

Wood dust industries and risk of sino-nasal cancer in Denmark

Johnni Hansen

Inst. of Cancer Epidemiology, Danish Cancer Society

Copenhagen, Denmark



Wood dust industries and risk of sino-nasal cancer in Denmark

.... in collaboration with

Håkan Wallin

&

Jette Bornholdt

Natlional Inst. of Occupational Health

Copenhagen, Denmark



Sources of information for the linked register

	Cancer Register	Pension Fund	Central Population Register
Person ID*	X	X	X
Company ID		X	
Industry		X	
Employment period		X	
Cancer diagnosis	X		
Marital status			X
Date of death etc.			X
Job title			X

* Name, birthday, sex



Main inclusion criterias

- Wage earners (1964-97)
- Born 1897-1970
- Age at diagnosis: 20-84 years
- Period of diagnosis 1970-97
- First primary cancer

Study aspects

Nationwide register based case-control study

Cases : PF members (wage earners) with ICD-7: 160

Controls : Randomly selected cancer free PF-members
(matched on birthyear, sex, and vital status)

Classification of "exposure" :

Employment (< 1 year) in wood-dust related industries

Analysis :

Conditional logistic regression (social class adjustment), 10 years of lag time included

Sino-nasal cases in the "pension fund cancer register linkage" (1970-97)

	Men	Women
Notified to the Cancer Registry*	710	384
- no pension fund membership	127	132
Included	583 (80%)	252 (54%)
Employed in "wood-industries"	95 (16%)	6 (2%)

*meeting age criteria, etc.

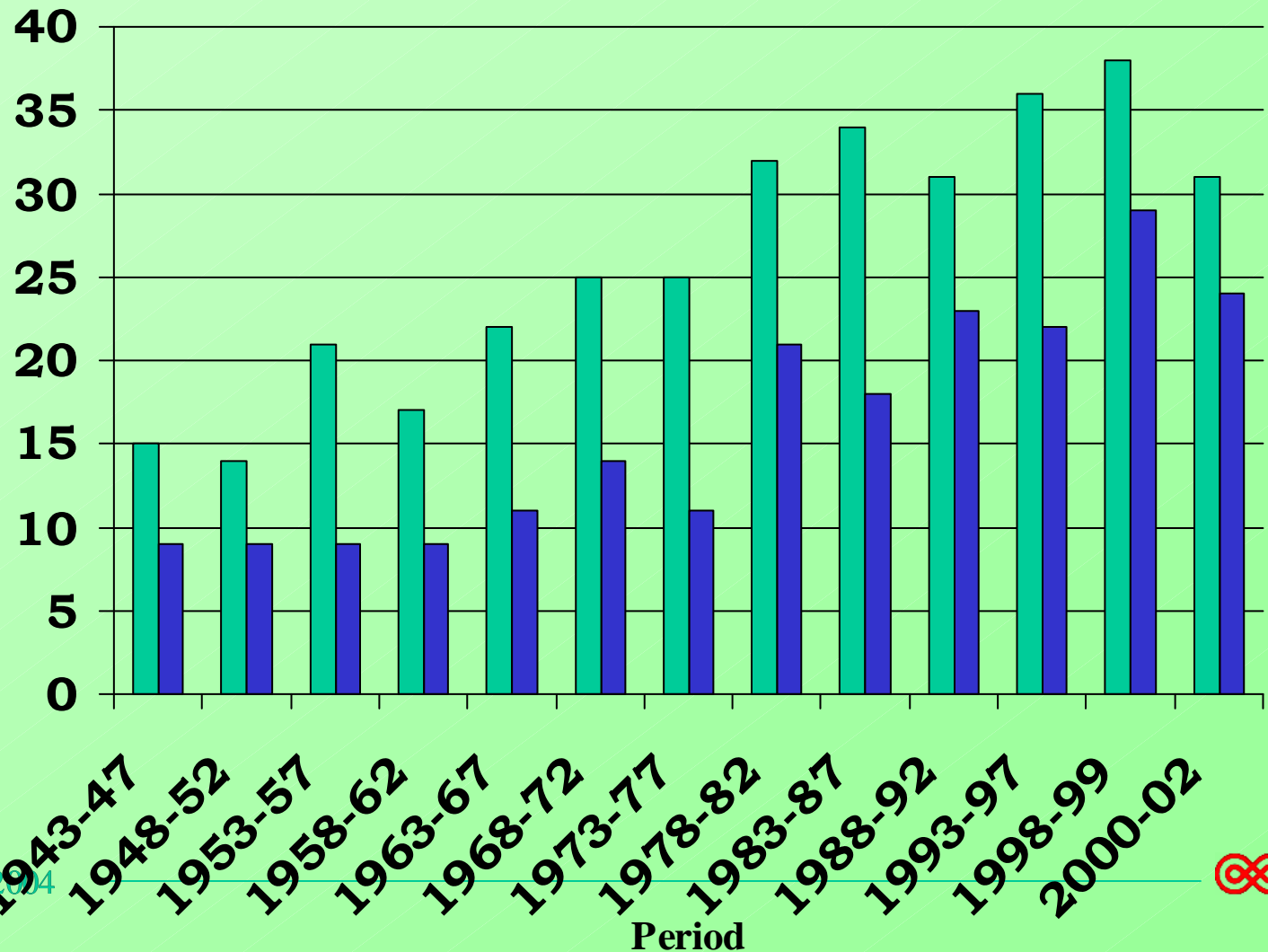


*Results will be presented in
scientific publication later*



Sino-nasal cancer patients in Denmark (1943-2002)

Average no. of cases per year



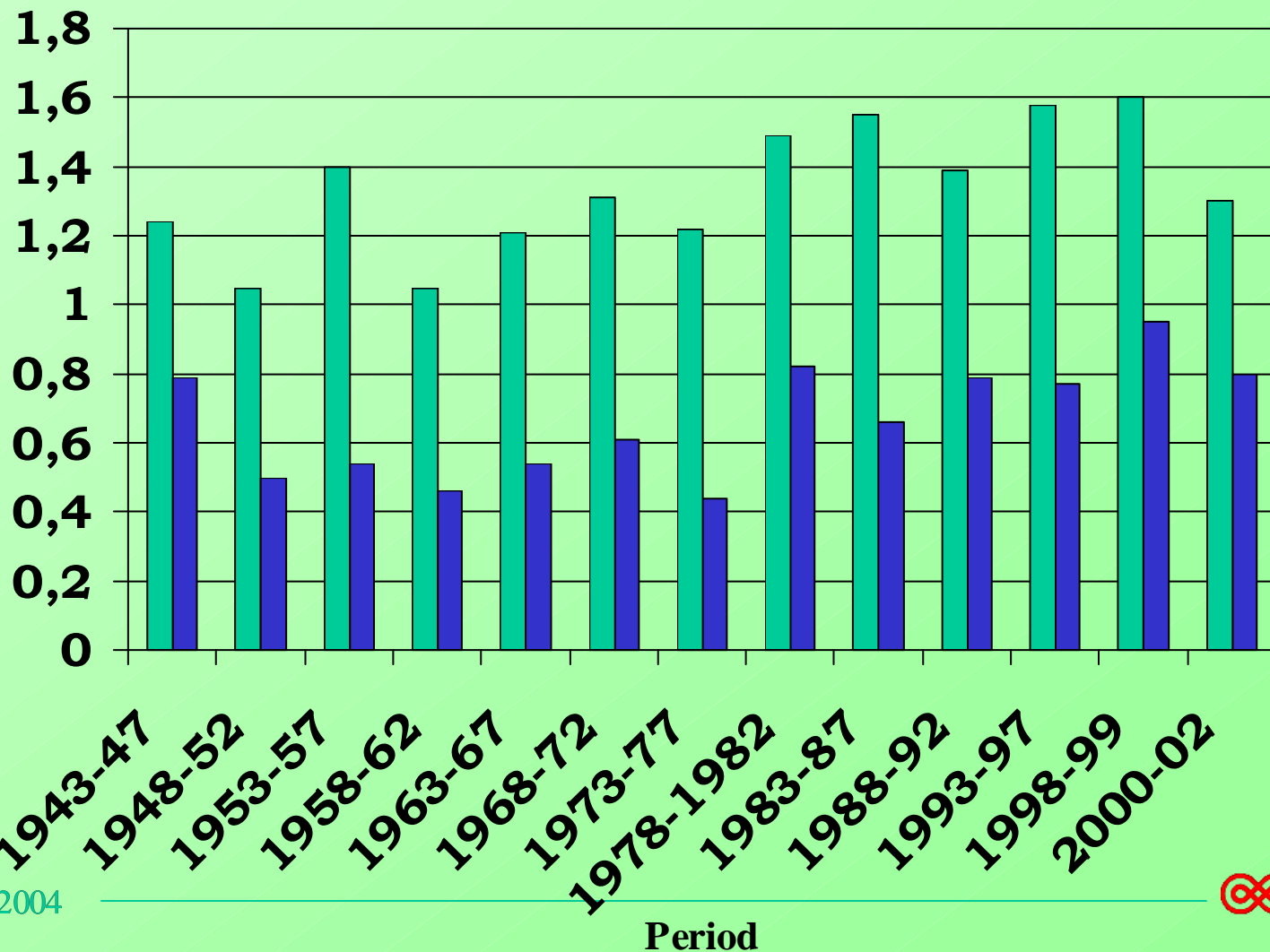
Men
Women

April 2004



Standardized incidence rates of sino-nasal cancer in Denmark

Rate/100,000
(DK2000)



Men
Women

April 2004



Register linkage study conclusions

- The risk of SNC among saw mill works seems close to unity
- Among other employees in wood related industries the risk of SNC is in average 3-fold increased (4-fold in the furniture ind.)
- No major differences in relative risks were seen between different topographical sites of SNC
- The risk of squamous cell carcinomas seems only weakly increased, whereas adenocarcinomas are 12-fold increased
- The used study method tend to underestimate the true risk
- SNC is not a major public health problem, but a problem among men within wood dust related industries



Wood Risk Study: Danish *epidemiological* subcomponent

- *Register* (emp. history) and *interview* (exp. details) based *case-control* study of a) *adenocarcinomas*, and b) *squamous cell carcinomas*
- *Study subjects*: born > 1923 (AC), 1930 (SCC), diagnosed 1992-2000
- *Cases*: 54 AC (x5 controls) and 129 SCC (x2 controls)
- *Status*: 376 interviews done.
- *Participation*: 89% cases and 75% among controls
- *Problems*: Next-of-kin interv. (retrival, infomation)



Current “epi” activities

- Updating of linked register system (1970-2002)
- Interview of NOK
- Data cleaning

