

**EXHIBIT NO. ___(RAM-23)
DOCKET NO. UE-060266/UG-060267
2006 PSE GENERAL RATE CASE
WITNESS: ROGER A. MORIN**

**BEFORE THE
WASHINGTON UTILITIES AND TRANSPORTATION COMMISSION**

**WASHINGTON UTILITIES AND
TRANSPORTATION COMMISSION,**

Complainant,

v.

PUGET SOUND ENERGY, INC.,

Respondent.

**Docket No. UE-060266
Docket No. UG-060267**

**EIGHTH EXHIBIT (NONCONFIDENTIAL) TO THE
PREFILED REBUTTAL TESTIMONY OF
ROGER A. MORIN
ON BEHALF OF PUGET SOUND ENERGY, INC.**

AUGUST 23, 2006

**BEFORE THE
PUBLIC SERVICE COMMISSION OF MARYLAND**

IN THE MATTER OF THE APPLICATION)
OF BALTIMORE GAS AND ELECTRIC)
COMPANY FOR REVISIONS IN ITS GAS) CASE NO. 9036
BASE RATES)
_____)

Direct Testimony and Exhibits of

Michael Gorman

On behalf of

ISG Sparrows Point LLC

Project 8434
August 15, 2005



1 **Q. WHAT DID YOU USE AS AN ESTIMATE OF THE MARKET RISK-FREE RATE?**

2 A. I used Blue Chip Financial Forecast's projected 20-year Treasury bond yield of 5.2%
3 (Blue Chip Financial Forecast, August 1, 2005 at 2).

4 **Q. WHY DID YOU USE LONG-TERM TREASURY BOND YIELDS AS AN ESTIMATE**
5 **OF THE RISK-FREE RATE?**

6 A. Treasury securities are backed by the full faith and credit of the United States
7 government. Therefore, long-term Treasury bonds are considered to have negligible
8 credit risk. Also, long-term Treasury bonds have an investment horizon similar to that
9 of common stock. As a result, investor-anticipated long-run inflation expectations are
10 reflected in both common stock required returns and long-term bond yields.
11 Therefore, the nominal risk-free rate (or expected inflation rate and real risk-free rate)
12 included in a long-term bond yield is a reasonable estimate of the nominal risk-free
13 rate included in common stock returns.

14 Treasury bond yields, however, do include risk premiums related to unantic-
15 pated future inflation and interest rates. Therefore, a Treasury bond yield is not a
16 risk-free rate. Risk premiums related to unanticipated inflation and interest rates are
17 systematic or market risks. Consequently, for companies with betas less than one,
18 using the Treasury bond yield as a proxy for the risk-free rate in the CAPM analysis
19 can produce an overstated estimate of the CAPM return.

20 **Q. WHAT BETA DID YOU USE IN YOUR ANALYSIS?**

21 A. I relied on the group average beta estimate for the proxy group. Group average beta
22 is more reliable than a single company beta. A group average beta has stronger
23 statistical parameters that better describe the systematic risk of the group, than does

1 an individual company beta. For this reason, a group average beta will produce a
2 more reliable return estimate.

3 I relied on The Value Line Investment Survey published beta for each of the
4 companies in my comparable group. The average beta for my proxy utility group is
5 0.78 as shown on my Exhibit MPG-11 ().

6 **Q. HOW DID YOU DERIVE YOUR MARKET PREMIUM ESTIMATE?**

7 A. I derived two market premium estimates, a forward-looking estimate and one based
8 on a long-term historical average.

9 The forward-looking estimate was derived by estimating the expected return
10 on the market (S&P 500) and subtracting the risk-free rate from this estimate. I
11 estimated the expected return on the S&P 500 by adding an expected inflation rate to
12 the long-term historical arithmetic average real return on the market. The real return
13 on the market represents the achieved return above the rate of inflation.

14 The Ibbotson and Associates' Stocks, Bonds, Bills and Inflation 2005 Year
15 Book estimates the historical arithmetic average real market return over the period
16 1926-2004 as 9.2%. A current five-year consensus analyst inflation projection, as
17 measured by the Consumer Price Index, is 2.5% (Blue Chip Financial Forecasts,
18 March 10, 2005 at 15). Using these estimates, the expected market return is 11.9%.
19 The market premium then is the difference between the 11.9% expected market
20 return, and my 5.2% risk-free rate estimate, or 6.7%.

21 The historical estimate of the market risk premium was also estimated by
22 Ibbotson and Associates in the Stock, Bonds, Bills and Inflation, 2005 Year Book.
23 Over the period 1926 through 2004, Ibbotson's study estimated that the arithmetic
24 average of the achieved total return on the S&P 500 was 12.4%, and the total return