



TOPSON AND TRK

SOLAR FLAT AND TUBULAR COLLECTORS

The amount of solar energy available in Germany exceeds primary energy demand by 80 times. Solar thermal systems exploit this potential by generating thermal energy. In technical terms, collectors convert the sunlight into heat, which they then supply to the household via a heating circuit. Any heat that is not used immediately is stored in integral accumulators and is available for later use. This type of system was initially conceived for supplying hot water for showers, baths and for drinking water. Today, solar thermal can be used as a backup solution for space heating.

- Suitable for water heating and for heating backup
- High optical efficiency
- Versatile installation angle (10° or 15° to 90°)
- Can easily be integrated into all Wolf systems and combined with various heat accumulators
- Meets requirements for the "Blue Angel" environmental mark
- 5-year guarantee (on TopSon F3)



Subsidies for solar thermal

In Germany, those opting for a solar thermal system also benefit from a government subsidy. These subsidies were increased by a further 50 % on August 2, 2007 and the application process simplified. For solar heating systems without heating backup, the German government now contributes €60/sqm of collector, solar heating systems providing heating backup attract a subsidy of €150/sqm of collector. Applications moreover need not be filed and approved before the system is erected, and may now be submitted up to six months after the system has been installed and commissioned.

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In **flat collectors**, the absorber is insulated against heat loss with rock wool (60 mm thick). The cover is made from hailstone-tested, thermally tempered safety glass 3.2 mm thick (TopSon) or 3.0 mm thick (CFK-1). Wolf flat collectors are eligible for subsidies under the German government's market incentives scheme for renewable energies.

Technical data

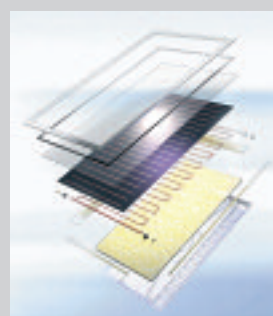
Model	TOPSON F3	TOPSON F3-Q (Landscape format)	CFK-1
Absorber material	Copper	Copper	Aluminium
Installation angle	15°- 90°	15°- 90°	15°- 90°
Optical efficiency (%)	82.1	81.9	71.2
Thermal capacity C* (KJ in m ² K)	5.5	6.3	4.73
Max. operating pressure (bar)		10	
Effective absorber area (m ²)		2.0	
Filling capacity (ltr.)	1.7	1.9	1.1
Dimensions (LxWxD in mm)	2099 x 1099 x 110	1099 x 2099 x 110	2099 x 1099 x 110
Weight (kg)	40	41	36

*Figures acc. to EN 12975

In **vacuum tube collectors**, the absorbers are located in glass tubes in which there is a vacuum. This prevents heat losses from convection. Thanks to this insulation, vacuum tube collectors achieve high absorber temperatures and very impressive efficiency rates even in low levels of sunlight. This is a particular advantage in the spring and autumn, because the system can then be used to back up the heating as well as provide hot water.

Model	TRK
Number of vacuum tubes per collector (pieces)	16
Glass tube diameter (mm)	38
Optical efficiency (%)	77.3
Thermal capacity Ceff* (KJ in m ² K)	35.7
Max. operating pressure (bar)	6
Effective absorber area (m ²)	0.808
Filling capacity (ltr.)	3.5
Dimensions (LxWxD in mm)	1684 x 765 x 100
Weight (kg)	20

*Figures acc. to EN 12975



Flat collector



The competence brand for energy saving systems

A Product of

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