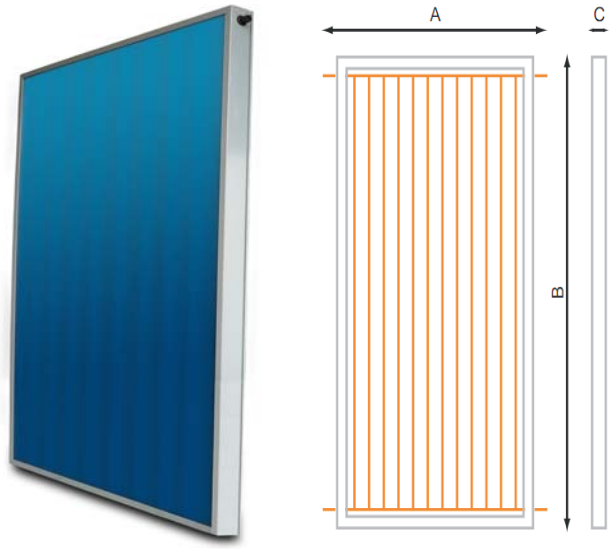
EVOP/EVOPN



DESCRIPTION

The EVOP is a solar flat plate collector with selective aluminum. The aluminum absorber is laser welded to copper pipes. The aluminum absorber is protected by high resistance tempered glass. The insulation is made of rock wool and glass wool.

FEATURES

1-**Collector casing**: Aluminum profile, RAL 9006 (grey)

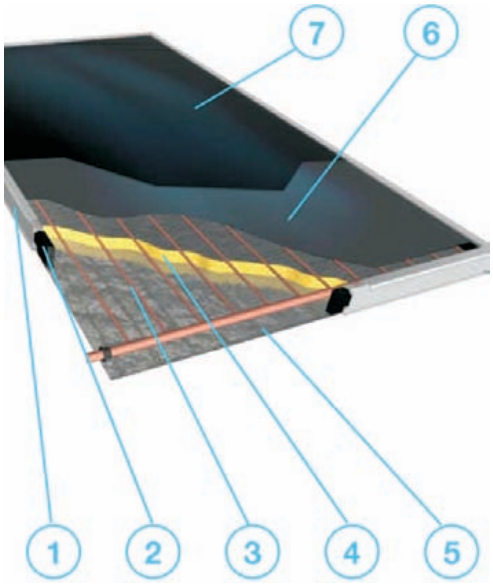
2-**Side insulation**: Glass wool:0.79 in thick.
Thermal conductivity:0.013 W/ftK (212F).
Density: 2.5 lbs/ft3

3-**Copper pipes: Riser** .87in x 0.031in.
Absorber: 0.31in x 0.019in

4-**Back insulation**: Rock wool:1.6 in
Thermal conductivity: 0.013 W/ftK (212F)
Density: 2.5 lbs/ft3

5-**Back sheet**: Aluminum

6-**Absorber sheet**: high selective coating aluminum



DIMENSIONS

Collector Type	27ft2
A [in]	48.6
B [in]	80.1
C [in]	3.5
Weight [lbs]	110
Absorber area [ft2]	24.9
Aperture area [ft2]	25.8
Absorber capacity [ft2]	26.9

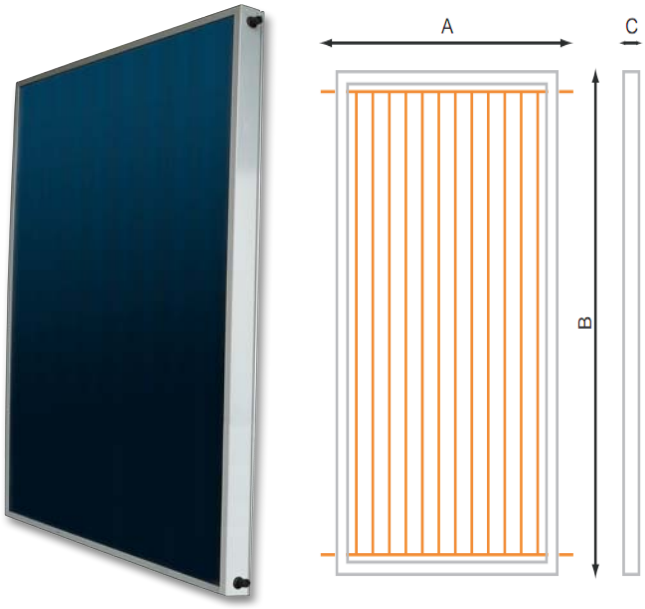
ARCHITECT/ENGINEER

JOB:_____ ENGINEER:_____

REP:_____ CONTRACTOR:_____

7243 Miller Drive* Warren, MI 48092
Phone:800-325-5690 Fax:800-628-4194
www.evosolar.us

Rev. 10/09



DESCRIPTION

The EVOPN is a solar flat plate collector with black painted aluminum. The aluminum absorber is laser welded to copper pipes. The aluminum absorber is protected by high resistance tempered glass. The insulation is made of rock wool and glass wool.

FEATURES

1-**Collector casing**: Aluminum profile, black painted

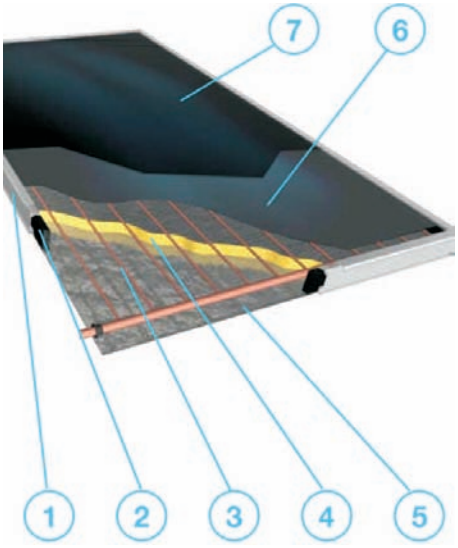
2-**Side insulation**: Glass wool:0.79 in thick.
Thermal conductivity:0.013 W/ftK (212F).
Density: 2.5 lbs/ft3

3-**Copper pipes: Riser** .87in x 0.031in.
Absorber: 0.31in x 0.019in

4-**Back insulation**: Rock wool:1.6 in
Thermal conductivity: 0.013 W/ftK (212F)
Density: 2.5 lbs/ft3

5-**Back sheet**: Galvanized steel

6-**Absorber sheet**: Pre painted aluminum



DIMENSIONS

Collector Type	27ft2
A [in]	49.2
B [in]	77.5
C [in]	3.7
Weight [lbs]	111
Absorber area [ft2]	24.5
Aperture area [ft2]	24.9
Absorber capacity [ft2]	26.9

7243 Miller Drive* Warren, MI 48092
Phone:800-325-5690 Fax:800-628-4194
www.evosolar.us

Rev. 10/09

EVOP/EVOPN

SOLAR COLLECTOR CERTIFICATION AND RATING	CERTIFIED SOLAR COLLECTOR	
SRCC OG-100	SUPPLIER:	EVOSOLAR 7243 Miller Drive Warren, MI 48092 USA
	MODEL:	EVOP
	COLLECTOR TYPE:	Glazed Flat-Plate
	CERTIFICATION#:	2007055A

COLLECTOR THERMAL PERFORMANCE RATING

Megajoules Per Panel Per Day				Thousands of BTU Per Panel Per Day			
CATEGORY (Ti-Ta)	CLEAR DAY	MILDLY CLOUDY	CLOUDY DAY	CATEGORY (Ti-Ta)	CLEAR DAY	MILDLY CLOUDY	CLOUDY DAY
A (-5 °C)	37.0	27.9	18.9	A (-9 °F)	35.1	26.5	17.9
B (5 °C)	33.4	24.3	15.2	B (9 °F)	31.6	23.0	14.5
C (20 °C)	28.1	19.1	10.3	C (36 °F)	26.6	18.1	9.7
D (50 °C)	18.4	10.2	2.8	D (90 °F)	17.5	9.7	2.6
E (80 °C)	9.7	3.0	0.0	E (144 °F)	9.2	3.0	0.0

A- Pool Heating (Warm Climate) **B-** Pool Heating (Cool Climate) **C-** Water Heating (Warm Climate) **D-** Water Heating (Cool Climate) **E-** Air Conditioning

SOLAR COLLECTOR CERTIFICATION AND RATING	CERTIFIED SOLAR COLLECTOR	
SRCC OG-100	SUPPLIER:	EVOSOLAR 7243 Miller Drive Warren, MI 48092 USA
	MODEL:	EVOPN
	COLLECTOR TYPE:	Glazed Flat-Plate
	CERTIFICATION#:	2007056A

COLLECTOR THERMAL PERFORMANCE RATING

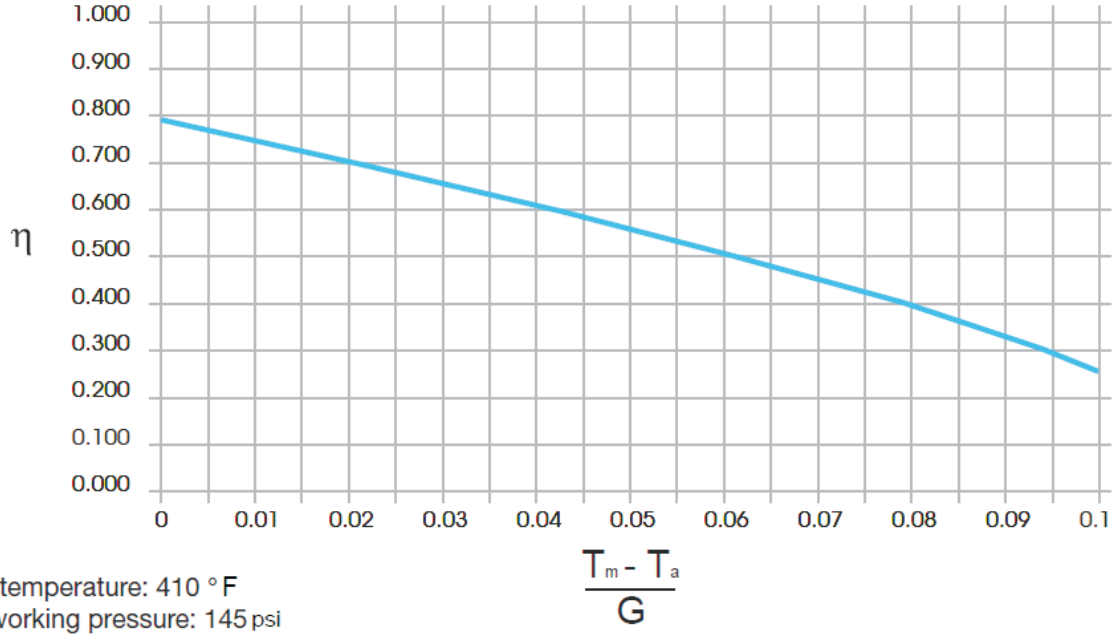
Megajoules Per Panel Per Day				Thousands of BTU Per Panel Per Day			
CATEGORY (Ti-Ta)	CLEAR DAY	MILDLY CLOUDY	CLOUDY DAY	CATEGORY (Ti-Ta)	CLEAR DAY	MILDLY CLOUDY	CLOUDY DAY
A (-5 °C)	35.4	26.9	18.5	A (-9 °F)	33.5	25.5	17.6
B (5 °C)	30.0	21.6	13.2	B (9 °F)	28.5	20.4	12.5
C (20 °C)	22.5	14.2	6.6	C (36 °F)	21.3	13.5	6.2
D (50 °C)	9.1	2.9	0.0	D (90 °F)	8.6	2.8	0.0
E (80 °C)	0.2	0.0	0.0	E (144 °F)	0.2	0.0	0.0

A- Pool Heating (Warm Climate) **B-** Pool Heating (Cool Climate) **C-** Water Heating (Warm Climate) **D-** Water Heating (Cool Climate) **E-** Air Conditioning

Pressure Drop

Flow		ΔP	
ml/s	gpm	Pa	in H_2O
20.00	0.32	84.90	0.34
50.00	0.79	259.1	1.0
80.00	1.27	489.60	1.97

EFFICIENCY CURVE



Stagnation temperature: 410 ° F
Maximum working pressure: 145 psi

7243 Miller Drive* Warren, MI 48092
Phone:800-325-5690 Fax:800-628-4194
www.evosolar.us

Rev. 10/09