

RENEWABLE MATERIALS CONFERENCE 2026

22-24 September • Siegburg/Cologne



Organiser



Platin Sponsor



Award Sponsor



Gold Sponsors



Silver Sponsors



renewable-materials.eu

We renew the everyday



Our wood-based biochemicals offer sustainable, competitive, high-quality solutions for various industries and applications. As our biochemicals can be fully integrated into existing production and recycling processes, they transform the entire chemicals value chain towards renewable circularity.

UPM – a material solutions company

1. Feedstock

Lignocellulosic biomass provides a powerful launchpad for the next wave of innovation – UPM solutions built on certified, traceable and resilient biomass – ensuring secure supply, high sustainability performance and full chain of custody transparency (ISCC+, FSC™, PEFC*).

*FSC-C210095, PEFC/04-31-3869



2. UPM Production

Novel refineries are scaling – industrial-scale renewable molecules, made in Europe today – UPM technology platform is already operating and scaling world-class biorefineries.



Leuna: €1B+ investment delivering Europe's flagship biorefinery



Lappeenranta: 10 years of commercial advanced biofuels and renewable chemicals production

3. Value Chain & End Products

High performance fossil replacements that fit existing value chains – UPM renewable solutions are fully compatible with today's global chemical and materials infrastructure, enabling seamless substitution without redesigning industrial systems.



4. Performance

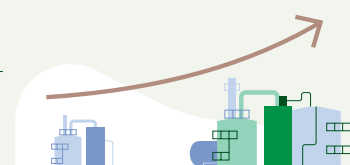
Outstanding climate performance with measurable emissions reductions – enabling immediate decarbonization while maintaining full material performance, accelerating Europe's shift to climate smart products.



Footprint Reduction



Value chain resilience



Scalable industrial deployment

Learn more
upmbiochemicals.com

Meet the UPM team at our booth!
Join the key note!

Florian Diehl, UPM Biochemicals
UPM's Lignin-based Materials:
Driving Innovation and Sustainability
Session: Lignin Utilization
Day 1 – 22 September 2026



Table of Content

Venue & Accommodation	3	Program Day 3, 24 September 2026	12
Floor Plan, Exhibition	4	Poster Session	14
Matchmaking, Conference Team	5	Nominees for the Innovation Award 2026	16
Program Day 1, 22 September 2026	6	List of Further Innovations Submitted	19
Program Day 2, 23 September 2026	9	Conference Advisory Board	20

Venue & Accommodation



Rhein Sieg Forum

Bachstraße 1, 53721 Siegburg, Germany

Phone: +49 2241 – 102 71 00

info@rhein-sieg-forum.de

www.rhein-sieg-forum.de

Recommended Hotels

www.renewable-materials.eu/venue

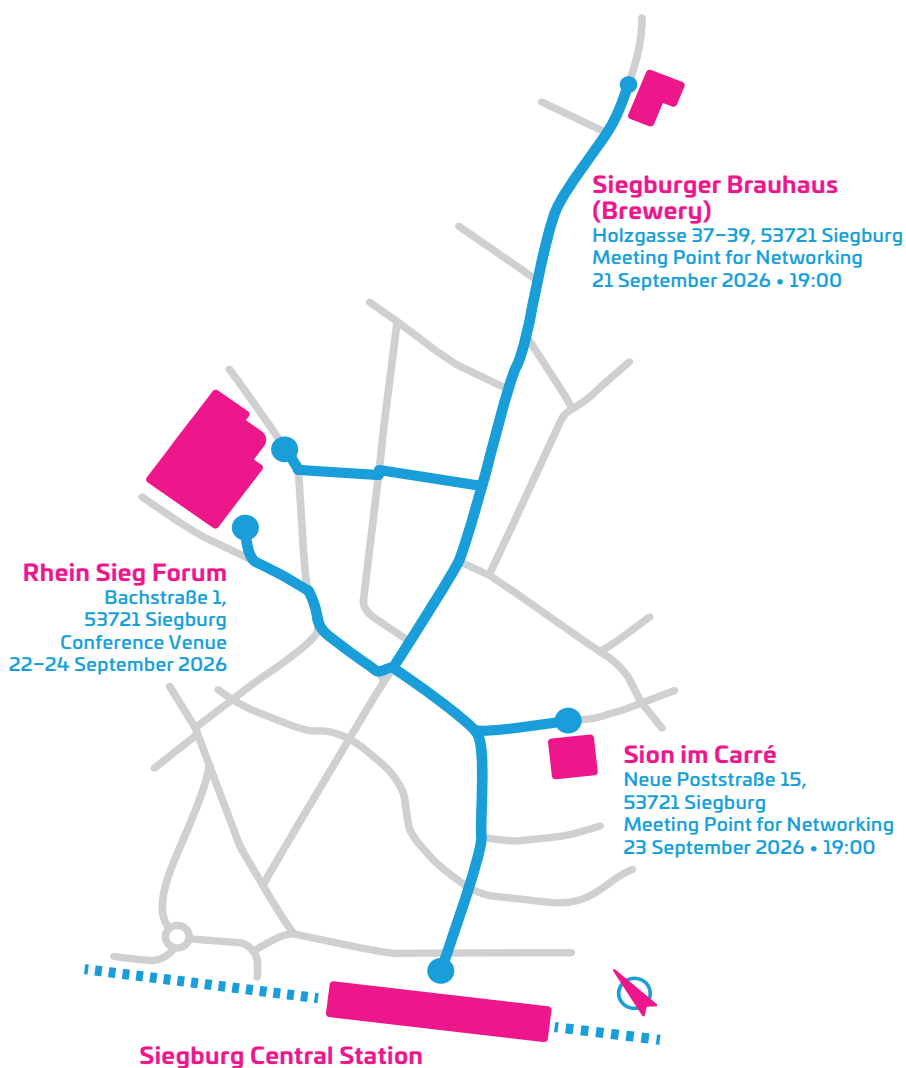
How to get to the Venue

By Train: Direct high-speed train connections from Brussels, Amsterdam, Cologne, Frankfurt, Berlin, Munich to Siegburg – without changing trains or with a maximum of one change at Cologne Central Station.

By Plane: The easiest way is to fly to Frankfurt and take the ICE direct from Frankfurt Airport to Siegburg (no change).

By Car: Car park next to the venue.

All locations are within walking distance via the pedestrian zone. Or take the bus from the Central Station to the Rhein Sieg Forum (3 minutes).

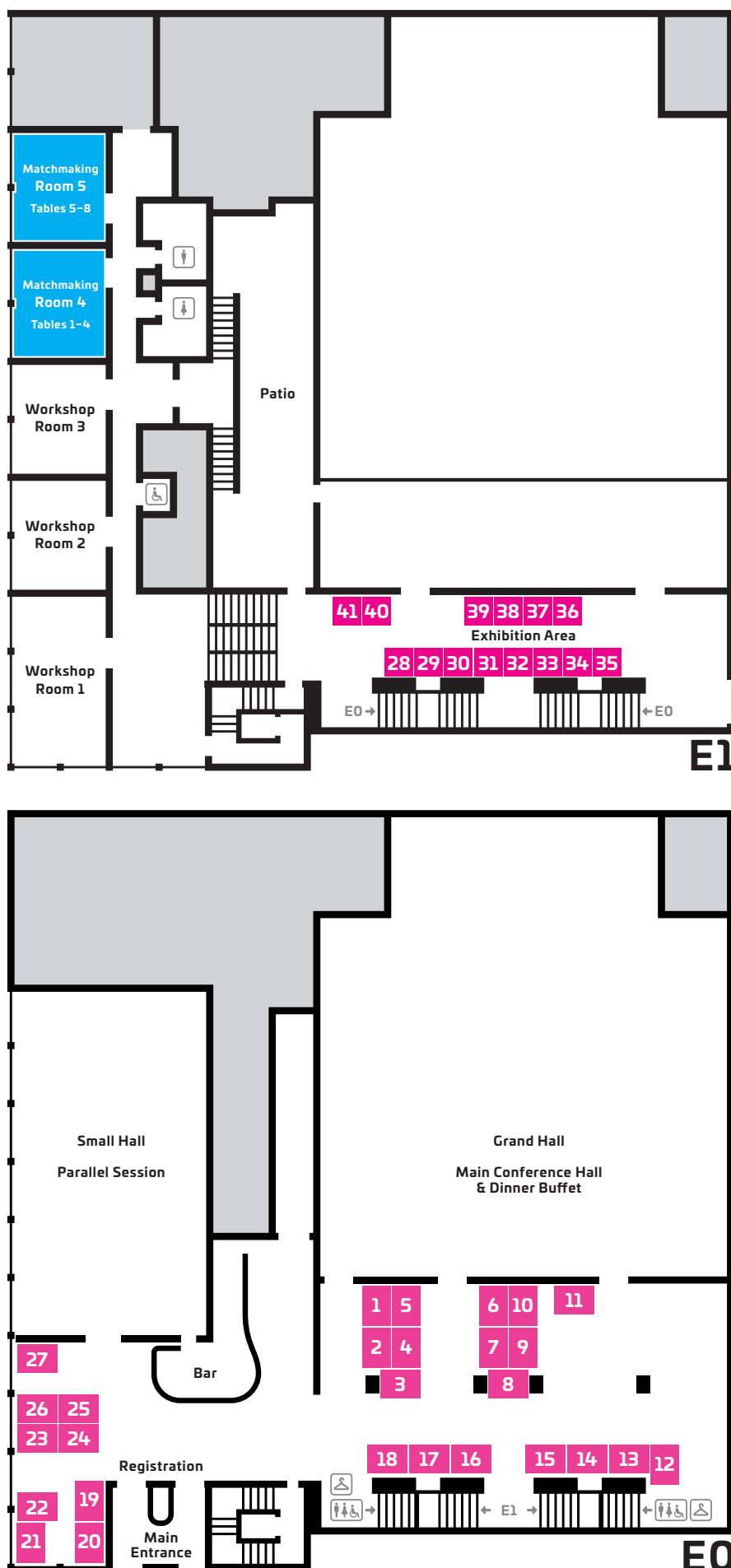




Floor Plan

Exhibition

- 01 iff
- 02 Bio-based Industries Consortium
- 03 nova-Institute
- 04 Jiangsu Celluranics New Materials
- 05 Innovation Award "Renewable Material of the Year 2026"
- 06 BPC Instruments
- 07 Renewable Carbon Initiative (RCI)
- 08 TÜV Austria Belgium
- 09 University of Kassel
- 10 University of Kassel
- 11 European Bioplastics
- 13 Bioeconomy For Change (B4C), LCA4BIO
- 14 DIN CERTCO
- 15 LEAF BIOTECH
- 16 Peterson Solutions
- 17 GS Biomats
- 18 CO₂ Value Europe
- 19 VTT Technical Research Centre of Finland
- 20 World Bio Markets
- 21 UPM
- 22 UPM
- 24 Verbio
- 25 Covestro
- 27 Charging Station
- 32 Poster Session
- 33 Poster Session
- 34 Poster Session
- 40 Media Table
- 41 Algenesis Corporations





Matchmaking

Are you already registered for the matchmaking tool? Arrange your appointments here:

renewable-materials.eu/matchmaking

Are you interested to take part in the matchmaking tool?

Please contact Mr Dominik Vogt:

dominik.vogt@nova-institut.de

Please find all participants here:

renewable-materials.eu/participant-list

Matchmaking Rooms 4 & 5 on Level E1.



WiFi • Free Access

Network ID nova-Conference

Join at sli.do

for real time questions and comments



Grand Hall

Main Sessions
#2026RMC



Small Hall

Parallel Sessions
#2026RMC-2



#2026RMC



#2026RMC

Your Conference Team



Lars Börger

CEO

lars.boerger@nova-institut.de



Michael Carus

Founder & Program

michael.carus@nova-institut.de



Dominik Vogt

Conference Manager & Matchmaking

+49 151 – 19 52 47 30

dominik.vogt@nova-institut.de



Vanessa Kleinpeter

Contact & Registration

+49 2233 – 460 14 00 • +49 170 – 595 96 47

vanessa.kleinpeter@nova-institut.de



Jutta Millich

Media & Partnerships

+49 561 – 50 35 80 44

jutta.millich@nova-institut.de



Anke Schwarzenberger

Zoom & Speaker Management

+49 173 – 663 25 83

anke.schwarzenberger@nova-institut.de



Brigitte Hellwig

Representative of the

nova-Institute at Booth No. 3

brigitte.hellwig@nova-institut.de



Day 1

22 September 2026, 9:00–19:00

Defossilisation of the Chemical Industry

9:00–9:20, Grand Hall

Conference Opening

9:00 **Lars Börger, nova-Institute (DE)**

9:20–11:00 Grand Hall

Defossilisation of the Chemical Industry

Chairpersons: Lara Dammer & Matthias Stratmann, nova-Institute (DE)

9:20 **Lars Börger, nova-Institute (DE)**

Future of Renewable Chemistry

9:40 **Dorothee Arns, FECC (BE)**

The Chemical Value Chain in Europe – Today and Tomorrow

10:00 **Doris De Guzman, Green D Market Analytics (US)**

Renewable Chemicals Market Update: Geopolitics, Protectionism, and Supply-Chain Realignment

10:20 **Shena Britzen, Rheinmetall (DE)**

How Giga PtX will Scale Hydrogen from Champagne to Commodity

10:40 **Panel Discussion with all Speakers of the Session**

11:00 **Coffee Break**

11:30–12:50, Grand Hall

Defossilisation of the Chemical Industry I

Chairpersons: Narendar Poranki, nova-Institute (DE) & Gillian Tweddle, Stripe Consulting (BE)

11:30 **Ann Zhang,**

Carbon Strategy (CN)

Chemical Industrial Park's Transition under The China's 15th Five-Year Plan – A Case Study

11:50 **Gabriela Fedor, Neste (FI)**

Under Pressure – Scaling Circular and Renewable Carbon for the Chemical Industry

12:10 **Michael Carus, nova-Institute (DE)**

& Peter Leonhardt, Cargill (DE)
Primary Biomass for Chemistry & Key Enabler of Europe's Circular Bioeconomy Through Integrated Biorefineries

12:30 **Panel Discussion with all Speakers of the Session**

11:30–12:50, Small Hall

Fine and Specialty Chemicals – New Pathways

Chairpersons: Ángel Puente & Olaf Porc, nova-Institute (DE)

11:30 **Natnael Behabtu, IFF (US)**

Designed Enzymatic Biomaterials™ (DEB) a Versatile Technology Capable of Providing Functional Performance Coupled with Advanced Renewable Carbon

11:50 **Tanja Meyer,**

Bio Base Europe Pilot Plant (BE)

Transforming Organic Waste into Bio-based Succinic Acid

12:10 **Christoph Wittman,**

Saarland University (DE)

From Biomass to Materials: Unlocking Renewable Carbon Through Microbial Platform Engineering

12:30 **Panel Discussion with all Speakers of the Session**

11:30–13:00

Workshop

Room 1

11:30 **Berend Brehm**

& Patrick Kohl,

Peterson Solutions (DE)

From Compliance to Market Access: Certification for Renewable Materials 101

12:50 **Lunch Break, Networking & Poster Session**



14:20–16:00, Grand Hall Defossilisation of the Chemical Industry II

Chairpersons: Matthias Stratmann & Lars Börger, nova-Institute (DE)

- 14:20 Jerry Luo, Leaf Bio (CN)**
Next-Gen Aromatics: Furan as a Bio-Based Platform
- 14:40 Petri Mast, ETB Global (NL)**
Resilient and Renewable Industrial Technology for C4-Production: Bioethanol to Bio-Butadiene
- 15:00 Andreas Kohl, Verbio (DE)**
New Plant Oil Based Value Chains Enabled by Metathesis: The First-Of-Its-Kind Ethanolysis Plant and Outlook on What is Next
- 15:20 Jörn Kiwitt, Evonik (DE)**
Building Resilience in the Chemical Industry – The Rheticus® Process and Renewable Carbon
- 15:40 Panel Discussion with all Speakers of the Session**

16:00 Coffee Break

14:20–16:00, Grand Hall Defossilisation of the Chemical Industry III

Chairpersons: Niels de Beus & Michael Carus, nova-Institute (DE)

- 16:30 Marilyne Hurtado, Michelin Engineered Polymers (FR)**
New Bio-based and Non-Toxic Building-Block Molecules Available at Industrial Scale
- 16:50 Jean-Paul Lange, University of Twente (NL)**
Cellulosic Ethylene Glycol – Economic Potential, Contaminants and Process Concepts
- 17:10 Martin Lindmeyer, YNCORIS (DE) & Jörn Viell, RWTH Aachen (DE)**
DeMoBio – Decentralized Modular Biorefinery-Container: Decentralized Pretreatment of Lignocellulosic Residues – Process Concepts & Techno-Economic Assessment
- 17:30 Panel Discussion with all Speakers of the Session**

14:20–16:00, Small Hall Lignin Utilisation

Chairpersons: Narendar Poranki & Asta Partanen, nova-Institute (DE)

- 14:20 Florian Diehl, UPM Biochemicals (DE/FI)**
UPM's Lignin-based Materials: Driving Innovation and Sustainability
- 14:40 Justine Charmillot, Bloom Biorenewables (CH)**
Preserving Nature's Chemistry to Enable High-Performance Renewable Materials
- 15:00 Balaji Sridharan, VITO (BE)**
Reductive Lignin Depolymerization: A Carbon Efficient Pathway Towards Biomaterials and Green Chemicals
- 15:20 Sari Rautiainen, VTT (FI)**
Higher Value from Lignins by Tuneable Depolymerisation
- 15:40 Panel Discussion with all Speakers of the Session**

16:30–17:50, Small Hall CO₂ Utilisation

Chairpersons: Achim Raschka & Christopher vom Berg, nova-Institute (DE)

- 16:30 Marjon Willekens, D-CRBN (BE)**
Plasma Technology to Convert CO₂ and Biomethane into Renewable Syngas
- 16:50 Balázs M. Hepp, eChemicles (HU)**
An Industrial Use-case for Low-temperature CO₂ Electrolysis: CO₂ Utilization in Iron & Steel Refining
- 17:10 Valtteri Oksanen, VTT Technical Research Centre of Finland (FI)**
Production of Succinic and Adipic Acids from CO₂ and Ethylene via Electrochemical Carboxylation
- 17:30 Panel Discussion with all Speakers of the Session**

14:30–16:00 Workshops

Room 1

- 14:30 Sarah Bernhardt, Lukas Horndasch & Henrik Basche, PtX Lab Lausitz (DE)**
Assessing Market-Pull Instruments for the EU Chemical Industry

Room 2

- 14:30 Yvonne van der Meer, Seunghye Lee & Alonso Albalade Ramirez, Utrecht University (NL)**
Advancing LCA: Circularity of Bio-based Materials and the Microplastics Challenge

16:30–18:00 Workshops

Room 1

- 16:30 Matthias Stratmann & Ángel Puente, nova-Institute (DE)**
Getting LCA Right for Renewable Carbon: Methodology Challenges in Recycling and CCU

Room 2

- 16:30 Martin Clemesha, Braskem (BR/NL) & Lara Dammer, nova-Institute (DE)**
Creating a Balanced Regulatory Framework Between Renewable Energy and Materials



18:00–18:30, Small Hall

Panel Discussion: Quadruple System Shock as Catalysts for Industrial Transformation

Chairpersons: Christopher vom Berg & Michael Carus, nova-Institute (DE)

18:00 **Marc Borghans**, ING (NL)
Lars Börger, nova-Institute (DE)
Shena Britzen, Rheinmetall (DE)
Janine van Kampen, Ministry of Economic Affairs and Climate (NL)
Ivana Krkljus, BASF (DE)
Jean-Paul Lange, University of Twente (NL)
Volker Strauss, UBA (DE)
Joel Tickner, Change Chemistry (US)

18:00 Networking with Local Beer

19:30 Gala Dinner (Grand Hall)



Day 2

23 September 2026, 9:00–19:00

Fossil-free Plastics

9:00–9:20 Grand Hall

Conference Opening

9:00 **Michael Carus, nova-Institute (DE)**

9:10–10:50, Grand Hall

Bio-based Polymers, Market & Application Development I

Chairpersons: Pauline Ruiz, nova-Institute (DE) & Gillian Tweddle, Stripe Consulting (BE)

9:10 **Michael Carus, nova-Institute (DE)**
Renewable Polymers: Status and Outlook

9:30 **Martin Clemesha, Braskem Netherlands (NL)**
Bio-based Polyethylene Success Story: History, Status and Outlook

Bio-based Polymers, Market & Application Development II

Chairpersons: Pauline Ruiz, nova-Institute (DE) & Gillian Tweddle, Stripe Consulting (BE)

9:50 **Geoffroy Delvinquier, Futerro (BE)**
PLA Success Story: History, Status and Outlook

10:10 **Frank Schöneberger, Fraunhofer LBF (DE)**
From Compostable to Capable: Tailoring Bio-based Polyesters via Additivation

12:30 **Panel Discussion with all Speakers of both Sessions**

11:00 **Coffee Break**

9:10–10:50, Small Hall

Adhesives & Binders

Chairpersons: Nadja Wulff & Lars Börger, nova-Institute (DE)

9:10 **Michael Wilhelm, Henkel (DE)**
Fuelled by Data, Driven by Markets – Henkel Adhesive Technologies' Renewable Carbon Pathway

9:30 **Sanjay Wahal, Decarbonization (US)**
Mycelium-Based Binders and Packaging Materials: High-Performance, Circular Alternatives for Hygiene and Spill-Control Applications

CO₂-based Polymers

Chairpersons: Nadja Wulff & Lars Börger, nova-Institute (DE)

9:50 **Nick Smith, Viridi (UK)**
New CO₂-to-Polymers Catalysts Made for the Industry We Have Today

10:10 **Sergio Santos, TECNALIA Research & Innovation (ES)**
Plastics Sustainability: Synthesis of CO₂- and Bio-based Polycarbonates and Polyurethanes

12:30 **Panel Discussion with all Speakers of both Sessions**

9:20–10:50

Workshops

Room 1

9:20 **Kim Schoppink, Science Based Targets initiative (SBTi) (UK)**
From Ambition to Action: The New SBTi Corporate Net-Zero Standard

Room 2

9:20 **Asta Partanen, Verena Roberts, Anke Schwarzenberger & Christopher vom Berg, Renewable Carbon Initiative (EU)**
Raising Awareness of Renewable Carbon – Global Developments and Communication Strategy

Room 3

9:20 **Tanja Meyer, Bio Base Europe Pilot Plant (BE)**
Making Bio-Based Textiles Competitive: Policy Levers For Industrial Scale-up and Market Uptake



11:20–12:40, Grand Hall

Innovative Bio-based Polymers I

Chairpersons: Achim Raschka & Matthias Stratmann, nova-Institute (DE)

- 11:20 Michaël van der Jagt, polySCOUT (NL)**
Advancing Fossil-Free Polymers Through AI-Powered Polymer Development
- 11:40 Stefaan De Wildeman, B4Plastics (BE)**
Swap or Scrap – Making Europe's New Biopolymers in its Existing Assets
- 12:00 Paul Stockmann, Fraunhofer IGB (DE)**
Caramides – Monoterpene-based Polyamides Scaled for Fibres, Foams, and Cast Polyamides
- 12:20 Panel Discussion with all Speakers of the Session**

12:40 Lunch Break, Networking and Poster Session

14:10–15:50, Grand Hall

Innovative Bio-based Polymers II

Chairpersons: Achim Raschak & Pauline Ruiz, nova-Institute (DE)

- 14:10 Marcus Elmer, Lixea Sweden (SE)**
High Performing Fibres from Annual Crops Through Ionic Liquid Fractionation
- 14:30 Pramod Shankar Kumbhar, Praj Matrix-R&D Center (IN)**
From HA (Hyaluronic Acid) to PHA (Polyhydroxy Alkanolate)
- 14:50 Jouni Lattu, VTT (FI)**
Novel PGA Barrier Polymer
- 15:10 Kazumitsu Suzuki, AC Biode (JP)**
Biogenic and Biodegradable Superabsorbent Polymers
- 15:30 Panel Discussion with all Speakers of the Session**

15:50 Coffee Break

11:20–12:40, Small Hall

Bio-based Coating

Chairpersons: Michael Carus & Christopher vom Berg, nova-Institute (DE)

- 11:20 Thomas Lueder, Beckers Group (DE)**
How to Create a Pull for Renewable Coatings in the Construction Industry?
- 11:40 Tim Kidd, Stahl (NL)**
Beyond the Surface: How Coatings Can Enable the Transition to Renewable Carbon
- 12:00 Sarvesh Poddar, Sustanix Materialtech (NL)**
100% Solid Bio-Coating System to Replace Water/Solvent Based PFAS & Acrylate Systems
- 12:20 Panel Discussion with all Speakers of the Session**

14:10–15:50, Small Hall

Recycled Polymers & Plastics

Chairpersons: Lars Krause & Asta Partanen, nova-Institute (DE)

- 14:10 Delphine Largeteau, Schneider Electric (FR)**
Open, Software-defined Automation as a Catalyst for the Sustainable Carbon Industry
- 14:30 Oliver Borek, Entzimatiko (ES)**
Converting Polyolefins into Monomeric Building Blocks Using Enzymatic Machinery
- 14:50 Andreas Sommerfeldt, Danish Technological Institute (DK)**
From RePURpose to PURfection: Danish Innovation Towards a Fully Circular Economy for Polyurethane
- 15:10 Ulphard Thoden van Velzen, Wageningen University & Research (NL)**
Mechanical Recycling of PLA Based Food Packaging
- 15:30 Panel Discussion with all Speakers of the Session**

11:20–12:50 (CET)

Workshops

Room 1

- 11:20 Pauline Ruiz & Asta Partanen, nova-Institute (DE), Miriam Weber & Christian Lott, HYDRA Marine Sciences (DE)**
Rethinking Plastics in Agriculture and Forestry: The Role of Biodegradable Materials

Room 2

- 11:20 Sarah Refai & Peter Stoffels, CLIB – Cluster Industrial Biotechnology (DE)**
How to Turn Lignin Valorisation Into Success

14:10–15:40 (CET)

Workshops

Room 1

- 14:10 Janine van Kampen, Ministry of Economic Affairs and Climate (NL)**
Policy Options for Sustainable Carbon

Room 2

- 14:10 Andreas Künkel & Patrizia Marie Schmidt, BASF (DE), Miriam Weber & Christian Lott, HYDRA Marine Sciences (DE)**
Quantitative Assessment of Biodegradable Materials in LCIA: Challenges and Solutions



16:20–18:10, Grand Hall

Innovation Award

“Renewable Material of the Year 2026”

Chairpersons: Michael Carus & Asta Partanen, nova-Institute (DE)

16:20 Michael Carus, nova-Institute (DE)

Innovation Award Introduction

16:30 Arthur Groh, KUORI (CH)

A RMC Success Story – Biobased and Biodegradable
Elastomers for Abrasion-Critical Applications

16:40 Christoph Gürtler, Covestro (DE)

Importance of Innovation

16:50 Carmen Danner, AeoniQ Holding (CH)

New Cellulosic Man-made Filament Yarn

17:00 Fanny Liao, Far Eastern New Century (TW)

First Commercially Realised CO₂-based Non-Isocyanate Polyurethane

17:10 Akshaykumar Kompa, Institute for Bioengineering of Catalonia (ES)

Chitin Becomes Stronger in Water

17:20 Oskari Larkimo, Kemira (FI)

Renewable Polymer Technology for Wastewater Treatment

17:30 Vishal Patil, UPM Biochemicals (DE/FI)

Bio-based Circular Renewable Black™

16:30 Nick Smith, Viridi (UK)

Anionic Surfactant Made Using Upcycled CO₂

17:50 Online-Voting

18:00 Christoph Gürtler, Covestro (DE)

Innovation Award Ceremony

18:10 Networking

19:00 Meetingpoint for Networking: Sion im Carré (Brewery), Neue Poststraße 15, 53721 Siegburg



Day 3

24 September 2026, 9:00–16:00

Setting the Frame for Renewable Carbon & Biodegradation

9:00–9:20 Grand Hall

Conference Opening

09:00 Christopher vom Berg, nova-Institute (DE)

9:10–10:50, Grand Hall

Renewable Carbon – Creating Market Pull

Chairpersons: Narendar Poranki & Christopher vom Berg, nova-Institute (DE)

9:10 **Janine van Kampen**, Dutch Ministry of Economic Affairs and Climate (NL)
Critical Chemical Alliance – Lead Markets for Sustainable Carbon Products

9:30 **Tristan Brown**, Molecule Group (US)
An Industry-Driven Framework for Enhancing Sustainable Chemicals and Materials Market Access

9:50 **Ivana Krkljus**, BASF (DE)
Creating Market Pull Through the European Chemicals Resilience Initiative (ECRI)

10:10 **Hans Ingels**, DG Grow (BE)
Insights into Biotech Act II

10:30 **Panel Discussion with all Speakers of the Session**

10:50 **Coffee Break**

9:10–10:50, Small Hall

Biodegradation – Science & Policy Progress

Chairpersons: Svenja Dahl, nova-Institute (DE) & Miriam Weber, HYDRA Marine Sciences (DE)

9:10 **Theodora Nikolapoulou**, European Commission (EU)
Biodegradability in EU Products
Legislation: Case Studies of Fertilising Products and Detergents

9:30 **Florian Matzka**, bündnis Mikroplastikfrei & VÖA (AT)
Disposal – Overall Picture

9:50 **Michael Sander**, ETH Zürich (CH)
From Fundamentals to Function: Scientific Insights into Polymer Biodegradation

10:10 **Jessica Mugleston**, BASF (DE)
Digital Tools for Biodegradation

10:30 **Panel Discussion with all Speakers of the Session**

9:20–10:50

Workshops

Room 1

9:20 **Michael Carus**, Narendar Poranki & Olaf Porc, Renewable Carbon Initiative (RCI) (EU)
Carbon Flows Update 2026, Compilation of Supply and Demand of Fossil and Renewable Carbon for the Chemicals and Derived Materials on a Global and European Level

Room 2

9:20 **Hans-Peter Heim**, University of Kassel (DE)
BeBio2: Durability of Bioplastics for Use in Technical Plastic Products – Overview and Discussion



11:20–12:40, Grand Hall Renewable Carbon – Vision & Strategy I

Chairpersons: Lukas Albrecht & Lara Dammer, nova-Institute (DE)

- 11:20 Marc Borghans, ING (NL)**
The Role of Finance: From Barrier to Enabler
- 11:40 Volker Strauss, Umweltbundesamt (DE)**
A Sustainable Chemicals Economy – a Common Vision and the Need for New Collaborative Approaches
- 12:00 Anastasios Perimenis, CO₂ Value Europe (BE)**
Quantifying the Role of CCU Towards Climate Neutrality in Europe
- 10:30 Panel Discussion with all Speakers of the Session**

11:20–12:40, Small Hall Biodegradation – Applications

Chairpersons: Rick Passenier, NGF Biobased Circular & Pauline Ruiz, nova-Institute (DE)

- 11:20 John Ryan, Sinclair Industries (UK)**
Biodegradable Adhesives for Fruit Stickers
- 11:40 Julie Capsalas, LACTIPS (FR)**
Enosis® by Lactips: Leveraging Biodegradability to Deliver High-Performance Bio-based Materials for Plastics Applications
- 12:00 Ryan Simkovsky, Algenesis Labs (US)**
Biodegradation of Thermoplastic Polyester Polyurethanes Produces Microplastic-free, Plant-enhancing Compost Under Home Composting Conditions
- 10:30 Panel Discussion with all Speakers of the Session**

11:20–12:50 Workshops

Room 1

- 11:20 Guillermo A. Reyes Torres, VTT (FI)**
CO₂ Mineralisation as a Cross-sector Platform Chemistry: Functional Coatings, Carbon-storing Construction Materials, and Industrial Side-stream Valorisation

Room 2

- 11:20 Chiara Bearzotti, European Bioplastics (DE)**
Rethink the Circularity of Your Products! From Biodegradability to Recyclability: Innovators Prove You Can Have Both.

Room 3

- 11:20 Wenda Van Uffelen, TÜV Austria (BE)**
From Certified Products to Trusted ESG Reports: The Hidden Value of Product Certification

12:40 Lunch Break & Networking

14:10–15:50, Grand Hall Renewable Carbon – Vision & Strategy II

Chairpersons: Lara Dammer & Lukas Albrecht, nova-Institute (DE)

- 14:10 Sakari Saarela, UB FIGG (FI)**
Equity Investor Perspectives on New Renewable Materials
- 14:30 Sergio Mastroianni, Syensqo (FR)**
Bio-Industrial Revolution: Generating and Transforming Materials and Products to Sustainable Progress – Examples from Syensqo
- 14:50 Malte Niebelschuetz, Brands 4 Change (DE)**
From Centralized Factory Hubs to Micro-Manufacturing, Rethinking Production for the Renewable Carbon Economy
- 15:10 Michael Carus, nova-Institute (DE)**
Solar Energy and Renewable Chemistry
- 15:30 Panel Discussion with all Speakers of the Session**

14:10–15:50, Small Hall Biodegradation – System Solutions

Chairpersons: Andreas Künkel, BASF (DE) & Anke Schwarzenberger, nova-Institute (DE)

- 14:10 Patrizia Marie Schmidt, BASF (DE)**
Fragmentation of Soil-Biodegradable Mulch Film: The Difference Between Fragments Released from Certified Soil-biodegradable Products and Persistent Microplastics
- 14:30 Christian Lott, HYDRA Marine Sciences (DE)**
Reducing Agriculture's Plastic Footprint: The Role of Biodegradable Plastics
- 14:50 Clayton Bunyard, Kimberly-Clark (US)**
Building the Case for Biodegradable Hygiene Products
- 15:10 Rick Passenier, NGF Biobased Circular (NL)**
A Practice-driven Biodegradation Innovation Cluster for Biopolyesters and Renewable Materials
- 15:30 Panel Discussion with all Speakers of the Session**

15:50 Final get-together

16:00 End of Conference



Poster Session

The poster session will take place at the first floor (booths 32–34) during the lunch breaks of Day 1 & 2.

&SISTERS (UK)

Alessio Massironi

**The Hidden Plastic in Our Daily Lives
Rethinking Superabsorbent Polymers**

AGH University of Krakow (PL)

Weronika Mikoda

**From Biomass Characterization to
Cascade Biorefinery: Palm Kernel Shell
as a Renewable Carbon Feedstock**

AGH University of Krakow (PL)

Aleksandra Hudek-Pietras

**From Industrial Chicory Residues to
Sugar-Rich Hydrolysates:
The Role of Processing History**

Bloom Sustainable Materials (US)

Stephan Slunitschek

**How Do We Address Growing Water
Pollution From Farming and Other
Practices Whilst Also Producing a
Sustainable Bioeconomy?**

ecorbio (CY)

Abhinav Kumar

**Advancing the Energetic Performance
of Upcycled Biopolyol Production
Towards the Green Transition of
Construction Materials via Innovative
Continuous Reactor**

ecorbio (CY)

Lukas Janiunas

**Waste Biomass Conversion System for
Sustainable Marine Applications**

Evonik Operations (DE)

Emily Schweissinger

**Enabling New Circular Solutions For
Chemical Recycling Of Polyurethane
Flexible Foam**

Heraeus Precious Metals (DE)

Franziska Heck

**From Technical Lignins to Functional UV
Absorbers: Catalytic Depolymerization
as a Route toward Renewable Material
Solutions**

Istanbul Technical University (Turkey)

Ozlem Ipek Kalaoglu Altan

**Recycled-Polyester Based Composite
Structures for Textile Management
Applications**

Monash (Australia)

Darsan Haridas

**Transition Metal-Catalysed Strategies
for Nanocellulose Functionalisation:
From Aqueous Photo-ATRP to
Mechanochemistry**

NRW.Energy4Climate (DE)

Regina Dietrich

**Diversity of Solid Carbon Materials
and Challenges for Climate-Neutral
Substitution**

PtX Lab Lausitz (DE)

Viktoria Erfurt

**Simulation of a Fischer-Tropsch Route
for CO₂-Based Naphtha and α -Olefins as
Fossil-Free Chemical Feedstock**

Stockholm University (SE)

Ashin Vadakke Kulangara

**Renewable Cellulose Aerogels for High-
Capacity Direct Air Capture of CO₂**

T.EN Zimmer (DE)

José Canga Rodríguez

**Integrated Scale-Up Methodologies for
Biodegradable Polyesters: T.EN Zimmer's
Approach from Laboratory Innovation to
Market Deployment**

Technical University of Munich (DE)

Alina Kerschbaum

**Spatially Resolved Renewable Technical
Carbon Potential of Biogenic Residues in
Germany**

University of British Columbia (CA)

Pani Rostami

**Sustainable Conversion of Pulp into
High-Surface-Area Activated Carbon
via CO₂ Activation for Energy Storage
Applications**

University of Leeds (UK)

Olivia Skilbeck

**The Effect of Preparation, Dyeing
and Finishing Treatments on the
Biodegradation of Cellulosic Microfibres**

University of Mainz (DE)

Tom Reimers

**Bio-Sourced and CO₂-Based
Polycarbonate Membranes for
CO₂ Gas Separation**

University of the Philippines Los Banos
(PH)

Jey-R Ventura

**Production of Short- and Medium-
Chain-Length Polyhydroxyalkanoates
Using Philippine Cobetia and Aeromonas
Isolates: Media Optimization and
Scale-Up Studies**



renewable-materials.eu/posters

Wie wir die **Kreislaufwirtschaft** verwirklichen



Die Zukunft ist zirkulär – und wir gestalten sie mit. Mitten in Europas stärkster Chemie-Region im Rheinland treiben wir Innovationen und damit die Kreislaufwirtschaft weiter voran – und zwar langfristig mit alternativen Rohstoffen, Energie aus erneuerbaren Quellen und innovativen Recycling-Technologien. **Mehr auf [covestro.com](https://www.covestro.com)**





Nominees for the Innovation Award

“Renewable Material of the Year 2026”

1

AeoniQ Holding (CH) New Cellulosic Man-made Filament Yarn



AeoniQ™ is a revolutionary new cellulosic man-made filament yarn designed as viable alternative to polyester and nylon, retaining all of their positive physical attributes while eliminating their negative impacts. The fibre is made from renewable cellulose sources, such as wood pulp, textile waste or non-valorised agricultural waste. AeoniQ™ uses 100% renewable energy and has a 99.5% closed loop manufacturing process.

In addition to being environmentally sustainable, AeoniQ™ is also biodegradable, and has been confirmed to fully degrade within 12 weeks in soil at the end of its lifecycle. AeoniQ™ is suitable for performance, fashion, home textiles, automotive, and technical applications. The first blue print industrialised production plant will be up and running in Portugal in Q4/2026.

More information: aeoniq.org

2

Far Eastern New Century (TW) First Commercially Realised CO₂-based Non-Isocyanate Polyurethane



TOPGREEN® AirTek PU: As the world's first commercially realised CO₂-based Non-Isocyanate Polyurethane (NIPU), this breakthrough transforms captured CO₂ into high-value elastomers while eliminating toxic phosgene and isocyanates.

Using Far Eastern Group's advanced carbon-capture technology, industrial emissions are converted into intermediates with over 50% CO₂ content, and polymerised into NIPU elastomers, achieving permanent carbon fixation and a 58% reduction in emissions compared to traditional TPU.

TOPGREEN® AirTek PU delivers exceptional performance for membranes, shoe materials, elastic fibres, and artificial leather. Protected by 22 patents, TOPGREEN® AirTek PU has earned global recognition, including ISPO Textrends “Best Product” and Second Place in the Innovation Award “Best CO₂ Utilisation 2025.”

More information: fenc.com

3

Institute for Bioengineering of Catalonia (ES)

Chitin Becomes Stronger in Water



AquaChitin is the first biomaterial shown to become stronger in water. Built from unmodified chitosan sourced from crustacean processing byproducts and urban organic waste streams, it replaces the plastic logic of isolation from the environment with a bidirectional relationship: Water enters and exits the material as part of a dynamic nickel-mediated network, increasing mechanical strength rather than degrading it. The result is a water-stable, biodegradable material platform for films, containers, and wet-use products, produced through water-based, zero-waste chemistry that recovers nickel. Because its biomolecular identity is preserved, AquaChitin is seamlessly integrated in Earth's ecological cycles without special treatment, recovery infrastructure, or human intervention.

More information: jgfermart.com

4

Kemira (FI)

Renewable Polymer Technology for Wastewater Treatment



KemAlpha® is a breakthrough renewable polymer technology for wastewater treatment, enabling the replacement of fossil-based organic coagulants at industrial scale. Derived from alpha-glucan produced from renewable sugar feedstocks, KemAlpha is built entirely on biogenic carbon. Proprietary polymer design delivers the charge density, molecular weight and robustness required for efficient clarification and fine particle removal in demanding municipal and industrial systems. Supplied in liquid and powder formats, KemAlpha integrates seamlessly into existing plants. Commercialised through a joint venture between IFF and Kemira, the technology has proven full-scale performance at a northern European dairy producer, demonstrating renewable materials deliver climate impact and reliability.

More information: kemira.com



5

UPM Biochemicals (DE/FI) Bio-based Circular Renewable Black™



UPM Circular Renewable Black™ is the world's first bio-based, NIR-detectable, carbon-negative black pigment, enabling premium black plastic packaging that remains recyclable while improving sustainability performance without compromising aesthetics. Black plastic packaging has long challenged recycling because carbon black pigments block near-infrared (NIR) detection, making items invisible to sorting systems. Made from renewable lignin, it delivers a deep black while remaining NIR-detectable, enabling recyclable black packaging without compromising design or polymer performance. The feedstock is sourced from sustainably managed forests and supported by FSC™ (C210095), PEFC (04-31-3869) and ISCC PLUS certifications. The product is part of UPM's CO₂-negative solutions linked to its €1.3bn Leuna biorefinery.

More information: upmbiochemicals.com

6

Viridi (UK) Anionic Surfactant Made Using Upcycled CO₂



Vireya™ is the world's first anionic surfactant made using upcycled CO₂. Anionic surfactants are ubiquitous in home and personal care but leave a heavy product carbon footprint. Containing up to 33% CO₂, Vireya™ shows a PCF up to 70% lower than the incumbents, supports compliance with the EU Deforestation Regulation by avoiding the use of oil palm derived materials, and provides the highest levels of skin mildness. It is all made possible by Viridi's unique proprietary catalyst technology that enables CO₂ to be utilised as a carbon feedstock in polymers. Their catalyst is readily scalable in existing chemical assets and is reusable and recyclable. Vireya™ surfactants are being developed at major manufacturers and are on test at the biggest brand owners in the world.

More information: viriditech.com



List of Further Innovations Submitted

for the “Renewable Material of the Year 2026”

Algenesis Corporation (US)

Soleic® Polyurethanes
algenesislabs.com

ALGIECEL (DK)

Nannocel
algiecel.com

Bio Recursive (UK)

EGSHEL
biorecursive.org

Bioweg (DE)

MicBeads100
bioweg.com

Catalyxx Procesos Cataliticos (ES)

Carbon negative bio alcohols from
Catalyxx
catalyxxinc.com

Dahlia Biotech (DE)

Fossil-free Acetic acid and Acetates
dahliabiotech.com

**Deutsche Institute für Textil- und
Faserforschung Denkendorf (DE)**

NUO FlexHolz
ditf.de

Dioxycle (FR)

Dioxycle's Electrolytic Formic Acid
(direct CO₂ > Formic Acid)
dioxycle.com

Econic Technologies (UK)

Polycarbonate Ether Polyols (PCE
Polyols)
econic-technologies.com

Fibenol Imavere (EE)

Woodcell™ crystalline cellulose
woodcell.fibenol.com/from-wood-fibres-
to-plastic-free-burger-boxes

Fiberdom (FI)

Duranova® by Fiberdom
fiberdom.com

HyaPak (KE)

HyaPak Biodegradable Packaging from
Invasive Water Hyacinth
hyapak.com

Kharazmi University (IR)

GeobagPro
khu.ac.ir/cv/311/en

Laboratorios Bioluméa (CL)

NATURECOAT: Bio-based Nanocomposite
Additive
bioluméa.com

**Lukasiewicz Research Network - Institute
for Renewable Resources Chemistry (PL)**

Epoxy vitrimers with Covalent Adaptable
Networks (CANs)
icso.lukasiewicz.gov.pl/en

Mud Rat (US)

Mud Rat Materials
mudratsurf.com

OCO (US)

OCOchem Hydrogen Formate
ocochem.com

Pili AdheSeal (PH)

Pili Seal®
linkedin.com/company/piliadhesel

R3V Tech (UK)

GlycoLoop™
r3vtech.com

SUSMATA (DE)

VSP+ / WASTE
susmata.com

Yarn AI (DE)

Yarn AI
linkedin.com/company/yarn-ai



Conference Advisory Board

We would like to thank the experts of the conference advisory board for their great help in selecting the best submitted papers and innovations.



Tanver Ali
Independent Consultant (UK)



René Bethmann
VAUDE Sport (DE)



Lars Börger
nova-Institute (DE)



Michael Carus
nova-Institute (DE)



Martin Clemesha
Braskem (NL)



Doris de Guzman
Green D Market
Analytics (US)



Dennis Herzberg
CLIB (DE)



Constance Ißbrücker
Gesamtverband der deutschen
Textil- und Modeindustrie (DE)



Lars Krause
nova-Institute (DE)



Ivana Krkljus
BASF (DE)



Andreas Künkel
BASF (DE)



Jean-Paul Lange
Shell Global Solutions (NL)



Christian Lott
HYDRA Marine
Sciences (DE)



Asta Partanen
nova-Institute (DE)



Rick Passenier
Biobased Circular /
GO!PHA (NL)



Ángel Puente
nova-Institute (DE)



Achim Raschka
nova-Institute (DE)



Sarah Refai
CLIB (DE)



Gudbrand Rødsrud
Borregaard (NO)



Alastair Sanderson
Private Expert (UK)



Anke Schwarzenberger
nova-Institute (DE)



Gillian Tweddle
Stripe Consulting (BE)



Christopher vom Berg
nova-Institute (DE)



Miriam Weber
HYDRA Marine
Sciences (DE)

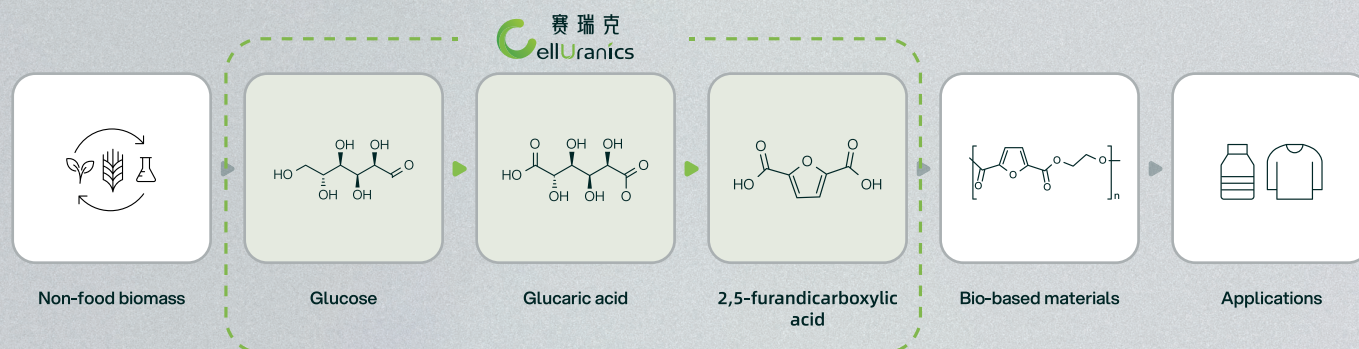


Ann Zhang
nova-Institute (CN)

Your Reliable Partner in Bio-based FDCA & Glucaric Acid

ABOUT CELLURANICS

Incorporated in 2020, CellUranics is an innovation-driven, venture-backed innovator committed to helping decarbonize the chemical industry. CellUranics develops and commercializes low cost, scalable technologies that convert renewable, cheap and abundant feedstocks (e.g., lignocellulose and polycotton) into value-added chemicals.

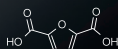


CellUranics offers two core products - glucaric acid (GA) and 2,5-furandicarboxylic acid (FDCA)- designated by the U.S. Department of Energy as two of the "Top 12 Value-Added Chemicals from Biomass". With applications spanning food and beverage packaging, beauty and personal care, water treatment, and performance materials, CellUranics addresses a \$300+ Billion total addressable market.

FDCA

2,5-Furandicarboxylic Acid

CAS NO.
3238-40-2



- HPLC Purity max. 99.999%
- b* min. 0.17
- Total Mono-carboxylic Acids Not Detected

• High-Performance • Cost-Effective • Renewable



Packaging



Film



Fiber



Adhesive

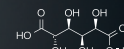


Lithium Battery

GAK

D-Saccharic acid potassium salt

CAS NO.
576-42-1



- HPLC Purity max. 99.67%

• Multifunctional • High-Value • Sustainable



Water Treatment



Surface Treatment



Daily Cleaning Chemicals



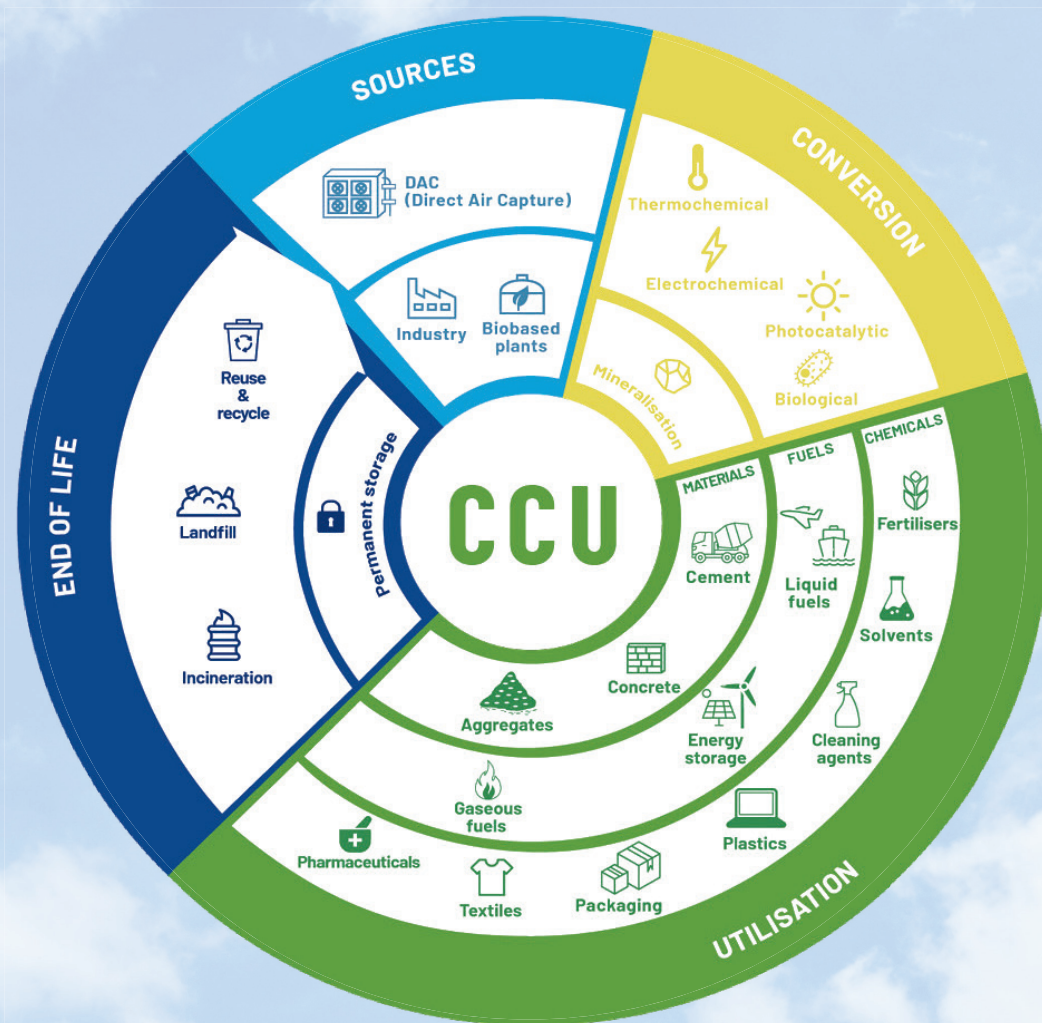
Food Additive



Medical Health



The non-profit association representing the Carbon Capture and Utilisation (CCU) community in Europe



CO₂ Value Europe attracts over 100 pioneer members covering the entire CCU value chain, and develops a vast network of many more organisations and individuals who share the belief that CCU technologies are necessary to help the EU reach climate targets, especially for the hard-to-abate sectors.

GOLD
SPONSOR

HVF 中科国生
GS BIOMATS



FDCA

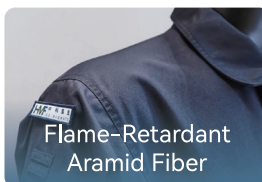
A NEXT-GENERATION SOLUTION FOR SUSTAINABLE PLASTICS

Multi-Functional • High-Performance • Recyclable • Renewable

Proven & Scaled >>>

- ✓ Thousand-ton order delivering
- ✓ High purity $\geq 99.99\%$
- ✓ REACH (EU): Full Registration & Intermediate Use
- ✓ USDA BioPreferred® Certified: 100% biobased
- ✓ Cradle-to-Gate LCA Certified
- ✓ China MEE Regular Registration (New Chemical Substances)

Validated in Multiple Markets >>>



Beyond FDCA >>>

We also offer customized, various, value-added furan chemicals — designed to unlock new performance frontiers in sustainable materials.

www.gsbiomats.com

Contact >>>

Susan Zhu

✉ susanzhu@gsbiomats.com

☎ +86 186 0652 5631

📍 Floor 12, Building 5, No.20 Longquan Road,
Cangqian Street Yuhang Area,
Hangzhou City, Zhejiang province, China

GOLD
SPONSOR



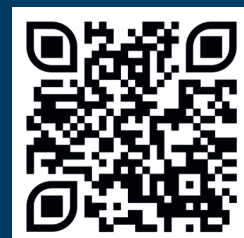
Sustainably Designed. Commercially Ready. Ready to Scale.

IFF's Designed Enzymatic Biomaterials™ platform transforms renewable building blocks into high-performance biomaterials that are ready for commercial applications today.

Visit us to learn how we're helping customers accelerate the transition to renewable materials across home care, personal care, and industrial markets.

Performance. Naturally Better.

©2026 by International Flavors & Fragrances Inc. IFF is a Registered Trademark. All Rights Reserved.



GOLD
SPONSOR



Founded in 2014, Leaf Bio is a global pioneer in next-generation plant-based materials, transforming renewable biomass into high-performance solutions through advanced molecular innovation.

Built on its proprietary FDCA platform molecule, Leaf Bio has created an integrated ecosystem spanning BioFleax®, a plant-based performance materials platform for textiles; ECOPEF®, a high-performance packaging material system; and FDCA, the foundation for a new generation of advanced polymers. Together, they serve applications across packaging, textiles, consumer goods, electronics, and automotive.

Using renewable feedstocks including agricultural residues and end-of-life textiles, Leaf Bio is building a circular material pathway, supported by commercial-scale manufacturing facility.

At Leaf Bio, we believe the future begins with better materials.



Plant-Based



Recyclability



Eco-Friendly

ECOPEF®

Designed to preserve.

A high-performance plant-based material system, protecting the qualities that define every product.



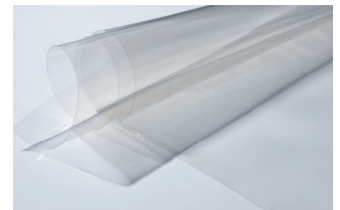
High Barrier



Thermal Resistance



Environmental & Process Efficiency



BioFleax®

Beyond oil, by design.

Performance materials, grown from plants —refined through molecular precision, engineered to scale.



Superior Comfort



Moisture Management



Style Versatility



Nature Antibacterial & UV Resistance



Follow Us

[@Leaf Bio](#) [@BioFleax®](#) [@leafbiotech](#) [@biofleax_byleafbio](#) [@leaf_bio](#)

Contact Us

TEL: +86-178-5732-1465 EMAIL: contact@leafbiotech.com WEB: www.leafbiotech.com

LIVE BEYOND OIL

GOLD
SPONSOR

Verbio
life chemicals

THE BIG BANG OF RENEWABLE CHEMISTRY

Meet us at booth 24



Bio-based innovations for specialty chemicals

Verbio life chemicals has developed a process to produce bio-based specialty chemicals for industrial scale in a wide range of applications.

Our high-performance molecules 1-decene and 9-DAME are obtained from European, bio-based raw materials through innovative catalyst based ethenolysis. We provide products of high purity and versatile functionality which offer a sustainable alternative to fossil-based raw materials.

Our bio-based platform molecules offer a cost-efficient solution. Derived from regional raw materials, they contribute to greater geopolitical resilience and enable products with a reduced carbon footprint.



Our Speaker

Dr. Andreas Kohl
September 22, 2026
3:00 PM

Topic: New plant oil based value chains enabled by metathesis: The first-of-its-kind ethenolysis plant and outlook on what is next



Save the date

October 6, 2026
Opening of the world's first industrial-scale ethenolysis plant for the production of renewable chemicals derived from rapeseed methyl ester

Pioneering green solutions

verbio.lifechemicals.com

Meet us at

Booth 8

Your partner for
sustainable product compliance.



ESPR

Ensure compliance
with the Ecodesign
for Sustainable
Products Regulation.



DPP

Build trusted
Digital Product
Passports.



EPD

Transparent
Environmental
Product
Declarations.



CBAM

Navigate Carbon
Border Adjustment
Mechanism.



FREE

30 min
ESPR/DPP
consultation



WIN
2 HOURS

of expert
ESPR/DPP
consultancy

Let's shape
a circular
future
together.

SILVER
SPONSOR

Conformity assessment and independent
third-party certification of compostable
products based on standards, like EN 13432,
support your market claims along the value
chain.

Ensure clear communication and
trust with our reliable certification
for your compostable packaging.



**Save
the Date**



**ADVANCED
RECYCLING**
Conference

**17–18 Nov
2026**

advanced-recycling.eu



**CO₂-based Fuels
and Chemicals
Conference**

**21–22 April
2027**

co2-chemistry.eu



**RENEWABLE
MATERIALS**
CONFERENCE

**New Date
for 2027**
Coming soon

renewable-materials.eu