



Aalborg Universitet

AALBORG UNIVERSITY
DENMARK

Education in medicine or medical science increases odds of non-participation in National colorectal cancer screening

Deding, Ulrik; Vardinghus-Nielsen, Henrik; Torp-Pedersen, Christian; Bøggild, Henrik

Publication date:
2019

Document Version
Publisher's PDF, also known as Version of record

[Link to publication from Aalborg University](#)

Citation for published version (APA):
Deding, U., Vardinghus-Nielsen, H., Torp-Pedersen, C., & Bøggild, H. (2019). *Education in medicine or medical science increases odds of non-participation in National colorectal cancer screening*. Poster presented at European society of coloproctology, Wien, Austria.

General rights

Copyright and moral rights for the publications made accessible in the public portal are retained by the authors and/or other copyright owners and it is a condition of accessing publications that users recognise and abide by the legal requirements associated with these rights.

- ? Users may download and print one copy of any publication from the public portal for the purpose of private study or research.
- ? You may not further distribute the material or use it for any profit-making activity or commercial gain
- ? You may freely distribute the URL identifying the publication in the public portal ?

Take down policy

If you believe that this document breaches copyright please contact us at vbn@aub.aau.dk providing details, and we will remove access to the work immediately and investigate your claim.

Education in medicine or medical science increases odds of non-participation in National colorectal cancer screening

Ulrik Deding^{1,2,3,§}, Henrik Vardinghus-Nielsen³, Christian Torp-Pedersen^{4,5}, Henrik Bøggild^{3,6}

1) Department of Surgery, Odense University Hospital, Svendborg

2) Department of Clinical Science, University of Southern Denmark

3) Public Health and Epidemiology Group, Department of Health Science and Technology, Aalborg University

4) Department of Clinical Investigation and Cardiology, Nordsjaellands Hospital, Hillerød

5) Department of Cardiology, Aalborg University Hospital, Aalborg

6) Unit of Epidemiology and Biostatistics, Aalborg University Hospital

§) Presenting author (+45 42574243, ulrik.deding@rsyd.dk)

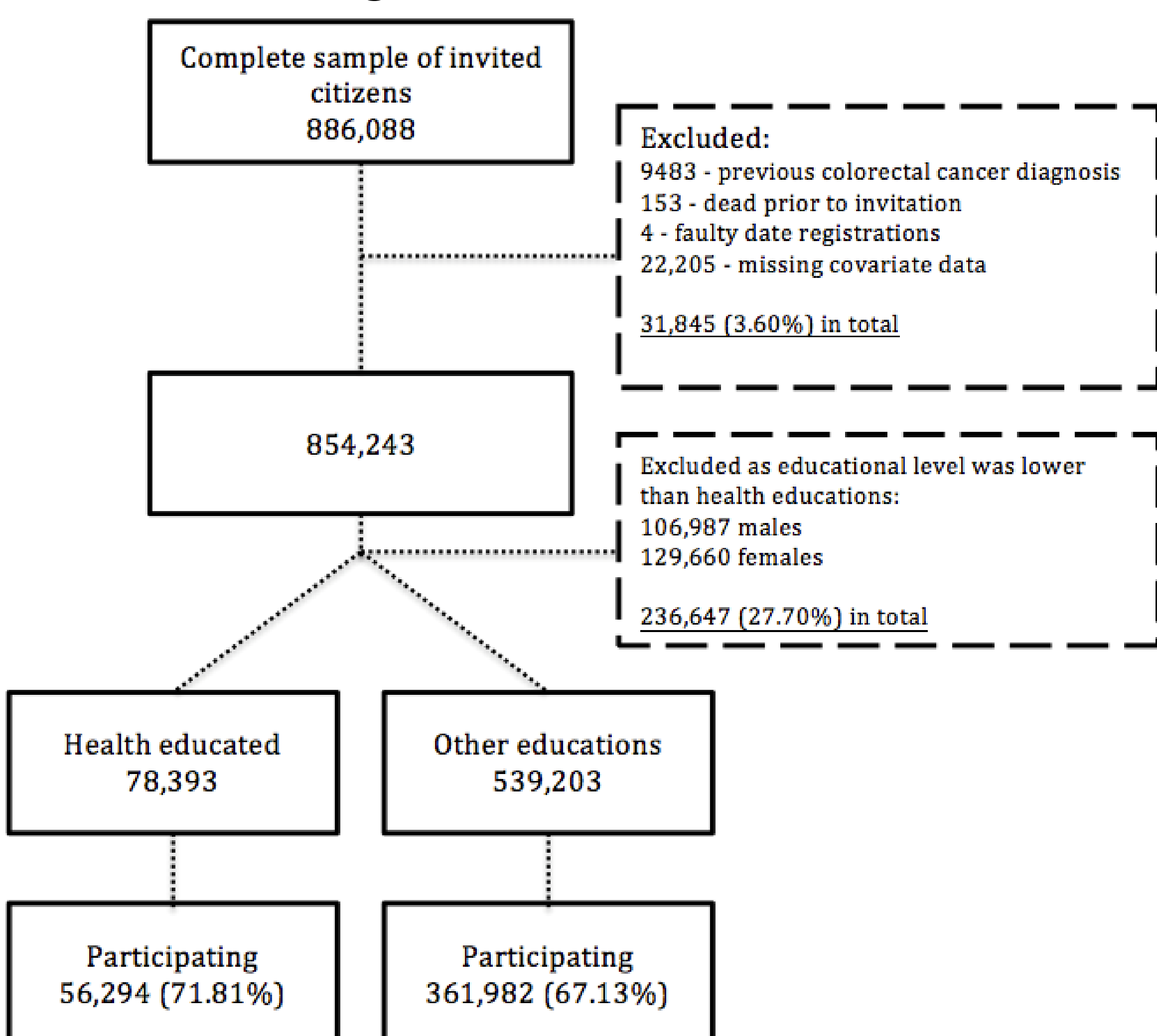
Aim

To investigate non-participation in colorectal cancer screening predicted by educational level (basic school, high school/vocational or higher) and type in a large Danish sample.

Highlights

- Education in medicine or medical science is associated with higher odds of non-participation.
- Women in nursing had lower odds of non-participation, while men did not.
- Differences persisted after adjusting for other risk factors for non-participation.

Flowchart of 886,088 invited citizens for colorectal cancer screening in Denmark 2014–15.



Methods

Danes aged 50 through 75 is invited biennially for CRC screening by submitting a FIT-sample. 886,088 Danes were invited during 2014-2015. Logistic regression analyses were conducted, estimating odds of non-participation based on educational type and level, stratified by gender and educational length while adjusting for sociodemographic characteristics (age, marital status, income and country of origin).

Conclusion

This large scale population-based study demonstrates that health education is related to screening participation. Men and women differ in the way they are affected by their health educations, but those educated in the field of medicine/medical science participate in screening less often than their peers in both genders.

Odds ratio of non-participation in males (n=108 966) and females (n=128 994) by educational type and length level, Denmark 2014–15.

Education group	Education type	OR	95% CI	P-value
Males long education	Other education	Ref		
	Medicine/Medical science	1.47	[1.38;1.57]	<0.001
	Nursing and health care	1.06	[0.91;1.23]	0.453
	Other health education	1.15	[1.05;1.26]	0.002
Females long education	Other education	Ref		
	Medicine/Medical science	1.87	[1.75;2.00]	<0.001
	Nursing and health care	1.01	[0.87;1.18]	0.869
	Other health education	1.11	[1.02;1.22]	0.022
Males short education	Other education	Ref		
	Medicine/Medical science	1.33	[1.22;1.44]	<0.001
	Nursing and health care	0.72	[0.70;0.75]	<0.001
	Other health education	0.75	[0.72;0.78]	<0.001
Females short education	Other education	Ref		
	Medicine/Medical science	1.47	[1.35;1.60]	<0.001
	Nursing and health care	0.76	[0.73;0.79]	<0.001
	Other health education	0.78	[0.75;0.81]	<0.001

a: univariate logistic regression models

b: multivariate logistic regression models adjusted for age, income, country of origin and marital status.

Results

Among both males and females with long education, odds of non-participation were statistically significantly increased if educated within the field of medicine/medical science (OR 1.87 and 1.47) compared to individuals with a long non-health related education after full model adjustments. In females but not in males the odds were reduced in those with a long education in nursing and health care (OR 0.76) or other long health education (OR 0.78).