

Project T6

Objectives

- Understand the global Life Cycle Assessment (LCA) needs for advanced and emerging materials to support future standardisation initiatives
- Initially assess the global composite industry regarding LCA and facilitate the development of improved regulations and standards

Background

Life cycle assessment (LCA) is a systematic evaluation of environmental impact of a product, process or service throughout its entire life cycle. By examining its entire lifecycle – from raw material extraction to disposal – LCA provides valuable data to inform sustainable decision-making.

Standardization Needs

LCA, a data-intensive methodology, can yield disparate results due to a lack of standardisation. Challenges pertaining to methodological inconsistencies, data quality, transparency, and reproducibility are frequently discussed but remain unaddressed on a global scale.

Deliverables and Dissemination

By identifying the most common issues faced by industry, users and research

institutes, the aim is to bridge the gaps in current methodologies and facilitate the development of improved regulations and standards.

Work Programme

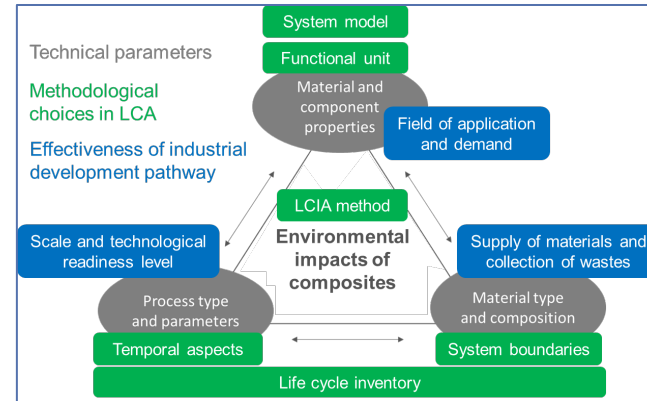
The initial project is proposed to address the global challenges hindering accurate LCA implementation within the composites industry.

Statistical analysis of the results from participants will be conducted as consistent with ISO/TS 5725.

- Review existing studies on LCA of fiber-reinforced polymer composites
- Undertake a consultation exercise within the global composites community (academia and industry)
- Analyze survey results for a joint publication in a scientific journal
- Outline recommendations for the conduct of LCA in the composites industry



Call for Expressions of Interest



Technical, methodological and industrial aspects when conducting LCA of composites

How can technical aspects at industrial scale be incorporated in methodological choices in LCA to produce meaningful results guiding the path to sustainable development?

Funding

Participants fund their own involvement in the study. The international collaborative partnerships that VAMAS fosters, pave the way for future standardisation initiatives.

Status

The working group is actively looking for members. We understand that your time is valuable, and we are flexible regarding the level of involvement required. We are particularly keen to welcome members from North and South America, Asia and Africa to ensure global coverage.

References

- ISO 14040:2006 “Life Cycle Assessment – Principles and framework”
- ISO 14044:2006 “Life Cycle Assessment – Requirements and guidelines”

Register your interest



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