ClimateTrust

Testimony to the Senate Environment and Natural Resources Committee Support for SB 324 and Lifting the 2015 Sunset of the Clean Fuels Program

February 2nd, 2015

Peter Weisberg, Program Manager The Climate Trust

The Climate Trust finances projects that depend upon revenues from environmental markets, like the potential market for Oregon Clean Fuels Program credits. In 1997, The Trust was founded as a 501(c)(3) nonprofit organization to assist new fossil-fueled power plants in complying with the Oregon Carbon Dioxide Standard—the nation's first legislation to curb emissions of carbon dioxide created by Oregon. Over the last 18 years, The Climate Trust has created programs in Washington, Colorado, Montana and Massachusetts and is an active participant in California's carbon offset and Low Carbon Fuel Standard Market.

The emission reductions that will result from the Oregon Clean Fuels Program represent a significant contribution to Oregon's greenhouse gas goals. The policy has an elegant design that allows it to efficiently incentivize projects with the largest greenhouse gas benefits. This will provide significant economic benefits to projects, like biogas plants at wastewater treatment plants, landfills and dairy farms, throughout Oregon.

The program provides significant carbon pollution reductions

Oregon's House Bill 3543 set a goal to reduce greenhouse gas emissions 10% below 1990 levels by 2020. According to the Oregon Environmental Council, this will require reducing our current annual emission by 17 million metric tons of carbon dioxide. The Oregon Department of Environmental Quality estimates that, if the legislature lifts the sunset of the program, the Oregon Clean Fuels Program will reduce emissions by at least 7.3 million metric tons cumulatively.¹ In the final year of the program, this would amount to a reduction of at least 1 million metric tons of carbon dioxide emissions. These reductions represent 6% of the emission reductions Oregon must achieve to reach its 2020 target – an essential first contribution to the ambitious challenge of mitigating climate change.

The transportation sector is the largest source of greenhouse gas emissions in Oregon. To mitigate these emissions, incentivizing the production of cleaner fuels, rather than continuing to important traditional ones, is essential.

¹ Calculated using emission reduction estimates from Table 25 of the report "Task 3 – Updated Compliance Scenarios" provided by ICF International to Oregon Department of Environmental Quality in the report produced in August 2014. Available on-line at http://www.oregon.gov/deq/RulesandRegulations/Documents/T3m3.pdf.

ClimateTrust

The incentive created by the program is based on rigorous greenhouse gas accounting and therefore elegantly supports projects with the greatest climate benefits.

The elegant design of the Oregon Clean Fuels Program means the policy will support those projects with the greatest greenhouse gas benefits without the government needing to artificially choose winners and losers. Under the standard, every project establishes the quantity of greenhouse gas emissions associated with the fuel it produces, called the "carbon intensity." The number of credits a fuel generates is then based upon that carbon intensity.

Many other clean energy policies do not incorporate this essential greenhouse gas accounting. The federal Renewable Fuel Standard, for example, gives a credit for each unit of renewable fuel produced, but does not fully distinguish between the unique and significantly different greenhouse gas benefits (or, in the case of some biofuels, net increase in emissions) associated with renewable fuels. It acts more like a Renewable Portfolio Standard, in which any renewable electricity project is given a credit for the electricity it produces regardless of the climate benefits.

The benefit of this elegant accounting is clear when working with biogas projects. Biogas projects generate renewable natural gas from organic materials normally treated as waste—like livestock manure or food scraps. These feedstocks are traditionally sent to wastewater lagoons or landfills, where they decompose without oxygen and release methane to the atmosphere. Methane is a potent greenhouse gas; over a 100 year period, a ton of methane released to the atmosphere traps as much heat as 34 tons of carbon dioxide. Because biogas projects avoid these methane emissions by capturing and combusting methane that is otherwise normally released to the atmosphere, biogas projects have a uniquely high potential to mitigate climate change. The Climate Trust estimates that many biogas projects have five times the greenhouse gas reductions as other similarly-sized solar or wind projects (which do not avoid methane emissions).

Unlike the Renewable Portfolio Standard, this benefit is recognized by the greenhouse gas accounting of programs like the Clean Fuels Program. The renewable natural gas from biogas projects, when compressed and used as vehicle fuel, has the lowest carbon intensity of any fuels in California's Low Carbon Fuel Standard. This translates into biogas projects generating significantly more credits than other projects, amplifying the financial incentive provided by the program to biogas projects. In this way, the policy elegantly incentivizes those projects with the greatest greenhouse gas benefits — an essential step to quickly implementing the low hanging fruit for climate mitigation that, in the absence of appropriate carbon pricing, have gone unbuilt.

ClimateTrust

The program offers a significant economic development opportunity to wastewater treatment plants, dairies, and food processors with biogas opportunities.

In the absence of a carbon price, biogas development in Oregon has been limited. Energy Trust's attached paper, *Putting Waste to Work*, provides a case study of four of these projects at Gresham's and Pendleton's wastewater treatment plants, a dairy farm in Dayton, and a merchant food-scrap plant in Junction City. A 2011 paper estimated that Oregon has realized only 8.25% of the economic potential of biogas projects in the state.² Unfortunately since that time, little growth has been realized with the expiration of the Business Energy Tax Credit.

Policies like the Clean Fuels Program recognize biogas project's significant methane benefits and provide a clear financial incentive to implement new projects and avoid methane emissions. The policy therefore offers significant potential to wastewater treatment plants, dairies, and food processors throughout mostly rural parts of Oregon that have access to feedstocks with the potential to generate renewable natural gas.

The Clean Fuels Program is an essential first step to pricing carbon pollution in Oregon. The Climate Trust urges the full implementation of the Clean Fuels Program by lifting the 2015 sunset.

² See *Growing Oregon's Biogas Industry*, a white paper prepared by The Climate Trust and the Energy Trust in February 2011. Available on-line at https://www.americanbiogascouncil.org/pdf/GrowingORBiogasIndustryWhitePaper.pdf.