Enbridge Gas Distribution QRAM Process

Calculation of Change in Reference Price

Volumetric Forecast for the Test Year	Gas Supply Portfolio	Reference Price Derivation: 21-Day Average Price for each month for each Hub/Basin	Reference Price Derivation: Annual Gas Supply Cost for each Source of Supply	Reference Price Derivation: Transportation Costs for Contracted Capacity	Reference Price Derivation: Reference Price	Change in Reference Price
Function of: 1- Degree Days 2- Customer Usage 3- Customer Additions 4- Total Customers	Inputs: Contracted Pipe Capacity + Monthly Volumes to be purchased at each Hub/Basin (AECO, Empress, Chicago, Dawn, etc.)	Inputs: Daily Closing Forward Price for 21 days for all 12 forward months at each Hub/Basin (AECO, Empress, Chicago, Dawn, etc.)	Inputs: 1- 21-Day Average Price for each month at each Hub/Basin 2- Monthly Volumes to be purchased at each Hub/Basin (AECO, Empress, Chicago, Dawn, etc.)	Inputs: Transportation Costs on TCPL, Alliance, Vector etc.	Inputs: 1- Total Acquisition Cost 2- Forecast Volume	Inputs: 1- Reference Price New Quarter 2- Reference Price Last Quarter (Trigger Rate Change: 0.5 ¢/m^3)
Determined once Annually via Rate Adjustment Process						
FORMULAE:		21-Day Avg Price = (Forward Price Day1 + Forward Price Day2 + ...+ Forward Price Day 21)/21	Annual Gas Supply Cost = ∑ Hub/Basin Costs , where: Annual Hub/Basin Cost= ∑ (21 -Day Avg. Price for the month x Forecast Volume for the month)	Transportation Cost = ∑ Pipeline Charges (TCPL, Alliance, Vector etc.)	Reference Price = (Gas Supply Cost + Transportation Cost) / Forecast Gas Purchase Volume	Change in Reference Price = Reference Price New Quarter - Reference Price Last Quarter

Determination of Change in Annualized Revenue Requirement

Change in Forecast Purchase Cost of Gas	Change in Forecast Carrying Cost of Gas in Storage & Working Cash	Change in Forecast Capital Tax
Inputs: 1- Reference Price New Quarter 2- Annual Forecast Gas Purchase Volume 3- Reference Price Last Quarter	Inputs: 1- Reference Price New Quarter 2- Gas in Storage and Working Cash 3- Reference Price Last Quarter 4- Rate of Return (RoR) on Ratebase	Inputs: 1- Gas in Storage at Reference Price New Quarter 2- Gas in Storage at Reference Price Last Quarter 3- Capital Tax Rate
Change in Purchase Cost = Acquisition Cost New Quarter - Acquisition Cost Last Quarter	Change in Carrying Cost = Gas in Storage x (Reference Price New Quarter - Reference Price Last Quarter) x RoR on Ratebase	Change in Capital Tax = Capital Tax New Quarter - Capital Tax Last Quarter

Derivation of Rate Changes: Cost Allocation and Rate Design

Allocate Changes in Costs to Rate Classes	Update Gas Supply Charge	Update Transportation Charge	Update Load Balancing Charge	Update Delivery Charge	Derive Rate Adjustment Rider
Inputs: 1- Gas Supply Costs 2- Transportation Costs 3- Carrying Cost of Gas in Inventory 4- Working Cash Requirement 5- Capital Taxes	Inputs: 1- Empress price inclusive of Fuel Cost 2- Working Cash (Commodity)	Inputs: 1- Upstream Transportation Costs including Deemed Transportation Costs	Inputs: 1- Return on Gas in Inventory 2- Capital Taxes 3- Seasonal and Peaking Supplies	Inputs: 1- Lost and Unaccounted for Gas Costs	Inputs: 1- Projected Year End PGVA Balance 2- System Gas Volume (Trigger for Clearing: 0.5 ¢/m^3)
	Gas Supply Charge	Transportation Charge	Load Balancing Charge	Delivery Charge	Rate Rider

QRAM Application Review and Approval

1- Submission of QRAM Application
2- Stakeholder Review of the Application
3- Reply Comments from Enbridge
4- The Board approval of:
   (i) Reference Price
   (ii) Rate Changes
   (iii) PGVA Clearances/Adjustments
   (iv) Customer Rate Change Notices
5- Implementation of Resultant QRAM Rates

Note: Monthly Customer Charge and Contract Demand Charge do not change with QRAMs.