

Technical data & dimensions

Models ELT 440, ELT 510 & ELT 580

	Ensbury LT boiler model	Units	ELT440	ELT510	ELT580
Energy	Building regulations Part L seasonal efficiency	% gross	85.05	85.11	84.97
	Boiler output 80/60°C	kW	440	510	580
	Boiler input (gross) - maximum	kW	537	622	707
	Boiler input (nett) - maximum	kW	483	560	637
	Boiler output - minimum 80/60°C, NG	kW	100	100	165
	Boiler output - minimum 80/60°C, oil	kW	127	127	219
Water	Water content	litres	540	540	540
	System design flow rate @ 20°C ΔT rise	l/s	5.26	6.1	6.94
	Water side pressure loss @ 20°C ΔT rise	mbar	20	27	35
	System design flow rate @ 10°C ΔT rise	l/s	10.53	12.2	13.88
	Water side pressure loss @ 10°C ΔT rise	mbar	81	108	140
	Water flow rate - minimum	l/s	No minimum flow rate		
	Minimum water pressure	barg	4	4	4
	Maximum water pressure	barg	0.5	0.5	0.5
	Maximum water flow temperature	°C	90	90	90
	Minimum water flow temperature - NG	°C	60	60	60
	Minimum water flow temperature - oil	°C	50	50	50
	Minimum water return temperature	°C	15	15	15
Gas	Gas flow rate, NG - maximum	m ³ /hr	51.2	59.3	67.4
	Inlet pressure for NG - nominal	mbar	20	20	20
	Inlet pressure for NG - maximum	mbar	50	50	50
	Input rate for oil (35sec)	l/h	50.8	58.8	66.9
Flue	Approx. flue gas volume @ 15°C, 9% CO ₂ , N.T.P	m ³ /hr	614.9	707.1	830.1
	Flue gas temperature @ 80/60°C	°C	182	192	197
	Combustion chamber resistance	mbar	2.53	3.83	5.86
Connection	Water flow/return connections		PN6 - DN80	PN6 - DN80	PN6 - DN80
	Gas inlet connection pipe thread size		Rc1 ½"	Rc2"	Rc2"
	Safety valve connection		Rc1 ½"	Rc1 ½"	Rc1 ½"
	Drain connection		R1"	R1"	R1"
	Flue diameter (O/D) - nominal	mm	250	250	250
Electrics	Electrical supply for boiler		230V 1Ph 50Hz	230V 1Ph 50Hz	230V 1Ph 50Hz
	Electrical supply for burner		230V 1Ph 50Hz / 400V 3Ph 50Hz Dependant on burner selection		
	Approx shipping weight (excluding burner)	kg	973	976	980

Note:

1. Data applies to gas and oil fired boiler, unless otherwise stated.
2. The nominal gas inlet pressure shown is for Riello burners. Alternative burners and dual fuel burner requirements may change. Nominal gas inlet pressure must be maintained under full gas flow operating conditions.