

Belshazzar's Feast, Rembrandt 1635



**Health professionals' perspective:
Addressing the unmet needs of NMSC patients**

Sven Malte John
Chair EADV Media & PR Committee & EADV Task Force on Occupational Skin Diseases
ICOH Scientific Committee on Occup. Env. Dermatoses
University of Osnabrueck, Germany

Wine Farmer from Veneto Region, IT




Italy:

- **NMSC** by UVR: **occup. disease**
- Actinic Keratoses: 15/yr reported
- NMSC: 34/yr reported (expected > 3000/yr)
- *Reporting legally required*

*Actinic Keratoses & Squamous cell carcinoma
Prof. S. Piaserico, Padua*

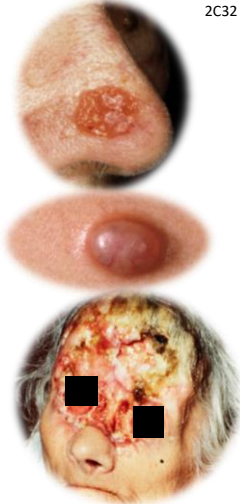
Modenese A, Gobba F, John SM; submitted JEADV

YOUR SKIN. THE MOST IMPORTANT OF YOUR LIFE. 2m²! EADV EUROPREVENTION CAMPAIGN: HEALTHY SKINWORK

What is non-melanoma skin cancer?

Basal Cell Carcinoma

2C32



Actinic Keratosis

(IN SITU Squamous Cell Carcinoma, 2E64.01)



Squamous Cell Carcinoma

2C31



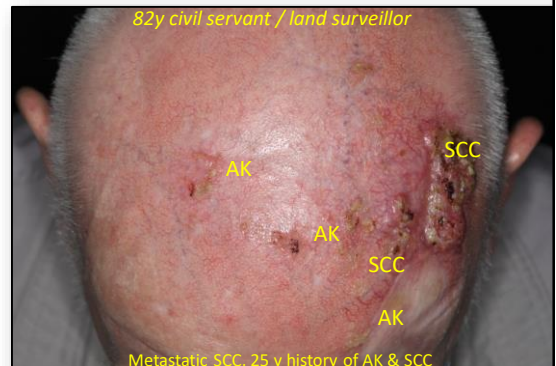
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Skin cancer – some facts

- ✓ **Non-melanoma skin cancer** (BCC and SCC):
most rapidly increasing cancers in fair-skinned populations worldwide (>4%/yr)
- ✓ **Most frequent** of all cancers male/female
- ✓ **Major risk factor:** exposure to solar UV radiation (>90%)
- ✓ **UV radiation:** group 1 carcinogen by WHO/IARC
- ✓ Ground level **UV** rising ("ozone hole", more sunny days)
- ✓ **Skin cancer:** detectable early with naked eye, prevention easy
- ✓ Lifelong, **chronic disease** with multiple tumors



Metastatic SCC, 25 y history of AK & SCC

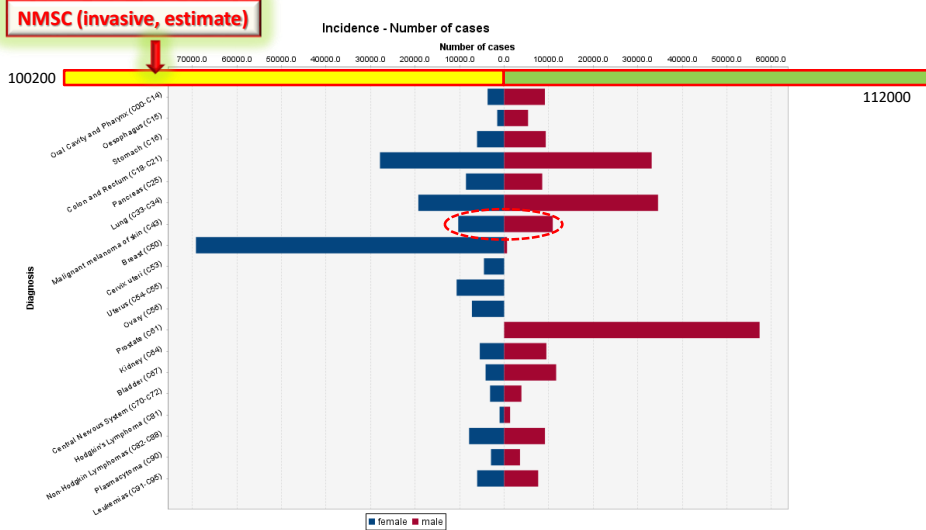
Dr Claas Ulrich, Charité

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Most frequent cancers in Germany 2015



Prof. Dr. Alexander Katalinic, Universität zu Lübeck, 2018



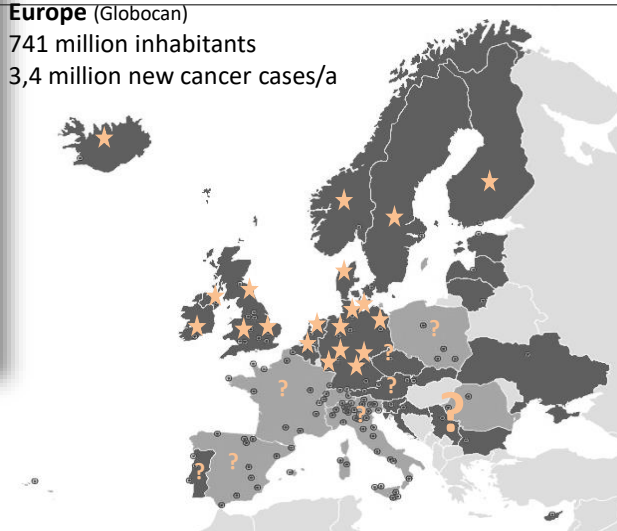
MEPs AGAINST CANCER MEETING
SKIN CANCER REGISTRIES IN EUROPE: FROM KNOWLEDGE TO ACTION
 20 JUNE 2018, 10:00-12:00
 EUROPEAN PARLIAMENT, ROOM A13-1
 HOSTED BY MEP CHARLES TANNOCK (UK, ECR)



10:00-10:10	Welcome & Introduction MEP Dr. Charles Tannock, MAC Vice-President
10:10-10:15	About MEPs Against Cancer Wendy Fawcett, DPP, ECG Director
10:15-10:30	Why registration is indispensable for skin cancer control Ana-Maria Flores, Eurodermatology
10:30-10:45	Measuring the impact of melanoma Maria Dorca de Saizade, Fondo Angliano Moroni per l'Oncologia
10:45-11:00	Non-melanoma skin cancer data: a challenge for the European Cancer Registries and the growing ECIS Elisabeth van Eycken, European Network of Cancer Registries
11:00-11:10	Absence of non-melanoma skin cancer registry Prof. Dr. Søren Møller John, EADV
11:10-11:25	The GDPR implications on cancer registries Mahvika Vyas, European Society for Medical Oncology, ESMO
11:25-11:55	Multi-stakeholder discussions Chaired by MEP Charles Tannock and Veronique del Marrol, EuroMelanoma
11:55-12:00	Wrap up & Outlook MEP Dr. Charles Tannock, MAC Vice-President

Published population-based registry data on non-melanoma skin cancer

Europe (Globocan)
 741 million inhabitants
 3,4 million new cancer cases/a



Dark grey = full coverage
 Grey = partial coverage
 Light grey = no CR
 Asterisks = NMSC reported

Today
~150 PbCR
in Europe

ca. 20 regional CR cover NMSC



Prof. Dr. Alexander Katalinic, Institute for Social Medicine and Epidemiology, University of Lübeck



Occupational UV



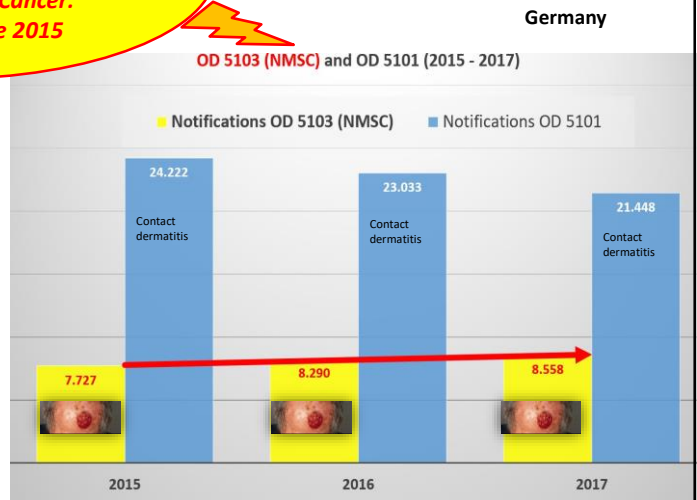
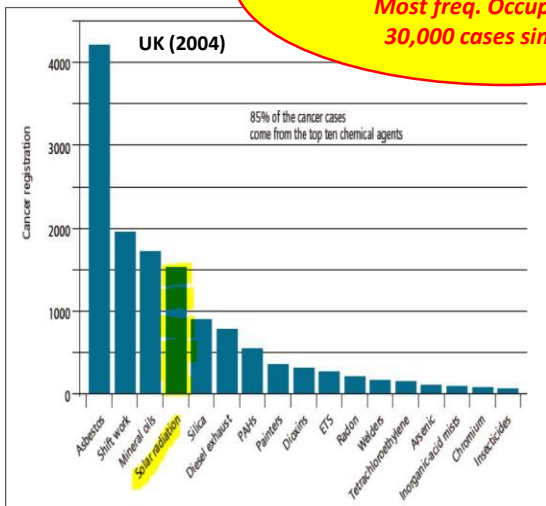
- ✓ **14.5 million EU workers: ≥75% work time outside (EU-OSHA)**
- ✓ **Outdoor workers: 100% increased cancer risk (AK, SCC)**
- ✓ **UV dosimetric measurements in outdoor workers: up to 600 SED/yr (occupational UVR > 500% of leisure exposure in brick layers)**
- ✓ **Exposure limits (WHO, ICNIRP: 1.3 SED/d) exceeded 5 x regularly**
- ✓ **Skin cancer (NMSC) recognized OD only in 6 EU countries, but almost never reported**
- ✓ **Workers lack information & protection**

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3rd most freq. notified OD (>10% of all OD)
2nd most freq. recogn. OD
Most freq. Occup. Cancer: 30,000 cases since 2015

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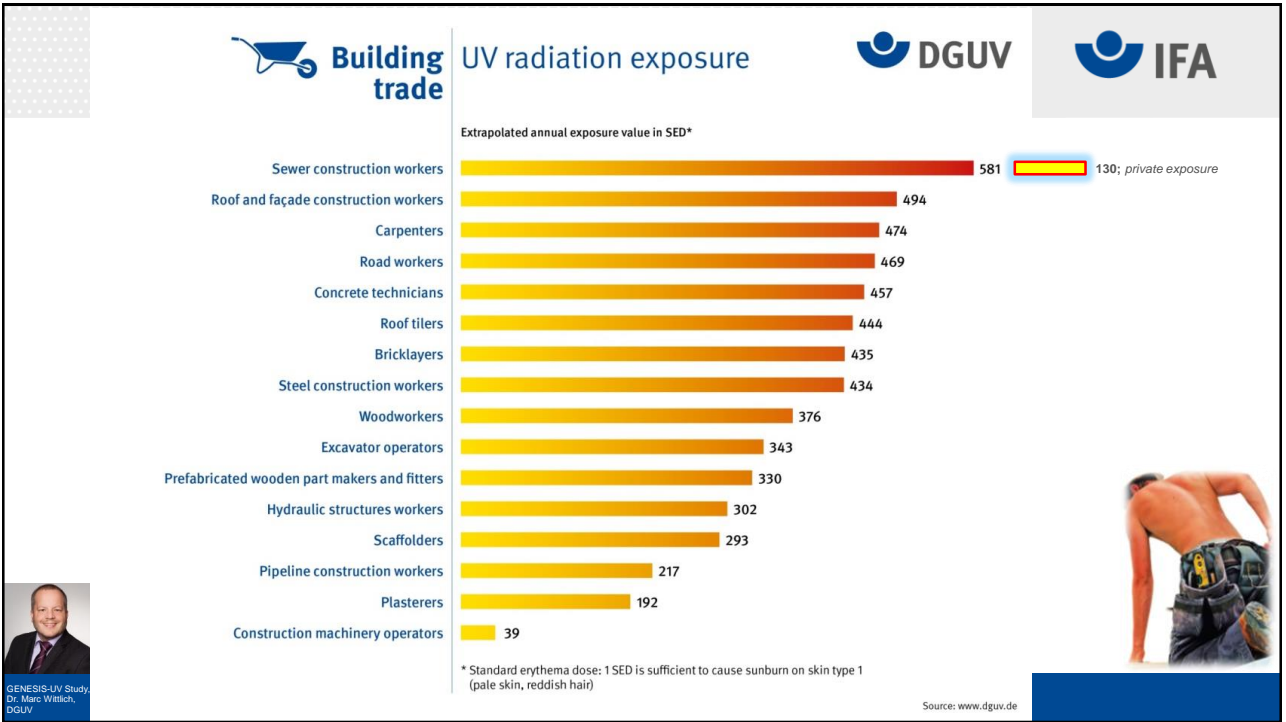


Takala, J. et al. Eliminating occupational cancer in Europe and globally. May 2017
https://oshwiki.eu/wiki/Eliminating_occupational_cancer_in_Europe_and_globally

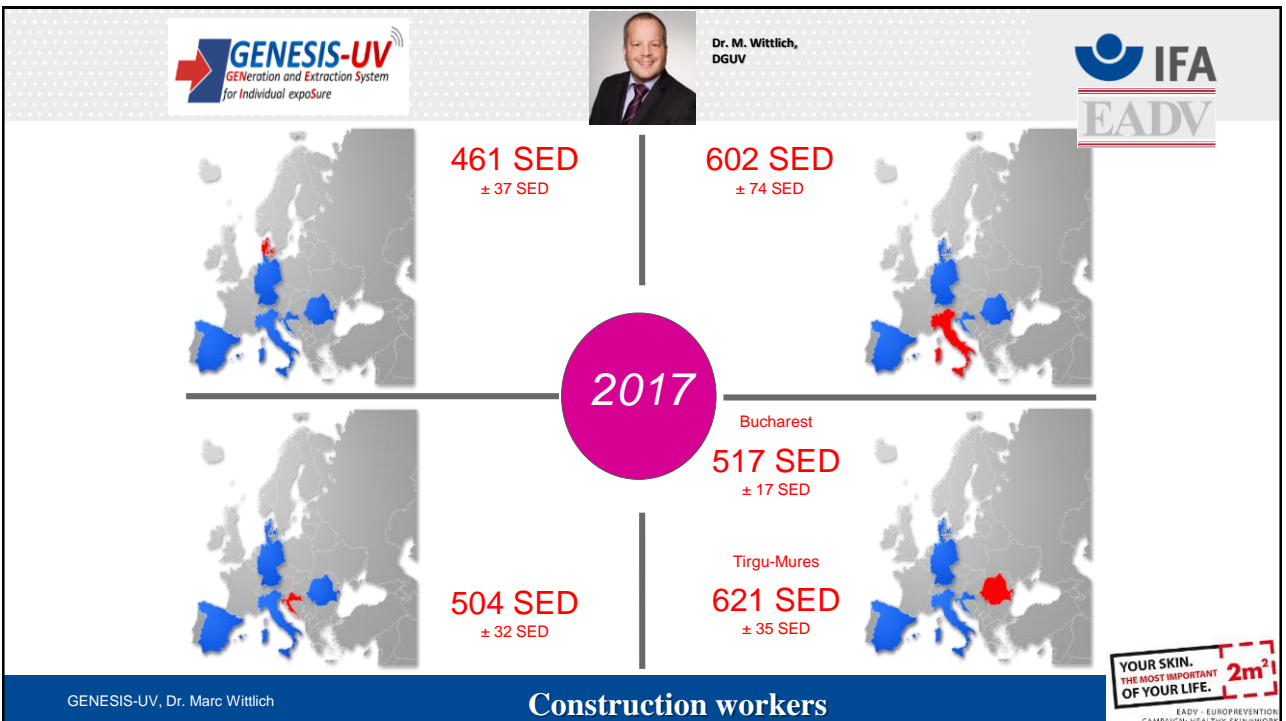
© DGUV Referat Statistik. GERMAN SOC ACCIDENT INSURANCE. 2018



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GENESIS-UV Study
Dr. Marc Wittlich,
DGUV



WHO and ILO enhance partnership in monitoring workers' health

UN sustainable development goals (SDG) 2030

EADV UNIVERSITÄT OSNABRÜCK



Contents lists available at ScienceDirect

ELSEVIER

Environment International
doi: 10.1016/j.envint.2018.09.039 [Epub ahead of print] Feb. 2019

journal homepage: www.elsevier.com/locate/envint

WHO/ILO work-related burden of disease and injury: Protocol for systematic reviews of occupational exposure to solar ultraviolet radiation and of the effect of occupational exposure to solar ultraviolet radiation on melanoma and non-melanoma skin cancer

Marilia Silva Paulo^{a,b}, Balazs Adam^{a,c}, Cyril Akagwu^d, Issaka Akparibo^d, Rami H. Al-Rifai^{a,b}, Sholeh Bazrafshan^e, Fabriziomaria Gobba^f, Adele C. Green^{g,h}, Ivan Ivanovⁱ, Sanja Kezic^j, Nancy Leppink^k, Tom Loney^{a,l}, Alberto Modenese^f, Frank Pegaⁱ, Cheryl E. Peters^{m,n}, Annette M. Prüss-Üstün^o, Thomas Tenkate^o, Yuka Ujita^k, Marc Wittlich^h, Swen M. John^{q,r,*}

EADV EUROPREVENTION CAMPAIGN: HEALTHY SKIN@WORK

ICD-11 - Mortality and Morbidity Statistics

25 May 2019 ICD-11 adopted by WHA

2C31.Z Cutaneous squamous cell carcinoma

Parent: 2C31 Squamous cell carcinoma of skin

This category is an 'unspecified' residual category.

Postcoordination:

Add detail to **Cutaneous squamous cell carcinoma**

Laterality (use additional code, if desired)

XX9J	Bilateral
XX9G	Left
XX9K	Right
XX70	Unilateral, unspecified
XX9G	Unspecified laterality

Specific anatomy (use additional code, if desired)

Extension codes

Associated with (use additional code, if desired)

XB0A	Occupational relevance
XB7I	Occupation as primary factor
XB5G	Occupation as cofactor
XB80	Not occupation-related
XB72	Occupational relevance unknown or unstated

ICD-11 for Mortality and Morbidity Statistics

ICD-11 Coding Tool Mortality and Morbidity

ICD-11 Mortality and Morbidity Statistics

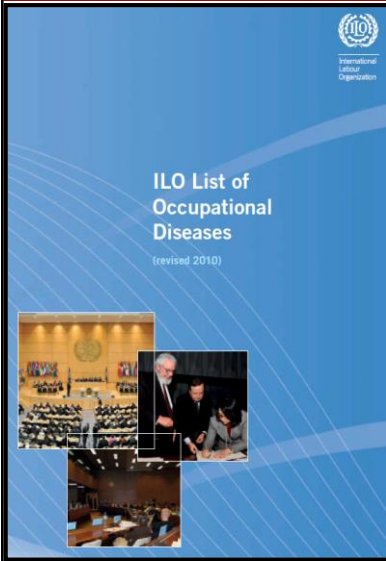
ICD-11 Coding Tool Mortality and Morbidity

ICD-11 Mortality and Morbidity Statistics

ICD-11 Coding Tool Mortality and Morbidity

ICD-11 Mortality and Morbidity Statistics

ILO Guidance Notes on Diagnostic and Exposure Criteria for Occupational Diseases. Released: 2020



1.2.5. Diseases caused by optical (ultraviolet, visible light, infrared) radiations

2.2.1. Allergic contact dermatoses...

2.2.2. Irritant contact dermatoses...


2.2.3. Vitiligo...

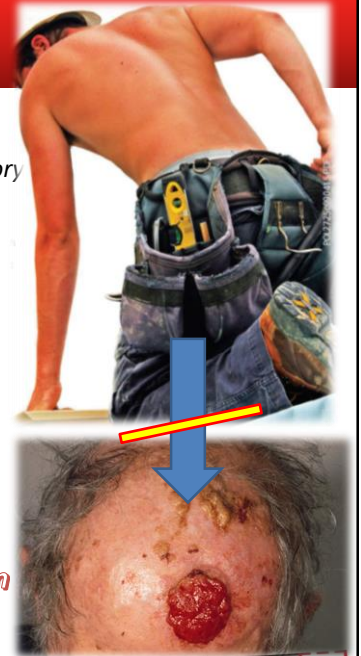
2.2.4. Other skin diseases caused by physical, chemical or biological agents at work

3.1.21. Cancers caused by other agents at work not mentioned in the preceding items where a direct link is established scientifically...between the exposure to these agents arising from work activities and the cancer(s) contracted by the worker



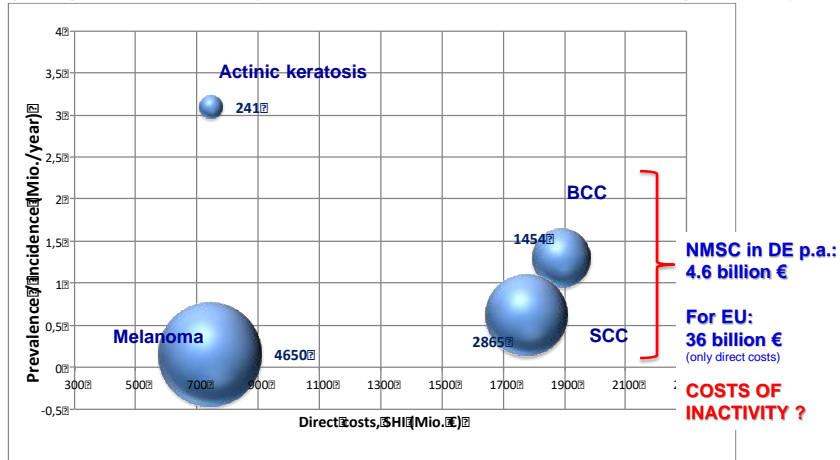
What needs to be done?

- Tremendous **underreporting** of NMSC
 - No representation e.g. in the *European Cancer Observatory*
- Tremendous **health economic burden**, incl. **costs of inaction**
- **NMSC** need reporting
 - incl. consecutive tumours (*high likelihood > 30%*),
 - tumour depths (*indicator for e.g., efficacy of prevention*)
 - jobs (occupational relevance, e. g. outdoor work)
- **Targeted prevention measures** for outdoor workers are needed
 - Prevention / Public health (*incl. in occup. settings*)
 - Screening! / Patient management ! / Follow up!
- **Concerted action** is needed!  **Global Call to Action**



Economic Aspects of Skin Cancer

High incidence and prevalence outweigh single patient costs from the SHI perspective in DE (data 2010 from DAK, 6.1 million persons)



DAK Data on File, 2015

Fransen M, Karahalios A, Sharma N, English DR, Giles GG, Sinclair RD, Non-melanoma skin cancer in Australia. Med J Aust. 2012 Nov 19;197(10):565-8



Multi-Stakeholder Summit on Occupational Skin Cancer
 at the occasion of the 15th EADO Congress, 24-27 April 2019, Paris, France

26 April 2019 from 11:00 to 15:00

**Maison de la Chimie
 Room 251**

28 Rue Saint-Dominique, 75007 Paris, France
<https://maisondelachimie.com/nous-contacter/>



EUROPREVENTION
 HEALTHY SKIN WORKS



Global Call to Action to End the Non-Melanoma Skin Cancer Epidemic in Outdoor Workers

April 26th, 2019



The nine co-hosting organizations¹ of the Multi-Stakeholder Summit on Occupational Skin Cancer – in cooperation with patient advocacy groups, workers unions, occupational safety and health professionals, social security representatives, dermatologists and oncologists – call for the implementation of a systematic approach to **addressing the Non-Melanoma Skin Cancer Epidemic** in view of the following:

Non-melanoma skin cancer (NMSC)² is by far the most frequently diagnosed cancer around the globe³. It is also one of the most common occupational diseases in Europe and its prevalence continues to increase⁴. For instance, in Germany, it is the second most frequently acknowledged occupational disease. In most countries, it is also the most common occupational cancer. Despite this, victims remain overlooked while prevention efforts, screening and improved access to care are neglected.

A lack of reporting and accurate data on the disease burden has allowed this crisis to remain in the shadows. Outdoor workers in construction and agriculture, recreation and public services may be exposed to solar UV radiation (UVR) for more than 75% of their working lives. UVR is classified by WHO as a group 1 carcinogen. WHO threshold levels are exceeded by five times in many outdoor professions. It is estimated that the risk of developing skin cancer increases significantly – up to more than 100% – with five or more years of outdoor work. If not detected and prevented at an early stage, NMSC leads to a life-long chronicity with abundant newly forming lesions.

The economic costs of NMSC continue to increase, placing governments and healthcare systems under significant economic pressure and affecting the livelihoods of millions of workers around the world.

Despite this alarming reality, outdoor workers lack legislative protection to ensure adequate prevention measures, diagnosis and effective treatments for this occupational disease globally. For that reason, WHO and ILO are currently assessing the global disease burden of occupational skin cancer within the UN Sustainable Development Goals 2030 framework⁵.

We urge policy makers, doctors and other health professionals, employers, workers and patient advocacy groups to take five actions to address the unmet needs of NMSC patients:

- 1. Policy makers** should improve the legislative framework to protect outdoor workers more effectively, and build accessibility for regular screenings and earlier, better treatments. In the European Union, NMSC should be officially recognized as an occupational disease within the next legislative period.
- 2. Doctors, other health professionals and policy makers** should work together to ensure standardised EU-wide registration of NMSC.
- 3. Employers** should use tools to quantify exposure levels to UVR in the workplace. They shall also implement cost-effective techniques for sun-safe behaviour and ensure regular skin cancer screenings for outdoor workers.
- 4. Doctors and other health professionals** should improve reporting of occupational NMSC (including actinic keratosis).
- 5. Patient advocacy groups, doctors and other health professionals as well as employers** should collaborate to promote skin cancer prevention and sun-safe working practices, and to address the unmet needs of retired outdoor workers with persisting NMSC.







WHITE PAPER

Improved Protection of Outdoor Workers from Solar Ultraviolet Radiation

Executive summary

Non-melanoma skin cancer (NMSC) is by far the most common cancer diagnosed in fair-skinned people. Ninety percent of NMSC is attributable to excessive exposure to ultraviolet radiation (UVR). Outdoor workers are exposed to an UVR dose of at least 2 to 3 times higher than indoor workers. So far, the risk of UVR exposure is vastly neglected and the evident future challenges presented in the following pages are contrasted with the current situation regarding legal recognition, patient care and compensation. While prevention is crucial to reduce cancer risks for outdoor workers, it is as much of relevance to better protect outdoor workers through legally binding rules and regulations, including at EU level.

Therefore, targeted actions are needed to make workplaces safer for the approximately 15 million outdoor workers in the EU, and millions more abroad. This includes the harmonisation of cancer registries, sun safe awareness-raising activities, further in-depth research to establish the extent and impact of exposure to UVR during working hours, the implementation of regular health surveillance and dermatological screening, as well as education and early care for at-risk workers.

The objective of the White Paper is to draw attention to the threat of UVR to outdoor workers around the globe, as well as to outline regulatory gaps and suggest methods to improve the protection of outdoor workers through better regulations and targeted preventative measures.

It is addressed to all key stakeholders involved in the protection of workers' health, such as policy makers, doctors and other health professionals, employers, workers, social security and patient advocacy groups. Specific actions are outlined in five recommendations (see Appendix 1) based on the Call to Action [add hyperlink] launched at the Multi-Stakeholder Summit on Occupational Skin Cancer, held on 26 April 2019 in Paris at the occasion of the yearly European Association of Dermato Oncology (EADO) Congress. The EADV, EADO, the Association of European Cancer Leagues (ECL), the International League of Dermatological Societies (ILDS), the European Dermatology Forum (EDF), the International Commission on Occupational Health (ICOH) and the European Cancer Patient Coalition (EPCP) urge key stakeholders to take the following actions to address the unmet needs of NMSC patients:

1. Strengthen legislation to protect outdoor workers and build accessibility for regular screenings and earlier treatments;
2. Increase cooperation to ensure standardised registration of NMSC;
3. Develop tools to monitor solar UVR exposure at work;
4. Improve the reporting of occupational NMSC (including actinic keratosis);
5. Enhance collaboration between patient advocacy groups, doctors and other health professionals as well as employers to address the unmet needs of outdoor workers with NMSC, a disease which results in persisting suffering from highly chronic tumours.



5 recommendations

Recommendation 1: Policy makers should **improve the legislative framework to protect outdoor workers** more effectively and build accessibility for **regular screenings and thus earlier treatments**. In the European Union, NMSC should be officially **recognized as an occupational disease** within the next legislative period.

Recommendation 2: Doctors, other health professionals and policy makers should work together to **ensure standardised EU-wide registration of NMSC**.

Recommendation 3: Employers should use tools to **monitor exposure levels to UVR in the workplace**. They shall also implement **cost-effective techniques for sun-safe behaviour** and ensure regular **skin cancer screenings** for outdoor workers.

Recommendation 4: Doctors and other health professionals should **improve reporting of occupational NMSC** (including actinic keratosis).

Recommendation 5: Patient advocacy groups, doctors and other health professionals as well as employers should **collaborate to promote skin cancer prevention and sun-safe working practices** and to address the unmet needs of retired outdoor workers with persisting NMSC.

