

# PHA-COATED PAPER



## WHAT IS PHA?

Natural PHA (Polyhydroxyalkanoate) is a family of biodegradable, water-insoluble biopolymers. Serving as a renewable, carbon-based alternative to fossil-fuel plastics, PHAs offer a compostable and marine-safe solution for various applications, including packaging and agricultural uses. With properties similar to traditional plastics, these eco-friendly polyesters support a circular economy by reducing plastic waste and contributing to sustainable, bio-based product systems.

## WHAT IS PHA-COATED PAPER?

PHA (Polyhydroxyalkanoate)-coated paper is an innovative, eco-friendly material designed to provide a water-resistant barrier while remaining fully biodegradable.

### BENEFITS



water  
repellent



biodegradable  
in soil



plastic free

### WASTE DISPOSAL PATHWAY



PHA-coated paper  
should be able to be  
landfilled or composted  
after use.



### TARGET LITTER

Substitutes PE-coated paper, which  
degrades into microplastics.



### IMPACT

Reduces microplastic pollution  
caused by PE film fragmentation.



### TARGET AUDIENCE

Packaging industry, in particular  
food packaging industry (paper cups  
& lids, disposable food boxes, etc.)



### ENVISIONED APPLICATION CASES

Biodegradable food and non-  
food packaging



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## THINGS TO MONITOR

- Appearance
- Quality
- etc.



## IMPLEMENTATION STEPS

The technology is still under development, and the steps for full implementation have not yet been completely defined. Further research and refinement are required to establish a clear pathway for deployment.



## CONTRIBUTION TO THE INSPIRE PROJECT

The INSPIRE project, funded by the European Union's Horizon program, is a pioneering initiative aimed at contributing to the drastic reduction of litter, macro and microplastics in European rivers in a holistic approach, by utilizing a series of detection, collection and prevention technologies and actions. This solution directly reduces microplastics accumulation in the environment. Learn more at <https://inspire-europe.org/>

## CONTACT

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