## Global Market Entry Strategies for Remanufactured Coffee Machines: A Regulatory View

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Remanufacturing is a key strategy in the circular economy to enable companies to realize their sustainability goals. Various industries practice remanufacturing, including the electrical and electronics industry. Thermoplan AG is committed to this topic and thus supports this project in which a regulatory perspective for an international market entry strategy for remanufactured commercial coffee machines was developed.

## **Introduction and Objectives**

Remanufacturing, i.e. the process by which a used appliance is restored to like-new condition through an industrial process, is to be analyzed from a regulatory perspective in the context of commercial coffee machines. Thermoplan AG has conducted a market analysis that identified 10 potential markets for remanufactured commercial coffee machines. The aim is to analyze the regulatory requirements of these 10 different countries in order to formulate an international market entry strategy from a regulatory perspective. The research is intended to provide information on whether a market can be entered easily or with challenges with commercial coffee machines.

## Methods

A mixed-method research approach consisting of qualitative interviews and extensive literature review was used. Qualitative interviews were conducted with four high-profile European experts. These provided insights into regulations, standards and remanufacturing activities. Extensive literature research analysed the 10 countries from a regulatory perspective using the framework developed in the pre-study, as illustrated in Figure 1. The five regulatory areas relating to product safety, product quality, food contact, waste and the environment were identified for each



country. The qualitative findings were then quantitatively evaluated using a multicriteria analysis in an Excel tool. This enabled the 10 countries to be ranked from a regulatory perspective.

## **Results**

The research work highlights the relevance of remanufacturing in the context of the circular economy. This is also evident in regulatory frameworks and standards. Regulatory requirements are often not yet precisely formulated for remanufacturing, and the necessary standards have not yet been developed. The development of standards and regulatory frameworks is still in its early stages and poses challenges regarding the meaning of the term "remanufacturing". The research work highlights these challenges for the remanufacturing industry. In addition, the research work results in a regulatory perspective with a ranking of the 10 countries analysed.



The recommendations can be summarized in two key points. First, the regulatory harmonization within the European Union facilitates market entry by ensuring more accessible and consistent compliance requirements. The Single European Market generates significant synergies in meeting these standards. Remanufacturers must guarantee that requirements applicable to the new product are also met by the remanufactured appliance. Second, the demonstrated relevance of the topic encourages companies to engage in standardization processes and positions them for participation in European initiatives supporting remanufacturing. The future of remanufacturing is currently being shaped, allowing companies to position themselves to help shape that future.



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