

UNDERSTANDING HOME ENERGY EFFICIENCY

Factors driving demand for energy efficient homes

Policies, programs and frameworks

will make energy efficient homes the norm, increasing the stock and value of the most efficient homes

Consumer demand

for energy efficient homes is here, now, and will continue to increase as the level of awareness and understanding amongst home buyers around energy costs and energy savings increases

1. Walk-in closets
2. High-efficiency windows
3. Energy efficient appliances
4. Overall energy efficient home
5. Kitchen islands
6. Linen closets
7. Open concept kitchens
8. Large windows
9. HRV/ERV air exchange
10. Certification by a designated program



1,059,320
Labels since 2011

3580 (11% YOY increase)
Labels in 2018

700 (252% YOY increase)
Labels in 2018

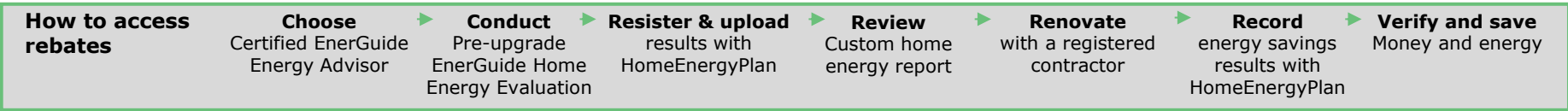
Efficiency ratings

Understanding the efficiency of components

will ensure you have optimal energy use and production

Scale	Low	Med	High
Insulation	R-value		
Attic	< R28	R40	R80 >
Wall	< R8	< R20	R28 >
Frost wall	< R8	< R12	R28 >
Windows	Energy rating (ER)		
	< 10	26	50 >
Air tightness	Air Changes per Hour (ACH)		
	> 4	3.2	1 <
Hot water	EF ₁ , Standby loss – watts ₂ , COP ₃		
Storage ₁	0.6	0.67	0.80 >
Tankless ₁	< 0.80	0.82	0.95 >
Electric ₂	25	70	180.5
Heat pump ₃	3.2	4.5	5.2
DWHR	Efficiency % @ 5.7-19L/min		
	39.2	55.6	58.4
Furnace	AFUE		
	< 92	95	98 >
Air source heat pump	HSFP		
	6.8	8.2	9.5
HRV	SRE %		
	60/50	66/60	78/72
Central air	SEER		
	< 14	16	21 >

HOME ENERGY PLAN REBATES

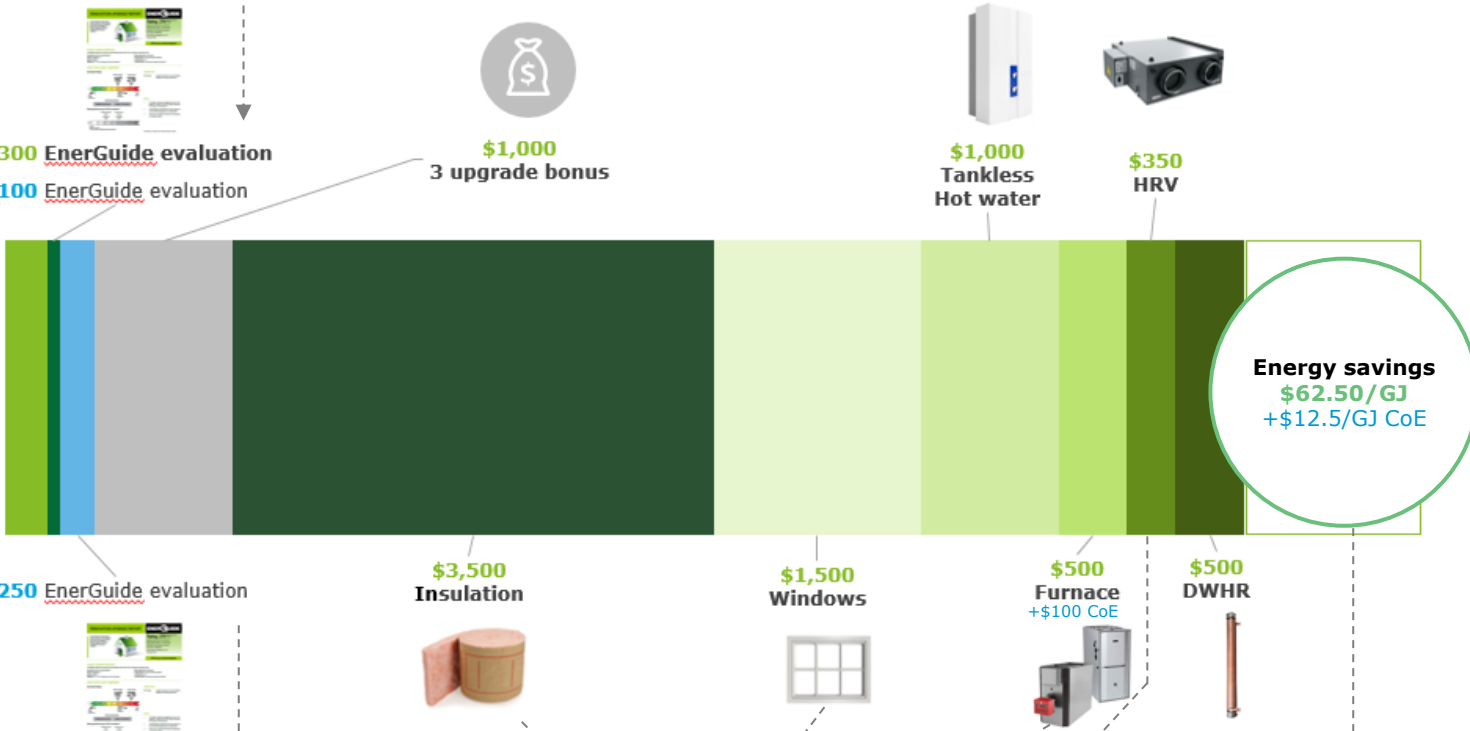


Rebates available



Resources

- Change Homes for Climate
- Keeping the Heat In
- Illustrated Guide for the Alberta Building Code 9.36. Prescriptive Energy Efficiency Requirements for Houses



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Case study

1200ft
 1985
 Note: Windows were only updated to double-pane. Rebates only available for triple-pane.

