

PRODUCT PROFILE

FG160-5115-5

Swimming Pool Heat Exchanger

Introduction

The Bowman FG160-5115-5 is an efficient shell and tube swimming pool heat exchanger which is suitable for use with either boiler heated hot water, or renewable energy heating systems, such as heat pumps or solar collectors. The cast end covers are finished in 'C' coat, an advanced technology coating, which is highly corrosion resistant and the unit is available with either a titanium, cupro-nickel or stainless steel tube core.

Typical Heat Transfer

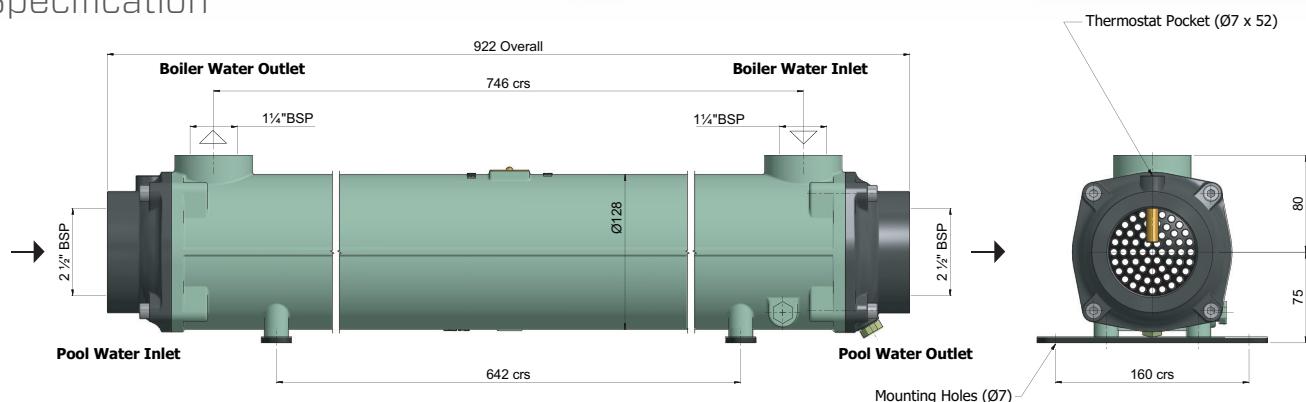
Boiler heating - 350kW
Renewable energy - 150kW



Product Benefits

Proven – heats pools fast, reducing energy costs
Easy to install – 2 1/2" BSP threaded end covers with thermostat pocket
Durability – salt water and mineral rich fresh water compatible
Simple to maintain – easy disassembly for routine maintenance
Titanium models – full 10 year warranty on titanium materials

Specification



All dimensions in mm (except threaded connectors)

Type	Tube Material	Typical Pool Capacity		Maximum Pool Water Flow		Maximum Hot Water Temp		Max. Operating Pressure Pool Water		Max. Operating Pressure Hot Water		Weight
		m³	gal	m³/h	l/min	°C	°F	bar	psi	bar	psi	
FG160-5115-5C	Cupronickel	320	70,000	39.0	650	110	230	6	87	6	87	29
FG160-5115-5S*	Stainless Steel	320	70,000	39.0	650	110	230	6	87	6	87	29
FG160-5115-5T	Titanium	320	70,000	39.0	650	110	230	6	87	6	87	25

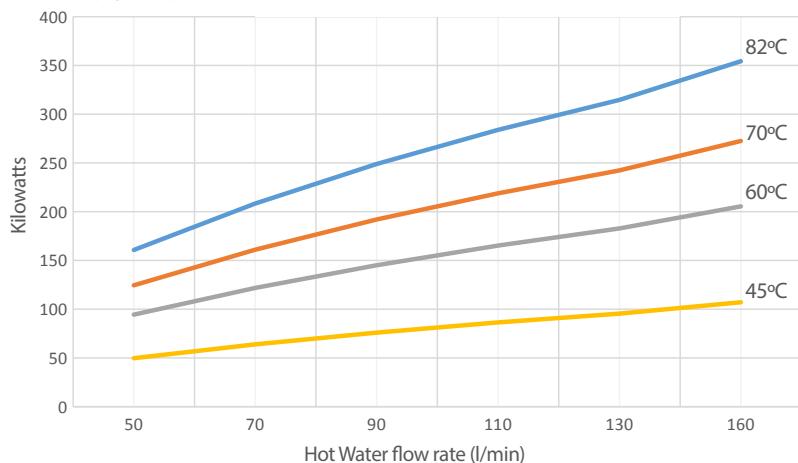
*Not suitable for use on pools fitted with salt water chlorinators or salt water pools.

Water Flow

As the graphs and table below illustrate, providing the right water flow volume is vital to the performance of the heat exchanger. If the flow rate of either the hot water supply, or the pool water circuit is too low, the heat exchanger will not perform at its designed efficiency and will be unable to transfer all the available heat energy in to the pool water.

For more information please visit; <https://ej-bowman.com/knowledge-centre/why-doesn-t-my-pool-heat-up-faster/>

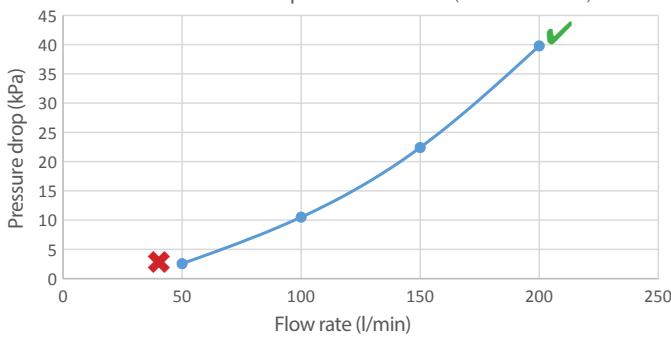
Heat Transfer



kW Heat Transfer - FG160 -5115-5
Pool water flow 650 l/min at 28°C

Hot Water	Temperature & Heat Transfer			
	82°C kW	70°C kW	60°C kW	45°C kW
Flow rate l/min	161	125	94	50
50	208	161	122	64
70	249	192	145	76
90	284	219	165	86
110	315	242	183	95
130	354	273	205	107
160				

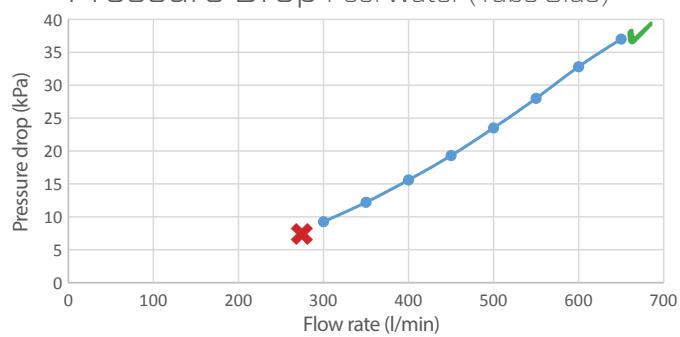
Pressure Drop Hot Water (Shell Side)



✓ Optimum heat transfer performance

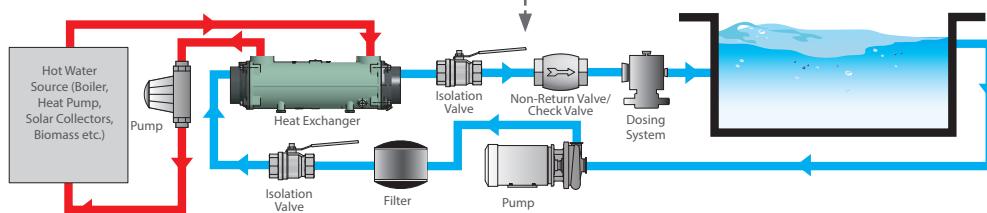
✗ Reduced heat transfer performance

Pressure Drop Pool Water (Tube Side)

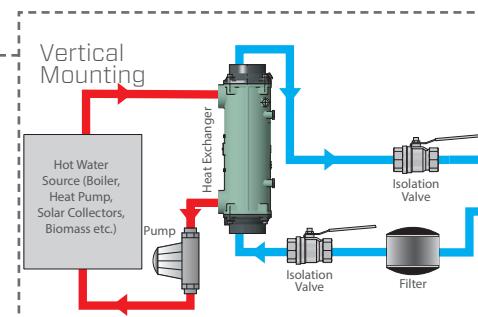


Installation

Horizontal Mounting



If an automatic dosing system is added, it must be installed after the heat exchanger on the return to the pool.



EJ Bowman (Birmingham) Ltd

Chester Street, Birmingham B6 4AP, UK

Tel: +44 (0) 121 359 5401 Fax: +44 (0) 121 359 7495

Email: sales@ej-bowman.com www.ej-bowman.com

