



Renewable Diesel and SAF: The Path to Net Zero

Transportation fuel and plastics producers are increasingly under pressure to reduce the carbon intensity (CI) of their products to comply with state and federal low-carbon policies and industry and company-driven low-carbon goals. These include the United States' (U.S.) Renewable Fuel Standard (RFS) and Canada's Clean Fuel Regulations (CFR) or Low-Carbon Fuel Standard (LCFS) programs in California and British Columbia and Clean Fuels Programs in Oregon and Washington, as well as Europe's Renewable Energy Directive (RED) and a wide array of registries and other European certification schemes such as International Sustainability and Carbon Certification (ISCC).

Transportation fuel and plastics producers want to ensure credible carbon claims and monetize their carbon reduction activities to capture the value of available LCFS credits and/or Renewable Identification Numbers (RINs). To do so, they need to first engage with experienced advisors who understand the carbon accounting frameworks and reporting structures unique to the compliance requirements of these low-carbon fuel programs – and that's where EcoEngineers can help.

Eco has conducted more than 500 Life-Cycle Analysis (LCA) projects to date. We have extensive experience producing consistent, accurate, and objective LCA methodologies, with clear assumptions and calculations. Our LCAs provide clarity of a refinery or petrochemical facility's CI values throughout the entire front-end process through to the production of renewable diesel (RD) and/or sustainable aviation fuel (SAF).

Our team of experts can provide action plans that support your carbon reduction activities and help you monitor and adjust the CI of your fuel and chemicals along your journey of compliance. We routinely assist transportation fuel and plastics producers with the registration of biobased feedstock eligibility and new technology pathways with the U.S. Environmental Protection Agency (USEPA) or California's Air Resource

Our Services:

- RFS Part 79 Guidance
- RFS Part 80 & Engineering Review
- Equivalence Value (EV) Calculations
- Inflation Reduction Act (IRA) Analysis (45Q, 45Z, and 45V)
- Life-Cycle Analysis (LCA)
- Quality Assurance Programs (QAP)
- Monitoring & Verification
- RINs Management
- Interaction with Regulatory Bodies (i.e., Feedstock Petition)
- Indirect Land-Use Change (iLUC) Evaluation
- RINs & Credit Forecasting

Board (CARB), prepare product applications and certifications, interface with local regulatory agencies, and deliver documentation, auditing, and validation.

In addition, Eco is your trusted guide in optimizing your response to emerging energy policies and training your compliance team on carbon market reporting. Our process starts with education led by EcoUniversity, which provides training workshops, market outlooks, an intensive Carbon Literacy training program, and condensed board and management training modules.

About EcoEngineers

Eco is a consulting, auditing, and advisory firm with an exclusive focus on the energy transition. From innovation to impact, we help you navigate the disruption caused by carbon emissions and climate change.

We help you stay informed, measure emissions, make investment decisions, maintain compliance, and manage data through the lens of carbon accounting. Our team of engineers, scientists, auditors, consultants, and researchers live and work at the intersection of low-carbon fuel policy, innovative technologies, and the carbon marketplace.

Eco was established in 2009 to steer low-carbon fuel producers through the complexities of emerging energy regulations in the United States. Today, our global team is shaping the response to climate change by advising businesses across the energy transition.

Together, we can create a world where clean energy fuels a healthy planet.

Navigating the Energy Transition



- Asset Development
- Life-Cycle Analysis
- Compliance
- Regulatory Engagement



- Validation & Verification
- Quality Assurance Programs
- Third-Party Engineering Reviews



- Interactive Workshops
- Market Outlooks
- Carbon Literacy

For more information about our Petroleum and Refining services, please contact:

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