

## **Removing finishing chemicals from outdoor acrylic textiles**

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To improve the sustainability of our society, it is necessary to close the loop of our economy – this means reusing and recycling materials. Yet recycling is still not tackled appropriately in the EU, as landfill and incineration rates remain high. One of the reasons for the lack of recycling is that recycled, secondary raw materials are often of a lower quality than virgin materials, due to contaminants or damaging recycling treatments. Outdoor acrylic fabric, for example, is often treated with water-repellent and wrinkle-resistant finishes, that need to be removed in a non-damaging way to guarantee high quality recycled acrylic fibres.

In this speech, results from the REACT project will be presented, showcasing the strategy used to remove these finishing chemicals with innovative treatment and evaluation techniques at laboratory scale. These techniques are currently being upscaled, to obtain fully recycled acrylic textiles of excellent quality.