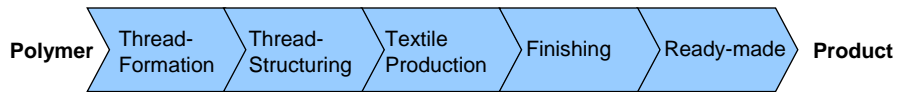


Institut für Textiltechnik der RWTH Aachen (ITA)

Textile Research



ITA Facts

- 71 years ITA
- 60 Staff Members
- 4 current EU-Projects



1

Smart Textiles at the ITA



- Fibrous sensors und actors



- Processing to textile structures
Hybrid yarns, various fabrics



- Assembly technology (sewing, gluing, bonding)



- Measuring Technology



- Applications, Prototypes, marketing strategies



2

Mobile Nutritional Condition Monitoring for Therapie Support

Current situation

- Cancer often comes with a rapid weight loss (cachexia)
- 20 % of the patients die from malnutrition and not directly from the tumour
- There is no reliable monitoring system for the nutritional condition commercially available



Cachexia

Objectives

- Body composition analysis
- Monitoring of food and water intake and consumption
- Reliable textile electrodes and conductors in near-skin clothing
- Features: Integrated in garment, mobile, easy to use, 24/7, washable, comfortable



Textile Conductors



3

Mobile Nutritional Condition Monitoring for Therapie Support

Consortium

- Medical analysis, sensor technology
*Philips Chair for Medical Information Technology,
RWTH Aachen, Germany*
- Microelectronic system
Electronics Laboratory, ETH Zürich, Switzerland
- Textile integration and production technology
ITA, RWTH Aachen, Germany

Contact

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