SOLAR RATING & CERTIFICATION CORPORATION

AWARD OF INTERIM COLLECTOR CERTIFICATION

The solar collector listed below has been evaluated by the Solar Rating and Certification Corporation (SRCC) in accordance with SRCC Document IC-1, *Interim Collector Certification Protocol*, and has been certified by the SRCC as specified in that document. Certification and thermal performance ratings are based on the successful durability and performance testing of a sample unit where said tests have been conducted by an independent laboratory accredited by the SRCC.

Collector Interim Certification Number: **100-2009092Bi**

Certification Date: 17-MAY-10	Type: Tubular	Expiration Date: 06-APR-12
Test Laboratory: FSEC	Report Number: 00443 i	Report Date: 10-MAR-10
Brand: GLE	Certified Model: SHP710-E-00	Model Tested: 2009092Ai

Supplier: **GLE Solar Energy - Great Lakes Electric LLC**
5744 Cleveland Avenue
Stevensville,MI 49127 USA
(269) 408-8276

Description: Steel frame. Glass cover. Glass absorber with Selective. Polyurethane Foam side insulation and Polyurethane Foam back insulation. Gross Area: 4.262 m^2 (45.9 ft^2). Aperture Area: 2.283 m^2 (24.6 ft^2).

TUBULAR 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)	32.8	25.0	17.2	A (-9 °F)	31.1	23.7	16.3
B (5 °C)	29.5	21.6	13.8	B (9 °F)	27.9	20.5	13.1
C (20 °C)	24.9	17.2	9.4	C (36 °F)	23.6	16.3	8.9
D (50 °C)	16.6	9.4	2.5	D (90 °F)	15.7	8.9	2.4
E (80 °C)	9.8	3.0	0.0	E (144 °F)	9.3	2.8	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

Efficiency Equation [NOTE: Based on gross area and (P)=Ti-Ta]		**Y INTERCEPT**	**SLOPE**
S I UNITS:	**Quadratic equation not defined**	**3.0**	**-2.0 $W/m^2.°C$**
I P UNITS:	**Quadratic equation not defined**	**3.0**	**-0.4 $Btu/hr.ft^2.°F$**

Incident Angle Modifier [(S)=1/cosθ - 1, 0°<θ<=60°]

Kα = 1	1.80 (S)	-1.700 $(S)^2$	**Kα** = 1	-0.10 (S)	Linear Fit

REMARKS:

Caution: The efficiency equation and ratings for this collector are assumed to be very low. They will be revised when the final test is completed. This collector will perform better than the above ratings indicate so use caution when designing a system to avoid overheating.

Technical Director March 17, 2011