

# Sustainable Silicon Valley

## History and Background:

- What inspired this? Wanting to achieve more than REGULATIONS and do more than REGULATE.
- Partners! A collaborative approach - ground rules
  - Silicon Valley Environmental Partnership - Indicators
  - Silicon Valley Manufacturing Group
  - CalEPA
  - Many others in public and private organizations.

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## ☞ A Regional EMS Approach

- “The Big Funnel” - The process of identification, narrowing and selection
  - Methods: community & expert input, use of the Web, surveys, outside experts, color motifs, ‘ground truthing’, choosing what we can impact.
- “The Envelope Please” - The winners are...
- Energy Use
- Water Use

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- ☛ Energy - CO<sub>2</sub> emissions as a measure of energy use effectiveness
  - CO<sub>2</sub> Goal - 20% reduction by 2010 from a 1990 baseline - for the Silicon Valley region
  - Protocol - Designed to work with as many other protocols as possible
  - Agreements - Each Setting Their Own Goal - Eight major corporations, one special district, one major city, one federal agency - and more on the way!!!

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☛ Participants must:

- Set a specific goal
- Track energy use by ‘whole’ facilities
- Select a baseline reporting year for each facility
- Track electrical and natural gas use
- Report energy use and key actions taken, annually

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☛ Participants may:

- Select a normalizing factor
- Track its transportation fuel use for its fleet, corporate travel, employee use of personal vehicles or employee commuting

☛ There are no sanctions - this is all voluntary

☛ All participants are recognized. Exceptional performance (20%+) will be highlighted.

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☛ What's in it for the various participants?

- Relationships between Government, Business and 'Environmental' organizations that are - *COLLABORATIVE* - not adversarial.
- Recognition for leadership and work well done
  - Pride of Place - Investment in Silicon Valley
  - Demonstration of leadership
  - Multiple benefits: Economic, Environmental, Image
- Opportunities to learn from others & improve

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☛ Specific Actions: Like your mother told you, “Turn it off if you’re not using it!”

- HVAC: Re-calibrate sensors.
- Cooling Tower Management: “Floating” temperature adjustment.
- Lighting: Re-lamp and Re-ballast. Motion or occupancy sensors. Reduce lighting levels.

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- Light colored roofs and other ‘green’ building techniques.
- Clean fuel or electric when vehicle fleets ‘turn over’.
- Procurement Policies: preference or specification for most energy efficient.
- Municipal policies: internal and external.
- Purchasing “Green Power”.

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## ☛ Energy Savings?

- Facilities implementing these types of energy use and emissions reductions strategies have reduced energy use between 10% and 30%.
- All of these have been done as cost-effective business decisions, not because of altruism.

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## ☛ **Future:**

- ☛ Establishing SSV as an independent organization
- ☛ Supporting CO<sub>2</sub> pledge participants -
  - Information sharing and education
  - Resource identification
  - Data gathering and management
  - Compilation and publication of reports

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## ☞ Future:

- Water -
  - Defining water sustainability for the Silicon Valley region
  - Setting objectives and measurable goals
  - Establishing the network of partners and relationships to achieve objectives and goals

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## ☛ Lessons Learned and Realizations:

- The process and outcome can be imagined in much less time than can actually be achieved. Patience and determination pay off.
- Each stakeholder group needed to learn and honor the ‘bottom line’ of the others.
- Success only happens when social, environmental & economic needs are met.

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- ☛ The model of SSV can be replicated anywhere.
- ☛ Environmental Management Systems and their aspects of choice will be as unique as the community they reflect.

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