

Featured Project

Redding ARFF Facility Aircraft Rescue Firefighting Facility

Redding, CA

ArcSine Engineering is considered an expert in power distribution, lighting design, standby generators, and special communication systems, such as alarm-activated lights and building-wide emergency radio broadcast associated with fire stations and other emergency response facilities.

The Redding ARFF Facility is a unique multiuse 7,100 square-foot facility, located at the Redding Municipal Airport in Redding, California. This facility serves as a localized community response fire station, as well as an aircraft rescue fire-fighting facility.

Because this facility has to serve dual purposes, this project posed some unique challenges. Each aspect of the project required its own and separate communications system.

ArcSine's experience in the collaborated design process required coordination between the Building Department, local Fire Marshal, Airport communications personnel, fire fighters and design disciplines that was essential in order to meet this project's criteria and budgetary constraints.

The facility includes: three sleeping quarters, locker room, offices, watch/ alarm room, training room, kitchen/dining room, laundry room, medical/ clean room, and four fire truck bays.

Below are listed some key features to the project:

- Alarm-activated lights in sleeping quarters, hallways and apparatus area.
- Electrically operated and alarm controlled bay doors.
- Alarm-associated kitchen appliance disable circuit and gas shutoff.
- Design of building-wide speaker system for emergency radio broadcast, in apparatus bay, living quarters, and building exterior.
- Design of front entry two-way communications system.
- Provisions for telephone/data, fiber optics, airport ground communications, airport tower communications, and fire department communications.
- Met Federal Aviation Administration (FAA) requirements for airport firefighting facilities.
- Standby power.
- High bay fluorescent lighting.
- Energy efficient lighting.
- Warning beacons.

Electrical
Mechanical
Lighting
Power Distribution
Construction Services
Fire Protection
Plumbing

