

RAPS™
 Remote Area Photovoltaic System
RAPS Design Steps

1. CALCULATE YOUR POWER REQUIREMENTS

Figure your load in Amp-hours per day. Consider both continuous and intermittent loads in a 24-hour period. Average over a week if loads change daily.

2. DETERMINE YOUR SOLAR INSOLATION ZONE

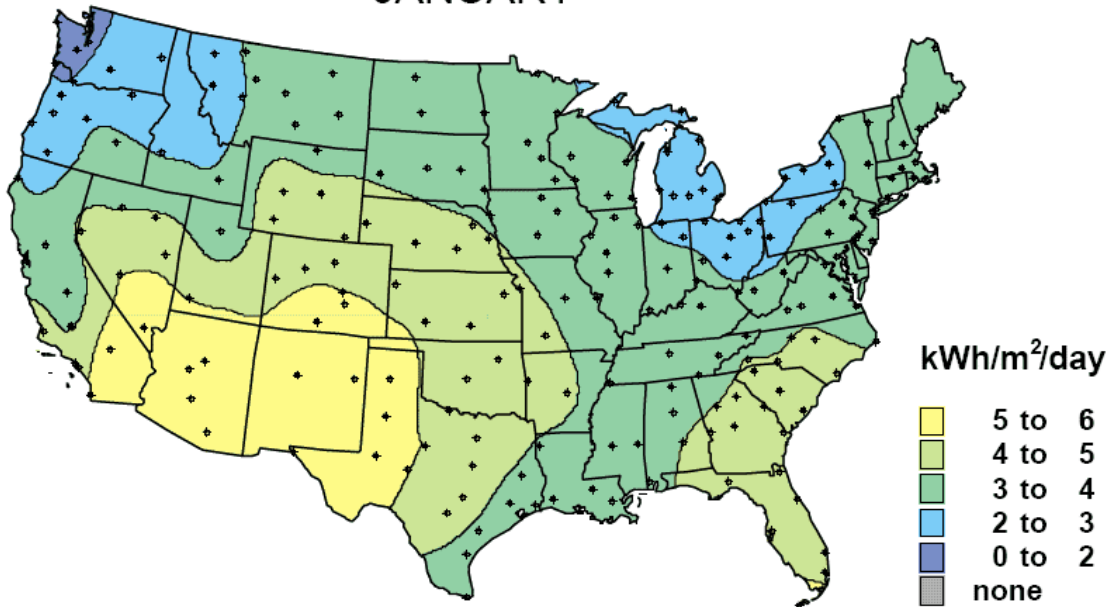
Locate your site on the map below. The map represents average solar energy available in the winter. Available energy increases incrementally from zones 1 through 5.

3. USE THE PERFORMANCE TABLE TO CHOOSE YOUR SYSTEM

The tables above represent the Amp-hours per day performance of each RAPS system in the different solar zones. Choose your system voltage, then look down your solar zone column for the value that meets or exceeds your design load Amp-hours. Follow the row to the left for the corresponding prepackaged RAPS system that will fully power your load requirements.

Average Daily Solar Radiation Per Month

JANUARY



Flat Plate Tilted South at Latitude + 15 Degrees

Map courtesy of NREL



RAPS™

Remote Area Photovoltaic System

Authorized Price List & Design Guide

(effective 3-18-08)

12 Volt Systems	Array Pwr (W)	Array l _{pv} (A)	Batt Cap. (Ah)	Zone 1 Load (Ah)	Zone 2 Load (Ah)	Zone 3 Load (Ah)	Zone 4 Load (Ah)	Zone 5 Load (Ah)	List Price
RAPS ID Number									
RAPS 10-36-12	10	0.59	36	0.53	1.06	1.59	2.12	2.66	\$ 662
RAPS 20-36-12	20	1.19	36	1.07	2.14	3.21	4.28	5.36	\$ 729
RAPS 30-58-12	30	1.78	58	1.60	3.20	4.81	6.41	8.01	\$ 941
RAPS 50-100-12	50	2.97	98	2.67	5.35	8.02	10.69	13.37	\$ 1,276
RAPS 80-108-12	80	4.55	108	4.10	8.19	12.29	16.38	20.48	\$ 1,598
RAPS 80-216-12	80	4.55	216	4.10	8.19	12.29	16.38	20.48	\$ 2,284
RAPS 100-216-12	100	5.94	216	5.35	10.69	16.04	21.38	26.73	\$ 2,691
RAPS 130-216-12	130	7.39	216	6.65	13.30	19.95	26.60	33.26	\$ 2,828
RAPS 160-216-12	160	9.1	216	8.19	16.38	24.57	32.76	40.95	\$ 3,136
RAPS 160-432-12	160	9.1	432	8.19	16.38	24.57	32.76	40.95	\$ 4,304
RAPS 240-432-12	240	13.65	432	12.29	24.57	36.86	49.14	61.43	\$ 5,150
RAPS 320-432-12	320	18.2	432	16.38	32.76	49.14	65.52	81.90	\$ 5,996

24 Volt Systems	Array Pwr (W)	Array l _{pv} (A)	Batt Cap. (Ah)	Zone 1 Load (Ah)	Zone 2 Load (Ah)	Zone 3 Load (Ah)	Zone 4 Load (Ah)	Zone 5 Load (Ah)	List Price
RAPS ID Number									
RAPS 40-36-24	40	1.19	36	1.07	2.14	3.21	4.28	5.36	\$1,699
RAPS 100-108-24	100	2.97	108	2.67	5.35	8.02	10.69	13.37	\$2,698
RAPS 160-108-24	160	4.55	108	4.10	8.19	12.29	16.38	20.48	\$3,112
RAPS 160-216-24	160	4.55	216	4.10	8.19	12.29	16.38	20.48	\$4,280
RAPS 260-216-24	260	7.39	216	6.65	13.30	19.95	26.60	33.26	\$5,224
RAPS 320-216-24	320	18.2	216	16.38	32.76	49.14	65.52	81.90	\$5,931

Other RAPS configurations are available.
 Please contact us for design and pricing assistance
 and for government/OEM/Industrial discounts.

we make solar simple™