6 MODELS

97-348 kW OUTPUT

Wessex ModuMax mk3 technical data

Models WM97/97H, WM 97/194V, WM97/291V, WM116/116H, WM116/232V, WM116/348V

97 and **116kW** modules

	Wessex ModuMax mk3 boiler model	Units	97/97H	97/194V	97/291V	116/116H	116/232V	116/348V
	No. of modules		1	2	3	1	2	3
Energy	Building regulations Part L seasonal efficiency	% gross	94.9	94.9	94.9	93.1	93.1	93.1
	BS EN 15502 seasonal efficiency	% gross	95.2	95.2	95.2	93.4	93.4	93.4
	Boiler output 80/60°C, NG & LPG	kW	95.7	191.4	287.1	115.2	230.4	345.6
	Boiler output 50/30°C, NG & LPG	kW	97.2	194.4	291.6	116.2	232.5	348.7
	Boiler input (gross) - maximum, NG	kW	109	218	327	133	266	399
	Boiler input (gross) - maximum, LPG	kW	106.7	213.4	320.1	130.2	260.4	390.5
	Boiler input (net) - maximum, NG & LPG	kW	98.2	196.4	294.6	119.8	239.6	359.4
	Boiler output - minimum 80/60°C, NG & LPG	kW	19.1	19.1	19.1	23.5	23.5	23.5
Water	Water content	litres	16	32	48	16	32	48
	System design flow rate @ 40°C ΔT rise	l/s	0.6	1.2	1.8	0.7	1.4	2.1
	Water side pressure loss @ 40°C ΔT rise	mbar	5	5	5	7	7	7
	System design flow rate @ 30°C ΔT rise	l/s	0.8	1.6	2.4	1	2	3
	Water side pressure loss @ 30°C ΔT rise	mbar	9	9	9	14	14	14
	System design flow rate @ 20°C ΔT rise	l/s	1.2	2.4	3.6	1.4	2.8	4.2
	Water side pressure loss @ 20°C ΔT rise	mbar	20	20	20	27	27	27
	System design flow rate @ 11°C ΔT rise	l/s	2.2	4.4	6.6	2.6	5.2	7.8
	Water side pressure loss @ 11°C ΔT rise	mbar	61	61	61	91	91	91
	Minimum water pressure	barg	Dependent on differential temperature – see page 25					
	Maximum water pressure	barg	10	10	10	10	10	10
	Maximum flow temperature setting	°C	90	90	90	90	90	90
Gas	Gas flow rate, NG (G20) - maximum	m^3/hr	10.8	21.6	32.4	12.7	25.4	38.1
	Gas flow rate, LPG (G31) - maximum	m^3/hr	4	8	12	5	10	15
	Nominal inlet pressure, NG (LPG) - maximum	mbar	20 (37)	20 (37)	20 (37)	20 (37)	20 (37)	20 (37)
	Maximum gas inlet pressure NG (LPG)	mbar	25 (45)	25 (45)	25 (45)	25 (45)	25 (45)	25 (45)
Flue	Approx. flue gas volume @ 15°C, 8.75-9.25% CO_2	m^3/hr	143	286	429	160	320	480
	Maximum flue gas temperature @ 80/60°C	°C	83	83	83	83	83	83
	Pressure at boiler flue connection	Pa mbar	150 1.5	150 1.5	150 1.5	150 1.5	150 1.5	150 1.5
	Dry NOx emission (0% excess oxygen, dry air free) - NG	mg/kWh	39.8	39.8	39.8	34.3	34.3	34.3
	Dry NOx emission (0% excess oxygen, dry air free) - LPG	mg/kWh	42	42	42	57.3	57.3	57.3
Connection	Water flow/return connections	inches	G1½" male	G1½" male	G1½" male	G1½" male	G1½" male	G1½" male
	Gas inlet connection pipe thread size	inches	R1" male	R1" male	R1" male	R1" male	R1" male	R1" male
	Nominal flue diameter (I/D)	mm	100	180	180	100	180	180
	Condensate trap connection(s) (O/D)	mm	32	32	32	32	32	32
Electrics	Electrical supply		230V 1Ph 50Hz	230V 1Ph 50Hz	230V 1Ph 50Hz	230V 1Ph 50Hz	230V 1Ph 50Hz	230V 1Ph 50Hz
	Power consumption - maximum boiler modulation	W	166	332	498	166	332	498
	Start current (per module)	Amp	1.2	1.2	1.2	1.2	1.2	1.2
	Run current (per module)	Amp	0.72	0.72	0.72	0.72	0.72	0.72
	Approx shipping weight	kg	180	355	540	180	355	540
	Noise emission @1m @maximum modulation	Max dB (A)	60	60	60	60	60	60
	Noise emission @1m @minimum modulation	Min dB (A)	47	47	47	47	47	47