



YAF MODEL | 28 EER & 4.8 COP

AFFINITY™ SERIES
GEO THERMAL HEAT PUMPS



10°

Heating Mode

When temperatures drop, a geothermal heat pump taps into the heat stored underground and concentrates it to keep your home warm. It doesn't use combustion nor emit any on-site gasses like carbon monoxide or carbon dioxide. Moving heat instead of creating it makes geothermal the most efficient heating solution available.

The ground absorbs 46% of the sun's radiation.

96°

Cooling Mode

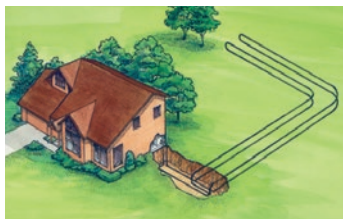
When temperatures rise, a geothermal heat pump pulls unwanted heat from your home and deposits it into the cooler earth (or uses it to create hot water). Its performance isn't affected by normal outdoor temperature swings and the result is ultra-efficient cooling and dehumidification.

55°-70°

The average year-round ground temperature only three to four feet beneath the frost line.

Geothermal Earth Loops

A geothermal system uses a series of underground pipes called a "loop." A loop is the secret behind a geothermal system's amazing efficiencies and the biggest difference from ordinary heating and cooling technologies.



Horizontal Loop

A typical home needs ¼ to ¾ of an acre to utilize a horizontal loop, and trenches are dug using a backhoe or chain trencher. High density polyethylene pipes are inserted, and the trenches are backfilled.



Vertical Loop

A typical home requires three to five bore holes, dug with a drilling rig. A pair of pipes with special u-bend fittings is inserted into the holes.



Pond Loop

A ½ acre, 8-foot-deep pond is usually sufficient for the average home. A series of coiled, closed loops are sunk to the bottom of the body of water and are used for heat transfer.



Open Loop

An open loop utilizes a well that has an adequate capacity to provide water flow for both domestic use and the geothermal unit. Most units require 3-10 GPM, depending on size and model.



Efficiency

Geothermal heat pumps are much more efficient than traditional heating and cooling systems. The York® Affinity™ YAF is rated with an amazing 28 EER and 4.8 COP, which makes it one of the most efficient dual stage units on the market. Efficiency translates into savings.



Cost effective

Geothermal heat pumps are so efficient that any added cost over traditional equipment is usually recovered in just a few years. And because they have a lifespan of 20-25 years, your investment will last longer and your return on investment will grow year by year.



Safe

No combustion or flames are used to operate a geothermal heat pump, making it a safe choice for your home and family. Our systems merely move heat to and from the ground rather than by burning natural gas, propane, or oil.



All-in-One

One York® geothermal heat pump will provide heating, cooling, and supplemental hot water for your home. A variety of sizes and configurations are available, so no matter your home or climate, a geothermal heat pump will work for you.



Environmentally responsible

Since our units don't burn expensive, polluting fossil fuels, they're the most environmentally responsible options available today. Replacing a furnace and/or air conditioner with geothermal can minimize acid rain threats, air pollution, and the greenhouse effect.



Affordable peace of mind

York® Affinity™ YAF units come with warranties up to 10 years for parts and labor allowances. Other options are available, so see your York® Contractor for details.

Features of the Affinity™ Series

Dual Capacity Compressor:

Allows the unit to operate at two speeds rather than running at one high speed all the time. The Affinity™ YAF can operate more frequently in a lower speed to satisfy the needs of your home while saving energy.

Controls: Sophisticated Aurora controls provide easy-to-use but extensive troubleshooting capabilities as well as advanced two-way communication between components. Expanded capabilities include true energy monitoring, extended hot water generation, and more.

Blower Motor: An ECM variable speed blower motor operates at only the speed needed for the greatest in efficiency and savings. A standard PSC or high efficiency 5-Speed ECM blower motor are also available.

Aurora Interface Diagnostic Port: Technicians can diagnose and service your system without even opening the unit by utilizing the external communication port and interface tool.

IntelliStart®: This optional soft starter reduces start-up amperage by 60% of normal draw to reduce noise, eliminate light flicker, and increase compressor life.

Coated Coaxial Heat Exchanger:

Coaxial heat exchanger life is extended by our proprietary coating that protects against condensation at temperatures below 50°F.

Hot Water Generation: A hot water assist option preheats your water and delivers it to your hot water heater. The longer the unit operates, the greater the amount of hot water generated.

All-Aluminum Air Coil:

Affinity™ YAF units feature aluminum air coils for durability and extended system life.

Cabinet: A professional grade powder-coat finish provides long-lasting beauty and protection. The unit is fully insulated with cleanable foil-backed insulation that ensures quiet operation.

Filter and Filter Rack: A high performance MERV 11 pleated filter comes standard while an optional MERV 13 pleated filter is available. The filter rack can be easily converted for use with 1" or 2" filters.

R-410A: All York® geothermal units utilize R-410A refrigerant, which is friendly to the environment.



Learn more at yorkgeothermal.com

Make a smart choice: York®

Choosing the right contractor is the first step in selecting the best system for your home. Your York® Contractor is trained to give you professional home comfort services, including:



- An evaluation of factors such as your home's size, age, number of rooms, climate characteristics and utility costs
- A system recommendation that fits your family's comfort needs, your home, your lifestyle and your budget
- The assurance of proper installation and customer care, including warranties and maintenance options

Stay comfortable for years to come.

York® is proud to offer the YorkCare™ Comfort Plan. It's designed to maintain your system as well as your peace of mind. With YorkCare™ you get total protection that ensures your unit is effective and efficient for years to come.

What's more, your York® Contractor offers maintenance agreements that provide upkeep while maximizing the warranty provisions. Ask about the YorkCare™ Comfort Plan. A little extra coverage is always a comforting idea.

Long story short – our history.

OVER
135
YEARS
OF DESIGN AND
INNOVATION

You've probably enjoyed York® engineering for years without even knowing it. We have, after all, designed and implemented heating and cooling systems in some of the world's most famous structures, including the U.S. Capitol building, the Sydney Opera House, the entire U.S. Navy nuclear submarine fleet, and even venues such as your local mall and corner bank.

There's a reason people trust us with the big jobs. We've been doing this a long time. Over 135 years, in fact. In that time, we developed the first successful room air conditioner and cooled the world's first theater, hotel and office building. We're constantly leading the industry in our design and our technology. And our commitment has earned our products the Good Housekeeping Seal of Approval. No matter what the scale, chances are we've developed an efficient, durable and effective solution for it.



Homeowners who install an ENERGY STAR® rated geothermal system in the U.S. are eligible for a 30% federal tax credit. The 30% credit will last through 2032 and can be claimed on equipment and installation costs with no upper limit. The credit is scheduled to decrease to 26% in 2033 then to 22% in 2034, so act now for the most savings!

ISO/AHRI/ASHRAE Performance Ratings (13256-1)

AFFINITY™ YAF MODEL						
MODEL & SIZE			CLOSED LOOP		OPEN LOOP	
			COOLING (EER)	HEATING (COP)	COOLING (EER)	HEATING (COP)
DUAL CAPACITY	026	Full Load	19.6	4.0	24.0	4.8
		Part Load	26.0	4.5	29.7	4.9
	038	Full Load	19.7	4.2	24.4	4.9
		Part Load	28.0	4.8	32.1	5.1
	049	Full Load	19.3	4.0	24.5	4.6
		Part Load	27.4	4.4	33.0	4.7
	064	Full Load	19.3	3.8	23.9	4.6
		Part Load	26.5	4.3	30.7	4.8
	072	Full Load	18.2	3.7	22.0	4.3
		Part Load	24.9	3.9	27.6	4.3

For additional product details, such as weight and dimensions, visit www.york-geothermal.com or ask your York® Contractor.

AFFINITY™ YAF MODEL						
MODEL & SIZE			CLOSED LOOP		OPEN LOOP	
			COOLING (EER)	HEATING (COP)	COOLING (EER)	HEATING (COP)
SINGLE SPEED	012	PSC	16.5	3.5	23.1	4.2
		PSC	17.3	3.5	24.7	4.3
	018	ECM	18.3	3.8	26.8	4.7
		PSC	16.2	3.8	25.5	4.8
	022	ECM or 5-Speed	18.7	4.0	30.0	4.8
		PSC	21.1	3.7	27.1	4.7
	030	ECM or 5-Speed	22.0	3.9	29.5	4.8
		PSC	19.2	3.8	24.4	4.5
	036	ECM or 5-Speed	22.0	4.2	30.1	5.1
		PSC	18.5	3.5	23.3	4.3
	042	ECM or 5-Speed	21.7	4.0	29.5	4.9
		PSC	16.0	3.7	22.3	4.2
	048	ECM or 5-Speed	18.8	4.0	26.1	4.7
		PSC	17.4	3.7	22.3	4.4
	060	ECM or 5-Speed	18.4	4.0	24.7	4.7
		PSC	16.6	3.4	20.8	4.0
	070	ECM or 5-Speed	17.6	3.7	23.8	4.4



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WE ENCOURAGE
NATE
CERTIFICATION



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