

SERVICE LIFE PERFORMANCE OF COATED WOOD PRODUCTS: PERFORMANCE, DETERIORATION AND MODELLLING

International Workshop for Developments on Micro-credentials in line with the New European Bauhaus





8 and 9 August 2023

VENUE

InnoRenew CoE Livade 6a, 6310 Izola

ATTENDEES

WoodLCC, ARCHI-SKIN and NEBAP Hub members

MEETING MODE

in-person and online (via Microsoft Teams)

OBJECTIVES

The workshop aims to exchange expert knowledge and experience regarding modelling the aesthetic service life of coated wooden surfaces. The vision is to integrate various aspects of coating performance with the building's overall service life framework, including environmental, aesthetic, and economic viewpoints. The results of the workshop will contribute directly to the ambition of the WoodLCC project. The workshop will also boost innovative solutions and provide strategic directions for further research in wood coatings. The workshop is a collaboration between project WoodLCC, ARCHI-SKIN and the New European Bauhaus Academy Pioneer Hub, towards promoting optimal technological solutions and sharing of best practices.





9.00-9.05	Welcome (Anna Sandak, Andreja Kutnar)
9.05-9.30	Introduction of participants (all)
9.30-10.45	Part 1: State-of-the-art coatings on wood exposed to natural weathering
	Overview of wood coating types and market trends (Holzforshung)
	Declared/real maintenance intervals and recommended procedure (Holzforshung)
	Typical service lives of wood coatings depending on the coating formulation (Holzforschung)
10.45-11.00	Break
11.00-12.30	Part 2: Understanding service life of wood coatings
	Aesthetic and performance limit states (Jakub Sandak)
	Typical failure modes for wood coatings (Holzforshung)
	Environmental and economic impacts of wood surface coatings (discussion)
12.30-14.00	Working lunch
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12.30-14.00 14.30-16.00	Working lunchPart 3: Modelling service life of wood coatingsMethodology for the SERVOWOOD-SLP modelling approach (Holzforshung)Methodology for the BIO4ever modelling approach (Jakub Sandak)Methods of addressing exposure time as a function of degradation-promoting conditions for service-life planning of wood and coating systems (Philip Bester van Niekerk)
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12.30-14.00 14.30-16.00 16.00-16.15 16.15-18.00 18.00-19.00	Working lunchPart 3: Modelling service life of wood coatingsMethodology for the SERVOWOOD-SLP modelling approach (Holzforshung)Methodology for the BIO4ever modelling approach (Jakub Sandak)Methods of addressing exposure time as a function of degradation-promoting conditions for service-life planning of wood and coating systems (Philip Bester van Niekerk)Estimation of material costs and labor time for maintenance of coated wood surfaces (discussion)BreakVisit of InnoRenew CoE laboratoriesPartners' discussions/free time









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MEETING AGENDA

	Part 4: Digital solutions for service life modelling, planning and simulation
9.00-11.00	Integration of the coating service life in context of the whole building performance - challenges (discussion)
	BIM - Building Information Modelling: is it an ultimate implementation? (Richard Acquah)
	ClickDesign - simple tool for predicting service life duration (Jonas Niklewski)
	What is really desired by researchers, architects, users - expectations for the perfect tool (discussion)
11.00-11.30	Break
11.30-12.15	Part 5: Directions for further research in wood coatings
	Performance of coated wood and derived materials - trainings content for the construction ecosystem (Andreja Kutnar)
	Future trends in coatings' development - ARCHI-SKIN project (Anna Sandak)
12.15-12.30	AOB
12.30-14.00	Working lunch
14.00-18.00	Networking session
19.00-21.00	Dinner

Note: Each presentation within Part 1 to Part 5 is foreseen as approximate 30 minutes (including discussion), but the timing, sequence, and content will be dynamically adjusted depending on the moderator and participants.

