

Franciszek Ługowski¹, Julia Babińska¹

Medical University of Warsaw, Faculty of Medicine, Poland

Occurrence of allergens in preparations dedicated for palliative care patients: product composition analysis

Dear Editor,

Atopic dermatitis (AD) occurs in approximately 6.6% of palliative care patients (PCP) and is one of the most common skin diseases among them [1, 2]. However, most of the palliative care literature is devoted to the treatment of wounds, with little research regarding dermatoses in terminally ill patients [3]. Topical corticosteroids and calcineurin inhibitors are the standard of care in PCP, however, avoidance of skin sensitizers is of utmost significance [4]. The cosmetic products available in the European Union are subject to European (EC) regulation 1223/2009, which requires assessment of the use of substances classified as CMR 1A and 1B in cosmetic products for exposure of vulnerable population groups, such as children under three years of age, elderly people, pregnant and breast-feeding women and persons with compromised immune responses [5]. However, there are no specific regulations that explicitly address the labeling as “safe” or “dedicated” for PCP. Skincare and avoidance of triggering factors are important in the prevention of AD. Our study aimed to ascertain the prevalence of contact sensitizers in cosmetics marketed as dedicated and safe for PCP. The products we analyzed are both over-the-counter and prescription drugs in different formulations. Therefore, they are widely available, and PCP might be inclined to buy them. Furthermore, with some of them being prescription drugs, physicians should examine their composition to choose the best possible treatment.

A systematic analysis of leave-on and rinse-off products available in “for palliative care patients” or “safe for palliative care patients” in the most popular online drugstores in Poland (according to: <https://www.wiadomoscikosmetyczne.pl/dystrybucja-kosmetykow/e-commerce/doz-dbam-o-zdrowie-jest-najlepiej-rozpoznawalna-e-apteka-raport-gemius-2022-2367064>. - last accessed February 15th 2024) was performed. Products included in the analysis were lotions, ointments, gels, creams, and washes. We analyzed the ingredients by the International Nomenclature of Cosmetic Ingredients (INCI) and matched these with 139 haptens listed in the European Baseline Series S-1000 (EBS), Fragrance Series F-1000 and Cosmetic Series C-1000 by Chemotechnique, 2023. We added “parfum” to the list. As of May 7th, 2024, 120 cosmetics met our inclusion criteria.

Only 7.5% of products in Poland did not contain EBS-listed haptens. On average they included 2.84 haptens \pm 1.2, range 0–6. Panthenol occurred most — 61.66%, then tocopherol — 35% and parfum — 32.5% (Fig. 1).

Herein, we provide a list of the most frequent haptens occurring in preparations dedicated to PCP. Our study shows that most of these products do display allergic potential. However, the herein-reported haptens seldom trigger increased skin sensitization as they are usually used in low concentrations [6]. Regardless, we suggest risk minimization by meticulously examining

Corresponding author:

Franciszek Ługowski, Medical University of Warsaw, Faculty of Medicine, Żwirki i Wigury 61 St., 02-091 Warsaw, Poland, e-mail: franciszeklugowski@gmail.com
Medical Research Journal 2024; Volume 9, Number 3, 319–320, DOI: 10.5603/mrj.101773, Copyright © 2024 Via Medica, ISSN 2451-2591, e-ISSN 2451-4101

This article is available in open access under Creative Common Attribution-Non-Commercial-No Derivatives 4.0 International (CC BY-NC-ND 4.0) license, allowing to download articles and share them with others as long as they credit the authors and the publisher, but without permission to change them in any way or use them commercially.

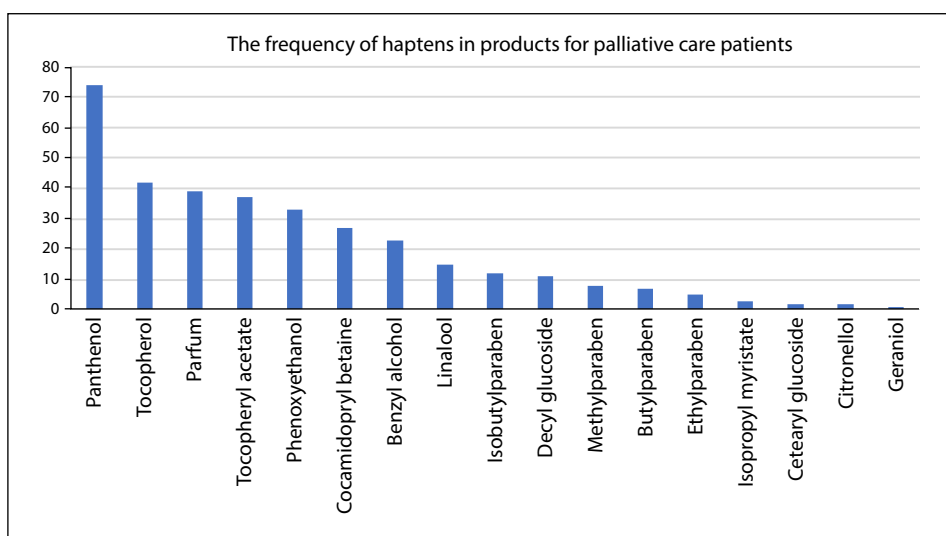


Figure 1. Analysis of leave-on and rinse-off cosmetics for palliative care patients based on haptens from the European Baseline Series, Cosmetic and Fragrance series by Chemotechnique, 2023. A total of 120 products have been analyzed

the composition of products for PCP. In our opinion, products that contain potential allergens should not mislead PCP by being labeled as “safe” or “dedicated”, as the consumers might not be aware of the risk.

Article information

Author’s contributions: *Conceptualization, FŁ; methodology, FŁ; software, FŁ; check, FŁ, JB; formal analysis, FŁ; investigation, FŁ, JB; resources, FŁ, JB; data curation, FŁ, JB; writing — rough preparation, FŁ, JB; writing — review and editing, FŁ; visualization, FŁ; supervision, FŁ; project administration, FŁ. All authors have read and agreed with the published version of the manuscript.*

Ethic statement: *Not applicable.*

Conflict of interest: *The authors declare no conflict of interest.*

Funding: *None.*

Acknowledgments: *None.*

References

1. Pala E, Tasar PT, Soguksu AO, et al. Dermatological Diseases in Palliative Care Patients in a University Hospital: A Prospective Study. *J Palliat Care.* 2024; 39(1): 75–81, doi: [10.1177/08258597221119063](https://doi.org/10.1177/08258597221119063), indexed in Pubmed: [35938193](https://pubmed.ncbi.nlm.nih.gov/35938193/).
2. Neloska L, Damevska K, Kuzmanova A, et al. Dermatological diseases in palliative care patients: a prospective study of 271 patients. *J Dtsch Dermatol Ges.* 2017; 15(6): 621–627, doi: [10.1111/ddg.13236](https://doi.org/10.1111/ddg.13236), indexed in Pubmed: [28513987](https://pubmed.ncbi.nlm.nih.gov/28513987/).
3. Barnabé C, Daeninck P. “Beauty is only skin deep”: prevalence of dermatologic disease on a palliative care unit. *J Pain Symptom Manage.* 2005; 29(4): 419–422, doi: [10.1016/j.jpainsymman.2004.08.009](https://doi.org/10.1016/j.jpainsymman.2004.08.009), indexed in Pubmed: [15857746](https://pubmed.ncbi.nlm.nih.gov/15857746/).
4. Hanna D, Moennich J, Jacob S. A Practical Management of Atopic Dermatitis-Palliative Care to Contact Dermatitis. *Journal of the Dermatology Nurses’ Association.* 2009; 1(2): 97–105, doi: [10.1097/jdn.0b013e3181970df1](https://doi.org/10.1097/jdn.0b013e3181970df1).
5. REGULATION (EC) No 1223/2009 OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL. Published online December 22, 2009. <https://eur-lex.europa.eu/LexUriServ/LexUriServ.do?uri=OJ:L:2009:342:0059:0209:En:PDF> (05.05. 2021).
6. Singleton H, Popple A, Gellatly N, et al. Anti-hapten antibodies in response to skin sensitization. *Contact Dermatitis.* 2016; 74(4): 197–204, doi: [10.1111/cod.12486](https://doi.org/10.1111/cod.12486), indexed in Pubmed: [26560413](https://pubmed.ncbi.nlm.nih.gov/26560413/).