



ausra™

Solar Thermal Power Plant



YOUR LOW-COST ENERGY SOLUTION

Ausra develops and installs large-scale solar thermal technologies to serve our customers' global energy needs in a dependable, market-competitive and environmentally responsible manner. We design, manufacture and install solar steam generators to meet your large-scale energy requirements, including solar hybrid design for firm capacity and solar power augmentation for existing power plants.

Ausra's experienced management team, leading scientists, superior technology, and volume production capacity are ready to meet your electricity needs.

RELIABLE, COST-COMPETITIVE ELECTRICITY

Ausra's solar collectors boil water with concentrated sunshine. Mirrors track the sun, reflecting solar heat onto boiler tubes to raise steam without the costs and emissions of fossil-fired boilers. The result is a system that produces steam directly from the sun to generate clean, reliable electricity.

Ausra is the first solar steam power boiler manufacturer to receive the American Society of Mechanical Engineers' (ASME) "S" Stamp Certificate of Authorization. Ausra has also received the National Board Certificate of Authorization "NB" to register its solar boilers.

SOLAR POWER PLANT

Nameplate Capacity 50 - 560 MW

Peak Power per
Square Mile 200 – 250 MW

THE AUSRA™ ADVANTAGE

SIMPLE, DURABLE DESIGN

- Low wind profile
- Direct steam generation
- Steel-backed mirrors for long life

COST-EFFECTIVE, CARBON-FREE ELECTRICITY

- Most land-efficient solar technology
- Eliminates fuel and emissions cost risks
- On-peak energy delivery

RELIABLE AND ROBUST

- Commercially proven technology
- Engineered for toughest environmental conditions
- (UV, rain, high wind, hail, seismic)

RAPID DEPLOYMENT AND INSTALLATION

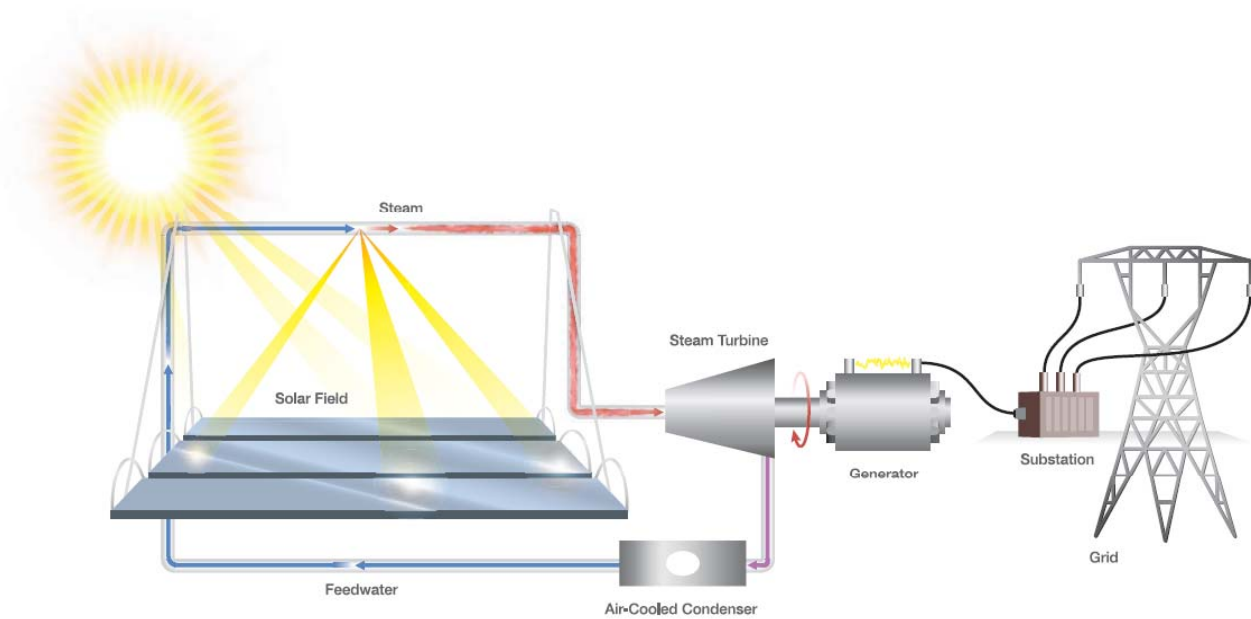
- High volume automated production and standard materials help eliminate supply chain constraints
- Rapid field installation (12-24 months)

OPTIMIZED SITING

- Ease of permitting
- Dry- or wet-cooled
- No fuel infrastructure required
- Maximum energy per square mile

		Hour											
		8	9	10	11	12	13	14	15	16	17	18	19
Month	1	0	0	0	5	53	76	102	124	103	55	0	0
	2	0	0	6	67	98	112	137	154	139	98	29	0
	3	0	2	63	155	175	191	210	211	195	146	70	0
	4	0	39	180	241	250	262	252	254	251	202	121	25
	5	0	88	200	232	242	255	252	251	236	218	137	44
	6	2	129	229	259	261	263	255	266	248	236	159	67
	7	0	74	196	244	245	249	261	254	258	239	159	66
	8	0	39	181	242	241	246	242	243	232	193	110	31
	9	0	16	154	216	226	241	245	234	218	144	69	0
	10	0	0	50	130	148	166	187	199	160	93	9	0
	11	0	0	5	72	93	112	129	126	91	42	0	0
	12	0	0	0	1	45	66	90	99	74	25	0	0

12 X 12 Average Hourly Net Plant Output in Mwe
2 X 140 MWe, Wet Cooled with Mojave DNI Data



DURABLE SOLAR FIELD

Heat Transfer Fluid	Water; no oil or molten salt
Steam Generator Tubing	carbon steel pipe, horizontal mount solid piping, no moving joints
Reflectors	Steel-backed glass mirrors rotate downward for protection
Tracking	Automatic computer control
Receiver Height	60 feet (18 meters)



Steel-backed mirrors track the sun, heating water to create reliable, low-cost steam.

For More Information:

Ausra, Inc. - USA

T 650.424.9300 E sales@ausra.com
F 650.494.3893 W www.ausra.com



<http://www.ausra.com/technology/>