



Topic of the Speech:

Evaluation of Functionality of Hemp Clothing

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Dr. Malgorzata Zimniewska works at the Institute of Natural Fibres & Medicinal Plants. She graduated from Textile Faculty, Mechanical Technology of Fiber at the Technical University of Lodz. Her PhD Thesis was completed with honours at the Technical University of Łodz in 2006 and habilitation in 2016. She received a title of Assoc. Prof. of Institute of Natural Fibres & Medicinal Plants in 2011.

Malgorzata Zimniewska was a director of the Institute of Natural Fibres & Medicinal Plants 2018 – 2021 and worked as Head of Department of Innovative Textile Technologies and the Laboratory of Physiological Influence of Textiles on Human Body at the Institute of Natural Fibres & Medicinal Plants. Her main area of interest is development of natural lignocellulosic fiber processing, technologies and evaluation, to meet the specific needs of different fiber applications. M. Zimniewska's favorite study is related to development of pro-healthy textiles with positive influence on human physiology and evaluation of their effect on the body. She also lead a research team working on bast fibers application to reinforce composites.

Malgorzata Zimniewska has been a Member of Advisory Council of BIOEAST Board - Central and Eastern European initiative for knowledge-based Agriculture, Aquaculture and Forestry in the Bioeconomy, expert of BIOEAST Foresight for the bioeconomy in the CEE region, she has served as vice chair of Quality Control for Research Executive Agency, Future and Emerging Technologies in H2020, European Commission, she is a member of Working Group on Fibres and Textile, EIHA European Industrial Hemp Association.

She has got CText FTI - Award of Professional Qualification of The Textile Institute, she is a Member of the Textile Institute Council. She served as a Chair of DNFI - Discover Natural Fibers Initiatives Network from 2013 to 2016, also as an Expert of Task Force on the Challenges from Competing Fibers of International Cotton Advisory Committee in USA, Expert of European Technology Platform for the Future of Textiles and Clothing EURATEX, and Expert of the National Centre for Research and Development in Poland.

Malgorzata Zimniewska has led many international, European and national projects.

She has authored and co-authored more than 150 articles published in research journals, conference proceedings and book chapters. She is a co-author of patents, which were awarded with 4 gold, one silver and one bronze medals at international innovation exhibitions and of President of Polish Chamber of Commerce Award KIG INNOVATICA 2010. She was also awarded with Silver Cross of Merit, 2010.

Evaluation of Hemp Clothing Functionality

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ABSTRACT (NO MORE THAN 500 WORDS:)

Textile market trends in recent years have been characterized by strong interest in use of biobased textile fibers.

Hemp is the most desirable fibers among of natural ones. Sustainability of hemp plant growing and processing as well as possibility to cascade use of hemp biomass causes that hemp is important plant for bioeconomy.

Value chain covering all processes from plant to fabric is challenge for European industry.

The aim of this study was analysis of properties of the hemp clothing based on comprehensive approach to the characteristics of raw material and long fibers processing. Results of the research proved the potential of hemp fibers for clothing high functionality purpose.