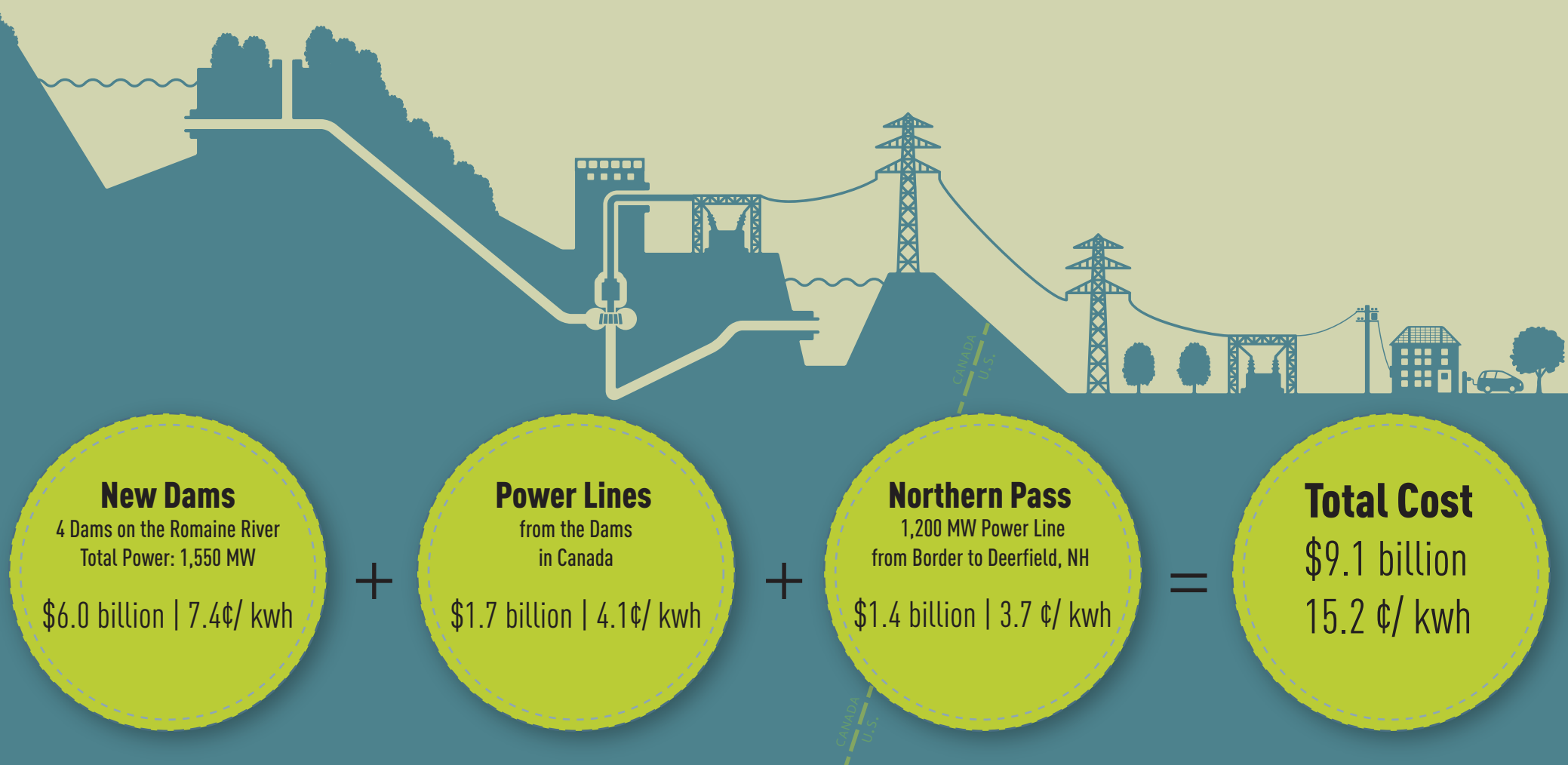


New England could pay more than **\$800 million** above market prices every year for Hydro-Québec/Northern Pass hydropower.



What we pay now

2013 MARKET PRICES
6¢/kwh

WIND POWER
8¢/kwh

ENERGY EFFICIENCY
5¢/kwh

All figures in US currency. Assumptions, calculations, and references on reverse.

Assumptions, Calculations, and References

Northern Pass electricity will come from the Romaine project and associated transmission investments. (All in US Currency at \$1.09 Canadian Dollars per US Dollar. All annual costs in US Cents per kwh.)

Romaine Project Cost: \$6.0B (Source: Hydro-Québec Documents)

Annual Generation from Romaine, When Complete: 8 TWH (Source: Hydro-Québec Documents)

Annual Cost of Romaine (¢/kwh)

Debt Interest:	2.9	(Debt of 69.5% of project cost at the Hydro-Québec average of 5.6% annual interest. Hydro-Québec 2013 18K pgs. 14 & 28)
Equity Return:	2.3	(Equity of 30.5% project cost at 10% return annually (actual 2013 ROE was 14.6%), Hydro-Québec 2013, 18k, pgs. 14 & 28)
Depreciation:	1.4	(Based on Hydro-Québec average generation depreciation life, Hydro-Québec average from Hydro-Québec 18K pgs. 10, 16, & 34)
Operations:	0.8	(Cash operating cost excl. interest, fuel, purchases from Churchill. Pg. 2 of annual report; pgs. 2 & 34 of 2013 18K, Globe & Mail)
Total	7.4	¢/kwh

Canadian Transmission Cost: \$1.7 Billion (Investment for transmission to Poste Arnaud. Source: Hydro-Québec Documents)

Annual Cost of Canadian Transmission (¢/kwh)

Debt Interest:	0.8	(Debt of 69.5% of project cost at the Hydro-Québec average of 5.6% annual interest. Hydro-Québec 2013, 18K, pgs. 14 & 28)
Equity Return:	0.7	(Equity of 30.5% of project cost at 10% annual return (actual 2013 ROE was 14.6%). Hydro-Québec 2013 18K, pgs. 14 & 28)
Depreciation:	0.7	(Based on Hydro-Québec avg. transmission depreciation life, calculated from Hydro-Québec 18K pgs. 10, 16, 34)
Operations:	1.3	(1550 MW at \$71.23 per kw/yr., from 2012 18K pg. 23, point-to-point rate minus temp. adj. for trans. from Poste Arnaud to U.S. Border)
Line Loss:	0.6	(Assuming line loss for a mix of AC and DC high voltage lines over 1000 km of 5.1%)
Total	4.1	¢/kwh

Northern Pass Project Cost: \$1.4 Billion (Source: Northeast Utilities analyst presentation)

Annual Electricity Carried: 8.9 TWH (Source: FERC approval of NPT-Hydro-Québec transmission service agreement)

Annual Cost of Northern Pass (¢/kwh):

Debt Cost:	0.6	(50% debt financed at 7.7% interest per FERC filing pg. 502)
Equity Return:	1.0	(50% equity financed at 12.56% after tax return, per FERC filings and recent Northeast Utilities analyst presentation)
Income Taxes:	0.7	(Combined 40.5% federal (35%) and state (8.5%) tax rate net of deduction of state taxes on federal return)
Depreciation:	0.4	(FERC filing pg. 501. 40 year life adjusted upward for project cost increase from \$1.1 Billion to \$1.4 Billion)
Real Estate Tax:	0.4	(\$28MM from FERC filing pg. 501, line 19, adj. for project cost increase. \$40MM uses ave. utility real estate tax rate of 2.85%, excluding State Education tax)
Operations:	0.1	(FERC filing pg. 501)
Rent from HQ:	0.6	(Estimate, actual cost not yet disclosed, may pass through to other ratepayers)
Total	3.7	¢/kwh

Market ¢/kwh: 6 (NEPOOL average price per kwh for 2013)

Wind Power ¢/kwh: 8 (Recent long-term contracts filed with the Massachusetts DPU, wholesale cost, without potentially required transmission)

Efficiency ¢/kwh: 5 (March 2014 Lawrence Berkeley Labs report, pg. 37; other recent estimates are lower)

NOTE: Price and cost for Hydro-Québec energy are not the same. Hydro-Québec will be able to raise rates over time.

July 2014