

New California Sustainability Laws

By Theodore L. Senet, Esq.*

I. INTRODUCTION

Over the past decade, California has enacted a comprehensive set of sustainability laws and regulations that are transforming the economy by generating opportunities and funding for renewable energy generation, energy efficiency measures in our buildings, and the implementation of clean transportation programs, which in turn have attracted venture capital and spurred the development of a clean energy economy.

This article explores how new California policies and laws could create the world's first major economy to abandon fossil fuels as its primary energy source. The transformation to a clean energy economy is occurring through: (1) building optimization; (2) renewable power generation; and (3) clean transportation. As new technologies are implemented through these sustainability laws and regulations, market forces will inevitably transform energy generation and consumption.

II. BUILDING OPTIMIZATION

Buildings account for an estimated 68% of total electrical consumption in the United States.¹ California's building standards and energy codes have led the nation for years and have set new standards for future buildings.

Although green building codes have made new buildings more energy-efficient, many existing buildings are inefficient and wasteful. Energy efficiency upgrades in existing buildings can reduce operating costs and often provide a surprisingly good return on investment.

A. New California Building and Energy Codes – A Future Game Changer

California's new energy standards and building codes became effective July 1, 2014.² These standards will make new buildings super-efficient. The California Energy Commission ("CEC") has proposed the requirement of "zero net energy" residential construction by 2020 and "zero net energy" commercial buildings by 2030.³ Although the definition of "zero net energy" or "net zero" is not settled, one common definition is that a new building's annual energy consumption does not exceed its total on-site energy production or local acquisition of renewable power over that year.

New buildings, however, are only a small percentage of the built environment, so new building codes will not dramatically reduce energy consumption in the short term. The real economic opportunities for cities are in upgrading and retrofitting existing buildings. The first step is to

encourage building owners to measure and benchmark energy use. Once energy use can be accurately measured, then energy use can be effectively managed.

B. Energy Reporting Ordinances – A Potential Retrofit Boom

By encouraging renovations and retrofits of existing buildings, state and local governments are promoting energy efficiency, reduced energy consumption, local jobs, and increased revenues for local businesses. Cities across the country are adopting new benchmarking and disclosure laws.⁴ Energy usage is typically benchmarked using the EPA Energy Star Portfolio Manager ("Portfolio Manager"). Under the Portfolio Manager, adjustments are made for size, location, use, and special factors in the benchmarking process and a building's usage is compared to the average for similarly situated buildings.

Disclosure of building energy use is a key motivation for retrofits. Energy retrofits can generate significant savings in operational costs due to reduced energy usage. When owners and tenants compare their usage with their neighbors' and competitors' usage, they will often respond with action. Most buildings require renovations as they age and delaying renovation can be wasteful. The

primary obstacles to adopting public reporting requirements are compliance, privacy concerns of owners and tenants, and the ability of utilities to provide accurate energy usage data. Aside from studying existing programs, there are a number of resources available to assist cities with the adoption of benchmarking and reporting laws, including the Institute for Market Transformation,⁵ Green Cities California,⁶ and Local Governments for Sustainability USA.⁷

There are currently two major benchmarking and disclosure programs in California: The first is Public Resources Code section 25402.10, effective January 1, 2014, requires owners and operators of non-residential buildings over 10,000 square feet to benchmark and disclose the building's energy usage data to buyers, lenders, or tenants leasing the entire building.⁸ Usage is measured with the Portfolio Manager.⁹ The new law does not mandate public reporting and does not affect multi-tenant buildings. It originally extended the statute's coverage to buildings over 5,000 square feet as of July 1, 2014, but this requirement was postponed until July 1, 2016.¹⁰

The second major benchmarking and disclosure program is San Francisco's Existing Commercial Building Energy Performance Ordinance. The San Francisco Environmental Code requires owners of non-residential buildings in the City and County of San Francisco to annually measure and disclose energy use.¹¹ This ordinance also requires use of the Portfolio Manager.¹² Energy efficiency audits of these properties

are conducted every five years under the ordinance.¹³ The ordinance provides that owners shall not be required to disclose "confidential business information," but states that certain information will not be viewed as confidential, including building specific energy performance statistics.¹⁴ Policy makers project that the San Francisco ordinance will double the number of energy retrofits over the next five years.¹⁵

C. Funding for Energy Retrofits

There are numerous technical and financing sources available to California public and private property owners for retrofits. The State of California and a number of local governments offer building owners zero-percent interest financing for energy-efficient retrofits.¹⁶ Public and investor-owned utilities within the state are mandated to promote energy efficiency programs.¹⁷ Southern California Edison, Pacific Gas & Electric, San Diego Gas & Electric, and Southern California Gas (Sempra Energy) all offer technical assistance, incentives, and funding programs for residential and commercial property owners, as well as to public agencies. Additionally, the California Legislature recently extended the exclusion of solar energy systems from affecting the full cash value of real property for taxation purposes for another eight years, extending the exclusion's expiration to January 1, 2025.¹⁸

Property Assessed Clean Energy ("PACE") is a financing program that allows property owners to finance energy efficiency

improvements and pay for the improvements over time through voluntary annual property tax assessments.¹⁹ These improvement costs remain part of the property assessments if the property is ever sold. Secured lenders must typically approve of the assessments. Certain lenders will consent to assessments if there is adequate equity and the improvements increase the value of their security. PACE funding for residential properties has expanded to a number of counties and cities around the state. The primary concerns for residential PACE programs are lender approvals, the public agency's ability to properly qualify renovation and energy projects, and the ability of residential property owners to adequately procure, manage, complete and pay for renovations and energy projects. For these reasons, PACE is mostly available for commercial buildings in some California counties.

D. Retrofitting Public Buildings

Both federal and state government agencies have implemented programs to retrofit existing buildings. Energy retrofits and renovations of municipal and other government buildings present a major economic opportunity for local businesses and public agencies. Renovations can reduce utility costs, create local jobs, increase revenue, and demonstrate leadership. Proper implementation of these projects requires compliance with state and local contracting laws, including any applicable local procurement, competitive bidding, and prevailing wage laws.

For funding and technical assistance with energy efficiency and energy generation projects, the Statewide Energy Efficiency Collaborative (SEEC),²⁰ Air Resource Board,²¹ and the California Energy Commission²² provide no-cost resources to support the energy initiatives of local California governments. There are some federal funds available for energy projects and energy efficiency programs.²³ As stated above, most public and investor-owned utilities have programs to assist cities and public agencies. There are also a number of organizations that can offer technical assistance with municipal retrofits and power generation projects.²⁴ In addition, the Governor and Legislature allocate auction proceeds from the Greenhouse Gas Reduction Fund to aid funding for energy efficiency in public buildings.²⁵ As a result of these resources, there are a growing number of municipal energy efficiency programs around the state.²⁶

III. RENEWABLE ENERGY GENERATION



In the short term, California has the highest Renewable Portfolio Standard (“RPS”) of any state in the nation. Utilities must achieve 33% renewable power generation by the year 2020.²⁷ Some utilities expect to reach the RPS prior to

2020. San Diego Gas & Electric expects to get 33% of its electricity from renewable sources by the end of this year—six years ahead of the state-mandated target.

In the past few years, solar panel and wind power generation efficiencies have risen while system component costs have come down.²⁸ Recent power purchase agreements reflect a continuing reduction in clean energy costs.²⁹ As utility scale installations have recently been completed, market conditions, along with these cost and efficiency trends, have created new clean power opportunities for businesses and local governments.³⁰

In January 2013, the Los Angeles Department of Water and Power (“LADWP”) approved a 150 MW Feed in Tariff (“FiT”) Program, allowing LADWP to purchase energy from renewable energy generating systems under a standard power purchase contract from participants within LADWP’s territory. Eligible renewable resources will be connected with LADWP’s electrical distribution system. LADWP purchases energy in installments at a fixed cost determined for up to 20 years. The Los Angeles Business Council estimated that the FiT program would create 11,000 local jobs. This FiT program has the largest capacity of any such program in the nation, with the potential to power 43,000 homes upon completion.³¹

There have been a number of communities that have entered the energy business in order to cut ratepayer costs.³² Under California’s Community Choice Aggregation law, customers are “entitled to aggregate their electric

loads as members of their local community with community choice aggregators.”³³ Under these programs, communities secure clean energy, which is then transmitted to consumers through the utility-controlled power grid. Each customer in the community is then given the choice to opt out of the clean energy program. Marin County and Sonoma County have instituted these programs.

A dozen other communities, including San Diego and San Francisco, are laying the groundwork for community power generation or microgrid programs.³⁴ A microgrid is a small energy system capable of balancing captive supply and demand resources to maintain stable service within a defined boundary.³⁵ A growing group of homeowners, government agencies, and businesses are using these kinds of microgrids to reduce power bills and dependence on utility networks.³⁶ Spending on microgrid projects in the U.S. is poised to explode to \$4.2 billion by 2024 in part due to growing concerns about the traditional grid’s reliability.³⁷ As major storms and severe weather around the world threaten power supplies and power transmission, microgrid, grid integration, and battery storage technologies will likely prove to be major benefits to local economies by adding resiliency to local power supplies.

A. Funding and Resources for Power Generation Projects

California laws and regulations have established a variety of funding streams and resources for clean power generation projects. The Greenhouse Gas Reduction Fund Allocation to Municipal Renewable

Energy Facilities will fund the installation of on-site energy generation systems for the 2014-2015 and 2015-2016 fiscal years.³⁸

The California Clean Energy Jobs Act (Proposition 39) changed the corporate income tax code to allocate funds to the California Clean Energy Job Creation Fund. Beginning in the 2013-2014 fiscal year, \$550 million will be appropriated annually for eligible local educational agencies to be used for energy efficiency and clean energy projects.³⁹

In addition, the Public Utilities Commission requires electric utility corporations to collect a surcharge on ratepayers' utility bills to fund renewable energy research and development under the Electric Program Investment Charge ("EPIC") Fund⁴⁰ administered by the CEC.⁴¹ For example, the CEC announced the availability of \$26.5 million in grants for projects that incorporate renewable energy resources with energy storage.⁴² The funds are specifically allocated for microgrid projects tied to critical facilities like hospitals and fire stations, while another allocation is reserved for projects that incorporate a high percentage of renewable energy (up to 100%) to meet a community's energy load. Under this program, the CEC set aside \$6 million for projects to connect plug-in electric vehicles. All proposed energy projects must include the ability to be disconnected from the grid for up to three hours in order to promote grid resiliency.

Finally, California law mandates that electrical utilities procure new energy storage systems in order

to integrate intermittent power generation from renewable energy resources and to reduce the need for fossil-fuel powered peaking generation facilities.⁴³ For example, Southern California Edison ("SCE") is soliciting quotations for grid-scale energy storage.⁴⁴ SCE released a 40 MW request for quotations oriented toward the local capacity requirements in the LA basin.⁴⁵ SCE also began testing lithium ion battery storage technologies in partnership with the U.S. Department of Energy.⁴⁶

B. Local Procurement and Hiring

A number of cities have implemented programs to attract clean energy projects and tech businesses to their communities, including Los Angeles, San Francisco, San Jose and San Diego. Local procurement and hiring policies can complement such programs. In particular, local energy procurement reduces costs inherent in long distance transmission of electricity and other sources of energy. Locally sourced energy also adds resiliency and reduces power interruption risk. Locally sourced power can also increase opportunities for local business and employment. Employment of local clean technology businesses for retrofits and procurement of clean tech goods and services can also reduce transportation costs and pollution, while aiding local economies. Providing preferences to local businesses and to local hires can reduce travel, traffic, and pollution.

The California Sustainability Alliance (funded under the auspices of the California Utilities

Commission) has developed a guidebook for local governments thinking of adopting a local procurement and purchasing plan.⁴⁷ Because programs and ordinances that encourage local procurement and hiring can be subject to legal challenges, primarily under the Commerce Clause, Privileges and Immunity Clause, and Equal Protection Clause of the United States Constitution,⁴⁸ entities considering such programs should carefully evaluate these legal issues.

IV. CLEAN TRANSPORTATION

Unfortunately, California has some of the worst traffic-related pollution in the nation.⁴⁹ Traffic results in wasted productivity and adverse health effects.⁵⁰ California has a number of programs intended to employ clean technology to reduce traffic-related air pollution. In 2013, Governor Brown issued a plan to put 1.5 million zero-emission vehicles on the road by 2025.⁵¹ The CEC recently approved fifteen grants totaling \$5 million for 475 electric vehicle charging stations across California.⁵² Research by the UC Berkeley California Electric Transportation Coalition shows that every dollar saved at the pump and redirected toward the rest of the economy not only reduces air pollution, but also captures significant ancillary economic benefits.⁵³

In the long run, a robust regional public transit system reduces traffic and makes local economies more competitive. Modernizing the statewide transit system is essential to foster a robust regional transportation system. Currently, the State is attempting

to implement a high-speed rail (“HSR”) system to serve as the backbone of a statewide transit system. The State projects that by 2029, the HSR system will run from San Francisco to the Los Angeles basin in under three hours, at speeds over 200 miles per hour. The system is planned to eventually extend to Sacramento and San Diego, totaling 800 miles with up to 24 stations. A statewide rail modernization plan could provide billions of dollars to local and regional rail lines.⁵⁴ The first significant construction contract executed on the HSR project will construct a 29-mile segment in Madera County and Fresno County. There are currently five design-build construction contracts planned that could generate a large number of jobs throughout the state.

Under a compromise between the Governor and the Legislature, the Legislature allocated \$250 million in cap-and-trade auction revenues for construction of the HSR system under the 2013-14 budget, with a 25% allocation of auction revenues thereafter.⁵⁵ While a number of legal challenges to the HSR system remain pending, the construction of this system could be a major boost to those California cities that stand to benefit from future HSR routes.⁵⁶

In addition to HSR, California seeks to encourage energy efficiency through transportation planning in other ways. There are current state requirements and incentives for local governments to implement regional transportations plans.⁵⁷ Under California

law, metropolitan planning organizations must prepare and implement strategies for these regional transportation plans. The development and integration of these regional transportation plans are important to the future economies of California cities.

V. The Transition to a Green Economy

California is transforming its economy through implementing sustainability laws and regulations, cultivating clean technologies and developing clean energy. Through investments and planning, businesses and governments are working together to reduce operating costs, promote employment, reduce pollution, and improve the health of its citizens. If sustained, these efforts may create the first major clean energy economy in the world.



* Theodore L. Senet is a named partner in the Los Angeles firm of Gibbs Giden. Mr. Senet's areas of practice include insurance, construction, environmental and real property law.

Endnotes

- 1 U.S. Environmental Protection Agency, *Why Build Green?*, U.S. ENVIRONMENTAL PROTECTION AGENCY ARCHIVED MATERIAL, <http://www.epa.gov/greenbuilding/pubs/whybuild.htm> (last visited January 6, 2015).
- 2 CAL. GOV'T OPERATIONS AGENCY, BUILDING STANDARDS INFORMATION BULLETIN 13-07, AT 1 (2013).

- 3 CAL. CODE REGS. tit. 24.
- 4 See, e.g., CITY OF NEW YORK, *Benchmarking Data Disclosure & Reports*, PLAN NYC (2014), http://www.nyc.gov/html/gbee/html/plan/1184_scores.shtml; Katherine Tweed, *Chicago Passes Energy Benchmarking Rules*, GREENTECH EFFICIENCY (September 14, 2013), <http://www.greentechmedia.com/articles/read/chicago-passes-energy-benchmarking-disclosure>; CITY OF BOSTON, *Building Energy Reporting and Disclosure Ordinance*, OFFICIAL WEB SITE OF THE CITY OF BOSTON (2014), <http://www.cityofboston.gov/eeos/reporting/>.
- 5 INSTITUTE FOR MARKET TRANSFORMATION, <http://www.imt.org> (last visited October 16, 2014).
- 6 GREEN CITIES CALIFORNIA, <http://greencitiescalifornia.org> (last visited October 16, 2014).
- 7 LOCAL GOVERNMENTS FOR SUSTAINABILITY USA, <http://www.icleiusa.org> (last visited October 16, 2014).
- 8 CAL. PUB. RES. CODE § 25102.10.
- 9 *Id.*
- 10 CAL. OFFICE ADMIN. LAW, NOTICE OF APPROVAL OF EMERGENCY REGULATORY ACTION, 2014-0821-05 E (September 2, 2014).
- 11 SAN FRANCISCO ENV'T CODE, Ch. 20, §§ 2000-2009 (2011).
- 12 *Id.* at § 2002.
- 13 *Id.* at § 2004.
- 14 *Id.* at § 2005.

- 15 GREEN CITIES CALIFORNIA, *Commercial Building Energy Efficiency, San Francisco, CA*, GREEN CITIES CALIFORNIA (Nov. 24, 2012) http://greencitiescalifornia.org/best-practices/energy/SF_commercial-building-energy-efficiency.html. A few cities outside California have expanded benchmarking ordinances to residential properties. New York City claims to be the first in the nation to publicly disclose data for large multifamily buildings. CITY OF NEW YORK, *Benchmarking Data Disclosure & Reports*, PLANYC (2014), http://www.nyc.gov/html/gbee/html/plan/1184_scores.shtml.
- 16 Brad Copithorne & James Fine, Environmental Defense Fund, *On Bill Repayment: Unlocking the Energy Efficiency Puzzle in California*, at 7-8 (2011), <http://www.edf.org/sites/default/files/On-Bill%20Repayment-Unlocking-the-Energy-Efficiency-Puzzle-in-California.pdf>.
- 17 CAL. PUB. RES. CODE § 25310 (West 2014); CAL. PUB. UTILITIES CODE § 9615 (West 2014); <http://www.cpuc.ca.gov/PUC/energy/Resources/Energy+Action+Plan/>; http://www.cpuc.ca.gov/NR/rdonlyres/A54B59C2-D571-440D-9477-3363726F573A/0/CAEnergyEfficiencyStrategicPlan_Jan2011.pdf.
- 18 An Act to Amend Section 73 of the Revenue and Taxation Code, Relating to Taxation, to Take Effect Immediately, Tax Levy, S.B. 871 (Cal. 2014) (enacted).
- 19 One example of a PACE funded commercial projects is the Universal City Hilton project, which utilized PACE financing to fund \$7 million in upgrades, making it the largest PACE project in the United States at that time. The improvements were estimated to result in energy and water savings of more than \$800,000 annually. Another example is the Constance Hotel in Pasadena, which used \$6.9 million in PACE funding for the renovation of the historic hotel which was originally built in 1926.
- 20 STATEWIDE ENERGY EFFICIENCY COLLABORATIVE, <http://californiaseec.org> (last visited October 16, 2014).
- 21 CALIFORNIA ENVIRONMENTAL PROTECTION AGENCY, AIR RESOURCES BOARD, <http://www.arb.ca.gov> (last visited October 16, 2014).
- 22 CALIFORNIA ENERGY COMMISSION, *Energy Efficiency Financing*, <http://www.energy.ca.gov/efficiency/financing>.
- 23 ENERGY.GOV, *Funding & Financing for Energy Projects*, www.energy.gov/funding-financing-energy-projects.
- 24 Examples of such organizations include: California Sustainability Alliance, www.sustainca.org; Green Cities California, www.greencitiescalifornia.org; U.S. Green Building Council, www.usgbc.org; Architecture 2030, www.architecture2030.org; Living Building Challenge, <http://living-future.org/lbc>; and Natural Resources Defense Council, www.nrdc.org/energy/files/ca-scaling-up-energy-efficiency-FS.pdf.
- 25 California Environmental Protection Agency, *Auction Proceeds Funded Programs and Events*, CALIFORNIA ENVIRONMENTAL PROTECTION AGENCY AIR RESOURCES BOARD, <http://www.arb.ca.gov/cc/capandtrade/auctionproceeds/ggrfprogrampage.htm#Energy> (last reviewed Nov. 11, 2014).
- 26 GREEN CITIES CALIFORNIA, *Urban Design Best Practice: Green Municipal Buildings, San Jose, CA*, (Jan. 4, 2013) <http://greencitiescalifornia.org/best-practices/urban-design/san-jose-green-municipal-building.html>.
- 27 CAL. PUB. UTILITIES CODE §§ 399.11, *et seq.*
- 28 Distributed solar PV system prices dropped by 12 to 19% nationwide last year, according to a report by the U.S. Energy Department's National Renewable Energy Laboratory (NREL) and the Lawrence Berkeley National Laboratory (LBNL). The jointly written report on PV pricing trends predicts another drop this year of between 3 and 12%, depending on system location and market segment. http://www.pv-magazine.com/news/details/beitrag/solar-energy-prices-to-drop-by-up-to-12-in-2014_100016875/#ixzz3IQgTSFeI; See also, Diane Cardwell, *Renewable Energy Starts to Win on Price*, THE NEW YORK TIMES, (November 24, 2014); Elias Hinckley, *The Solar Energy Industry is Red Hot—Will it Get Hotter?*, The Energy Collective (December 11, 2013). <http://theenergycollective.com/eliashinckley/315371/solar-industry-red-hot-will-it-get-hotter>.

- 29 Examples of power purchase agreements entered into by cities and local districts include: (1) The City of Palo Alto, which claims to have already achieved its goal of zero carbon generated power through a combination of solar, wind and hydro-electric power. Daniel Gross, *Palo Alto's Electric Supply is 100 Percent Carbon-Neutral*, Slate, (Sep. 3, 2014) http://www.slate.com/articles/business/the_juice/2014/09/palo_alto_power_supply_how_the_home_of_stanford_became_carbon_neutral.html; (2) Lancaster's municipal buildings are now largely powered with solar energy from a 1.45 megawatt project, which is projected to save the city an estimated \$6 million over 15 years. Lancaster is the first city in the nation to mandate solar for all new residential developments. Zachary Shahan, *Lancaster Home Solar Mandate—1st In US (& World?)—Leads City Into 2014*, CleanTechnica, (Jan. 4, 2014), <http://cleantechnica.com/2014/01/04/lancaster-home-solar-mandate-1st-us-world-leads-city-2014/>; and (3) Antelope Valley Union High School District (“AVUHSD”) has the largest operational solar project by a school district in the United States. The fully installed 9.6 MW project will span 10 campuses and supply 80% of the school district's energy demand. It is estimated AVUHSD will save \$40 million in energy costs over the 20-year term of the power purchase agreement. PSOMASFMG, *Antelope Valley Union School District Case Study*, <http://www.psomasfmg.com/casestudy.html> (last visited Oct. 20, 2014).
- 30 LOCAL GOVERNMENT SUSTAINABLE ENERGY COALITION, <http://www.lgsec.org/issues/clean-energy> (last visited Oct. 20, 2014).
- 31 LOS ANGELES BUSINESS COUNCIL, *Largest-in-the-Nation Feed-In Tariff Solar Program Kicks Off*, (June 27, 2013), <http://www.labusinesscouncil.org/LargestintheNation-Feedin-Tariff-Solar-Program-Kicks-Off>.
- 32 Evan Halper, *Communities Going Into Power Business to Cut Cost, Carbon Footprint*, LOS ANGELES TIMES, (Sep. 1, 2014), <http://www.latimes.com/business/la-fi-sonoma-power-20140902-story.html>.
- 33 CAL. PUB. UTILITIES CODE § 366.2.
- 34 SAN FRANCISCO PUB. UTILITIES COMMISSION, *About CleanPowerSF*, <http://sfwater.org/index.aspx?page=577>.
- 35 MICROGRID INSTITUTE, *About Microgrids: Definition*, <http://www.microgridinstitute.org/>.
- 36 Shan Li, *Microgrid Sales Rise Alongside Qualms About the Power Grid*, LOS ANGELES TIMES, (June 17, 2014), <http://www.latimes.com/business/la-fi-microgrids-20140618-story.html#page=1>.
- 37 Richard Martin, *Energy Storage Systems for Microgrids to Reach Nearly \$4.2 Billion in Market Value by 2024*, NAVIGANT RESEARCH (May 12, 2014), <http://www.navigantresearch.com/newsroom/energy-storage-systems-for-microgrids-to-reach-nearly-4-2-billion-in-market-value-by-2024>.
- 38 LEGISLATIVE ANALYST'S OFFICE, *The 2014-15 Budget: Cap-and-Trade Auction Revenue Expenditure Plan*, (Feb. 2014), <http://www.lao.ca.gov/reports/2014/budget/cap-and-trade/auction-revenue-expenditure-022414.aspx>.
- 39 CALIFORNIA DEPARTMENT OF EDUCATION, *California Clean Energy Jobs Act*, <http://www.cde.ca.gov/lr/fa/ce/>.
- 40 CAL. PUB. RES. CODE §§ 25710 *et seq.*; *Southern Cal. Edison Co. v. Public Utilities Com.* (2014) 227 Cal.App.4th 12.
- 41 http://www.energy.ca.gov/research/upcoming_funding.html; CAL. PUB. RES. CODE §§ 25216 (c) and 25401.
- 42 Jeff St. John, *California Ready to Fund the Next Wave of Microgrids Paired With Renewables and Storage*, GREENTECHGRID, (July 14, 2014), <http://www.greentechmedia.com/articles/read/California-Funds-the-Next-Wave-of-Microgrids-Armed-With-Renewables-and-Stor>.
- 43 CAL. PUB. UTILITIES CODE §§ 2837 (West 2014); <http://energy.gov/sites/prod/files/2014/06/f17/EACJune2014-3Charles.pdf>.
- 44 Eric Wesoff, *Grid-Scale Energy Storage RFQs: Lessons From the Imperial Irrigation District*, GREENTECHGRID (May 14, 2014), <http://www.greentechmedia.com/articles/read/Grid-Scale-Energy-Storage-RFQs-Lessons-From-the-Imperial-Irrigation-Distri>.
- 45 Eric Wesoff, *Another 40MW of Grid-Scale Energy Storage in the California Pipeline* (Jan. 22, 2014), <http://www.greentechmedia.com/articles/read/Another-40-MW-of-Grid-Scale-Energy-Storage-in-the-California-Pipeline>.
- 46 SOUTHERN CALIFORNIA EDISON, *Tehachapi Wind Energy Storage Project*, (Oct. 2012), <http://energy.gov/sites/prod/files/Tehachapi.pdf>.
- 47 CALIFORNIA SUSTAINABILITY ALLIANCE, *Tools: Eight Elements of Green Procurement*, http://sustainca.org/tools/green_procurement_toolkit.
- 48 *See, e.g.*, 53 Ops.Cal.Att'y Gen. 72, 73 (1970).

- 49 California cities top the American Lung Association's list of the most polluted cities by year round particle pollution. AMERICAN LUNG ASSOCIATION, *State of the Air 2013*, at 13 (2013), <http://www.lung.org/assets/documents/publications/state-of-the-air/state-of-the-air-report2013.pdf>. According to a recent study, California cities lead the nation in early deaths due to air pollution. Fabio Caiazzo, Akshay Ashok, Ian A. Waitz, Steve H.L. Yim, Steven R. H. Barrett, *Air Pollution & Early Deaths In The United States. Part I: Quantifying The Impact Of Major Sectors In 2005*, 79 J. ATMOSPHERIC ENV'T 198, Nov. 2013. Along with Honolulu, two California cities, Los Angeles and San Francisco, lead the nation in traffic congestion. See INRIX TRAFFIC SCORECARD, <http://scorecard.inrix.com/scorecard/> (last visited Oct. 21, 2014). Traffic is not only a health and environmental problem, but it is a drag on economic productivity. Through transformation to a clean energy economy, California cities can develop solutions for air pollution and traffic congestion.
- 50 Robert Longley, *Americans Now Spend Over 100 Hours A Year Commuting*, ABOUT NEWS, (April 2005) <http://usgovinfo.about.com/od/censusandstatistics/a/commutetimes.htm>. In a ranking of large cities (with populations of 250,000 or more), New York (38.3 minutes), Chicago (33.2 minutes), Newark, New Jersey (31.5 minutes), Riverside, California (31.2 minutes), Philadelphia (29.4 minutes), and Los Angeles (29.0 minutes) had among the nation's highest average commute times.
- 51 GOVERNOR'S INTERAGENCY WORKING GROUP ON ZERO-EMISSION VEHICLES, 2013 ZEV ACTION PLAN 1 (Office of Governor Edmund G. Brown Jr., 1st ed. 2013), available at [http://opr.ca.gov/docs/Governor's_Office_ZEV_Action_Plan_\(02-13\).pdf](http://opr.ca.gov/docs/Governor's_Office_ZEV_Action_Plan_(02-13).pdf).
- 52 *California Investing Millions to Build Hundreds of EV Charging Stations*, EARTHTECHLING (June 20, 2014), [http://earthtechling.com/2014/06/california-investing-millions-to-build-hundreds-of-ev-charging-stations/?utm_source=feedburner&utm_medium=feed&utm_campaign=Feed%3A%20Earthtechling%20\(EarthTechling\)](http://earthtechling.com/2014/06/california-investing-millions-to-build-hundreds-of-ev-charging-stations/?utm_source=feedburner&utm_medium=feed&utm_campaign=Feed%3A%20Earthtechling%20(EarthTechling)).
- 53 Max Baumhefner, *Big Brown and Governor Brown Deliver on Zero Emissions Vehicles*, (Feb. 5, 2013), http://switchboard.nrdc.org/blogs/mbaumhefner/big_brown_and_governor_brown_d.html.
- 54 California High Speed Rail Authority, <http://www.hsr.ca.gov/> (last visited Oct. 29, 2014).
- 55 Melanie Curry, *Breaking News: Deal Reached on CA's Cap-and-Trade Spending Plan*, STREETS BLOG LA (June 12, 2014), <http://la.streetsblog.org/2014/06/12/breaking-news-deal-reached-on-cas-cap-and-trade-spending-plan>.
- 56 Legislative Analyst's Office, *The 2014-15 Budget: Cap-and-Trade Auction Revenue Expenditure Plan*, (Feb. 24, 2014), <http://www.lao.ca.gov/reports/2014/budget/cap-and-trade/auction-revenue-expenditure-022414.aspx>
- 57 CALIFORNIA ENVIRONMENTAL PROTECTION AGENCY AIR RESOURCES BOARD, SUSTAINABLE COMMUNITIES, (last reviewed Oct. 17, 2014), <http://www.arb.ca.gov/cc/sb375/sb375.htm>.

The State Bar of California Public Law Section

The Public Law Section of The State Bar of California presents:

Webinar: New California Sustainability Laws

Wednesday, March 4, 2015, 12 noon - 1 p.m.

This program offers 1 hour participatory MCLE credit.

To register go to www.calbar.org.online-cle and select Public Law.

Over the past decade, California has enacted a comprehensive set of laws and regulations that are transforming the economy. This informative webinar will provide a comprehensive overview of such sustainability laws and regulations which have generated funding for renewable energy generation, energy efficiency measures in our buildings, and the implementation of clean transportation programs.

Speaker **Ted Senet** and moderator **David King**.

The State Bar of California Office of Education is a State Bar of California-approved MCLE provider.