

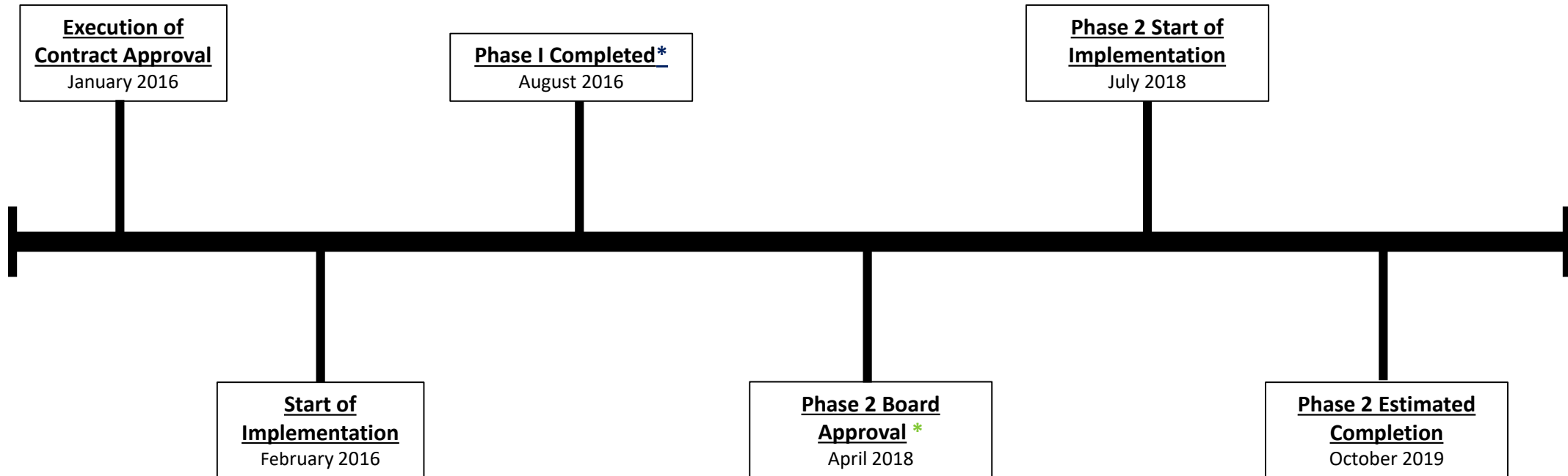


# William S. Hart High School District

## Energy Efficiency Project Overview



# Timeline To Date



# Phase I - Recap



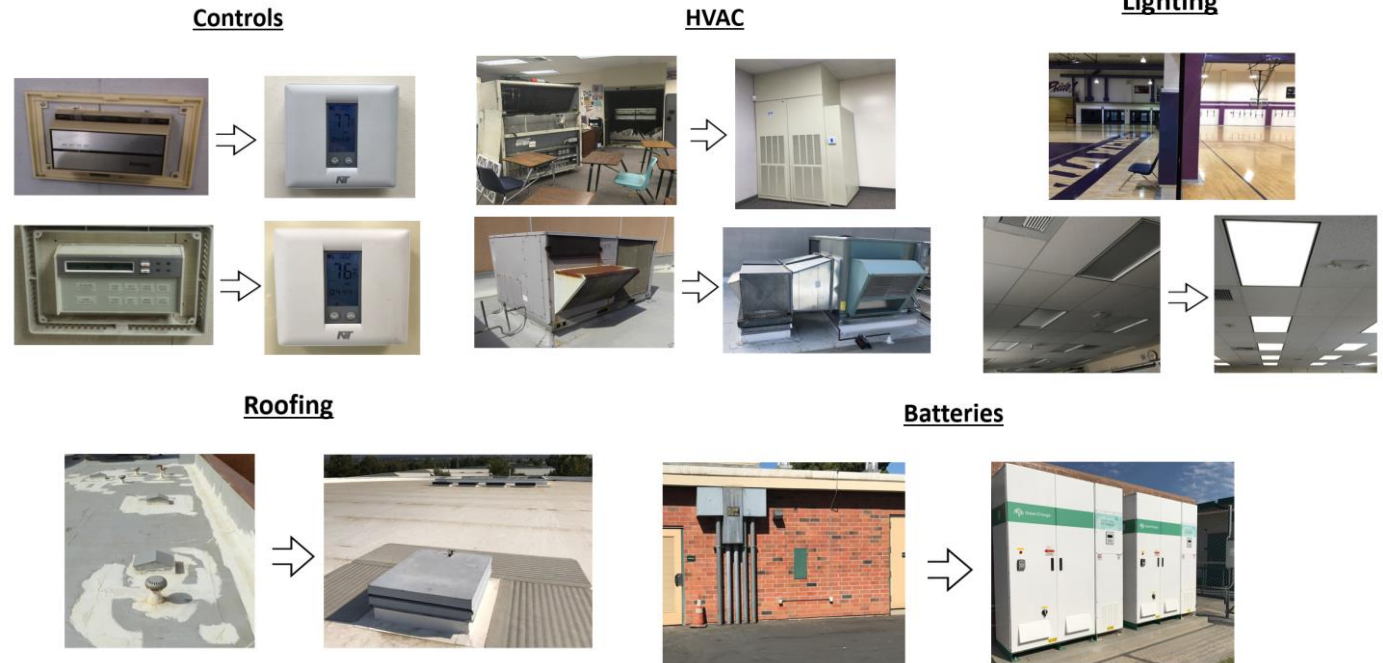
## Sites Included

- Administration
- Bowman HS
- Canyon HS
- Maintenance
- Rancho Pico JH
- Rio Norte JH
- Sierra Vista JH
- Valencia HS

## ECM's Included

- **Lighting**
  - Interior Lighting Upgrades
  - Exterior Lighting Upgrades
  - Occupancy Sensors
- **HVAC**
  - HVAC Unit Replacements
  - Networked Smart Thermostats
  - Occupancy Sensors and Door Contacts
- **Continuous Monitoring**
  - Install Energy Monitoring & Provide Continuous Commissioning
- **Battery Storage**
  - Canyon HS
  - Valencia HS
- **Other**
  - Roof Replacement
    - Valencia HS
  - Maintenance & Transportation

## Scope Overview



## **Current Savings Results**



Phase I utility savings are exceeding savings guarantee by **21% !**

# Phase 2 Scope of Work

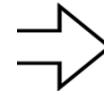


	Lighting			Mechanical	Controls		Solar	Other	Extended Services		
	Interior LED Lighting Upgrades	Exterior LED Lighting Upgrades	Install Occupancy Sensors	New High Efficiency HVAC Units	Install New Network-Based Smart Programmable Thermostats	Upgrade BAS and Sequence of Operation	Install Solar Photovoltaic (PV) System	Roof Replacement - Cool Roof	Energy Manager (5 Years)	Solar O&M (5 Years)	HVAC Extended Warranty (3 Years)
Administrative Center	✓	✓	✓		✓		✓		✓	✓	
Arroyo Seco Junior High	✓	✓	✓	✓	✓		✓		✓	✓	✓
Canyon High School				✓	✓				✓	✓	✓
Golden Valley High	✓	✓	✓		✓				✓	✓	
Hart High School	✓	✓	✓	✓	✓	✓	✓		✓	✓	✓
La Mesa Junior High	✓	✓	✓	✓	✓			✓	✓	✓	✓
Placerita Junior High	✓	✓	✓	✓	✓		✓		✓	✓	✓
Rancho Pico Junior High					✓				✓	✓	
Rio Norte Junior High					✓				✓	✓	
Saugus High School	✓	✓	✓		✓	✓			✓	✓	
Sierra Vista Junior High					✓				✓	✓	
West Ranch High School	✓	✓	✓		✓				✓	✓	
William S Hart District Copy Center	✓	✓			✓				✓		

# Lighting



- Exterior Lighting
  - Exterior LED Upgrades
    - (9) sites
- Interior Lighting
  - Interior LED Upgrades
    - (9) Sites
- Occupancy Sensors
  - (8) Sites





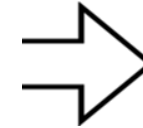
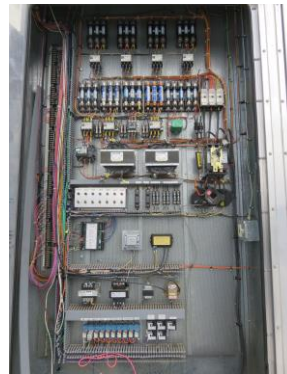
# HVAC



## High Efficiency HVAC Packaged Units

- (273) Units
- (5) sites

\* Replacing 15 MZU's with individual package units at sites (Arroyo & Bowman)



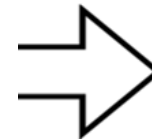
\*Phase 1 install

# Controls



## HVAC Controls System

- Install New Network-Based Smart Programmable Thermostats
- (1,266) Units
  - (13) sites

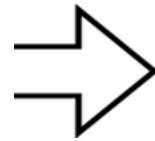


# Building Envelope



## Roofing

- Replace with New Energy Efficient Cool Roof
  - (1) site





# Solar



## Solar System

- Install Solar Photovoltaic (PV) System
  - (4) Sites
- Power Purchase Agreement (PPA) Buyout
  - (9) Sites
- O&M Included for 5 Years





# Project Overview

## **Project Amount**

**\$23,789,921**

\* ABS secured remaining Prop 39 funds of **\$767,923** which will be applied to the project cost

## **Net Cumulative Program Savings**

**\$64,461,437**

\* Savings includes \$15M PPA Buyout Program

-LED Lighting Upgrades	(9) Sites – Interior & Exterior Lighting Upgrades
-Occupancy Sensor Upgrades	(8) Sites
-HVAC Upgrades	(5) Sites / (273) Units
-Controls Upgrades	(13) Sites / (1,266) Units
-Solar Photovoltaic	(4) Sites
-Solar PPA Buyout	(9) Sites
-Roof Replacement	(1) Site – Cool Roof Installation
-Energy Manager	5 Years
-HVAC Extended Warranty	3 Years
-Solar O&M	5 Years



[www.absenergy.com](http://www.absenergy.com)

