## 3.14 Non-melanoma skin cancer

Table 3.14.1 Overview of key epidemiological parameters for Germany, ICD-10 C44

Incidence		2017		2018		
	Women	Men	Women	Men		
Incident cases	98,040	109,120	94,200	105,230		
Crude incidence rate <sup>1</sup>	234.1	267.6	224.3	257.2		
Age-standardised incidence rate 1, 2	129.3	160.8	122.4	152.2		
Median age at diagnosis	74	75	74	75		
Mortality		2017		2018		2019
	Women	Men	Women	Men	Women	Men
Deaths	402	527	430	536	445	631
Crude mortality rate <sup>1</sup>	1.0	1.3	1.0	1.3	1.1	1.5
Age-standardised mortality rate 1, 2	0.3	0.7	0.3	0.7	0.4	0.8
Median age at death	86	82	87	82	87	83
Survival rates		5 years		10 years		
	Women	Men	Women	Men		
Absolute survival rate (2017–2018) <sup>3</sup>	85 (84–86)	80 (78-81)	70 (68–71)	61 (60–63)		
Relative survival rate (2017–2018) <sup>3</sup>	103 (101–105)	103 (100–105)	107 (104–112)	106 (104–112)		

<sup>&</sup>lt;sup>1</sup> per 100,000 persons <sup>2</sup> age-standardised (old European Standard) <sup>3</sup> in percent (lowest and highest value of the included German federal states)

## **Epidemiology**

About three quarters of non-melanoma skin cancers are basal cell carcinomas (basaliomas). These metastasise only in exceptional cases, especially when the immune system is weakened, and are therefore rarely life-threatening. However, they can grow into the surrounding tissue, e.g. into the bones, and thus lead to considerable restrictions in the quality of life. Almost a quarter of malignant, non-melanoma tumours of the skin are squamous cell carcinomas. About two thirds of these tumours occur on the head or neck. Among the rare forms is Merkel cell carcinoma, which belongs to the neuroendocrine tumours. In 2018, it is estimated that almost 200,000 people in Germany developed non-melanoma skin cancer for the first time, compared to around 1,000 deaths per year. After the introduction of skin cancer screening, the incidence increased significantly; the recent noticeable decline might also be explained by a declining registration rate. Even though internationally, the data availability is less good compared to malignant melanoma, it can be assumed that the incidence of the disease has increased significantly in the western industrial nations during the last decades.

## Risk factors

Non-melanoma skin cancer occurs more often in people with light skin types than in people with darker skin types. The most important risk factor for non-melanoma skin cancer is a strong exposure of the skin to ultraviolet (UV) radiation, no matter if the source is natural (the sun) or artificial (a solarium). The risk of squamous cell carcinoma increases with the cumulative (lifetime) UV dose. In the case of basal cell carcinoma, the risk is probably also increased by intermittent (recurrent intensive) UV exposure.

Those who have already developed non-melanoma skin cancer have an increased risk of developing it again. Actinic keratoses in particular increase the risk of squamous cell carcinoma. Non-melanoma skin cancer can also develop after many years of arsenic exposure, on radiation-damaged skin (for example after radiotherapy) or under immunosuppressive therapy, for example after an organ transplant.

The statutory cancer screening programme provides for a skin examination every two years by a doctor with appropriate training (dermatologist, general practitioner) for men and women from the age of 35.

Figure 3.14.1
Age-standardised incidence and mortality rates by sex, ICD-10 C44, Germany 2006-2018/2019
per 100,000 (old European Standard)

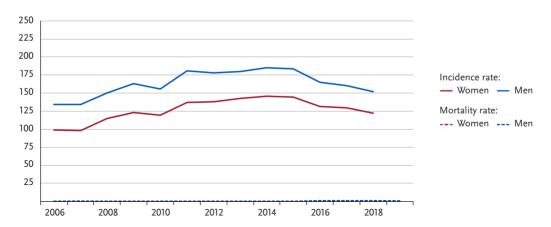


Figure 3.14.2 Absolute and relative survival rates up to 10 years after diagnosis by sex, ICD-10 C44, Germany 2017–2018

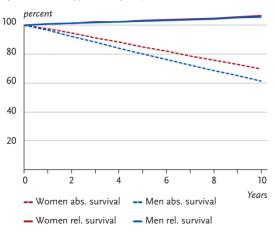


Figure 3.14.3
Relative 5-year survival by histology and sex, ICD-10 C44,
Germany 2017 – 2018

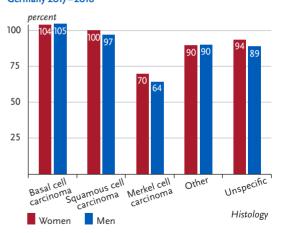


Figure 3.14.4 Age-specific incidence rates by sex, ICD-10 C44, Germany 2017 – 2018 per 100,000

