# California Clean Energy Committee

"We're all working together to do a better job for the country."

April 8, 2011

Mr. Mark Gross, Senior Planner City of Moreno Valley 14177 Frederick Street Moreno Valley, California 92553

Re: Comments on Draft Program Environmental Impact Report World Logistics Center Project (SCH # 2012021045)

Dear Mr. Gross:

This letter will constitute comments by the California Clean Energy Committee on the Draft Environmental Impact Report for the World Logistics Center Project (EIR).

The California Clean Energy Committee is a California non-profit corporation headquartered in Davis which seeks to promote energy conservation, greenhouse gas reduction, and the development of clean-energy resources in California. It actively supports the application of the California Environmental Quality Act (CEQA) to energy conservation and related impacts.

Over 20 individuals in the Moreno Valley area have joined Clean Energy's campaign to request that that city require robust energy conservation and environmental stewardship in the World Logistics Center project design.

All notices regarding this project are requested to be sent to 3502 Tanager Avenue, Davis, California 95616-7531. Please feel free to contact the undersigned for additional information.

Accompanying this letter is a USB flash drive containing electronic copies in pdf format of all the documents listed in the appendix to this letter. Please contact us if you have any difficulty displaying the documents.

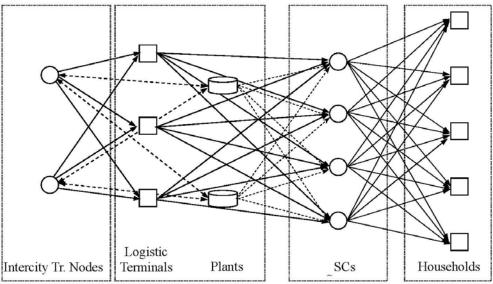
The EIR should be amended to incorporate an analysis of energy conservation, to include feasible mitigation for GHG emissions, to fully address transportation impacts and mitigation, and to incorporate a reasonable range of alternatives and then recirculated. The

logistics industry is uniquely situated to enable a wide variety of companies to pursue corporate responsibility and environmental sustainability goals in a cost-effective way. Sustainability is a key buying criterion for a growing number of consumers and a key factor in determining the reputation and success of companies. The development of sustainable logistics solutions should be a key element of the planning and development of the World Logistics Center.

1. Logistics Sprawl

According to the Southern California Association of Governments (SCAG), Southern California already faces severe congestion on its transportation routes with truck traffic as one of the major culprits. SCAG projects that warehousing in western Riverside County will increasingly serve the ports of Los Angeles and Long Beach. This will entail increased hauling distances and will contribute to traffic congestion and will lead to greater environmental and economic impacts on the region.

Figure 1: Supply Chain Network for Retail Goods in a City.



SCAG expects truck traffic to grow significantly on key east-west freeway segments. Increased truck traffic will cause longer delay to both trucks and general traffic. SCAG has planned a new East-West Freight Corridor that would run adjacent to SR-60 in an effort to accommodate truck traffic generated by projects such as this one.

The EIR should evaluate the potential cumulative impact of increased heavy-duty truck traffic from the ports. SCAG provides a Heavy Duty Truck modeling program which is a four-step data model for projecting the effects of increased trucking to the Inland Empire.

Urban package delivery is connected with increasing levels of traffic congestion, climate impacts, air quality impacts, and energy use. By locating the WLC at a considerable distance from the businesses and consumers that will ultimately receive the products, the project increases the amount of travel required to deliver goods and the related impacts to their ultimate destination. The EIR should evaluate the impact of increasing the total net distance travelled by trucks to reach their final destinations in the region.

## 2. Mitigation of Transportation Impacts

The project will have significant and unmitigated impacts to SR-60, SR-91, and I-215. The Perris Valley Line, which is now under development in Riverside County, projects that it will serve 4,350 riders daily and that the diversion from private car use to rail will reduce VMT by approximately 34 million miles per year reducing GHG emissions in the region. Riverside Transit Authority (RTA) has numerous transit routes serving the area.

The city should implement a transit funding charge on the project to fund mass transit operation expenses, van pools, real-time ridesharing, alternative mode marketing, transit pass programs, guaranteed ride home, truck routing and scheduling information, and management time to implement a traffic demand management measures that to mitigate freeway impacts. Transportation system impacts can be off-set by programs that increase transit mode share. Additional transit ridership would reduce congestion caused by the project.

Impacts could further reduced by implementing a transit-oriented development (TOD) design. TOD integrates transit service into the layout for the project so that transit services are convenient and obvious at employment sites. The proposed project should be designed around an effective transit plan which would encourage transit by designing it as a simple, convenient, clean, and economic way for employees to commute to work. This requires that the land use plan for the project be designed to integrate transit and that upgraded transit facilities be required so as to maximize transit mode share.

The project should subsidize transit fees, promote transit ridership, insure adequate transit service, and improve transit intermodal connections so as to increase transit ridership and reduce impacts to transportation system, air quality, energy, and GHG emissions.

ITE trip generation rates for a traditional warehouse are about 4.96 trips per thousand square feet. The trip generation analysis for the project is estimating .11 per thousand square feet. This means that a warehouse on site is projected to have about 2 percent as much traffic as a traditional warehouse. This is unreasonable and unsupported given that the number of truck trips would be similar for the two uses and given that employment, while much lower at this project, is not expected to be only 2 percent of a traditional warehouse.

The project concludes that certain transportation impacts are mitigated by the TUMF fee. However, TUMF mitigation does not account for the additional trips generated by the project being disproportionately truck trips which require considerably more infrastructure investment due to their greater traffic congestion impacts.

## 3. Transportation Management District

A Mello-Roos district should be established for the project to fund the design and operation of an on-going transportation management district and a commuter benefits program to serve the project's transportation demand. Employers should be required to contribute on either a square footage basis or an employee formula. A commuter benefits program provides alternatives and incentives that encourage commuting by more sustainable modes such as transit, rail, biking, van pools, and car-pooling. Commuter benefits programs are based on a traffic mitigation plan that includes public outreach to commuters through various media including workplace promotion, social media, on-line ride matching, signage, on-site transit pass sales, on-site transit information, discounted transit passes, and coordination with transit agencies. Employers located at the project site should mitigate transportation impacts by actively participating in a commuter benefits program. Such a program could be operated under the joint supervision of the City of Moreno Valley and the Riverside County Transportation Agency. By securing the participation of all employers on site through a Mello-Roos district and CC&Rs, companies can minimize the expense and administrative burdens of setting up individual programs while providing a more effective and responsive program under the supervision of specialized staff working with RTA.

# 4. Freight Rail

The EIR should analyze mitigation that would require the project applicant to develop freight facilities in along the San Jacinto Branch Line or take advantage of the intermodal facilities in San Bernardino to reduce impacts to regional freeways resulting from the shipment of cargo by truck to the project site from the San Pedro Bay ports, from other intermediate distance locations, and from elsewhere in the United States and Canada. The EIR should discuss whether the selection of the proposed site forecloses future use of energy efficient freight rail transportation.

# 5. Vehicle Miles Travelled

The EIR assumes that there will be no traffic impact other than trip generation because the jobs/housing balance in Moreno Valley will be improved by the project. At the same time the EIR claims that the project will involve high-cube warehouse space that will employ only a few people resulting in a very low trip generation rate. These are contradictory assumptions.

The EIR should specify what a high-cube warehouse is and assure that only warehouses with the projected low levels of employment would actually be built on site. Monitoring should be provided that would insure that high-employment uses would not be accommodated or that additional mitigation would be required if traffic counts ultimately exceeded the low-employment levels that the traffic analysis projects.

The number of employees expected to work at the project should be projected along with a how many of those employees would be expected to live in Moreno Valley, how many of them would be new residents, and how the jobs-housing ratio would be affected in view of those numbers.

The project is expected to generate 71,085 vehicle trips daily. Those are trips that will either begin or end at the project site. There is no support for the proposition that 71,085 less auto trips will be made elsewhere in the Los Angeles Basin as a result of this project. The EIR must analyze the vehicle miles travelled (VMT) associated with this project. SB 375 provides that regional transportation plans must lay out a land use pattern with the goal of reducing GHG emissions through VMT reductions. (Cal. Gov. Code Section 65080(b)(2)(B)(vii).) Locating the warehousing on the periphery of the urbanized area may increase the distance trucks are required to travel thus off-setting any potential reduction resulting from an improved jobs-to-housing ratio. The analysis should consider that some trips generated by the project will be made by delivery vehicles which may travel hundreds of miles, frequently stopping, before returning to the project site.

#### 6. Alternative Fuels

Shippers operating from the project should be required to use alternative fuels to reduce the air pollution, energy, and climate impacts of the project. This includes zero-emission vehicles such as electric delivery vans and trucks operating on natural gas for as many of the new vehicles acquired for the project as feasible as well as for equipment operating on the site such as forklifts.



Heavy fleet operation can be

based on fuel cell vehicles using hydrogen as a fuel source. The alternative fueling station for the project should provide for H2 fueling to be incorporated. The project should provide funding to Riverside Transit Authority to provide H2-powered transit taking advantage of the H2 fueling station. Fleet operations may make hydrogen fuel cell vehicles

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cost-effective. The EIR should evaluate mitigation that requires companies to operate with sustainably-fueled, zero-emissions vehicles. Solar photovoltaic on warehouse roofs can charge vehicle batteries or operate hydrogen electrolysis to power zero-emissions fleet vehicles.

## 7. Parking

All employers owning or leasing buildings in the project site should be required to offer parking cash-out to employees. Parking cash out requires employers to offer employees the option to choose cash in lieu of any parking subsidy offered. Implementation of parking cash-out by individual employers can be used to reduce transportation impacts whether or not employers are able to reduce the number of parking spaces they own or rent.

The project should adopt shared parking through either a parking district or public parking in lieu of minimum parking requirements. Employers should be allowed to reduce the number of shared parking spaces they construct or lease based upon (i) the likelihood that multiple facilities will not all require maximum parking at the same time and (ii) the extent to which individual facilities can implement cash-out parking. This reduces costs to employers and moderates single-occupant vehicle demand.

## 8. Co-Loading and Back-Hauling

The project should require companies locating at the project site to participate in the VICS Empty Miles program or an equivalent program to reduce empty backhauls and to facilitate co-loading opportunities. The design of the program should be tailored to take advantage of economies of scale at the WLC site.

## 9. SmartWay

Companies operating at the project should be required to participate in the U.S. EPA's Smart Way Program. Under that program freight shippers commit to use SmartWay freight carriers for 50 percent or more of their shipping resulting in more freight being carried by freight companies that are taking steps to reduce energy consumption and emissions.



Smart Way allows ground shippers to track supply chain emissions using data supplied to the SmartWay system by trucking and rail companies. It also allows shippers to model strategies to reduce emissions. The EPA is continually upgrading this tool, and it is being

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integrated into logistics programs. The SmartWay shippers can pick carriers to meet performance targets for emissions reductions. This allows shippers to drive efficiency in the supply chain and encourages freight carriers to adopt strategies such as idle reduction, improved aerodynamics, improved freight logistics, automatic tire inflation systems, single wide-base tires, and driver training.

#### 10. Evaluation of Energy Resources

The EIR should evaluate the economic viability of potentially-feasible renewable energy strategies and energy efficiency tools available that could reduce energy demand from the project. The EIR should evaluate options for putting the entire project on 100 percent renewable electrical energy, or some lesser percentage as may be feasible, and evaluate the extent to which transportation systems associated with the construction and operation of the project can be fueled from renewable electrical generation or other reduced-emission fuels.

The EIR should compare the relative efficiency of different technologies to could provide energy to the project for operation, construction, transportation, and other uses. The EIR should discuss the projected energy use of the project and the impact of requiring additional generation facilities to serve the anticipated load. Project loads should be estimated based upon typical high-cube warehouse space operations including lighting, space conditioning, battery recharging, equipment, transportation, water heating, etc. Energy resources potentially available include natural gas, solar radiation, grid-sourced electricity, petroleum, wind, geothermal, biofuels, and biomass. The EIR should evaluate ways in which the projected electric demand can be served in an efficient and environmentallysustainable way. The EIR should evaluate strategies for reducing reliance on fossil fuels, increasing reliance on renewable resources, reducing peak loads, and reducing the impacts of reliance on remote generation facilities.

The planned 40,000,000 square feet of commercial space comprising the project would yield 28,000,000 square feet of rooftop solar PV at a 70 percent coverage ratio. At an average of 4 mWh daily produced per mW of solar generation capacity, the available solar generation would produce 204,400 mWh annually. The cost of purchasing an equivalent amount of power using \$0.1401 per kWh, which is the time-of-use rate for summer peak for large commercial users of the Moreno Valley Electric Utility, is over \$28 million per year.

SOLAR ENERGY PER YEAR	
Gross Floor Space (sf)	40,000,000
Available Roof Space for Solar PV (sf) <sup>1</sup>	28,000,000
Roof Space Required per MW of Generation (sf) <sup>2</sup>	200,000
Solar Generation Capacity (mW) <sup>3</sup>	140
Annual Solar Generation (mWh) <sup>4</sup>	204,400
Annual Cost of an Equivalent Amount of Electric Power pur-	
chased from Moreno Valley Utility <sup>5</sup>	\$28,636,400

Using the CPUC-determined starting price for the SB32 feed-in-tariff of \$89.23/mWh and a 20 percent adder for solar time-Of-use characteristics, the annual wholesale value is \$21,829,920. The shading effect of rooftop solar arrays reduces cooling demand and should be included in the energy benefits.

The addition of solar generation to the project could be centrally managed by a third party or under contract with Moreno Valley Utility. Excess power could be sold to the Moreno Valley Utility under a long-term power purchase agreement or sold to SCE. Moreno Valley Utility could enter a long-term lease agreement and finance the solar at municipal bond rates. Ratepayers would benefit because the Moreno Valley Utility would meet its renewable portfolio standard (RPS) obligation at no additional cost, rather than being required to pay a premium for renewable energy purchased through the RAM auction.

The EIR should discuss how failing to implement reliable and efficient local energy generation would pre-empt future clean energy development. By failing to adopt renewable energy when the project is implemented, project occupants become subject to administrative and financial obstacles as well as additional construction costs associated with retro-

<sup>&</sup>lt;sup>1</sup> 40,000,000 square feet of commercial space would yield 28,000,000 square feet of usable roof space at a 70 percent usable ratio.

<sup>&</sup>lt;sup>2</sup> Solar generation at Orange County Convention Center delivers 1.016 MW from 200,000 s.f. of roof space.

<sup>&</sup>lt;sup>3</sup> 28,000,000 square feet of roof space used for solar panels would generate 140 mW (28,000,000/200,000=140).

 $<sup>^4</sup>$  Assuming conservatively 4 mWh per day of generation for each mW of solar generation capacity, 140 mW of capacity would produce 204,400 mWh of electricity per year (4 mWh \* 140 \* 365).

<sup>&</sup>lt;sup>5</sup> 204,400,000 kWh \* \$0.1401.

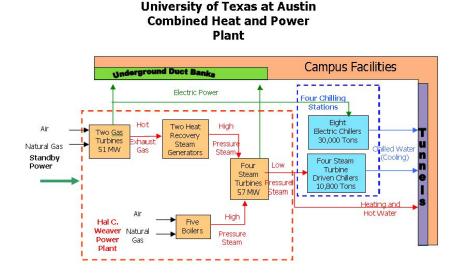
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fitting renewable generation to an operating commercial building, rather than installing it as a component of the initial construction.

### 11. District Heating and Cooling

District heating and chilled water should be evaluated for use project-wide in lieu of packaged HVAC units. Either centrifugal chillers or centralized solar collection technology driving single or double effect absorption chillers should be considered. Chilled water and hot water service could be produced via one or more solar thermal installations. The payback period on such a system can be less than five years. Chilled water can also provide cost-effect thermal storage taking advantage of off-peak electricity rates and solar thermal resources.

District heating and cooling should also be evaluated based on implementing combinedcycle gas turbine generation with a combined heat and power application that uses waste heat to power an absorption chiller. To the extent that new natural-gas-fired generation would serve the project's electrical demand, generation should be located close to project load in order to reduce the cumulative impact of requiring additional long-distance transmissions lines, to reduce transmission line losses, and to facilitate combined heat and power applications using waste heat. The EIR should also consider the GHG impacts from sulfur hexafluoride emissions (SF6), a human-made chemical that is used as an electrical insulating fluid for power distribution. In 1998, atmospheric concentrations of SF6 were 4.2 ppt and steadily increasing in the atmosphere. SF6 is the most powerful GHG listed in IPCC studies with a GWP of 23,900 (Intergovernmental Panel on Climate Change 1996). Avoiding reliance on grid-sourced power also increases power reliability avoiding costly power outages for business locating in the WLC. CHP is especially attractive in hotter inland areas because of high cooling loads.

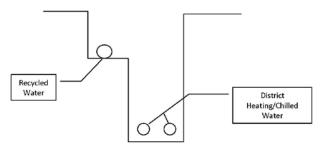


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Investment tax credits and municipal bonding by a cooperative agreement with the Moreno Valley Electric Utility can be combined with a Mello-Roos district reduce capital costs to approximately 4 percent while taking advantage of tax incentives available only to the private sector. The combination is considerably less than the cost of financing separate HVAC units as part of the construction take-out financing. A Mello-Roos district and appropriate mitigation provisions as a condition of project approval would insure adequate project demand to insure financial viability and justify financing.

As noted, capital costs are substantially reduced for renewable energy systems integrated into the initial project design and installed during initial construction, as opposed to being retrofitted at some later date. Chilled water distribution piping installed as a component of the initial project is another good example of this. Piping would be sequenced into construction of underground utilities such as water, sewer, natural gas, electricity, data services, recycled water, etc. using an appropriate joint trench design.

District chilled water reduces capital costs and maintenance costs for individual warehouses the cost to purchase and install large HVAC units, the cost of structural components required to support heavy HVAC equipment on roofs, the cost of sizing substations and power distribution systems to serve peak demand for numerous large HVAC systems, the costs to construct floor space for HVAC equipment, and the cost of



Combined Trench for Recycled Water and District Heating/Chilled Water

duct work throughout warehouses. HVAC maintenance costs and replacement costs are reduced because individual buildings do not have HVAC systems to maintain or replace. Air handler units and chilled-water piping are used. The overall cooling capacity that must be purchased is reduced because system size is based on overall peak demand rather than by equipping each building to meet peak cooling demand individually. Further cost savings could be achieved by selling credits from the project under the AB 32 cap and trade program.

## 12. Ground Source Heat Pumps and Solar Water Heating

Ground source or geothermal heat pumps can reduce heating and cooling expenditures for buildings by 40 to 70 percent. Ground source heat pumps take advantage of relatively consistent ground temperatures. The city should evaluate the use of ground source heat pumps and solar water heating to increase project efficiency and reduce impacts. Horizontal or vertical loops could be installed quickly and efficiently prior to initiating foundation work. Applicable federal tax credits increase the economic returns. Ground source heat pumps can supply hot water, or they can be paired with solar water heating to provide an alternative design to district heating and cooling.

#### 13. Lighting and Energy Efficiency

The total cost of ownership of LED lamps is considerably less than incandescent and florescent lamps. Up to 80% of the electrical energy used in warehouses is consumed by electric lighting. The EIR should consider requiring LED lighting throughout including the use of LED lighting in parking lots because of the reduced energy requirements of LED lighting. Many projects now exceed Title 24, Part 6. The EIR should also evaluate incorporating additional energy efficiency up to 40 percent beyond Title 24.

#### 14. Microgrid and Storage

A microgrid is a cluster of electricity sources and possibly controllable loads that are connected to the traditional wider power system but which may, as circumstances dictate, disconnect from it and operate as an island for short periods of time. Microgrids can consist of multiple buildings or locations. Micro-grids provide the power quality and reliability benefits of on-site generation with semiautonomous control as well as cost, efficiency and environmental benefits. The EIR should evaluate the use of a microgrid for the WLC project area. Microgrids are suitable for projects that require high reliability and availability of electricity supply. Microgrids allow the efficient integration of project-wide renewable energy resources, enable consumption shift to off-peak hours, facilitate energy storage, reduce environmental impacts, and enhance the safety, reliability and affordability of electric service to business users. Energy storage should be evaluated for combinations of thermal storage, vehicle batteries (V2G), and hydrogen electrolysis for vehicle and equipment use.



Chilled Water Storage

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#### 15. Ancillary Benefits

The combination of solar photovoltaic, energy conservation, a district chilled water system and enhanced Title 24 plus compliance would bring the project near to net zero with no additional lifecycle cost. Clean energy systems provide on-going, long-term savings to companies operating on the project site. They also make the project more attractive to companies intending to meet sustainability goals. Sustainability has become a key buying criteria for consumers, and sustainability is a critical factor in shaping the reputation of a company. Sustainable projects sell more quickly because they provide economic benefits to prospective owners. Faster sales reduce the developer's project carrying costs.

Renewable energy facilities provide additional value for the invested dollar because they increase the reliability of the energy supply. Black-outs cause considerable economic losses to businesses and typically require expensive, inefficient, and decentralized back-up power supplies. Incorporating micro-grid technology into the WLC grid would greatly increase the resilience of the Moreno Valley electric grid and allow for islanding the site and maximizing local generation while shedding of non-essential load during power emergency conditions. The combined-cycle gas turbine/chilled water plant at the UC Davis Medical Center in Sacramento was to a large extent initiated because of the reliability of locally-sourced generation.

Buildings that incorporate on-site renewable generation have increased market value and that market value grows over time. By contrast, brown power is only an expense and carries no investment return. Further, an investment in renewable energy locks in the cost of energy for the lifetime of a project. It provides companies a hedge against energy price increases resulting from factors such as volatile fossil fuel prices or the cost of decommissioning nuclear facilities.

#### 16. Mello-Roos District

The city should condition approval of the World Logistic Center on the formation of a Mello-Roos district encompassing the project site to generate long-term funding sufficient to insure the operating cost for more efficient and more economical project operation.

The Mello-Roos Community Facilities Act of 1982 (Gov. Code, § 53311 et seq.) authorizes local government agencies to form community facilities districts to "finance the purchase, construction, expansion, improvement, or rehabilitation of any real or other tangible property with an estimated useful life of five years or longer," as well as related planning and design work. (Gov. Code, § 53313.5.) The financed facilities need not be physically located within the Mello-Roos district. (Gov. Code, § 53313.5.) Funding under the act is through the use of special taxes, submitted to a two-thirds voter approval. (Gov. Code, § 53326, 53328.)

The Legislature has recognized importance of dramatically reducing California's reliance on fossil-fuel powered electrical generation by adopting the California Renewable Portfolio Standard, which will help to reduce air pollution in the state, meet the state's climate change goals, promote stable retail rates for electric service, meet the state's need for a diversified and balanced energy generation portfolio, assist meeting the state's resource adequacy requirements, contribute to the safe and reliable operation of the electrical grid, provide a predictable electrical supply, voltage support, lower line losses, and congestion relief, and to implement the state's transmission and land use planning activities related to development of eligible renewable energy resources. (Pub. Utilities Code, § 399.1(b).)

Proceedings for the formation of a community facilities district are initiated by adoption of a resolution of intention to establish the district. The resolution of intention sets a time for a public hearing on the establishment of the district, at which time interested persons may protest or otherwise comment on formation of the district. (Gov. Code, §§ 53321, 53323.) If a majority protest has not been made, the legislative body may adopt a resolution of formation establishing the district. (Gov. Code, § 53325.1.) Following establishment of the community facilities district, an election must be held within the district to authorize the proposed special tax. If fewer than 12 registered voters reside within the boundaries of the district on the date 90 days before the date of the hearing, then the tax is voted on by persons who own property within the district on the date of the hearing, each receiving 1 vote for each acre of land owned. If 12 or more registered voters reside within the district, then the election is by registered voters within the district. (Gov. Code, § 53326.)

#### 17. Farmland Impact

The project will have a significant impact on conversion of unique farmland and farmland of local importance. The city should provide mitigation for the farmland impacts by requiring the purchase of conservation easements for an amount of land equivalent to the farmland that will be occupied by the project. The easements should be held by the city or by a suitable land trust.

#### 18. Alternate Sites

The EIR should fully evaluate alternative sites, or a combination of alternative sites, that are capable of supporting a large-scale, logistics warehouse project. The City of Beaumont contains at least three parcels that would support large-scale logistics warehousing. The City of Calimesa has a large amount of vacant land near Singleton Road and I-10. Union Pacific's El Paso Line runs through Beaumont. The City of Perris has considerable land that could be used for large-scale logistics warehousing. Riverside County has considerable land already zoned for light industrial or business park uses along the I-215 corridor south of Moreno Valley where logistics warehousing would be appropriate. The March Joint Powers Authority has over 700 acres of developable land. San Jacinto has

considerable land available for a large logistics warehouse. BNSF has trackage rights for freight service on the San Jacinto Branch Line, which runs parallel to I-215 from Riverside through Perris and Hemet to San Jacinto.

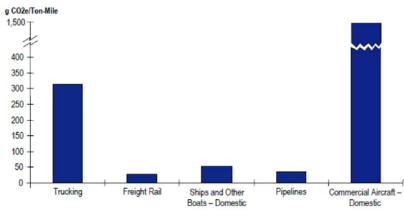


Exhibit 2.10: GHG Emissions per Freight Ton-Mile by Freight Transportation Mode, 2006 Source: U.S. EPA 2008, Inventory of U.S. Greenhouse Gas Emissions and Sinks: 1990 to 2006; and Bureau of Transportation Statistics, National Transportation Statistics.

## 19. Mixed-Use Design

The EIR does not contain a plausible mixed-use alternative. Modeling should be done to develop an optimized mixed-use design. The EIR should analyze the vehicle-miles travelled reduction for the mixed-use alternative. Trip counts should be reduced for the mixed-use alternatives based on the resulting internal capture of vehicle trips on the project site.

The Mixed-Use A alternative contains no residential and thus fails to achieve the reduced travel impacts that are associated with locating residential development close to commercial and business uses. Mixed Use B alternative eliminates all commercial development and again fails to locate commercial and residential near to each other where trip generation and vehicle miles travelled would be reduced. The mixed use alternatives have not been design in a manner that would achieve the benefits of mixed-use design.

The project should be evaluated for consistency with AB 32, the SCAG Sustainable Communities Strategy and with Executive Order S-03-05.

## 20. Covenants, Conditions and Restrictions

The project applicant should be required to record a set of CC&Rs on the entire project site that implements cost-effective energy and climate mitigation including the various components described in this comment letter. Particular focus should be given to energy

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efficient designs, development of renewable energy resources, the use of transportation energy, smart-grid integration, and the implementation of district heating and cooling.

Respectfully submitted,

/s/ Eugene S. Wilson

Eugene S. Wilson

Enclosures

### APPENDICES

Appendix 1	Energy Design Resources, Energy Design Resources Design Brief: Chiller Plant Efficiency (June, 2010).
Appendix 2	Johnson Controls, Application Opportunities for Absorption Chillers (2013).
Appendix 3	Johnson Controls, Optimize Your Facilities Energy Utilization with Free Heat (2013).
Appendix 4	Johnson Controls, Improve Your HVAC-Energy Utilization (2013).
Appendix 5	U.S. Department of Energy, Advanced Manufacturing Office, Use Low- Grade Waste Steam to Power Absorption Chillers (Jan. 2012).
Appendix 6	Association of Energy Engineers Southern California Chapter, Case Study: Central Plant District Cooling and Heating on College Campus.
Appendix 7	U.S. Green Building Council, Toyota Motor Sales South Campus Office Development, Torrance, California.
Appendix 8	Sun Power, Case Study: Macy's Go Solar and Improves Energy Efficiency in 28 California Stores with Sun Power.
Appendix 9	Sun Power, Case Study: FedEx Goes Solar with Sun Power.
Appendix 10	U.S. Green Building Council, USGBC Project Profile, Office Depot, Aus- tin, TX.
Appendix 11	U.S. Green Building Council, USGBC Project Profile: Emeryville Mar- ketplace, Emeryville, California.
Appendix 12	U.S. Green Building Council, USGBC Project Profile, Jackson Square Redevelopment Initiative.
Appendix 13	Sun Power, Tiffany's Saves \$450,000 Annually with Sun Power.
Appendix 14	Google Maps, Distribution Center with Full Solar Roof in Riverside County.
Appendix 15	Walmart, Walmart Renewable Energy: Ohio.
Appendix 16	Talbot Solar, Estimate (Apr. 2013).

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Appendix 17	Berkeley Law & Center for Law, Energy & the Environment, California's Transition to Local Renewable Energy: 12,000 Megawatts by 2020 (Jun. 2017).
Appendix 18	Solar Energy Industries Association, Solar Means Business: Top Com- mercial Solar Customers in the U.S. (Sept. 2012).
Appendix 19	Go Solar California, Clean Power Estimator.
Appendix 20	Clean Technia, Solar, Renewable Grid Parity, or Better, in California Latest Renewable Power Auction (2012).
Appendix 21	Solar Panel Talk, Solar Energy Measurement (2012).
Appendix 22	Johnson Controls, Case Study Orange County Convention Center (2009).
Appendix 23	Wikipedia, Cost of Electricity by Source.
Appendix 24	East Orlando Lawrence Berkeley National Laboratory, Understanding the Cost of Power Interruptions to U.S. Electricity Consumers (2004).
Appendix 25	U.S. Energy Information Administration, Frequently Asked Questions (2013).
Appendix 26	California Public Utilities Commission, Decision Revising Feed-In Tariff Program (May 2011).
Appendix 27	City of Moreno Valley, Rates (2013).
Appendix 28	City of Moreno Valley, MV Electric Utility: A Brief History (2013).
Appendix 29	City of Moreno Valley, Moreno Valley Electric Utility Service Area (2013).
Appendix 30	City of Moreno Valley, Energy Efficiency and Climate Action Strategy (Apr. 2012).
Appendix 31	International District Energy Association, Combined Heat and Power (CHP): Essential for a Cost Effective Clean Energy Standard
Appendix 32	International District Energy Association, Community Energy: Planning, Development and Delivery.
Appendix 33	Wikipedia, District Heating (Nov. 2012).
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Appendix 34	City of Vancouver, Fact Sheet: Neighbourhood Energy Utility.
Appendix 35	City of Boise, Geothermal Heating District (2013).
Appendix 36	University of Texas, A Study in the Benefits of Efficiency Improvements to Emissions and Fuel Costs.
Appendix 37	University of Texas, Power Plant and Chilling Stations (2013).
Appendix 38	District Energy St. Paul, Combined Heat and Power (2013).
Appendix 39	District Energy St. Paul, Solar Thermal (2013).
Appendix 40	District Energy St. Paul, Thermal Storage (2013).
Appendix 41	District Energy St. Paul, District Heating (2013).
Appendix 42	District Energy St. Paul, District Cooling (2013).
Appendix 43	District Energy St. Paul, Customers (2013).
Appendix 44	District Energy St. Paul, History (2013).
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