

Case study: Benson Center

(Santa Clara University)



CHROMASUN



Project Overview

Chromasun and its partners installed 60 Micro-Concentrator collectors at Santa Clara University's (SCU) Benson Center. The Chromasun MCT panels will produce an estimated 6,727 therms of energy annually and heat water to 200 degrees Fahrenheit for Benson Memorial Center's dining services. Heating water with solar energy rather than with natural gas will reduce the building's water-heating bills by as much as 70 percent and offset 34 tons of CO₂. The system will help SCU reach its goal of becoming climate neutral by the end of 2015.

Client Perspective

"With its 25-year lifespan and six-year payback period, the Chromasun solar thermal system is an excellent capital investment. Energy security was a major driver of our decision to undertake this project. Per the terms of our ten-year leasing agreement, we will pay a fixed price for the energy the system produces, shielding the university from natural gas price volatility. We'll also own the system when the lease is up."

- **Joe Sugg**, Assistant Vice President of University Operations at SCU

About Chromasun

Founded in 2008, Chromasun is a leading developer and manufacturer of rooftop friendly high performance solar solutions. Chromasun's unique MCT HT solar collector provides high grade thermal energy but in a familiar flat panel format with no external moving parts. The MCT HT is designed to drive high performance air-conditioning absorption chillers and other industrial process heat applications. It is the most space efficient solar technology available and can produce more energy per unit of roof area than any competing technology. As a leader in the space, the Chromasun team of engineers and professionals have decades of experience in utility scale solar, air-conditioning engineering, product development and manufacturing.

SYSTEM AT A GLANCE

Location	Santa Clara, CA
Building	Benson Center
Collectors	60 MCTs
Total Collector Area	2,682 square feet
Collector Loop Capacity	300 gallons
Hot Water Load	2,880 GPD (peak)
Therms Offset (1 Year)	6,727 (estimated)
System Size	120 KWt
Thermal Output	410 Mbtu/h



Aerial view of Benson Center



Rear view of MCT collectors & piping at the Benson Center