unlikely to reduce the equity risk premium to such a low number.

In order to estimate the potential scale of the survival bias, and to look for empirical evidence that the U.S. market was an unusual performer in the global economy, Jorion and Goetzmann (1999) collected capital appreciation and inflation data for a large sample of the world's equity markets from 1921 forward. They found that the U.S. was the top performer out of 39 markets, in terms of real capital appreciation of stocks. Studying this effect subsequently with a smaller but richer sample, Dimson, Marsh, and Staunton (2002) collect total real returns for 12 countries over the entire century and find that the U.S. was in the top quartile of performers in real terms—inched out by Sweden and Australia over the first couple of decades of the century.[13] The Jorion and Goetzmann

[13] Dimson, Marsh, and Staunton (2002).

# *Equity Risk Premiums (ERP): Determinants, Estimation, and Implications – The 2022 Edition*

*Updated: March 23, 2022*

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cannot even reject the hypothesis that the equity risk premium in each of these countries is zero, let alone attach a value to that premium.

If the standard errors on these estimates make them close to useless, consider how much more noise there is in estimates of historical risk premiums for some emerging market equity markets, which often have a reliable history of ten years or less, and very large standard deviations in annual stock returns. Historical risk premiums for emerging markets may provide for interesting anecdotes, but they clearly should not be used in risk and return models.

## The Survivor Bias

Given how widely the historical risk premium approach is used, it is surprising that the flaws in the approach have not drawn more attention. Consider first the underlying assumption that investors' risk premiums have not changed over time and that the average risk investment (in the market portfolio) has remained stable over the period examined. We would be hard pressed to find anyone who would be willing to sustain this argument with fervor. The obvious fix for this problem, which is to use a more recent time period, runs directly into a second problem, which is the large noise associated with historical risk premium estimates. While these standard errors may be tolerable for very long time periods, they clearly are unacceptably high when shorter periods are used.

Even if there is a sufficiently long time period of history available, and investors' risk aversion has not changed in a systematic way over that period, there is a final problem. Markets such as the United States, which have long periods of equity market history, represent "survivor markets". In other words, assume that one had invested in the largest equity markets in the world in 1928, of which the United States was one.[80] In the period extending from 1928 to 2000, investments in many of the other equity markets would have earned much smaller premiums than the US equity market, and some of them would have resulted in investors earning little or even negative returns over the period. Thus, the

[80] Jorion, Philippe and William N. Goetzmann, 1999, *Global Stock Markets in the Twentieth Century*, Journal of Finance, 54(3), 953-980. They looked at 39 different equity markets and concluded that the US was the best performing market from 1921 to the end of the century. They estimated a geometric average premium of 3.84% across all of the equity markets that they looked at, rather than just the US and estimated that the survivor bias added 1.5% to the US equity risk premium (with arithmetic averages) and 0.9% with geometric averages.

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My name is Aswath Damodaran, and I teach corporate finance and valuation at the Stern School of Business at New York University. I am a teacher first, who also happens to love untangling the puzzles of corporate finance and valuation, and writing about my experiences. As a result, I am at the intersection of three businesses, education, publishing and financial services, that are all big, inefficiently run and deserve to be disrupted. I may not have the power to change the status quo in any of these businesses, but I can stir the pot, and this website is my attempt to do so.

Broadly speaking, the website is broken down into four sections. The first, teaching, includes all of my classes, starting with the MBA classes that I teach at Stern and including the shorter (2-day to 3-day) executive sessions I have on corporate finance and valuation. You will find not only the material for the classes (lecture notes, quizzes), but also webcasts of the classes that you can access on different platforms. I also have classes specifically tailored to an online audience on valuation, corporate finance and investment philosophies, as well as my quirky versions of accounting and statistics classes. The second, writing, includes links to almost everything I have written and continue to write, starting with my books and extending to my practitioner papers (on equity risk premiums, cash flows and other things valuation-related). The third, data, contains the annual updates that I provide on industry averages, for US and global companies, on both corporate finance and valuation metrics (including multiples). It is also where I provide my estimates of equity risk premiums and costs of capital. The fourth, tools, incorporates the spreadsheets that I have developed over time to value and analyze companies and short in-practice webcasts on how to analyze companies. (If you have trouble with any of the links, try a different browser, since Google Chrome, in particular, seems to have developed an aversion to downloads on my site.)

I have been told that my website is ugly, and I apologize for its clunky look and feel. While some of you have offered to make it look better for me, and I thank you for your kindness, I need to be able to tweak, modify and adapt the website as I go along and to do that, I have to work with what I know about website design, which is not much. You can try the search engine below and if that does not work, try this guide to the site.

*Other Updates*

**Teaching:**

1. *Stern Classes*: The Spring 2024 Corporate Finance

*Equity Risk Premiums (Data, Updates and Papers)*

**Implied ERP on July 1, 2024=** 3.97% (Trailing 12 month, with adjusted payout); 4.11% (Trailing 12 month cash yield); 5.90% (Average CF yield last 10 years); 3.91% (Net cash yield); 4.06% (Normalized Earnings & Payout)

**Implied ERP in previous month** =4.12% (Trailing 12 month, with adjusted payout); 4.27% (Trailing 12 month cash yield); 6.01% (Average CF yield last 10 years); 4.13% (Net cash yield); 3.92% (Normalized Earnings & Payout)

*Downloadable datasets (For more data, go here)*

1. Historical Returns on Stocks, Bonds, Real Estate and Gold (for historical risk premiums)
2. Implied ERP by month for previous months (September 2008- Current)
3. Implied ERP (annual) from 1960 to Current
4. My data on ERP & CRP by country (January 2024 and July 2024)

*Downloadable spreadsheets* (For more spreadsheets, go here)

1. Spreadsheet to compute current ERP for current month
2. Spreadsheet to value the S&P 500 (January 1, 2024)
3. Valuation Spreadsheet for non-financial service firms with video guidance

*Papers*: Starting in 2008, I have written annual update papers on equity risk premiums, in two installments. The first one looks at equity risk premiums, in general, starting with their determinants and working through different approaches to measuring htem. The second one is more focused on country risk. The latest updates for both can be found below:

1. Equity Risk Premiums (Annual Update Paper)
2. Country Risk Premiums (Annual Update Paper)

class, now fully archived, can be found here and the archived Spring 2024 Valuation class is linked here. You can find archived versions of prior year's classes here.

2. *Online classes (Free and NYU Certificate)*: The online versions of these classes can be found here and NYU is offering certificate versions here. In the next academic year, I will be teaching all three classes again and you can find the links to them here.
3. *Short Prep Courses*: If you need a short brush up on the basics of finance, I have added a class on the foundations of finance as well as a minimalist accounting class to my online list. In 2021, I added a statistics class to the mix, again taught from the perspective of someone who uses statistics rather than a statistical expert.

**Writing:**

1. *Papers/Articles*: This paper on valuing Tesla (with Brad Cornell) won the readers' award (Bernstein-Levy) in The Journal of Portfolio Management. Brad and I have written a paper on what we call the big market delusion, on how the allure of big markets coupled with overconfident entrepreneurs/investors can create over pricing across companies. In 2020, we added a paper on ESG, a concept that has been oversold and overhyped by its proponents, as well as a paper on value investing's travails in the last decade. I also have a paper on valuing users, subscribers and members. In 2020, I also wrote a series of fourteen posts on the COVID crisis, with the emphasis on markets, in real time, which I put together as a paper (way too long) on what I learned and unlearned. I also added a paper on the disruption coming to the IPO process. For a complete list of papers, go here
2. *Books*: My book on Narrative and Numbers, from Columbia University Press, is in bookstores and the third edition of The Dark Side of Valuation came out in 2018. My book on Corporate Life Cycles, where I look at where a firm stands in its life cycle affects corporate finance, investing and valuartion judgments, is forthcoming from Penguin Random House.

**Data:** The latest overall data update was on January 5, 2024; my next one will be in January 2025. My country risk premiums also get updated midyear; my latest update is as of July 2024. Check under data for downloads and links, as well as archived data from prior years.

**Tools:** Check under tools for additions to spreadsheets and webcast. uValue is available at the iTunes store.

AFFIDAVIT

STATE OF MICHIGAN )

COUNTY OF WAYNE )

John Defever, Senior Regulatory Consultant, being duly sworn, states that his responses to discovery in the above referenced case are true and accurate to the best of his knowledge, information and belief.

John Defever

John Defever

Sworn to and subscribed before me on this 11th day of September 2024.

Christine Miller

Notary Public

CHRISTINE MILLER
NOTARY PUBLIC, STATE OF MI
COUNTY OF WAYNE
MY COMMISSION EXPIRES Nov 6, 2028
ACTING IN COUNTY OF Wayne

**AFFIDAVIT**

STATE OF GEORGIA )

COUNTY OF FULTON )

RICHARD A. BAUDINO, being duly sworn, deposes and states: that the attached is his sworn testimony and that the statements contained are true and correct to the best of his knowledge, information and belief.

Richard A. Baudino

Richard A. Baudino

Sworn to and subscribed before me on this

11th day of September, 2024.

Jessica K Inman
NOTARY PUBLIC
Cherokee County, GEORGIA
My Commission Expires 07/31/2027

Jessica K Inman

Notary Public