

**Exh. JL-10C**  
**Dockets UE-190529/UG-190530 and**  
**UE-190274/UG-190275 (*consolidated*)**  
**Witness: Jing Liu**  
**REDACTED VERSION**

**BEFORE THE WASHINGTON**  
**UTILITIES AND TRANSPORTATION COMMISSION**

**WASHINGTON UTILITIES AND**  
**TRANSPORTATION COMMISSION,**

**Complainant,**

**v.**

**PUGET SOUND ENERGY,**

**Respondent.**

**DOCKETS UE-190529**  
**and UG-190530 (*consolidated*)**

---

**In the Matter of the Petition of**

**PUGET SOUND ENERGY**

**For an Order Authorizing Deferral**  
**Accounting and Ratemaking Treatment**  
**for Short-life UT/Technology Investment**

---

**DOCKETS UE-190274 and**  
**UG-190275 (*consolidated*)**

**EXHIBIT TO TESTIMONY OF**

**Jing Liu**

**STAFF OF**  
**WASHINGTON UTILITIES AND**  
**TRANSPORTATION COMMISSION**

***Colstrip Major Maintenance Budget v. Actual v. In Rates***

**November 22, 2019**

**CONFIDENTIAL PER PROTECTIVE ORDER – REDACTED VERSION**

**BEFORE THE WASHINGTON UTILITIES AND TRANSPORTATION COMMISSION**

**Dockets UE-190529 & UG-190530  
Puget Sound Energy  
2019 General Rate Case**

**WUTC STAFF DATA REQUEST NO. 167**

**“CONFIDENTIAL” Table of Contents**

<b>DR NO.</b>	<b>“CONFIDENTIAL” Material</b>
<b>167</b>	Shaded information is designated as CONFIDENTIAL per Protective Order in Dockets UE-190529 and UG-190530 as marked in Attachment A to Puget Sound Energy’s Response to WUTC Staff Data Request No. 167.

**BEFORE THE WASHINGTON UTILITIES AND TRANSPORTATION COMMISSION**

**Dockets UE-190529 & UG-190530  
Puget Sound Energy  
2019 General Rate Case**

**WUTC STAFF DATA REQUEST NO. 167:**

**Re: Major Maintenance Cost – comparison to 2017 GRC level**

Please refer to Mr. Roberts' workpaper  
"RJR\_WB\_C\_2019\_GRC\_Production\_OM\_WorkPaper\_Rvn17Apr(C)," tab  
Major Maintenance (C)."

For each of the major maintenance events listed in the tab, please provide an additional column to show the total amortization amount (event cost) that was built into rates in the 2017 GRC (Column "Amt to Amort as Booked" in the 2017 GRC workpaper).

**Response:**

Please see Attachment A to Puget Sound Energy's ("PSE") Response to WUTC Staff Data Request No. 167 for the detail of amortization amounts built into rates in the 2017 general rate case. In Attachment A, this information has been inserted to the right of the 2019 general rate case rate year amortization.

Shaded information is designated as CONFIDENTIAL per Protective Order in Dockets UE-190529 and UG-190530 as marked in Attachment A to PSE's Response to WUTC Staff Data Request No. 167.

**ATTACHMENT A to PSE's Response to  
WUTC Staff Data Request No. 167**

**PSE Power Plants Major Maintenance Cost (Actual versus Built in Rates)**

Plant	Event	Event Date	Amt to Amort as Booked	Actual Amort Begin	Amort Period as Booked	Amort End as Booked	Monthly Amortization	Months Amort in Rate Yr.	Rate Year Amortization	Test Year Amortization as booked	Adjustment to test Year (rounded to nearest \$10)	Event Cost Embedded in 2017 GRC	Over (under) Estimate	Over (under) Estimate Percent
Colstrip 1&2	Colstrip Unit #2 Outage	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX
Colstrip 1&2	Colstrip Unit #1 Outage	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX
Colstrip 1&2	Colstrip Unit #1 Outage	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX
Colstrip 1&2	Colstrip Unit #2 Outage	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX
Colstrip 3&4	Colstrip Unit #3 Outage	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX
Colstrip 3&4	Colstrip Unit #4 Outage	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX
Colstrip 3&4	Colstrip Unit #3 Outage	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX
Colstrip 3&4	Colstrip Unit #4 Outage	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX
Encogen	ENC U1 Major Insp, CT Generator Major Insp	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX
Encogen	ENC U2 Major Insp; CT Gen Maj Insp	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX
Encogen	ENC Unit #3 HGP Insp, CT Gen Major Insp	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX
Encogen	ENC Steam Turbine Major Insp/Gen Insp	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX
Ferndale	FRNDL Steam Turbine Major/ST Gen Insp	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX
Freddie 1	FDY1 CT Major (a)	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX
Freddie 1	FDY1 ST Summary (a)	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX
Frederickson	FRE Unit 2 Mod HGP Insp/ CT Gen Insp	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX
Frederickson	FRE Unit #1 CT HGP Insp/ CT Gen Insp (a)	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX
Fredonia 1-4	FRA U2 Major Insp/ GT Gen Major Insp	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX
Fredonia 1-4	FRA U1 Major Inspection	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX
Goldendale	GLD Steam Turbine Major Inspection	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX
Goldendale	GLD Steam Turbine Summary Inspection.	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX
Goldendale	GLD Major Inspection	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX
Goldendale	GLD Steam Turbine Summary Inspection. (a)	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX
Mint Farm	MTF Steam Turbine Full Scale Inspection	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX
Mint Farm	MTF Steam Turbine Summary Inspection	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX
Mint Farm	MTF Major Inspection	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX
Mint Farm	MTF Steam Turbine Summary Inspection	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX
Mint Farm	MTF ST partial Full-Scale Insp	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX
Sumas	SMS CT Major Insp, CT Generator Major Insp	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX
Sumas	SMS Steam Turbine Major Insp, ST Generator Insp (a)	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX
Whitehorn	WHN Unit #2 Compressor Rebl	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX
Whitehorn	WHN Unit #3 Generator Major	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX	XXXXXX

Notes:  
Data in Column "Amort Period as Booked" (Event Cost proposed in 2019 GRC) is from Mr. Ronald Roberts' Workpaper, "RJR\_WB\_C\_2019\_GRC\_Production\_OM\_WorkPaper\_Rvn17Apr(C)" in UE-190529.  
Data in Column "Event Cost Embedded in 2017 GRC" is from Mr. Ronald Roberts' Exhibit RJR-26C in UE-170033.

Source: PSE Response to UTC Staff Data Request No. 167