

Low Carbon Fuel Standard: Negligible and Uncertain GHG Emissions Reductions

The primary purported goal of a Low Carbon Fuel Standard (LCFS) is to reduce greenhouse gas (GHG) emissions, which include: Carbon Dioxide (CO₂), Methane (CH₄), Nitrous Oxide (N₂O) and Fluorinated Gases. Proponents commonly overstate the potential GHG emissions reductions that could result from an LCFS. In fact, the LCFS is a costly and ineffective approach to reducing greenhouse gas emissions compared to alternative carbon reduction policies.¹

Actual GHG emissions reductions attributable to LCFS are not quantifiable and subject to substantial uncertainty

- According to an analysis of California's LCFS prepared by the state's nonpartisan Legislative Analyst's Office:²
 - "...estimates [of GHG reductions] are subject to substantial uncertainty because there are a wide variety of factors that make it difficult to estimate the magnitude of GHG reductions attributable to the LCFS. For example, it is unclear how biofuels would have otherwise changed under the federal Renewable Fuel Standard (RFS) and how the two programs interact."²
 - While LCFS may contribute minor reductions in GHG emissions, "the magnitude of effect is unclear."²

Estimated GHG emissions reductions from California's LCFS are minimal

- Estimated annual GHG reductions in California from the LCFS have averaged less than 1% of total state emissions.³
- According to the California Air Resources Board (CARB), "It is important to note that because the LCFS calculates emission reductions on a full lifecycle basis, the GHG emission reductions occur both in California and out-of-state."⁴ As a result, emissions reductions attributed to the LCFS in California are even less than estimated, and purported emissions reductions that may occur elsewhere are uncertain and impossible to quantify.

Potential impacts on GHG emissions from the proposed Puget Sound regional LCFS are unknown

- The Puget Sound region's transportation sector generates 13.6%⁵ of the state's total GHG inventory⁶ (King County 7.5%, Snohomish 2.6%, Pierce 2.7%, Kitsap <1%).
- A study conducted for the Puget Sound Clean Air Agency (PSCAA) on the proposed regional LCFS⁷ did not model impacts on GHG emissions at all – even though its main goal is to reduce them.

1 California Legislative Analyst's Office, "Assessing California's Climate Policies – Transportation," December 2018 (Page 31) (Estimates LCFS costs are more than ten times higher than the state's cap-and-trade program.)

2 Ibid (Page 33)

3 Ibid (In 2016, estimated GHG emissions reductions in CA attributable to LCFS were 2.4 MMT which was 0.56% of the state's total GHG emissions.)

4 California Air Resources Board, "Final Environmental Analysis, Prepared for the Proposed Amendments to the Low Carbon Fuel Standard and the Alternative Diesel Fuels Regulation," September 17, 2018

5 Puget Sound Clean Air Agency, Greenhouse Gas Emissions Inventory, June 2018 (2015 data)

6 Washington State Greenhouse Gas Emissions Inventory: 1990-2015, Report to the Legislature, Washington State Department of Ecology, December 2018 (2015 data)

7 ICF, "Puget Sound Regional Transportation Fuels Analysis," Submitted to Puget Sound Clean Air Agency, September 2019