modulating electric furnace with electronic controls-ECM motor



Modulation at its best

A SEF furnace equipped with a modulating system and a ECM (electronically commutated motor) ensuring increased efficiency and uniform airflow, that's what the SEFECM has to offer. It's the pinnacle of comfort and reliability. Thanks to the ECM, you will have the opportunity to use the continuous ventilation mode for less. Moreover, since it is more quiet than a PSC (permanent-split capacitor), you can enjoy continuous airflow which maintain constant temperature and increase the efficiency of your humidifier and filtration system. The ECM controls allow flexibility when choosing the desired airflow for each mode. A potentiometer allows to adjust the desired airflow with a high degree of accuracy, resulting in easier adjustments and maximum comfort. The SEFECM can also be installed in mobile homes using the FSB1 adapter.

Features

color: light charcoal **finish:** powdercoated **manufacturing:** robust monopiece galvanized steel cabinet • compartmentalized door providing easy access to all components • disposable 20 x 20 in. air filter (included) • compatibility mechanism for air conditioners and heat pumps (included) • pilot lights that clearly identify the selected modes • 1 type of relay for all functions **elements:** modulating elements for increased comfort • elements separately framed allowing for quick and easy replacement • M-shaped elements supports increasing heat transfer surface **motor:** ECM (electronically commutated motor) **control:** easy-to-use modes • automatic shut-down of the continuous heating modes, if needed • power selector switch • continuous ventilation switch (low or high speed) • continuous heating switch (2.5 or 5 kW) • simplified connexion system • electronic board replacing the sequencers • mechanical relays allowing for easy and low-cost maintenance **installation:** three possible installation positions: upflow, downflow or horizontal • installation directly against a wall ("zero inch" clearance) • possible installation with 3 conductors **warranty:** 5 years

Controls table



continuous ventilation		continuous heating		thermostat: heating demand	
LOW SPEED	HIGH SPEED	2.5 kW	5.0 kW	50%	100%
the low or high speed switch allows to select the low or high speed continuous ventilation mode or to keep the automatic mode active	uniformity and increases efficiency of the humidifier	allows a heat increase up to 2.5 kW in order to reduce the feeling of cold airstreams in recirculation*	allows a heat increase up to 5.0 kW in order to reduce the feeling of cold airstreams in recirculation*	reduces the maximum power by approximately half during the seasonal transition periods	maximum power (during the coldest months of the year)

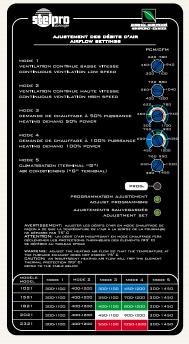
* increase the elapsed time between heating demands

Approved according to the Canadian standards only

for American versions, visit our website or contact our customer service

Stelpro Design Inc. reserves the right to modify any design and/or dimension of its units at any time. Visit www.stelpro.com to view the latest version of this product

modulating SEFECM



Selection table

product motor power pow code kilowatts volts speeds mm in. mm in. mm in. lb kg price hp SEFECM1021 240/208 MULTI 36 9/16 20 1/8 21 3/16 1 426.00 10.0/7.5 929 538 100 1/2511 45 36 9/16 SEFECM1521 1/2 MULTI 929 21 3/16 1 496.00 15 0/11 2 240/208 511 20 1/8 538 100 45 SEFECM1821 18.0/13.5 240/208 MULTI 929 36 9/16 20 1/8 538 21 3/16 45 1 542.00 1/2 511 100 SEFECM2021 20.0/15.0 240/208 MULTI 929 36 9/16 20 1/8 538 21 3/16 100 45 1 542.00 1/2511 SEFECM2321 23.0/17.2 240/208 1/2MULT 929 36 9/16 511 20 1/8 538 21 3/16 100 45 1 693.00 SEFECM2721 27.0/20.2 240/208 MULTI 929 36 9/16 511 20 1/8 538 21 3/16 105 48 1 914.00 1 SEFECM3021 30.0/22.5 240/208 MULTI 929 36 9/16 20 1/8 538 21 3/16 105 48 1 989.00 511

ECM (electronically commutated motor)

Comfort: comfort level can be increased if a variable speed motor is installed. This level cannot be reach with any other method. It also allows the user to select the low speed with the desired airflow in

Efficiency: since it combines electronic circuits and a BLDC motor, it is the most efficient motor on the

Reliability: all its electronic circuits are protected against condensation. Thanks to its design and materials,

Security: its electronic system is protected by MOVs (metal oxide varistors) against lightning overvoltages.

Comfort, efficiency, reliability and security are at the heart of the ECM.

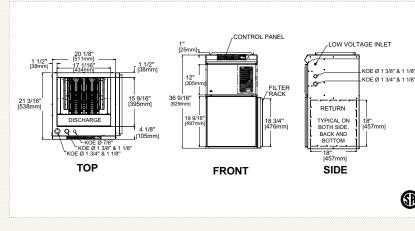
HVAC market. It can reach up to twice the capacity of a PSC motor.

like silicone elastomer, it is one of the most reliable motor on the market.

Prices indicated in this catalog are valid 90 days starting from March 1, 2011. For all the updated prices, please refer to the Web site.

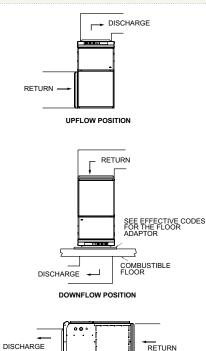
recirculation.

Technical drawings



Installation

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Accessories/filters

For optimum efficiency and a better air quality: add a Stelpro filter

For a complete list of accessories, please refer to the accessories table at page 77.

HORIZONTAL POSITION