Enter Data

WA Utility (non multi-jurisdictional)		Allowance Allocation Calculation for 2023-2026					
, mara jar	Formula				l		
YEAR	descriptions	2023	2024	2025	2026	Field description	Data source and calculation method
	-						Most recent IRP or other board-approved forecast, or a
						Forecasted annual energy demand, including	more up-to-date forecast adapted as needed to accour
Energy to Serve Load (MWh)	Α					transmission and other losses.	for the CCA
DECLARED RESOURCES:		Generation forecasts a	re informed by IRP ana	lysis and inclusive of CEI	P specific actions.		
						Estimate of annual energy generation provided by	
						the Bonneville Power Administration. E.g. specified-	
BPA Specified-source purchases						source purchases including block, slice, and load-	
(total) (MWh)	В					following products or other specified ACS purchases.	
	_				n/a - not permitted	Total forecasted generation from owned or long-	
Coal - Total (MWh) Aggregate Coal Generation (Less	С	-	-	-	under CETA	term contracted specified-source coal resources.  Energy acquired from aggregate coal generation	
Specified Resources)	C1				n/a - not permitted under CETA	(less specified resources).	
Specified Resources)	CI						
Constitut Cont Decrees #4	C2				n/a - not permitted	Generation from Specified Coal Resource #1, an	
Specified Coal Resource #1	C2				under CETA	owned or long-term contracted resource.  Generation from Specified Coal Resource #2, an	
Specified Coal Resource #2	C3				n/a - not permitted under CETA	owned or long-term contracted resource.	
Specified Coal Resource #2	C3				under CETA	Total forecasted generation from owned or long-	
						term contracted specified-source natural gas	
Natural Gas - Total (MWh)	D		_		_	resources.	
ivaturar das - rotar (ivivvir)						resources.	
Aggregate Natural Gas Generation						Energy acquired from aggregate natural gas	
(Less Specified Resources)	D1					generation (less specified resources).	
						Generation from Specified Natural Gas Resource #1,	
Specified Natural Gas Resource #1	D2					an owned or long-term contracted resource.	
·						Generation from Specified Natural Gas Resource #2,	
Specified Natural Gas Resource #2	D3					an owned or long-term contracted resource.	
						Total forecasted generation from owned or long-	Assume "average," "P50," or "base case" hydro
Hydro - Total (MWh)	E					term contracted specified-source hydro resources.	conditions
						Total forecasted generation from owned or long-	
Other Renewables & Non-Emitting						term contracted specified-source non-hydro	
Resources - Total (MWh)	F					renewables and other non-emitting resources.	
						Estimate of generation to be acquired through	
	G =					unspecified wholesale market purchases.	
Harris of Carl Davidson (1994)	A - (sum of B					Unspecified purchases are assumed to be the	Energy to serve load minus the sum of all dspecified
Unspecified Purchases (MWh)	through F)	-	-	-	-	backstop resource.	sources.  Energy to serve load multiplied by 5%. This 5% adder
						Estimate of shorter-term balancing transactions that	
Operational adjustment (MAM/h)	H = A * 5%					carry CCA compliance obligations	· ·
Operational adjustment (MWh)	Π = A · 3%	_	-	-	-	carry con compliance obligations	that carry CCA compliance obligations.
BPA Unspecified Imports, if BPA is						Estimate of unspecified imports from BPA for each	
not FJD (MWh)						year, if BPA is not the FJD	Utility specific estimate

Constants Used in Calculations

Asset Controlling Supplier (ACS) factor for Bonneville Power Administration - Average of ACS factors used 0.0154 in previous four years (2019-2022) (MTCO2e/MWh)

ı		
	1.0614	Default Coal Emissions Factor (MTCO <sub>2</sub> e/MWh)
		Specified Coal Resource #1 emissions factor, if known
w	w	(MT CO2e/MWh)
		Specified Coal Resource #2 emissions factor, if known
хх	(	(MT CO2e/MWh)

0.435	Default Natural Gas Emission Factor (MTCO <sub>2</sub> e/MWh)
	Specified Natural Gas Resource #1 emissions factor, if
YY	known(MT CO2e/MWh)
	Specified Natural Gas Resource #2 emissions factor, if
ZZ	known (MT CO2e/MWh)

Unspecified emissions factor established in WAC 0.437 173-444-040

Estimated balancing purchases and sales as a 5.00% percentage of total energy to serve load

Unspecified emissions factor established in WAC 0.437 173-444-040

EMISSIONS ASSOCIATED WITH DECI	LARED RESOURCES:						
MT CO2e	J = B * BPA's ACS					Metric tons of CO2 equivalent associated with BPA	
BPA purchases	emissions factor	-	-	-	-	purchases.	Total BPA purchases multiplied by BPA's ACS factor.
MT CO2e Coal	K = C * coal emissions factor(s)	#VALUE!	#VALUE!	#VALUE!	n/a - not permitted under CETA	Metric tons of CO2 equivalent associated with specified-source coal generation.	Total generation from owned or long-term contracted specified-source coal resources multiplied by the relevant coal emissions factor(s) (default coal emissions factor or specific emissions factors, when known).
MT CO2e Natural gas	L = D * natural gas emissions factor(s)	#VALUE!	#VALUE!	#VALUE!	#VALUE!	Metric tons of CO2 equivalent associated with specified-source natural gas generation.	Total generation from owned or long-term contracted specified-source natural gas resources multiplied by the relevant natural gas emissions factor(s) (default natural gas factor or specific natural gas factor, when known)  Total generation estimated to be acquired through unspecified purchases multiplied by the unspecified
MT CO2e Unspecifed purchases	M = G * unspecified emissions factor	-	-	-	-	Metric tons of CO2 equivalent associated with unspecified purchases.	emissions factor established in WAC 173-444-040
MT CO2e Operational adjustment	N = K * unspecified emissions factor	-	-	-	-	Metric tons of CO2 equivalent associated with the operational adjustment.	Operational adjustment value multiplied by the unspecified emissions factor established in WAC 173-444-040
MT CO2e BPA unspecified imports	O = I * unspecified emissions factor	-	-	-	-	Metric tons of CO2 equivalent associated with importing unspecified BPA power if BPA chooses not to be the FJD	Total BPA imports multiplied by the unspecified emissions factor established in WAC 173-444-040
Energy supplied to EITEs (MWh)	P					Energy supplied to industrial covered entities by the utility. Fill out this field ONLY IF EITEs are receiving allowances for energy consumption directly. Otherwise, assume inclusion of energy supplied to EITEs in utility-specific emissions ("R").	
EITE Emissions (MTCO₂e)	Q = (P / A) * sum of J through O	#DIV/0!	#DIV/0!	#DIV/0!	#DIV/0!	EITE Purchased Electricity multiplied by Utility- Specific Emissions Factor	Energy provided to EITE customers divided by all energy to serve load, then multiplied by the sum of all emissions associated with declared resources.
Utility-Specific Emissions (MTCO <sub>2</sub> e)	R = sum of J through O - Q	#VALUE!	#VALUE!	#VALUE!	#VALUE!	Total metric tons of CO2 equivalent associated with energy to serve load.	Sum of all emissions associated with declared resources subtracted by emissions associated with industrial covered entities.
COST BURDEN CALCULATION:  Utility-Specific emissions allowances	S	#VALUE!	#VALUE!	#VALUE!	#VALUE!	Total metric tons of CO2 equivalent associated with energy to serve load.	Total metric tons of CO2 equivalent associated with energy to serve load.
Administrative Costs Allowance Adjustment	allowance floor price	-	-	-	-	Projected administrative costs associated with participation in the CCA program and allowance market/auction.	Projected administrative cost per year divided by the estimated floor price for one emissions allowance.
Power Cost Adjustment	U = estimated annual power cost impacts / allowance price used to estimate power costs					Projected power cost impacts due to redispatch - CO2 cost in thermal dispatch decreases wholesale market sales, increases average production cost.	Projected increased power costs per year divided by the assumed price of emissions allowance equal to forecast in Appendix H.1 of Ecology's Preliminary Regulatory Analysis for Chapter 173-446 WAC
Annual Allocation (allowances)	V = S+T+U	#VALUE!	#VALUE!	#VALUE!	#VALUE!	Utility-Specific Emissions Allowances PLUS Administrative cost allowance adjustment PLUS Power Cost Adjustment	Utility-Specific Emissions less EITE Emissions PLUS Administrative cost allowance adjustment PLUS Power adjustment

	Estimated cost burden for administration each year: reporting, market participation, auction tracking, etc. In dollars.
\$22.34	Estimated allowance floor price for 2023

	Estimated allowance floor price for 2024 (not
	adjusted for inflation)
	Estimated allowance floor price for 2025 (not
\$24.63	adjusted for inflation)
	Estimated allowance floor price for 2026 (not
\$25.86	adjusted for inflation)