BIOENERGY EUROPE

November 20-21, 2024

WOOD PELLET
ASSOCIATION OF CANADA

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BACKGROUND

The Wood Pellet Association of Canada (WPAC) is a Bioenergy Europe (BE) trade association member. Other members include European electric utilities, European, Canadian and US national bioenergy and pellet associations, boiler manufacturers, European bioenergy companies and research institutions.

A key benefit of WPAC's participation in BE is to ensure ongoing market access for Canadian SMEs. The European Union (EU) and EU member state regulators are currently modifying legislation and regulations related to sustainability requirements for biomass used for heat and power generation in Europe. BE is a forum where EU, US, and Canadian trade associations can provide input into proposed legislation which is then communicated by BE to European regulators.

WPAC is an active participant in BE's *Sustainability Working Group*, where strategies for collectively adapting to European legislative and regulatory developments are discussed. In 2024 our primary focus will be to ensure that the revision of the European Renewable Energy Directive and the development of the European Deforestation Regulation include terms that Canadian wood pellet manufacturers will be able to comply with.

The focus of BE's Sustainability Working Group in November was its participation in BE's flagship event, the European Bioenergy Future 2024 (EBF2024), held in Brussels, Belgium, from November 20-21, 2024. EBF2024 brought together nearly 150 participants, including industry leaders, policymakers, academics, and civil society representatives, to explore bioenergy's role in achieving the EU's climate and energy goals.

EBF2024, with almost 150 participants representing the bioenergy industry, policymakers, academia, and civil society, featured comprehensive coverage of policies and market trends in the EU bioenergy sector. Key topics covered included:

- The growing demand for biomass in the evolving bioeconomy.
- The challenges and opportunities of biomass supply within the framework of EU legislation.
- The role of biomass heating as a complementary solution in an increasingly electrified energy landscape.

- Alternative pathways for the efficient use of biogenic CO_2, focusing on storage and utilization strategies.

On the second day of the conference, EBF2024 featured two parallel technical sessions. The first session, organized in collaboration with the EUBCE (European Biomass Conference and Exhibition) Industry Track, focused on innovative biomass thermochemical conversion technologies. It showcased cutting-edge advancements such as oxy-fuel combustion, gasification, and fast pyrolysis for heat and power generation. These technologies were explored in conjunction with CO_2 capture and storage, biochar production, bio-methanol synthesis, biomass-to-SAF (sustainable aviation fuel), biomass-to-hydrogen, and other bio-based products.

The second session served as a training event for quality managers under ENplus®, the world's leading fuel quality certification scheme for wood pellets. Targeted at ENplus®-certified companies (traders and producers) and others interested in the program, the event provided a comprehensive overview of the scheme's procedures and requirements.

WPAC / CANADA OBJECTIVES

Fahimeh Yazdan Panah, WPAC's Director of Research and Technical Development attended the event. Key objectives included:

1. Sharing Canada's perspectives to policymakers and regulators in the EU.
2. Building alliances with like-minded nations.
3. Seeking joint solutions to addressing regulatory challenges and opportunities such as the European Union Deforestation Regulation.

ACTIVITIES, DELIVERABLES & OUTCOMES

Activities

1. Networking to share Canadian wood pellet sector perspectives, concerns, and suggestions on regulatory implementation at an international event in Brussels.
2. Meeting with EU stakeholders, as arranged by officials from NRCAN and Global Affairs Canada within various directorates of the European Commission.

Deliverables & Outcomes

- 30 potential foreign partners (agents, distributors, service contractors, etc) will be identified from this activity
- 10 Canadian companies expanded their international business development efforts
- 30 foreign participants interacted with Canadian participants
- 2 Canadian participants interacted with foreign participants
- 200 industry personnel will be reached by a market intelligence / trip report

SESSION HIGHLIGHTS

1. Bioeconomy and Competition for Biomass

This session highlighted the strategic importance of biomass in decarbonizing the EU's economy, emphasizing its dual role in energy generation and as a renewable carbon source for industrial applications.

- **Biomass as a dual solution**: By replacing fossil fuels in energy production and displacing fossil-derived carbon in industries such as plastics, chemicals, and synthetic fuels, biomass serves as a cornerstone for sustainable development.
- **Cascading principle**: Discussions reinforced the need to prioritize biomass for high-value applications, such as bioplastics and bio-based chemicals, before utilizing it for energy production. This approach maximizes economic and environmental benefits while fostering innovation.
- **Challenges to overcome**:
    - Stronger EU policies and targeted investments are essential to support the development of sustainable biomass supply chains.
    - Regulatory barriers, such as fragmented policies across member states, hinder progress and need to be addressed.
    - Enhanced R&D funding to explore advanced biomass applications is vital for maintaining Europe's competitive edge in the global bioeconomy.

2. Biomass Supply and EU Legislation

The second session provided an in-depth analysis of the challenges posed by the EU's complex regulatory landscape for biomass supply.

- **Regulatory complexities**: Farmers, forest owners, and other stakeholders face uncertainty due to overlapping and sometimes contradictory EU regulations. This has slowed the development of a resilient and sustainable biomass supply chain.
- **Simplifying bureaucracy**: Participants called for streamlined policies to reduce administrative burdens, ensuring ease of compliance and fostering innovation at the local level.
- **Community support and alignment**:
    - It was emphasized that policies must align with real-world conditions and local community needs to secure buy-in and ensure long-term sustainability.
    - Case studies were presented showing how local engagement and incentives can unlock significant biomass supply potential.

3. Bioenergy and Electrification

This session addressed the critical question of how bioenergy and electrification can work together to achieve decarbonization.

- **Limitations of electrification**: While electrification is essential for decarbonizing some sectors, it cannot address all challenges, particularly in hard-to-abate sectors like heavy industry, aviation, and maritime transport.
- **Bioenergy as a complement**:
    - Bioenergy provides a consistent, renewable energy source for industrial processes, heating, and other applications where electrification is not feasible.
    - It ensures grid stability by balancing supply during periods of low renewable electricity generation.

- **Integrated approaches**: Speakers advocated for holistic energy strategies that combine bioenergy with electrification, optimizing resource efficiency and reducing emissions across multiple sectors. This integrated approach was seen as a cornerstone for achieving the EU's ambitious climate goals.

4. Biogenic CO_2: Storage and Utilization

The session on biogenic CO_2 explored its growing importance in achieving net-zero emissions and fostering a circular economy.

- **Rising competition for biogenic CO_2**: Industries such as sustainable aviation fuel (SAF), chemicals, and bioplastics increasingly rely on biogenic CO_2 as a raw material. This has created a new layer of competition for this valuable resource.
- **Balancing priorities**:
    - **Storage for negative emissions**: BECCS (Bioenergy with Carbon Capture and Storage) is critical for achieving long-term climate targets by permanently removing CO2 from the atmosphere.
    - **Utilization in circular economy applications**: Biogenic CO_2 can also be repurposed into valuable products, supporting industrial decarbonization while driving innovation in bio-based solutions.
- **Key enablers**:
    - **Infrastructure development**: Building robust pipelines, storage facilities, and CO_2 transportation networks is essential to scale up carbon capture and storage/utilization.

- **Policy and incentives**: Regulatory frameworks must support bio-carbon solutions, offering incentives to industries that adopt carbon-negative practices.
- **Public acceptance and cost reduction**: Strategies to reduce costs and increase public awareness of biogenic CO_2 technologies were seen as crucial to their broader adoption.

KEY OBSERVATIONS

- Bioenergy Europe's President, Christoph Pfemeter, opened the conference by emphasizing bioenergy's pivotal role in the EU's energy transition. He highlighted its potential to efficiently replace fossil fuels by 2050 and called for simplified administrative procedures to ease burdens on stakeholders, robust support schemes to drive innovation and foster sectoral growth, and recognition of bioenergy as the most cost-effective solution for reducing CO2 emissions and enhancing energy resilience.

- Dr. Martin Junginger from Utrecht University delivered a keynote on "Challenges and Opportunities for Bioenergy in the EU till 2050," with a focus on Bioenergy with Carbon Capture and Storage (BECCS) and Sustainable Aviation Fuel (SAF). Key insights included:
    - BECCS for Carbon Neutrality: BECCS emerged as the cornerstone technology for achieving net-negative emissions, compensating for the EU's carbon budget overshoot. Prioritizing BECCS for high-temperature heat, electricity, and fuel applications ensures more efficient and scalable GHG reduction.
    - Sustainable Aviation Fuel (SAF): A comparative analysis highlighted a “dream team” approach, combining biofuels and e-fuels to optimize land use, energy demand, and costs.
    - Policy Recommendations: Regulatory frameworks must prioritize BECCS and facilitate its adoption. Synergies between BECCS, material applications, and e-fuels should be exploited for a seamless energy transition.
- MEP Nicolás González Casares offered valuable insights into the EU’s renewable energy strategy, emphasizing the critical role of sustainable bioenergy. He underscored the importance of striking a balance between ambitious climate goals and pragmatic, actionable implementation.
- These sessions collectively underscored the indispensable role of bioenergy in Europe’s transition to a sustainable, net-zero economy. By addressing challenges in biomass supply, aligning policy with practice, integrating bioenergy with electrification, and leveraging biogenic CO_2, the bioenergy sector can lead the way in delivering innovative, scalable, and sustainable solutions. However, achieving these goals will require a concerted effort from policymakers, industry leaders, and local communities to ensure bioenergy’s full potential is realized.

“Biomass is a unique renewable energy carrier that stands apart from other commercial renewable technologies. Its ability to be easily stored and its independence from weather conditions make it a highly reliable energy source. To maximize its potential, biomass should be integrated with other renewable energy solutions, creating a complementary and resilient energy mix.”

~ Biljana Kulisic**,** Bioenergy Team Member for the European Commission DG – Decarbonization and Sustainability of Energy Sources

“Bioenergy, together with other renewables, have the capacity to replace fossil fuels by 2050.”

~ Christoph Pfemeter, President of Bioenergy Europe

RECOMMENDATIONS

- Continue close engagement with BE, as a board member, as a general member and as a member of BE's sustainability working group to ensure that we can have input on EU policy, regulations, acts, and directives that impact bioenergy use and trade. The most immediately urgent topics are REDIII and EUDR. Dr. Fahimeh Yazdan Panah was elected a board member in the Bioenergy Europe's board meeting that occurred during the EBF2024 event in Brussels.
- Bioenergy Europe, its board and sustainability group serve as a strategic platform to engage with EU policymakers, regulators, and industry leaders to address evolving sustainability regulations that impact market access, such as the European Renewable Energy Directive and Deforestation Regulation. By participating in BE events, board and Sustainability Working Group, WPAC ensures Canadian producers' perspectives are represented, strengthens relationships with key stakeholders, and identifies market opportunities that align with Europe's decarbonization goals, thereby safeguarding and expanding the significant export opportunities for Canadian wood pellets
- Continue communications with Canadian government officials regarding the pellet sector's concerns.
- Explore opportunities to develop systems in Canada addressing evolving topics such as geolocation and how they may work in the Canadian context.
- Continue with consistent and regular communications with allied nations.

"We need sustainable bioenergy in Europe to decarbonise our energy system."

~ Nicolás González Casares, Member of The European Parliament

2025 PRIORITIES FOR BIOENERGY EUROPE MEMBERS (INCLUDING WPAC)

The main priority for the advocacy department for 2025 is the outreach to the Parliament and the Commission to establish strong and lasting connections. In this context the Advocacy department's goal is to:

- Strengthen relations with current Members of the European Parliament and build good connections with newly elected ones, in particular in the Industry & Energy, Environment and Agriculture Committees. This will be done in cooperation with National Associations and members to create the local link with MEPs constituencies.
- Start the activities of the MEP informal network and organise our yearly networking event.

- Build on the network of high-level relations created in previous years through frequent cabinets meeting and improve reach with DG Climate and DG Environment.
- Demonstrate the need to rely on bioenergy for long-term GHG reductions, though a science and industry-based approach.
- Explain with help of partner EU trade associations how sustainability policy for biomass will impact all the Forest based sector.

Bioenergy Europe will follow up and further promote key documents to influence the new Commission and Parliament. Their key priorities will be:

- Monitor the implementation of REDII and REDIII at national level (in cooperation with the national associations)
- Follow the implementation of the EUDR provisions
- Analyse the revised National Energy and Climate Plans (NECPs).
- Work on upcoming expected policy files: revision of the Climate Law and Governance Regulation, Clean Industrial Deal, Bioeconomy Strategy.

In 2025, the key policy files with impact on the bioenergy sustainability framework will be:

- Discussion on the EU 2040 Targets.
- Taxonomy Regulation, Including sustainability requirements for biomass.
- Implementation of REDIII - Permitting, sustainability criteria.
- Implementation of EUDR.

FINAL TAKEAWAYS

The European Bioenergy Future 2024 conference underscored the transformative potential of bioenergy in achieving a sustainable, resilient, and decarbonized EU energy system. By fostering dialogue among policymakers, industry leaders, and academia, the event catalyzed a shared vision for the bioenergy sector's future. Bold investments, regulatory support, and innovation will be critical in realizing Europe's ambitious climate and energy targets by 2050.

1. **Invest in BECCS:** Essential for achieving net-negative emissions and supporting the EU's Green Deal.
2. **Simplify Regulations:** Overregulation remains a significant barrier; streamlined policies are necessary.
3. **Optimize Biomass Potential:** Sustainable biomass is crucial for cross-sectoral applications.
4. **Enhance Public Engagement:** Public trust and acceptance are vital for bioenergy advancements.
5. **Foster Innovation:** Collaboration among stakeholders is key to developing cutting-edge bioenergy solutions.

LEAD GENERATION

Fahimeh Yazdan Panah met numerous existing and potential important contacts:

1. Jean-Marc Jossart, Secretary General, Bioenergy Europe
2. Christophe Pfemeter, President & Managing Director, Bioenergy Europe & Austrian Biomass Association
3. Gustav Melin, BK Tech Group
4. Manolis Karampinis, Business Development and Membership Director, Bioenergy Europe
5. Agata Kotkowska, Deputy Head of Circular Economy, European Commission
6. Biljana Kulsic, Policy Officer, European Commission
7. Valentins Kuksinovs, Technical Officer, Bioenergy Europe
8. Agnieszka Jankowska, Certification Officer, Bioenergy Europe
9. Matteo Favero, Wood Biofuel Area Manager, Aiel
10. Altina Ribeiro, Eng, AIMMP
11. Azadeh Daheshmand, Regulatory Affairs Manager, Uniper
12. Pablo Rodero, Project Manager, Avebiom
13. Hannes Tuohiniitty, Sector Manager, Bioenergy Association of Finland
14. Kasia Wilk, Head of Public Affairs and Policy, EU and Asia, Drax
15. Esther Bustillo, Project Engineer – Biomass & Green Fuels, Engie Laborelec
16. Ieva Medne, Project Manager, Latvian Biomass Association
17. Eric Vial, GM, Propellet France
18. Christian Rakos, CEO, Propellets Austria
19. Andre Bedard, Manager, Wood Pellet Group, Quebec Wood Export Bureau
20. Dobromir Yankow, Marketing Manager, Bioenergy Europe
21. Elena Dumitru, Certification Manager, Bioenergy Europe
22. Ennio Prizzi, Policy Officer, Bioenergy Europe
23. Irene Di Padua, Policy Director, Bioenergy Europe
24. Jeremie Geelen, Market Intelligence Manager, Bioenergy Europe
25. Jonathan Canon, Market Intelligence Manager, Bioenergy Europe
26. Luca Oggianu, Communications Officer, Bioenergy Europe
27. Ennio Prazzi, Senior Policy Officer, Bioenergy Europe
28. Andrew Georgiou, USIPA, VP Global Policy
29. Patrick Nanninga, Lead Commercial Business Developer, Uniper
30. Marcel Huber, CEO, Syncraft
31. Jean-Francois Sidler, CEO, STUV
32. Didzis Palejs, Biomass Trade and Development, Verdo
33. Vojtech Pospisil, Project Manager, CZ BIOM
34. Henrik Brodin, Head of Energy Transition, SODRA
35. Andreas Martinsson, Market Research Manager, SODRA
36. Martina Friedl, Head of International Affairs, Austrian Biomass Association
37. Christian Rakos, President, World Bioenergy Association

SHARING INFORMATION WITH CANADIAN PELLET SECTOR

WPAC has shared this report and its observations and recommendations with more than 70 companies, including WPAC members. The report is anticipated to be shared, reaching more than 500 key Canadian industry leaders.