WESTFA
FLÜSSIGGAS UND UMWELTTECHNIK

Product information

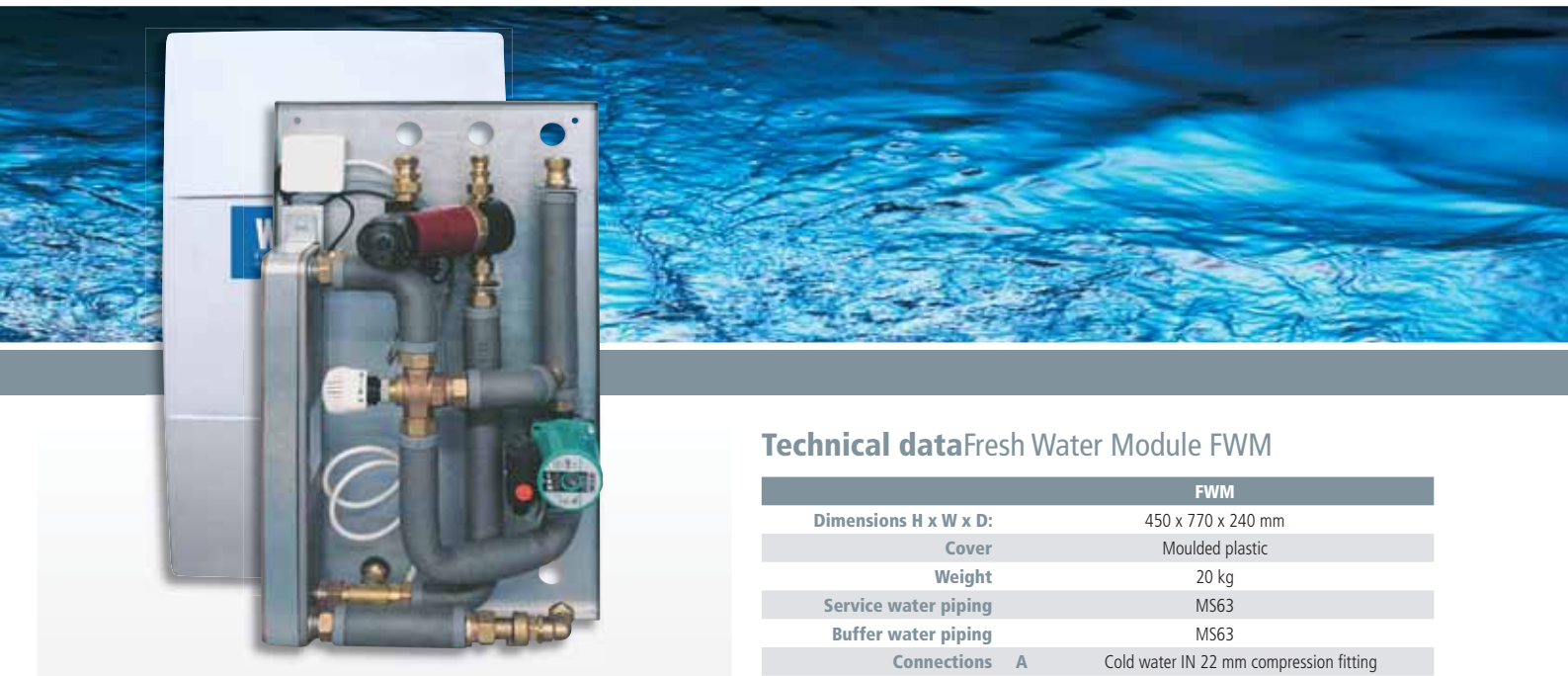
Solar hydraulic modules

Fresh water module, Stratified filling module and Solar circuit assemblies

Switch to the sunny side for your heating system

Fresh water module **FWM**

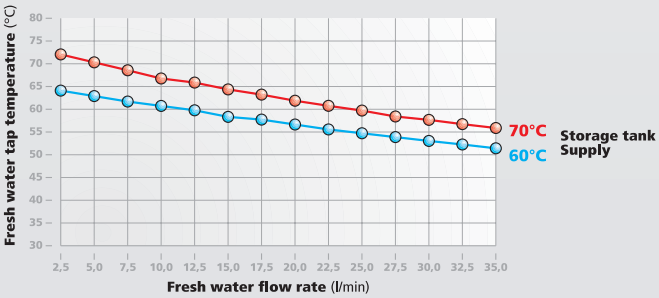
The fresh water module is used to supply instanteous hot water heating. On the primary side, heating system water is supplied from the buffer storage tank or another energy source. The circulation pump pumps the heating water via a continuous control valve through a plate heat exchanger. At the thermostat, a desired service water temperature is set. The continuous control valve allows only as much heating system water to flow on the primary side as is necessary to just maintain the preset hot water temperature on the secondary side. The sensor element integrated directly into the hot water outlet can compensate for temperature changes almost instantly with very high precision.



Advantages Fresh Water Module

- Preassembled ready to connect up
- Convenient hot water from fresh water at all times
- Hot water heated instantaneously to guarantee 100 % hygienic, clean water
- Space-optimised modular design
- High-grade stainless steel for resilient quality and long life
- High-performance heat exchanger guarantees hot water volumes virtually the same as from a service water tank

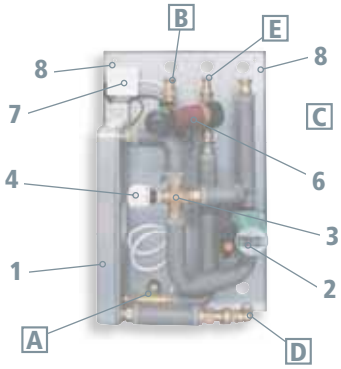
Performance chart FWM



Technical data Fresh Water Module FWM

		FWM
Dimensions H x W x D:		450 x 770 x 240 mm
Cover		Moulded plastic
Weight		20 kg
Service water piping		MS63
Buffer water piping		MS63
Connections	A	Cold water IN 22 mm compression fitting
	B	Hot water OUT 22 mm compression fitting
	C	From tank 22 mm compression fitting
	D	To tank 22 mm compression fitting
	E	Circulation 15 mm compression fitting
Main components	1	Plate heat exchanger
	2	Filling pump ST 20/7
	3	Continuous control valve
	4	Thermostat knob
	5	Flow switch
	6	Circulation pump (optional)
	7	Electrical connection box
	8	Securing holes
Capacity		Max. 35 l/min hot water
Operating pressure		Max. 6 bar
Operating temperature		Max. 95°C; min. 2°C
Filling pump		230 V/50 Hz; 3 RPM speeds
		Power: P2 = 7-60 W, P1 59-110 W; current: I = 0,29-0,48 A
Circulation pump		230 V/50 Hz; power: P1 = 25 W

Schematic diagram VRK



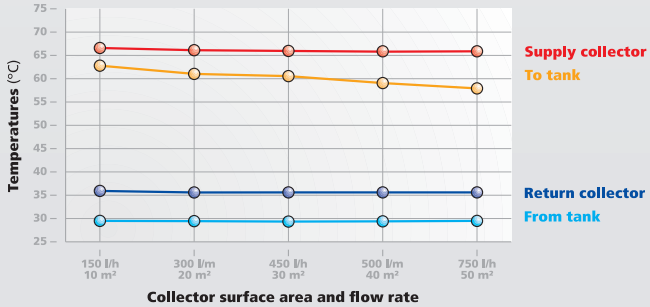
Stratified Filling Module **SLM**

Stratified filling module for filling a buffer storage tank in 2 levels. For collector areas of 15 m² to 50 m² (approx.), heat exchanger, primary and secondary pump, switching valve, 3-circuit controller with variable speed and shut-off valves, ready assembled with electrical wiring on a base plate, includes cover

Advantages
Stratified Filling Module

- Optimum external stratification of all storage tanks from 500 to 10,000 litres
- Space-saving single-tank system
- Maxmimum comfort with hot water priority circuit
- Optimum solar yields using a self-optimising controller with digital display
- Virtually loss-free heat transmission with high-performance heat exchanger
- High energy efficiency with variable speed

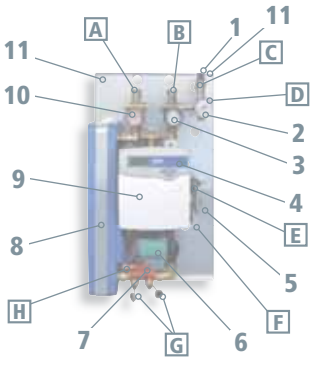
Performance chart SLM



Technical data Stratified Filling Module SLM

		SLM
Dimensions H x W x D:		450 x 770 x 240 mm
Cover		Moulded plastic
Weight		26 kg
Solar piping		MS63
Storage tank water piping		MS63
Connections	A	Solar supply (from collector) 22 mm compression fitting
	B	Solar return (to collector) 22 mm compression fitting
	C	Blow-out pipe from safety valve 3/4" internal thread
	D	Expansion vessel solar 3/4" external thread
	E	Storage tank filling top 22 mm compression fitting
	F	Storage tank filling middle 22 mm compression fitting
	G	Flushing connection and filling unit 2 x 1/2" external thread
	H	Return storage tank filling 22 mm compression fitting
Main components	1	Safety valve
	2	Manometer
	3	Return ball valve with thermometer & integ. gravity brake
	4	Solar controller
	5	Three-way switching valve
	6	Solar pump ST 20/7
	7	Flushing and filling unit (opt. return 2nd collector array)
	8	Plate heat exchanger
	9	Secondary pump (behind the controller) ST 20/6
	10	Supply ball valve with thermometer & integ. gravity brake
	11	Securing holes
Operating pressure		Max. 6 bar
Operating temperature		Max. 95 °C; min. 2 °C
Primary pump		230 V/50 Hz; 3 RPM speeds
(Solar circuit - ST 20/7)		Power: P2 = 7-60 W, P1 59-110 W; current: I = 0,29-0,48 A
Secondary pump		230 V/50 Hz; 3 RPM speeds
(Storage tank filling - ST 20/6)		Power: P2 = 7-60 W, P1 44-82 W; current: I = 0.20-0.36 A

Schematic diagram SLM



Solar circuit assemblies **SKG/RG**

WESTFA solar circuit assemblies are supplied complete with all the necessary fittings for the solar circuit. All units are mounted, sealed and insulated.

A more powerful pump option is available for large collector arrays.

For multiple solar circuits with a shared supply, return expansion assemblies are available. These can easily be fitted next to each other and are easy to plumb in.

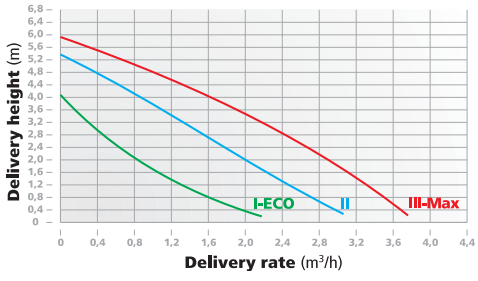
Advantages
Solar Circuit Assemblies

- Full insulation with upscale appearance
- Fittings and safety equipment ready installed
- Solar-compatible circulation pumps even for large collector arrays
- Ball valves in supply and return
- Gravity brakes in supply and return to safely prevent gravity circulation
- Solar safety valve with manometer
- Thermometer in supply and return
- Flushing and filling fitting
- Flow meter with adjustment capability
- Air separator for permanent degasification
- Ideal for combination with expansion return assembly for connecting multiple collector arrays

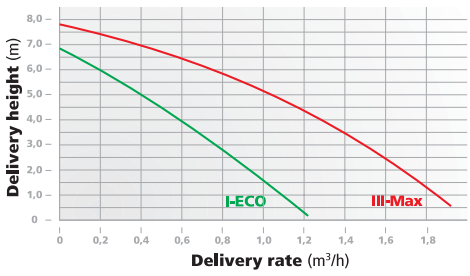
Technical data Solar Circuit Assemblies SKG/RG

		SKG206	SKG208	RG206
Dimensions H x W x D:	mm	250 x 425 x 165		
Weight	kg	6.0	7.0	5.0
Compression fittings	DN	22	22	22
Max. pressure	bar	6	6	6
Max. temp.	°C	110	95	110
Medium		Water with max. 50 % glycol		
Flow meter	l/min	0,5 - 15	0.5 - 15	0.5 - 15
Max. pump volume	l/h	3,800	1,900	3,800
Max. delivery height	m	6	8	6
Nominal voltage pump	V	230	230	230
Max. power consumption	W	44/63/83	80/120	44/63/83
Max. current consumption	A	0.36	0.52	0.36
Protection class		IP44	IP42	IP44

Pump graph SKG/RG 206



Pump graph SKG/RG 208



Information also available at

www.westfa.eu