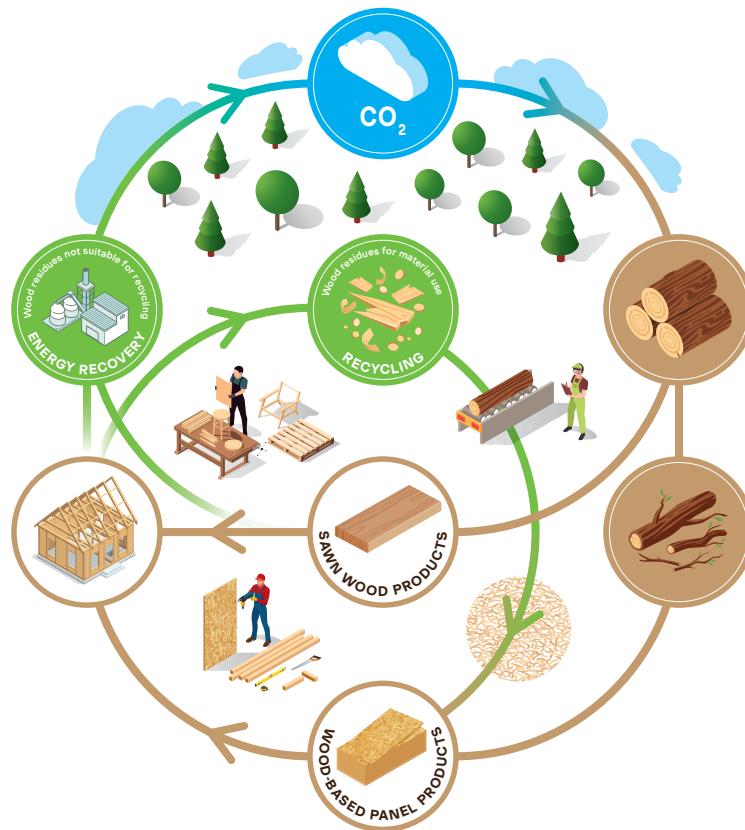




BUILDING A RESILIENT EUROPEAN WOODWORKING INDUSTRY

by anticipating changes, increasing attractiveness, building skills, and promoting inclusiveness



Co-funded by
the European Union

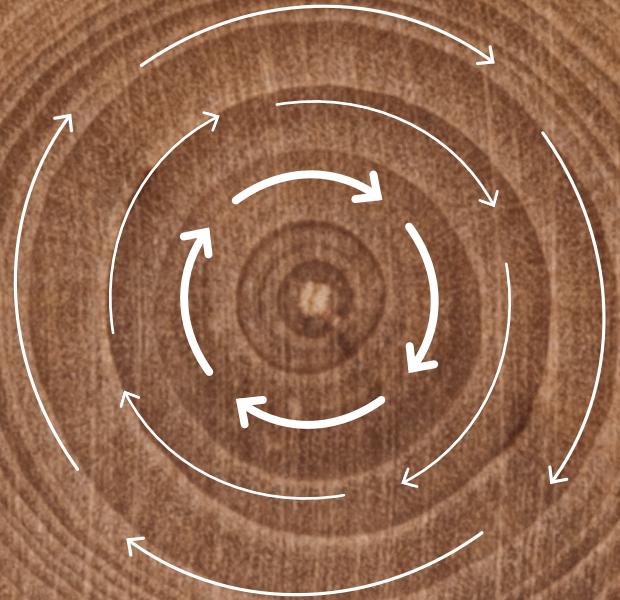
Project funded under the Social Prerogative and Specific Competencies Lines (SOCPL)

Image: The virtuous cycle
of wood ©CEI-Bois

Circularity is our business model

Timber is a natural raw material and therefore follows the biological cycle, with the possibility of recycling as it can be seen in the pictogram. Residues, by-products and post consumers wood can find numerous additional applications as they can be used for the production of other fiber-based materials, such as pulp and paper, oriented strand boards, a number of engineered wood products, and more recently polymers filled /reinforced with wood and other natural fibers.

Overall, wood products and wood applications can foster a green and sustainable growth while playing a key role in decarbonising energy- and emission-intensive sectors, such as construction, plastics, and textiles. The diagram in the picture highlights the well know cycle of uses for wood, developed by all the wood industries.



Contributing to a carbon neutral economy



THE EUROPEAN UNION HAS CLOSE TO 160 MILLION HECTARES OF FORESTS COVERING 39% OF ITS LAND AREA¹ AND THESE FOREST AREAS ARE ONE OF EUROPE'S MOST IMPORTANT RENEWABLE RESOURCES.

Wood has grown in Europe over the last decade. EU forests are exceptionally diverse, with a large variety of forest types and wood species, characteristics and ownership structures. They provide multiple benefits for society and the economy whilst being a major source of biodiversity.

The forest-based industries are a crucial part of Europe's modern industrial fabric and play an integral role in greening many of the 14 industrial ecosystems included in the updated EU Industrial

Strategy. The wood industry is comprised of companies that work with wood as the main material. The industry consists of the entire value chain for lumber – from growing in the forest, being processed and manufactured for its final use, without forgetting re-use. A major advantage of wood and wood-based materials lies in its potential use for substitution of fossil-based materials in various industries, including energy, construction, packaging, or textiles.

1. Sources for 2020 by Eurostat



Forests are more than carbon sinks. They are a vital source of raw material –

WOOD!





The European Woodworking Industries contribute greatly to the EU Green Deal objectives and play a fundamental role in the transition to a sustainable, green, and carbon-neutral Europe.

Through their value chains, the forest-based industries extend upstream into an increasing EU forest resource and downstream into an array of industrial and consumer applications for their products meaning that wood, is having enormous potential to contribute positively to a low-carbon economy, such as to provide a high standard of living from lower levels of energy input and resource consumption.



Investments in the wood-based value chain are important for delivering on the objectives of the European Green Deal and reaching climate neutrality by 2050 as enshrined in the European Climate Law. Greenhouse Gas (GHG) intensive materials and fuels can be replaced by sustainable bio-based alternatives through the application of a cascading principle: long lasting wood-based products can replace GHG intensive construction products such as cement and steel, while wood that is unsuitable for long-lived materials and products, and secondary woody biomass such as sawmill by-products, residues and recycled materials, can be used for short-lived products and also for energy production. This principle is recognised in the Communications on “A sustainable bioeconomy for Europe”, “A Clean Planet for All”, “Sustainable Carbon Cycles” and in the “New EU Forest Strategy for 2030”.

Extract of the Answer given by Executive Vice-President Timmermans on behalf of the European Commission (E-001370/2022)

The woodworking industry relevance



IN 2021 THERE WERE MORE THAN 900 000 PERSONS EMPLOYED WITHIN THE MANUFACTURE OF WOOD AND WOOD PRODUCTS.

The woodworking sector is derived from NACE 1625, Eurostat, and includes:

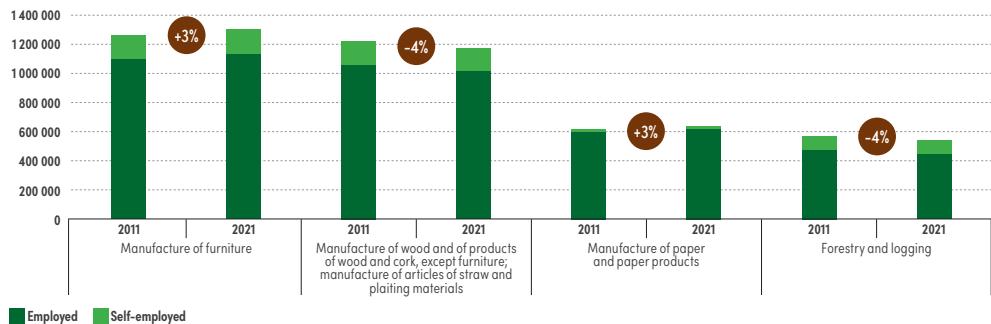
- Primary processing resulting in the production of sawn wood.
- Secondary processing involving wood-based panels, solid-wood products, wooden pallets and other wooden packaging and bioenergy products.
- Tertiary processing to manufacture builder's carpentry and joinery products and wooden flooring or as insulation material

The European Woodworking industries are a complex and labour-intensive sector. They comprise a large number of SMEs, many of which in rural areas.

Woodworking companies are also highly varied, focusing on a wide range of different products, and stages of timber processing along the supply chain. They include sawmills, planning plants, preservative treatment specialists, flooring manufacturers, plywood and other wood-based panel producers, and makers of veneer, joinery, carpentry, construction products, pallets, packaging and more.

Together, some 393 000 enterprises were active in wood-based industries across the EU in 2020; they represented one in five (19%) manufacturing enterprises across the EU. The wood-based industries employed 3.1 million persons across the EU in 2020 or 10.5% of the manufacturing total.

Employment in forestry and wood-based industry in the EU, 2011-2021² (by NACE Rev.2 activities)



2. Source: Eurostat



393 000 enterprises were active in wood-based industries across the EU in 2020



Expected technological changes



THE WOOD INDUSTRY IS KEY FOR A GREEN AND SUSTAINABLE EUROPEAN GROWTH AND IT ALSO REPRESENT AN IMPORTANT ECONOMIC ACTIVITY IN MANY EUROPEAN COUNTRIES, IN PARTICULAR MANUFACTURED WOOD PRODUCTS FOR CONSTRUCTION HAVE SPECIAL RELEVANCE.

In recent decades, the industry has evolved toward more intensive use of digital technologies. And this has passed from traditional automation to the use of industrial revolution, electronics, automation and CAX (Computer Aided X) technologies. Nowadays, **in most European countries basic computer skills are required for all positions.** Digitalization enables efficiency throughout the value chain. From forestry and raw material sourcing, forestry practices, through the entire logistical production chain to the end product at retailers with traceability according to the new EUDR Regulation

For example, although sawmills still turn logs into wood products, modern technology has revolutionized the operations at sawmills. Advanced machinery and a high degree of sophisticated automation are improving overall efficiency at every step of the process. High-speed lumber sorting systems, machine vision, lasers and scanners guide the logs on tracks, and optimise the cutting process, determines the grade and guides to the optimal way to cut the logs, ensuring high resource efficiency.

The development of measuring technology help improving the raw material yields and labour productivity. With new investments into equipment and machinery, the outcome is usually a rise in productivity for both in the raw material use as well as labour.

Additionally, the development in technology can improve the industry capabilities to improve the quality throughout the production process and to continue to deliver smart, environmentally friendly products and services through improved digital manufacturing systems and with an increased resource-efficient way.



The woodworking industry needs to invest in higher quality technologies such as automation, sensors, data analytics, and robotics to improve operational efficiency, reduce waste, increase output and improve safety and working conditions.



Woodworking industry outlook in times of crisis

DIGITALISATION, ROBOTISATION AND GLOBALISATION HAVE TRIGGERED PROFOUND SHIFTS ACROSS EUROPE IN HOW PEOPLE LIVE AND WORK.

The coronavirus pandemic has accelerated these beyond what could have been predicted.

Parts of the forest-based industry developed relatively well during the pandemic years, driven by an increased domestic focus. Woodworking manufacturers have largely weathered the COVID-19 storm safely and most quickly returned to full production levels. The immediate effects of the pandemic on the demand for lumber were positive. As a result of the pandemic, consumers all over the world were stuck at home. They were unable to go on holidays or spend money in traditional entertainment venues such as restaurants and cinemas, instead focusing their expenditures on accessible areas like their homes. Central banks put in place very accommodative monetary policies and governments passed huge stimulus programmes. The Do-It-Yourself sector experienced an unprecedented boom that drove up demand and production of sawn wood, wood panels and flooring.

Nonetheless the woodworking industry also experienced challenges linked to the pandemic such as limited labour availability and logistics (deliveries were especially difficult and there was a shortage of truck drivers).

After a robust recovery in 2021 and the first half of 2022, EU labour markets faced in 2022 uncertainties related to the impact of Russia's war of aggression against Ukraine and strong inflationary pressures.

For softwood lumber availability in the EU, the impact of the war in terms of imports is significant. The EU in 2021 consumed about

83 million m³ of sawn softwood. Of this, 4.5 million m³ was imported from Russia, 1.1 from Ukraine, 2.6 million m³ from Belarus. Altogether the market share of the three countries at war Russia, Ukraine and Belarus is slightly below 10%. This created a concern about the availability of wood products in Europe as Russia has been the world's largest exporter of wood products.

The war also brought new cost shocks such as rapidly rising energy prices. The increasing energy prices have obviously taken a heavy toll on the European woodworking industry. When it comes to demand, the high energy prices and inflations pushed central banks to sharply increase interest rates on both sides of the Atlantic which in turn caused mortgage rate to rise. This had a depressing effect on demand in the construction markets.



Raw material securing and availability remains a challenge in Europe: The industry needs to adapt to a new situation where softwoods will be less abundant in Central Europe and hardwoods, in particular species as of today, underutilized, will be more and more available.

Responsible forestry management, energy efficiency, and waste reduction to meet the growing demand for environmentally friendly products will be key.

Gender balance in the woodworking sector



GENDER EQUALITY CONTINUES TO IMPROVE WITHIN THE MANUFACTURING AND CONSTRUCTION INDUSTRIES, ALBEIT AT A SLOW PACE.

The woodworking industries, like many other trades, have stereotypically been practiced by men although the share of women employed by the industry is slowly growing.

Some countries have recorded a higher percentage of women workers than others due to various factors such as national policies, cultural norms, and labour market conditions.

In most cases, women are employed mainly in administrative and support functions, while in other cases they work in production jobs for quality management.

There is still a significant gender gap in the woodworking industry, and more efforts need to be made to promote gender equality and diversity in the sector.

There are many challenges to the further integration of women in the sawmill industry, including:

- Perceived gender bias: Women may perceive the industry as being predominantly male dominated, which may discourage them from pursuing a career in the sector.
- A gender pay gap is still a reality and concerns our sector as well.
- Long-working hours: The industry may require long working hours and inflexible schedules, which might not be compatible with family life and other commitments.
- Limited job opportunities: Many women may not be aware of the job opportunities available in the sawmill industry or may not have access to the relevant training and education necessary for these jobs.
- Stigma attached to manual labour: There is still a stigma attached to manual labour jobs, which may discourage women from pursuing careers in industries like the sawmill industry.



In Sweden in the sawmill sector in 2022, the proportion of women was 11.7% and 88.3% men.

In France the proportion of women is estimated around 25%.

In Belgium, the proportion of women in the wood industry is only 9%. In wood education, we see that only 5,30% that starts an education in woodworking, is female. In the total of graduates from woodworking education, only 3% is female.



Increasing the attractiveness through education and skills development



EUROPE IS UNDERGOING PROFOUND CHANGES WITH THE TWIN DIGITAL AND GREEN TRANSITIONS.

World Economic Forum estimates that, by 2025, 50% of all employees will need upskilling due to adopting new technology. A third of the essential skills in 2025 will consist of technology competencies not yet regarded as crucial to today's job requirements. Adding to that the demographic changes and in particular, the ageing and ever-changing demography of the European population and workforce, also described as labour shortage or tight labour markets, has major consequences for employment, skills, and economies, making it even more difficult because industries in Europe tend to compete amongst each other for the same available workforce.

Upskilling the workforce with green and digital skills is key to successfully navigate labour market changes and ensure the competitiveness of the woodworking sector. Developing new and diverse education programs and promoting innovative curricula should be seen as education's primary goals in order to place on the market skills and knowledge needed for an entrepreneurial culture. On one hand companies will have to increase effort in stimulating the motivation of their workers and providing professional opportunities and invest in training. On the other hand, the workforce will need to adopt a new mindset of continuous learning (lifelong learning).

Life-long learning for all should become a reality. Acknowledging that education and vocational training is an individual right, enabling people to participate actively as a citizen in social life and well trained and as much as possible independently in the economic field, our sector takes its responsibility to provide training opportunities and to increase its related capacities in connection with the related technological evolution.

The advancement of new technology has accelerated the upskilling requirements. This means not only new skills for the future workers but also making sure that the existing workforce is trained and equipped with the necessary knowledge in order to adapt to new arriving technologies and forms of work. **It is very important that no one is left behind – new workers and existing ones.**



The advancement of new technology has accelerated the upskilling requirements.

Training and upskilling are essential steps towards addressing skills needs. However, it is important to acknowledge that the challenge of labour shortage is complex and goes beyond training alone. It is influenced by demographic and technological changes. There are many obstacles when addressing the needs of skills in the woodworking industry such as:

- Attractiveness of the sector
- Working conditions linked to physical and manual labour, occupational health and safety, working time arrangements and pay
- Lack of visibility and understanding of woodworking career opportunities
- Old fashioned image and outdated perceptions

In Sweden the crises did not change anything in the educational elements or the needs. During the pandemic and the energy crisis, investment in training, hot work, sorting training and lifting training was on the rise. **With the pandemic, the industry adapted its needs through an increased use of digital educational efforts.**

In Belgium in 2022, there is only 10% of the labour force (within 20% of the companies in the sector) that has registered any training. More than 33% was older than 45 years. The average duration of a training was 65 hours.

In general terms the image of VET in Europe performs comparatively poor against general education. VET is still seen as a second choice and for second-rate students, although it could be a good opportunity for career reconversion. This coincides with a gradual disregard of traditional craftsmanship in our societies. In consequence,



today's high demands of those professions in terms of knowledge and skills are not realized, youngsters do not see the actual perspectives of these professions and focus on university degrees. This is why more investment in VET is needed. Training providers, companies and trade unions need to work together to develop future-proof curricular. Companies need to provide well-educated trainers and tutors for the apprentices, equipped with sufficient time and resources. **Furthermore, the permeability between vocational education and university needs to be fostered, to make craftsmanship again more interesting and to provide career paths during the professional life.**

Making VET more attractive to young people in Europe will be key in addressing the skills gaps and meeting the expectations of both the students and employers.

(In Belgium, after some years of light decline of the number of students in woodworking education (-10% over 5 years), we see some progress in the number of students (+2%) since 2021.)



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About the project



RESILIENTWOOD: ANTICIPATE CHANGES, INCREASE ATTRACTIVENESS, BUILD SKILLS AND INCLUSIVENESS IN THE WOODWORKING INDUSTRIES IN TIMES OF CRISIS

The European Confederation of the Woodworking industries (CEI-Bois) led project, together with the European Federation of Building and Woodworkers (EFBWW), Woodwise and FCBA aims to offer recommendations to tackle specific challenges in the Woodworking Industries through strengthened social dialogue.

CEI-Bois and EFBWW are the official recognised European Social partners for the woodworking sector and as such participate jointly the woodworking dedicated European sector social dialogue committee meeting.

The project builds on a strong transnational dimension. To implement it the partners will conduct research and collect data from 5 countries (Belgium, France, Croatia, Italy, Sweden) and the European Sawmill sector, identify key findings, share best practices and propose strategies on how to tackle the above-mentioned social challenges of the WI in Europe.

The project is further supported and implemented by EOS, the Croatian Wood Cluster, FILCA-CISL and the Union of Forestry, wood and graphical workers.

OBJECTIVES:

➤ Provide social partners with an overview of the latest developments of the woodworking sector in Europe, including the economic impact of the Covid-19 pandemic, as well as expected technological and organisational changes within woodworking companies.

➤ Develop recommendations and guidelines for companies, VET and public authorities to overcome the above-mentioned challenges, to be presented in the final report and final conference of the project.

➤ Stimulate the joint social partners' discussion on 4 specific issues through dedicated workshops (Adaptation of the industry and outlook after the Covid-19 pandemic and crisis, gender equality in the industry, expected technological changes in the industry and adaptation needs, increasing the attractiveness of the sector through education).

➤ Disseminate results within and outside the membership base of the European social partners of the woodworking sector.

Consortium partners

The European Confederation of Woodworking Industries (CEI-Bois): CEI-Bois represents 21 European and National organisations from 15 countries and is the body backing the interests of the whole industrial European wood sector: more than 180.000 companies generating an annual turnover of 152 billion euros and employing 1 million workers in the EU.

The European Federation of Building and Woodworkers (EFBWW): The EFBWW is a European trade Union Federation with members in the Building, Building Materials, Wood, Furniture, Forestry and allied sectors. The EFBWW represents blue and white collar workers from 76 national trade unions in 34 countries.

The Institute of Technology Forêt, cellulose, bois-construction, ameublement (FCBA): As an industrial technical centre, FCBA's mission is to promote technical progress, to participate in the improvement of yield and to guarantee quality in the industry. Its field of action covers the entire forestry-wood and furniture sectors: forestry, logging, sawmills, pulp and paper, wood-based panels, carpentry, structures, furniture, packaging and various products. It also works with various suppliers in these sectors. As a privileged partner of companies, FCBA is attentive to their technical and economic environment, to help them integrate technological innovations and adapt to the rapid evolution of markets.

Woodwise: Woodwise is the paritary sectoral organisation for wood and furniture sector in Belgium. WOODWIZE knows the Belgian timber and woodworking sector inside-out, and we'd love to pass this knowledge on to employers and workers, teachers and students! Our training

courses, information sessions and professional services help to make this sector both sustainable and safe. Looking for someone to show you the ropes? No-one is better able to help than we are! Got any questions about Health & Safety when it comes to woodworking? WOODWIZE is the ideal place to get them answered!

The European Organisation of the Sawmill Industry (EOS): EOS consists of national sawmill-federations and associates members from 11 European countries, representing 80% of the EU sawnwood production.

The Croatian Wood Cluster (Hrvatski Drvni Klaster, CWC): Croatian Wood Cluster is the oldest industrial cluster in Croatia, established in 2003 by following the bottom-up approach. CWC acts on the national level as a triple-helix organization, and has about 60 members from all sectors related to the forest-based industries value chain. Main objectives are enhancing sustainability and competitiveness of the sector, by encouraging innovations, investments, research, knowledge and technology transfer.

Federazione Italiana Lavoratori Costruzioni e Affini (FILCA-CISL): Italian sectoral union representing construction, wood, cement, brick, marble and stone workers. It is affiliated to CISL (Italian Confederation of the Workers' Unions) and represents around 243.000 workers in Italy. It is present in all provinces in Italy.

The Swedish Union of Forestry, wood and graphical workers (Facket för skogs-, trä- och grafisk bransch, GS): GS was established in 2009 and organizes workers in the forestry, woodworking and graphic industries in Sweden.



European Federation
of Building
and Woodworkers



WOODWIZE



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