

# Would you buy a new type of blood bag?



With financial support  
from EU's Life+ programme

Healthcare is succeeding in phasing out hazardous substances. There are many examples<sup>1</sup>, but currently no acceptable PVC-free blood bag for red blood cells is available on the market. Today's bag is made of PVC (polyvinylchloride) and has up to 40 percent plasticizer, to make it soft. The most commonly used plasticizer in blood bags is the phthalate DEHP, di(2-ethylhexyl)phthalate, which is classified<sup>2</sup> as a reproductive disruptor<sup>3</sup> and is also forbidden in toys.<sup>4</sup> The risks of DEHP are emphasized in the directive for medical devices.<sup>5</sup> Demanding PVC-free blood bags means avoiding potential risks from new plasticizers, which is a precautionary act as the consequences of new plasticizers cannot be predicted.



## Welcome – join us in demanding a PVC-free blood bag

Help us to increase awareness and disseminate knowledge.

- Sign the petition
- Join the Linked-In group: [PVCfreeBloodBag](#)
- Learn more at [www.pvcfreebloodbag.eu](http://www.pvcfreebloodbag.eu)

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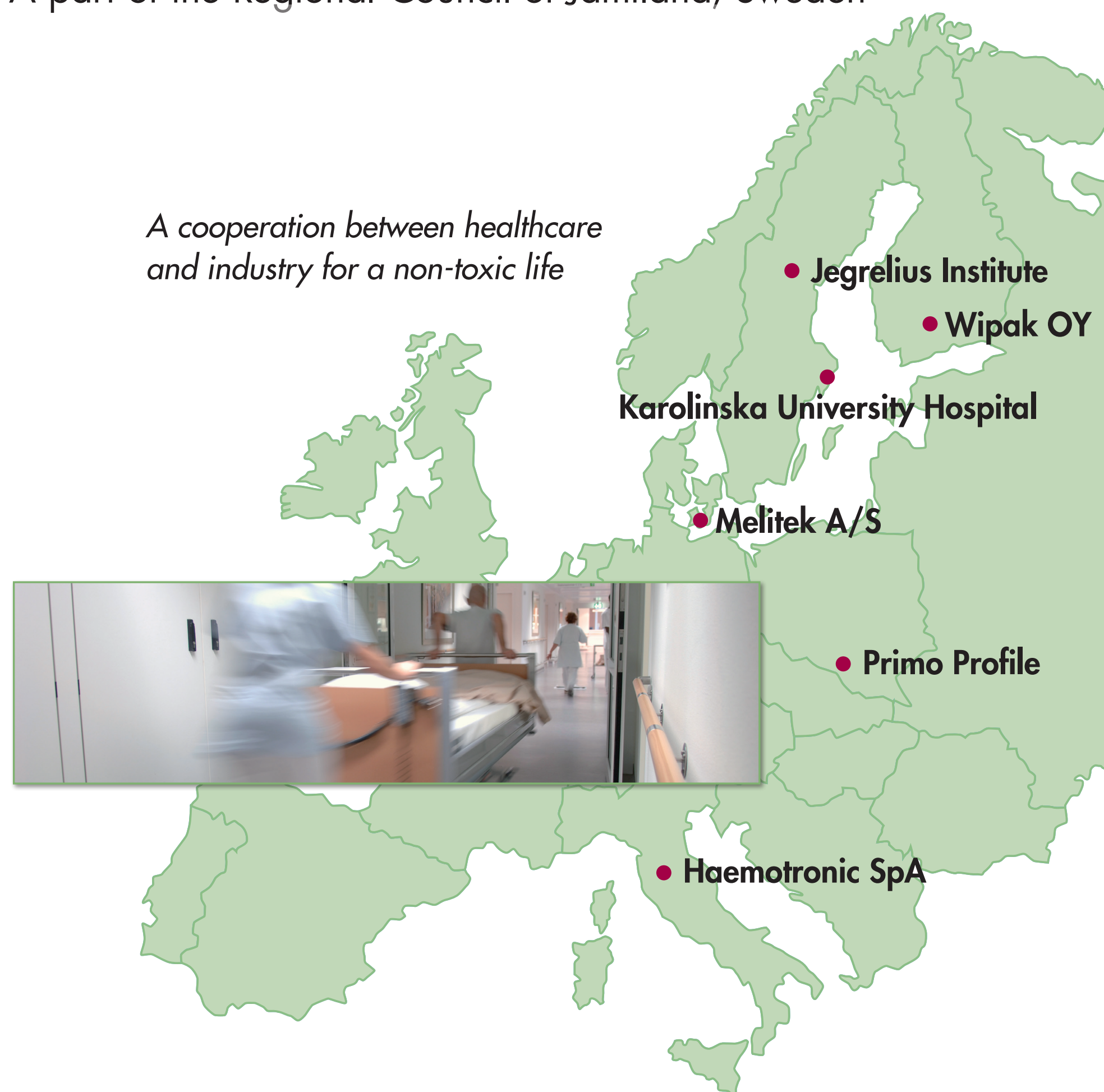
A part of the Regional Council of Jämtland, Sweden

## Benefits of a PVC-free blood bag

- Minimised patient exposure to potentially hazardous substances
- A better working environment for both manufacturers and hospital employees.
- Long-term health improvements
- Spin-off effects on other products means less overall exposure
- From a life-cycle perspective, there is less impact on the environment from hazardous substances
- Reduced need to clean smoke from controlled waste combustion, thus decreasing the use of resources and contributions to climate change
- Reduced long-term costs in health care due to a healthier population
- Less costs for handling toxic waste

**One challenge to the introduction of safe blood bags in healthcare is a lack of clear demand; in order for the old bags to be phased out, demand for a safer alternative must increase.**

*A cooperation between healthcare  
and industry for a non-toxic life*



1. The Substitution list: [www.msr.se/PageFiles/10127/substlista\\_EN\\_120921.pdf](http://www.msr.se/PageFiles/10127/substlista_EN_120921.pdf)

2. Directive 67/548/EEC (28th ATP) According to Annex 1

3. Repr. Cat. 2; R60-61 "May impair fertility and may cause harm to unborn child"

4. EU directive 2005/84/EC

5. EU directive 2007/47/EC

6. Raul Carlson, Life Cycle Assessment 2012-03

7. The full title of the project is "Public healthcare and plastic makers demonstrate how to remove barriers to PVC-free blood bags in the spirit of REACH"

**PVCfreebloodbag** is a project within the EU's Life+ Environmental Programme. It started in September 2011 and will end in March 2016.

The objectives are

- To demonstrate that it is possible to produce a PVC-free blood bag that fulfils requirement specification, including CE-labelling.
- To increase demand by cooperation with European health care by disseminating knowledge and awareness.

The four European companies participating in the project, Melitek A/S, Wipak Oy, Primo Profile and Haemotronic SpA, will work together to produce a PVC-free blood bag. Karolinska University Hospital is responsible for evaluating the bag. Jämtland County Council is in charge of the handling test of the bags.