

# Information about product quality on milk packages in Germany and Poland – A ProOrg Research Project

Authors: Lisa Borghoff <sup>1</sup>, Karolina Misztal <sup>2</sup>, Friederike Elsner <sup>1</sup>, Marta Wójtowicz <sup>2</sup>, Hubert Kowalski <sup>2</sup>

1. Münster University of Applied Sciences, Germany

2. Warsaw University of Life Sciences, Poland

Contact: lisa-borghoff@fh-muenster.de; karolina\_misztal@sggw.pl

## Background

Nowadays consumers are becoming more aware of and value high quality of food products. To define food products' quality, consumers evaluate both intrinsic and external extrinsic factors [1].

### Food quality aspects by consumers' perception

**intrinsic factors**  
taste, organoleptic properties, health impact

**external factors**  
traceability, geographical indications, certification, environmental issues

The aim of the study was to analyze textual information, on organic and non-organic milks' packaging, in the context of food quality, to check what kind of quality aspects' factors can be found on the cows' milk in Germany and Poland.

## ProOrg

ProOrg is a research project that is developing a set of strategies and tools (Code of Practice) to help organic food processors in the selection of appropriate technologies that are in harmony with the organic principles. Part of the Code will be a tool for successful communication between producers and consumers.

## Material and Methods

The subject of the analysis was cow's milk products from organic and non-organic production, excluding products for special dietary needs, e.g. without lactose. In summer 2019 a full inventory of organic milk took place in 8 supermarkets in Münster, Germany. Seven supermarkets offer a mixed assortment with both organic and non-organic products and one offers only organic products. The same inventory took place in 12 supermarkets in Warsaw, Poland. Five supermarkets offer a mixed assortment and seven of them were organic-only stores. The market research involved 150 photographed packaging of milk – 98 in Germany and 52 in Poland.

During the analysis, attention was paid to the content of labels and the presence of quality information such as: certification, quality assurances, sensory aspects, health impact (e.g. source of calcium, salt content provided with naturally occurring sodium only), an information about place of origin, animal welfare and social and environmental sustainability, emotional context and a long-time tradition of production.

The term "fresh" was only counted when it was not part of the name, because "fresh milk" is a defined product name in Germany. The term "fresh" was included in the research when it was used to describe the production process of the milk, like "fresh from cow".

### Acknowledgements

We thank Professor Ewa Rembiałkowska and Professor Carola Strassner who are the coordinators of the "ProOrg" project on behalf of WULS and FHMU.

### References

[1] Sadilek T (2019) Perception of Food Quality by Consumers: Literature Review. European Research Studies Journal, Volume XXII, Issue 1, 2019: 52-62

A full list of all references used in the preparation of this work can be requested from the authors at lisa-borghoff@fh-muenster.de or karolina\_misztal@sggw.pl

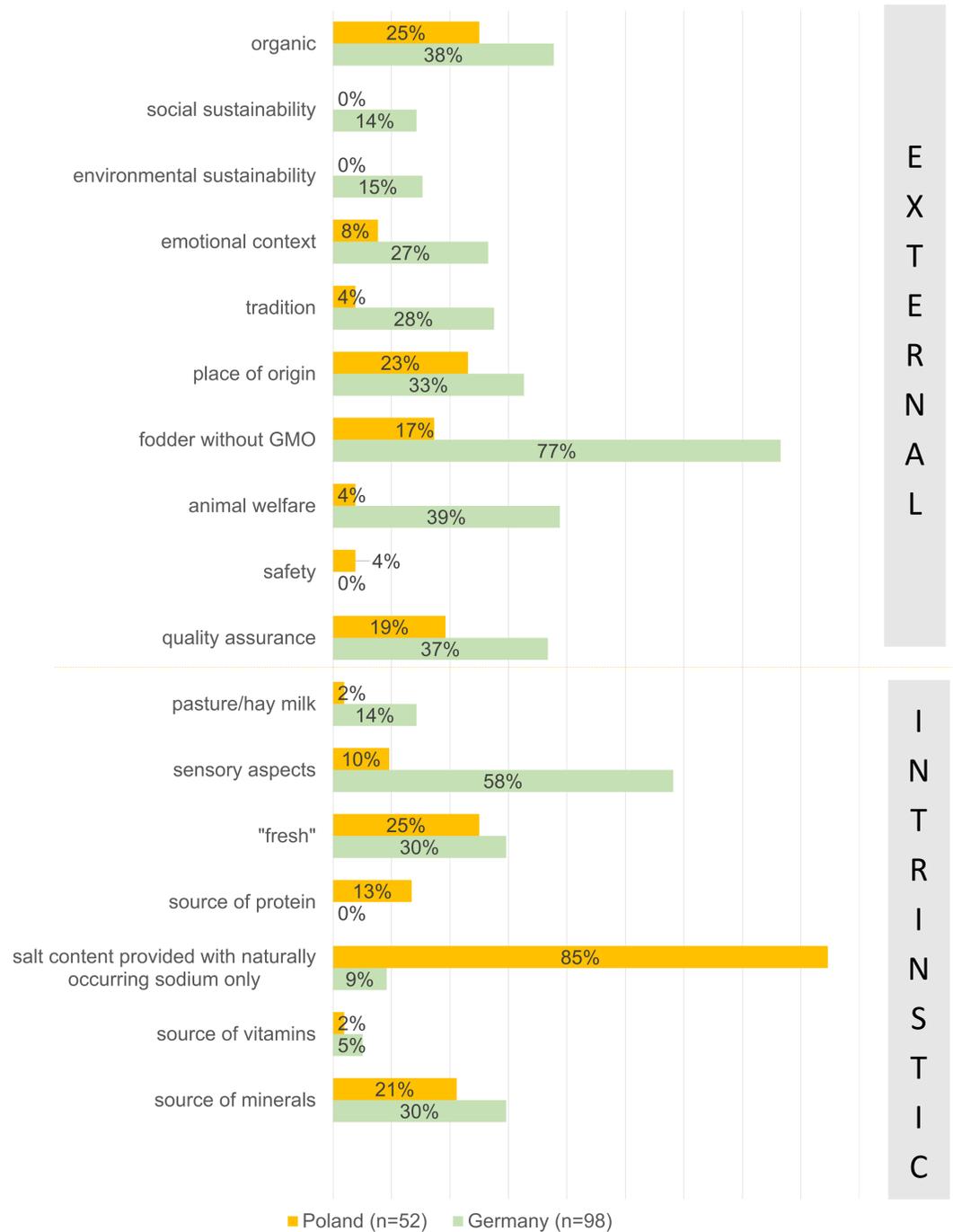
CORE organic

PRO-ORG COORDINATOR CREA (ITALY)

THE AUTHOR(S)/EDITOR(S) ACKNOWLEDGE THE FINANCIAL SUPPORT FOR THIS PROJECT PROVIDED BY TRANSNATIONAL FUNDING BODIES, BEING PARTNERS OF THE H2020 ERA-NET PROJECT, CORE ORGANIC COFUND & THE COFUND FROM THE EUROPEAN COMMISSION

## Results

### The percentage share of packaging with textual information of quality



The results show that manufacturers put on textual information that guarantee high quality of food products, whereby information on external factors outweigh those on internal factors. Organic products accounted for 38 % of analyzed products on the German market and 25 % on the Polish market.

The most frequently appearing information about external factors in Germany are: fodder without GMO (77 %), animal welfare (39 %) and quality assurance (37 %). In Poland these are place of origin (23 %), quality assurance (19 %) and fodder without GMO (17 %).

The most frequently appearing information about intrinsic factors in Germany are sensory aspects (58 %), while this is only mentioned on 10 % of the packages in Poland. Here, the most frequent appearing information about intrinsic factors is on the natural sodium content (85 %), which is only mentioned on 9 % of the packages in Germany. The vitamin content is mentioned only on 4% of the packages in total (Germany: 5 %, Poland: 2 %).

## Conclusion

A comparison of the highly developed food market in Germany with the developing Polish market allows to notice differences between the textual information placed on the milk products. The producers respond to the needs and expectations of their audiences considering their characteristic, behaviors and preferences. Communication via textual information could design effective and targeted actions aimed at reducing uncertainty and promoting high quality products' consumption. For this reason and due to the constantly changing market, it is worth conducting further research in this area, which is part of the CORE Organic project ProOrg.