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Cadmium Intake as a Prognostic Factor in Endometrial Cancer: A Swedish Cohort-Based Study

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ABSTRACT

Metalloendocrinology is a new interdisciplinary field, which was established due to the importance of connections between inorganic chemicals and hormonal mechanisms. The role of cadmium in hormone-related tumors is an excellent example of this connection, as cadmium mimics estrogen in the human body. Since endometrial cancer (EC) is hormone-related, it is well-suited for assessing the estrogenic effects of cadmium. Therefore, the present study aims to explore the role of dietary cadmium intake in the progression-free survival (PFS) and overall survival (OS) in women with EC. Dietary cadmium intake was estimated based on a large cohort of Swedish women ($n = 416$) with EC. Median dietary cadmium intake was then analyzed in relation to different tumor characteristics and clinical outcomes. Cox proportional hazard models were used to estimate hazard ratios (HRs) and 95% confidence intervals (CIs). Median daily dietary cadmium intake in the cohort was 13.1 μg (interquartile range 25%-75%=6.4). High dietary cadmium intake (μg/day) was associated with significantly decreased OS in the study cohort (HR = 0.956, 95% CI = 0.914-1.001, $p = 0.05$). Dietary cadmium intake was not associated with PFS (HR = 0.975, 95% CI = 0.924-1.028, $p = 0.348$). Therefore, our results indicate that high dietary cadmium intake could be associated with poor outcome in women with EC.

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Introduction

Endometrial cancer (EC) is the most common gynaecological tumor in high-income countries, and incidence rates for the disease have increased over time (1). In 2016, the incidence rate of EC was 27.7 per 100 000 women in Sweden (2). The majority of EC cases are diagnosed at an early stage (3), and more than 95% of EC develops in women over 40 years of age, but 4% of women with EC are under 40 years old (4). Median age at EC diagnosis among Swedish women is 71 years old, according to the Ministry of Health and Social Affairs and the Swedish Cancer Society (2). Various patient characteristics and histopathological tumor features have a significant influence on patient prognosis (5).

There are several established risk factors for EC, including hypertension and diabetes, as well as conditions associated with excess estrogen exposure, such as early menarche, late menopause, and high body mass index (5). Environmental factors that mimic the effects of estrogen could also be associated with a higher incidence of EC (6).

Cadmium is a heavy metal and an environmental contaminant, which has been classified as a group 1 carcinogen (7). Although environmental quality standards exist for cadmium, it has been found in a few Swedish lakes, watercourses, and coastal waters (8). Dietary intake is the most significant source of cadmium exposure in people not exposed through their occupation or habitat in specifically polluted areas in Sweden (9); therefore, both cadmium levels in food items and food consumption patterns play a role in total dietary cadmium intake (10). Cereal products and vegetables are the most common sources, partly due to their high consumption but also because

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cadmium is mainly absorbed by crops from the soil (9). Tobacco products are the second most common source of cadmium intake in the population, due to high concentrations in cigarettes and snuff (7,11).

Cadmium absorption in humans is low (3%-5%), but the biological half-life of cadmium in the liver and kidneys of humans' ranges from 10 to 30 years (7). Interestingly, low iron status increases cadmium absorption in the intestine, which leads to higher cadmium concentrations in women than men (12,13). The metal has many adverse effects, including on kidneys and bone (14,15). In addition, cadmium has a mutagenic effect and increases estrogen receptor α-mediated cell proliferation (16–18). Thus, it has an estrogenic effect, resulting in hyperplasia, increased uterine weight, and endometrial thickness (19). Recently, the new scientific field metalloendocrinology was introduced (20). It shows the essential role of inorganic chemicals in the development of hormone-dependent conditions. The present study aims to explore the role of dietary cadmium intake in the disease progression and survival of women with EC.

Methods

Study Population

The study population included 890 women diagnosed with uterine cancer and admitted to the Karolinska University Hospital Solna within the period 2007-2012. All women underwent hysterectomy and bilateral salpingo-oophorectomy, and tumor tissue samples were collected during the operation. Pathologists examined the samples, performed immunohistochemical analyses and summarized the results into a pathologic-anatomic diagnosis, which was entered into patients' medical records. If needed, patients received adjuvant treatment at the Karolinska University Hospital. After cancer treatment, and if the disease had not spread, gynecologists outside of the hospital conducted follow-up visits, which included collection of patient history, vaginal examination, and transvaginal ultrasound. All patients with suspected relapse were referred back to the Karolinska University Hospital for more detailed examinations. All women in the study population were given a written description of the study and letter of consent. Upon agreement to participate in the study and completion of the letter of consent, women were given or sent two printed questionnaires, which were completed at home, with full anonymity guaranteed. All described methods were carried out in accordance with relevant guidelines and regulations.

Questionnaires and Clinical Data

Questionnaire one covered lifestyle and dietary habits (Appendix S1) and Questionnaire two covered selected socioeconomic and reproductive factors (Appendix S2), with two reminders sent at an interval of 2 mo. Questionnaire one covered eight different subjects: physical activity and exercise, sun habits, eating habits, dietary habits in the last year, dietary supplements and medicine, alcohol, tobacco, and outdoor activities; there were 1-14 items in each subject. The subject "physical activity and exercise" has been validated and contains five different options for each item. The time spent doing each specific activity a day was multiplied by its energy usage in metabolic equivalents (METs) and summarized in MET-hours per day (21). We used the item "watching TV/reading" to assess leisure time physical activity, with sitting $\geq$5 h per day described as inactivity as per Friberg et al. (22). In the case of missing data on this item, the gap was considered as zero. The subject "dietary habits in the last year" was a food frequency questionnaire previously designed by Terry et al. at the Institute of Environmental Medicine at Karolinska Institutet (23). This questionnaire has been validated and is based on internationally accepted questions. The subject "tobacco" included cigarette and snuff use and was divided into never, former, or current tobacco use. The standard portion of snuff was considered to be 1 g of smokeless tobacco.

Questionnaire two was also developed at Karolinska Institutet (personal communication, M. Mints) and consisted of four different subjects: physical parameters (height and weight), women's health questions (age at menarche and menopause, etc.), general health questions (diabetes and hypertensive heart disease), and other questions (education, family history, etc.). Both questionnaires included the patient's personal registration number.

The hospital's medical records programme, Take Care, is used in Stockholm County and Karolinska University Hospital to handle electronic medical records with regular updates regarding patients' diagnosis, treatments, follow-up visits, relapses, survival, and other medical conditions. Patients' personal registration number was used by Take Care to collect information on different clinical variables. The latest review of survival data was performed in February 2019.

Analytical Cohort

The study sample was formed based on responses to Questionnaire 1, which was returned by 471 women (response rate = 53%). We then excluded 24 patients treated outside Stockholm County, as we had no

access to their medical records; 23 patients diagnosed with cancer of the uterus that was not EC; three patients who received primary treatment before 2007 and were admitted to Karolinska University Hospital due to EC relapse after study initiation; four patients who completed the questionnaires improperly; and one patient diagnosed with ovarian cancer (24). Therefore, 416 women were included in the final analysis.

Assessment of Dietary Cadmium Exposure

Median daily dietary cadmium intake was calculated for each participating patient based on the food frequency questionnaire. The cadmium content of different food items was taken from the reports of the National Food Agency (NFA; Uppsala, Sweden) (25), which have been monitoring cadmium levels in different food items since the 1970s. The mean cadmium level for each food item in NFA reports is based on analyses ranging from a few to several hundred. Only the most recent reports were used in order not to comprise the quality of the data (9,26–34).

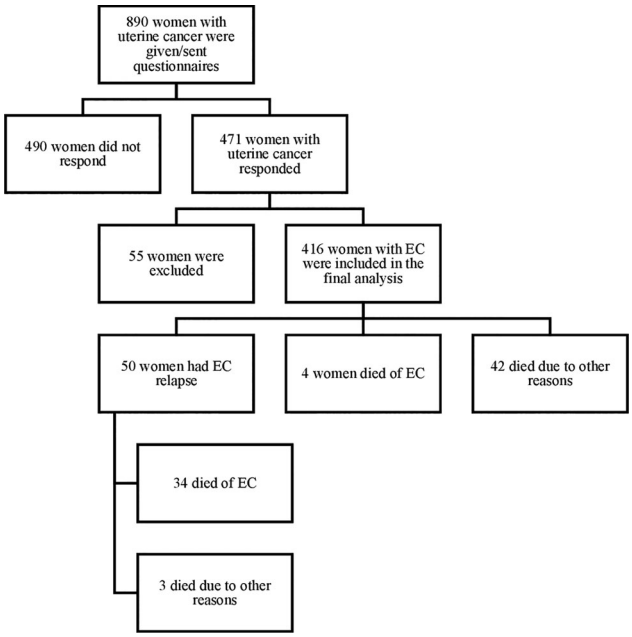

Figure 1. Flowchart of the patient cohort.

Cadmium levels for each food item were averaged. There is no variation in the cadmium levels found in particular food items in Sweden, nor is there any artificial cadmium contamination of soil in the country. Moreover, there are only a few companies in Sweden that produce food items (10). Therefore, we consider our dietary cadmium intakes to be nationally representative. For a few food items (white bread loaf, fiber-enriched bread, granary wholemeal bread, i.e., whole grain bread, oranges and other citrus fruits, and raisins), Danish data on cadmium levels were used (35).

Average daily dietary cadmium intake (μg cadmium per day) was estimated for each participating patient by multiplying the frequency of consumption of different foods by the average daily consumption calculated from the mean values of age-specific (<66, ≥66 years) portion sizes of scale-weighted foods recorded for four 1-week periods 3-4 mo, apart, by 213 women randomly selected from the cohort (10). The age-specific portion sizes were provided by the Nutritional Epidemiology Unit of the Karolinska Institute. Cadmium intake from the air is less than 1% of total cadmium exposure, and average cadmium intake from water (community-provided tap and private wells) is 0.2%; thus, both of these exposures were ignored in our calculations (10).

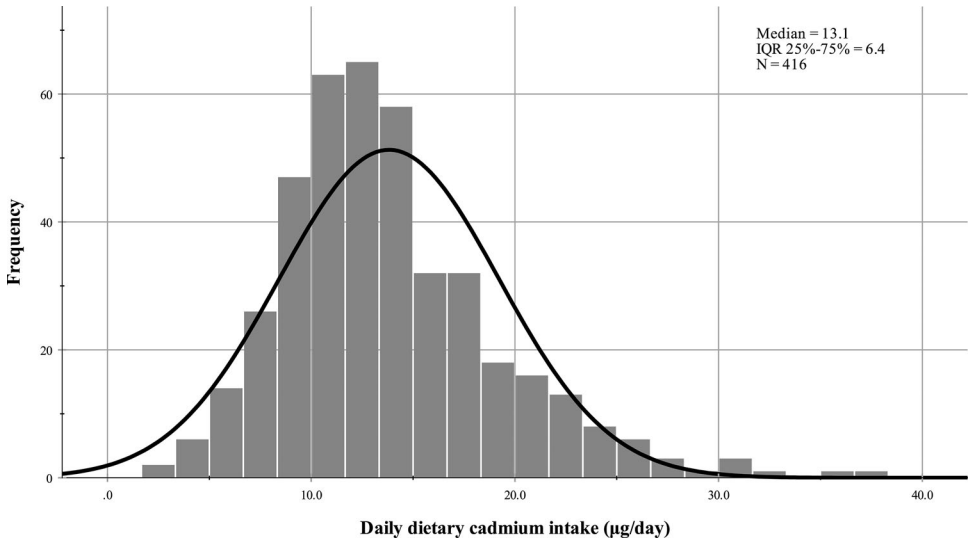

Figure 2. Daily dietary cadmium intake in the study cohort (μg/day).

Table 1. Baseline characteristics of the full cohort by tertiles of median daily dietary cadmium (Cd) intake (μg/day).

Characteristic	Range	Median Cd intake (μg/day)			
		Full cohort ($n = 416$)	Tertile 1. <11.3 ($n = 139$)	Tertile 2. 11.3-14.9 ($n = 138$)	Tertile 3. >14.9 ($n = 139$)
Age (years) - *median*	36-95	67.0	67.0	68.0	67.0
Body mass index (kg/m^2)** - *median*	18-55	26.0	27.6	27.0	25.0
Leisure time physical activity (MET-hours/day)* - *median*	0-38*	21.5	20.0	22.0	22.0
Dietary cadmium intake (μg/day) - *median*	2.2-37.2	13.1	9.2	13.1	18.5
Cancer in a first-degree relative (%)	n/a	85	87	80	88
Diabetes (%)	n/a	11	11	12	10
Ever use of lipid-lowering agents (%)	n/a	22	23	25	21
Ever use of hormone replacement therapy** (%)	n/a	51	53	42	60
Type of EC** (%)	Endometrioid adenocarcinoma	91.8	91.4	92.0	92.1
	Serous carcinoma	6.0	6.5	5.8	5.8
	Clear cell carcinoma	2.2	2.2	2.2	2.2
Grade of EC** (%)	G1 (high)	46.4	48.5	43.5	47.3
	G2 (moderate)	34.8	29.9	38.2	36.4
	G3 (poor)	18.8	21.6	18.3	18.8
Stage of EC** (%)	IA	67.1	62.6	61.6	77.0
	IB	19.2	21.6	21.7	14.4
	II	7.0	9.4	8.0	3.6
	IIIA	3.1	2.9	5.1	1.4
	IIIB	1.9	3.6	0	2.2
	IIIC (IIIC1 or IIIC2)	0	0	0	0
	IVA	0.2	0	0.7	0.7
	IVB	1.4	0	2.9	1.4
Ploidy** (%)	Diploid	72.7	71.9	70.8	75.4
	Aneuploid	27.3	28.1	29.2	24.6
Number of pregnancies (%)	None	16.4	15.8	17.5	15.8
	1-2	47.0	45.3	51.8	47.0
	≥3	36.6	38.8	30.7	36.6
Number of children (%)	None	18.8	19.4	19.7	17.3
	1-2	58.1	57.6	59.1	57.6
	≥3	23.1	23.0	21.2	25.2
Cigarettes (%)	Never	53.6	41.7	58.0	59.7
	Current	4.3	5.2	3.8	3.9
	Former	42.1	53.0	38.2	36.4
Snuff (%)	Never	96.9	96.5	98.3	95.8
	Current	2.3	2.6	0.8	3.4
	Former	0.9	0.9	0.8	0.8
Alcohol (%)	Never	9.1	10.1	8.7	8.6
	Current	86.8	86.3	87.7	86.3
	Former	4.1	3.6	3.6	5.0

*MET score groups: light (0-3), moderate (3-6), vigorous (≥6).
**Statistically significant difference within the tertiles was observed for the following characteristics.

Cadmium intake from tobacco was estimated as follows: mean cadmium level in each cigarette/snuff × mean number of cigarettes/snuff patches used × mean number of years of tobacco use (11,36). Cadmium intake from tobacco was analyzed independently from dietary intake due to a high possibility of statistical errors (36).

Table 2. Daily cadmium (Cd) intake from tobacco (mg/day).

Type of tobacco	Use	Number of women	Daily Cd intake (mg/day)
Cigarettes	Current	16	13.1
	Former	158	12.7
Snuff	Current	8	13.3
	Former	3	n.a.*

n.a.: not applicable.
*Snuff intake was not reported in the group.

Statistical Analyses

Descriptive statistics were used to describe our analytical cohort. Cox proportional hazard models were used for the statistical analyses. All women were considered at risk of relapse or death from the time of EC diagnosis. End of follow-up was identified at death or 1 February 2019, whichever occurred first.

We estimated crude and adjusted HRs by tertiles of daily dietary cadmium intake, based on the distribution among the cohort members, using the lowest tertile as the reference group. We also evaluated predefined, specified, individual characteristics as potential effect modifiers: educational level (<high school; high school or equal; >high school), tobacco use (never; current and/or former), body mass index (<25; ≥25), and leisure time physical activity (MET score, continuous). Effect modifications were examined by including the terms into the model, and they were all tested by the Wald test. Statistical analyses

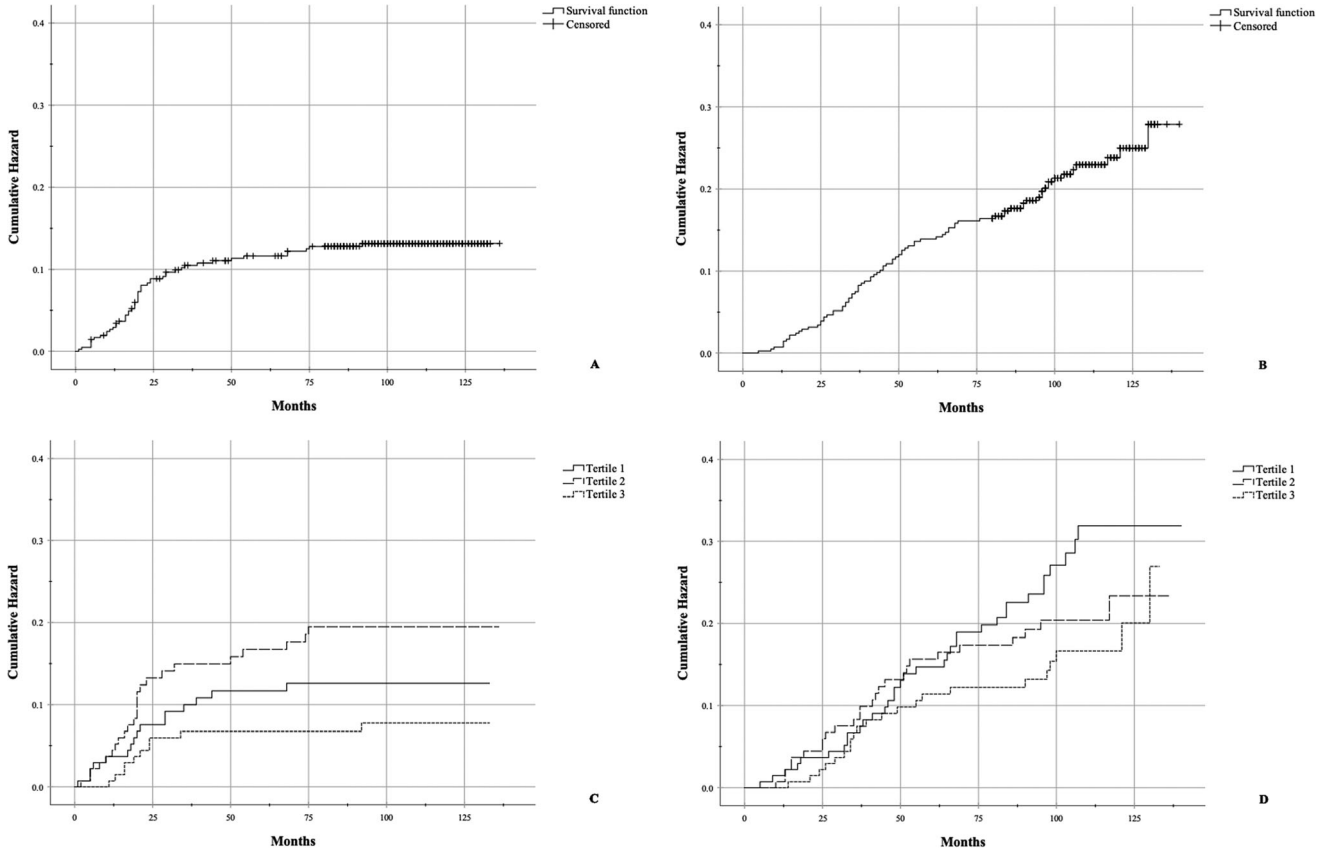

Figure 3. Progression free survival (A and C) and overall survival (B and D) in the whole cohort (A and B) and in each tertile of median daily dietary cadmium (Cd) intake (µg/day).

were performed with IBM SPSS Statistics for Macintosh, Version 25.0 (IBM Corp., Armonk, NY, USA) in August 2019.

Results

In this retrospective cohort study of women with EC from the Stockholm region, we estimated average daily dietary cadmium intake among 416 women with EC (Figure 1).

Median daily dietary cadmium intake in the cohort was 13.1 µg/day (interquartile range [IQR] 25%-75%=6.4) (Figure 2). At the same time, median weekly cadmium intake was 1.3 µg/kg of body weight. The dominant source of dietary cadmium intake was cereal products and vegetables (75.3%).

Baseline characteristics of the full cohort by tertiles of median daily dietary cadmium intake (µg/day) are summarized in Table 1. Median age and body mass index at the moment of diagnosis was 67.0 years and 26.0 kg/m^2, respectively. The most common tumor type was early-stage diploid endometroid carcinoma.

Median daily cadmium intake from tobacco was similar between current and former smokers/snuff users (Table 2).

In the entire cohort, median follow-up was 8.5 years. Using the Cox proportional hazard model, we observed that the daily dietary cadmium intake (µg/day) was significantly associated with decreased OS (HR = 0.956, 95% CI = 0.914-1.001, $p = 0.05$) (Figure 3). Physical activity decreased probability of death ($p < 0.0001$).

Daily dietary cadmium intake was not associated with PFS (HR = 0.975, 95% CI = 0.924-1.028, $p = 0.348$). However, the frequency of PFS events differed by tertile of median daily dietary cadmium intake: 12.9%, 18.1%, and 7.9%. The middle tertile had a significantly higher number of the PFS events when compared to tertiles 1 and 3 combined (HR = 1.804, 95% CI = 1.056-3.079, $p = 0.031$). PFS was decreased among women with type 2 EC ($p < 0.0001$) and more advanced-stage disease (FIGO stage III and IV) ($p < 0.0001$). Combining former and current smokers was not significantly associated with both PFS and OS (HR = 0.020, 95% CI = 0.571-1.823, $p = 0.945$; HR = 0.218, 95% CI = 0.503-1.286, $p = 0.363$).

When combined into a Cox proportional hazard model, we observed no significant input from the potential effect modifiers (educational level, tobacco

Table 3. HR of EC by different baseline characteristics among the PFS events and OS events according to daily dietary cadmium exposure.

Groups	Dietary cadmium exposure	N PFS events	Crude model HR* (95% CI**)	p	Adjusted model HR* (95% CI**) [a)]	p[b)]	N OS events	Crude model HR* (95% CI**)	p	Adjusted model HR* (95% CI**) [a)]	p[b)]
	Tertiles										
1	<11.3 μg Cd/day (n = 147)	18	1 (Ref.)	0.047	1 (Ref.)	0.131	35	1 (Ref.)	0.174	1 (Ref.)	0.567
2	11.3 – 14.9 μg Cd/day (n = 148)	25	1.421 (0.775-2.605)	0.256	1.205 (0.602-2.412)	0.598	26	0.753 (0.453-1.251)	0.274	0.810 (0.453-1.450)	0.479
3	>14.9 μg Cd/day (n = 146)	11	.585 (0.276-1.239)	0.161	0.515 (0.211-1.255)	1.444	22	0.608 (0.356-1.036)	0.067	0.720 (0.386-1.344)	0.302
	Subgroups[***]										
Type 1	13.9 μg increment Cd/day (n = 382)	43	1 (Ref.)	Ref.	n.a.	n.a.	67	1 (Ref.)	Ref.	n.a.	n.a.
Type 2	14.2 μg increment Cd/day (n = 34)	11	3.385 (1.744-6.570)	0.000	n.a.	n.a.	16	3.730 (2.157-6.449)	0.000	n.a.	n.a.
	Educational level										
>High school	14.3 μg increment (n = 120)	15	1 (Ref.)	0.193	1 (Ref.)	0.210	34	1 (Ref.)	0.053	1 (Ref.)	0.230
High school or equal	13.3 μg increment Cd/day (n = 97)	19	1.736 (0.882 – 3.417)	0.110	1.914 (0.880-4.165)	0.102	28	2.037 (1.137-3.648)	0.017	1.766 (0.916-3.404)	0.089
<High school	14.3 μg increment Cd/day (n = 132)	17	1.055 (0.527-2.133)	0.879	1.177 (0.532-2.603)	0.687	19	1.660 (0.946-2.913)	0.077	1.502 (0.790-2.859)	0.215
	Smoking										
Never	14.7 μg increment Cd/day (n = 188)	25	1 (Ref.)	0.996	1 (Ref.)	0.973	34	1 (Ref.)	0.652	1 (Ref.)	0.973
Current	13.5 μg increment Cd/day (n = 14)	2	1.015 (0.240-4.284)	0.984	0.990 (0.231-4.246)	0.989	3	1.140 (0.350-3.712)	0.828	0.990 (0.231-4.246)	0.989
Former	13.2 μg increment (n = 147)	19	0.976 (0.538-1.773)	0.937	0.927 (0.491-1.753)	0.817	33	1.253 (0.776-2.024)	0.356	0.927 (0.491-1.753)	0.817
	Body Mass Index										
<25 kg/m^2	15.1 μg increment Cd/day (n = 121)	13	1 (Ref.)	Ref.	1 (Ref.)	Ref.	26	1 (Ref.)	Ref.	1 (Ref.)	Ref.
≥25 kg/m^2	13.5 μg increment Cd/day (n = 228)	39	1.475 (0.788-2.764)	0.225	1.071 (0.542-2.116)	0.844	53	0.994 (0.622-1.590)	0.981	0.726 (0.431-1.223)	0.229
	Physical activity[****]										
MET-hours/day	n/a[****]	54	0.966 (0.918-1.016)	0.183	0.973 (0.914-1.035)	0.380	83	0.927 (0.892-0.964)	0.000	0.915 (0.872-0.959)	0.000

n.a.: not applicable.
[*]HR- Hazard ratio.
[**]CI confidence interval.
[***]Classification is based on pathological reports at the moment of diagnosis.
[****]Continues variable.
[a)]Adjusted for educational level (<High school; High school or equal; >High school), smoking status (never; former; current), BMI (<25; ≥25) and physical activity (MET score, continuous).
[b)]*p* values for interaction.

use, body mass index, and leisure time physical activity) by tertiles of daily dietary cadmium intake (Table 3).

Discussion

In the current study, we found that high median daily dietary cadmium intake significantly decreases OS in women with EC. However, daily dietary cadmium intake is not associated with PFS. To the best of our knowledge, our study is the first to report on the effects of cadmium on EC prognosis and outcome. The median daily dietary cadmium intake in our cohort of women with EC was 13.1 µg/day. Julin et al. reported similar values (14 µg/day) among women in the same region of Sweden (10). Meanwhile, the median weekly cadmium intake was 1.3 µg/kg of body weight, which is consistent with results obtained by the Swedish National Food Agency in 2015 (9).

The Panel on Contaminants in the Food Chain stated that a tolerable weekly cadmium intake is 2.5 µg/kg of body weight (37). This suggests that the patients in our cohort benefited from a high level of consumer protection. Moreover, due to Swedish regulations, Swedish women overall do not belong to a vulnerable group regarding cadmium exposure (38). Therefore, the results of our current study could be applicable to countries with similar strict regulations. However, the role of cadmium in the prognosis and outcome of hormone-related tumors like EC in polluted areas with high levels of cadmium exposure has yet to be described, and additional experimental and epidemiological studies in the respective areas are needed.

The dominant source of dietary cadmium intake was from cereal products and vegetables, which is in agreement with statements from the European Food Safety Authority (37). High cadmium intake is generally related to a healthier diet, since the main source of cadmium is vegetables and cereals. Nevertheless, we found that high median daily dietary cadmium intake increased the risk of death from EC. And, it would be interesting to explore further the association between dietary cadmium intake and OS in women with EC, especially in a cadmium-polluted area.

We also observed that women with type 2 EC and advanced-stage disease had a worse prognosis. In contrast, vigorous physical activity was associated with a better outcome. This is consistent with previous studies that have reported the benefits of regular physical activity in patients with cancer (39,40).

Although our study is the first to investigate the effects of cadmium on PFS and OS in women with EC, previous studies have examined the relationship between cadmium intake and the risk of developing EC.

For example, a meta-analysis of eight studies, which included a study by Akesson et al., examined the association between dietary cadmium intake and overall cancer risk and showed no significant correlation (41). At the same time, subgroup analyses including study design, geographic location, and type of cancer showed a positive association between dietary cadmium intake and cancer risk in studies from high-income countries, especially with hormone-related cancers such as EC. Another prospective study examined the connection between dietary cadmium intake and epithelial ovarian cancer risk over almost 19 years and found no significant correlation (42). One possible reason for this result may be that estrogen is not an aetiologic factor in ovarian cancer, but it may play a significant role in EC (43–45).

Our study has several strengths, such as the large number of women in the study sample, the use of individual clinical and pathological profiles, and the use of a self-created, detailed food-cadmium database that used the most up-to-date sources. The number of EC cases ($n = 416$) is considered to be high due to the specific study design. All women included in the study had a well-documented family history of EC and completed the detailed food frequency questionnaire. Another strength of the present study was the long-term follow-up (median follow-up was 102.0 mo,).

The retrospective design of the study may lead to misclassification. Moreover, the individual daily dietary cadmium intake was estimated by formula. Therefore, errors due to self-reported dietary intake cannot be excluded. Furthermore, our study used no biomarkers from blood or urine to validation the assessment of cadmium intake during the long study period. Today, it is recommended to check levels of the metal in blood and urine (46,47), and Julin et al. (48) validated the relationship between dietary cadmium intake and cadmium concentrations in urine and blood.

In summary, the present study found that high median daily dietary cadmium intake could be associated with poor in women with EC.

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Author Contributions

ZR, EÖ and MM conceived and designed the study. ZR, EÖ and MM did the data curation. ZR, IG and EÖ conducted the data analysis and drafted the initial manuscript. MM helped with results interpretation and gave critical comments for the manuscript. MM did the project administration and secured funding for data collection. All authors contributed to the final version of the manuscript.

Ethics Approval and Consent to Participate

All patients were given a written description of the study and completed an informed consent. Full anonymity of questionnaire information was guaranteed, as per the consent letter. To minimize integrity violations, we unidentified the patients after data collection. The ethical review board in Stockholm (Regionala etikprövningsnämnden i Stockholm) approved this project (dr nr 2006/649 and dr nr 2010/1536-31/2).

Disclosure Statement

No potential conflict of interest was reported by the author(s).

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Availability of Data and Materials

The datasets used and analyzed during the current study are available from the corresponding author on reasonable request.

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Karolinska Institutet

STUDIE OM KOST OCH LEVNADSVANOR

- Använd en svart eller blå kulspetspenna.
- Om Du vill ändra Ditt svar fyll den felaktigt ikryssade rutan **helt** och kryssa därefter i rätt ruta.

Personnummer ☐☐☐☐☐☐ – ☐☐☐☐

FYSISK AKTIVITET OCH MOTION

1. Din fysiska aktivitet under **det senaste året**.

Gång och cykling

☐ Nästan aldrig
☐ Mindre än 20 min/dag
☐ 20-40 minuter/dag
☐ 40-60 minuter/dag
☐ 1-1,5 tim/dag
☐ Mer än 1,5 timmar/dag

Daglig sysselsättning eller arbete

☐ Mest stillasittande
☐ Sitter ca 1/2 tiden
☐ Mest stående
☐ Går mest, lyfter/bär lite
☐ Går mest, lyfter/bär mycket
☐ Tungt kroppsarbete

Hem och hushållsarbete

☐ Mindre än 1 tim/dag
☐ 1-2 timmar/dag
☐ 3-4 timmar/dag
☐ 5-6 timmar/dag
☐ 7-8 timmar/dag
☐ Mer än 8 timmar/dag

Titta på TV eller sitta och läsa

☐ Mindre än 1 tim/dag
☐ 1-2 timmar/dag
☐ 3-4 timmar/dag
☐ 5-6 timmar/dag
☐ 7-8 timmar/dag
☐ Mer än 8 tim/dag

Gym och gymnastik

☐ Nästan aldrig
☐ Mindre än 1 tim/vecka
☐ 1 timme/vecka
☐ 2-3 timmar/vecka
☐ 4-5 timmar/vecka
☐ Mer än 5 timmar/vecka

2. Hur långt kan Du gå utomhus?

☐ Kan ej gå utomhus
☐ Endast kortare sträckor
☐ Nästan så långt jag vill
☐ Obegränsat långt

3. Utför Du vanligtvis någon fysisk aktivitet (som gör Dig andfådd) i sammanlagt mer än 2 timmar per vecka? *t ex trädgårdsarbete, raskpromenad eller liknande*

☐ Ja ☐ Nej

SOLVANOR

4. Brukar Du åka på solsemester vintertid?

☐ Nej ☐ Ja, ibland ☐ Ja, varje år

5. Hur reagerar Din hud om Du solar?

☐ Alltid röd/aldrig brun
☐ Alltid röd/ibland brun
☐ Ibland röd/alltid brun
☐ Aldrig röd/alltid brun

6. När det är soligt är Du helst i:

☐ Solen hela tiden
☐ Både i sol och skugga
☐ Söker skugga hela tiden

7. Använder Du solskyddskräm?

☐ Ja, alltid ☐ Oftast ☐ Ibland ☐ Nej

MÅLTIDSFRÅGOR

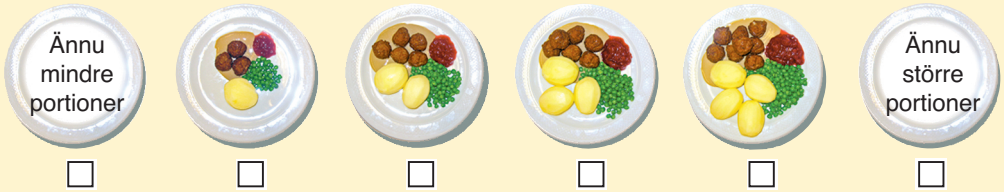
8. Vilka måltider brukar Du vanligtvis äta?

☐ Frukost ☐ Lunch ☐ Middag
☐ Mellanmål 1 ☐ Mellanmål 2 ☐ Mellanmål 3

9. Hur ofta i genomsnitt brukar Du äta följande?

	Gånger per månad		per vecka			per dag		
	0	1-3	1-2	3-4	5-6	1	2	3+
Lagad varm mat	☐	☐	☐	☐	☐	☐	☐	☐
Måltider utanför hemmet	☐	☐	☐	☐	☐	☐	☐	☐
Färdigköpta frysrätter	☐	☐	☐	☐	☐	☐	☐	☐
Mat lagrad i konservburk	☐	☐	☐	☐	☐	☐	☐	☐
Färdiglagad mat *(service-hus, hemtjänst, anhörig)*	☐	☐	☐	☐	☐	☐	☐	☐
Fisk	☐	☐	☐	☐	☐	☐	☐	☐
Kött	☐	☐	☐	☐	☐	☐	☐	☐

10. Hur stora portioner äter Du?
Kryssa för den bild som passar bäst in på Dina portioner **(volymmässigt).**



☐ ☐ ☐ ☐ ☐ ☐

11. Vilken typ av kost äter Du i huvudsak? ☐ Blandkost ☐ Vegetarisk kost ☐ Vegankost

12. Utesluter/undviker Du något i kosten? ☐ Gluten ☐ Laktos ☐ Mjölkprotein ☐ Nötter
☐ Annat:_____ ☐ Inget

13. Under barndomen, åt Du mer sötsaker *(t ex kakor, godis, söta desserter, kräm, saftsås)* än Dina jämnåriga kamrater?

☐ Ja, mycket mer ☐ Ja, lite mer ☐ Nej, samma ☐ Nej, lite mindre ☐ Nej, åt inte alls

14. Hur ofta åt Du dessa sötsaker? ☐☐ gånger/vecka **eller** ☐☐ gånger/månad ☐ Vet ej

DET SENASTE ÅRETS KOSTVANOR

15. Hur mycket brukar Du dricka/äta av följande?
Om Du inte dricker/äter livsmedlet fyll i ”0”.
1 glas, 1 kopp= 2 dl ***(ange i heltal).***

	Per dag	***eller***	Per vecka
Lätt/minimjölk		glas/d		glas/v
Mellanmjölk		glas/d		glas/v
Standardmjölk		glas/d		glas/v
Fruktyoghurt/fil		glas/d		glas/v
Lättfil/lättyoghurt		glas/d		glas/v
Mellanfil		glas/d		glas/v
Filmjölk/yoghurt		glas/d		glas/v
Vatten (även mineral)		glas/d		glas/v
Coca Cola/Pepsi, *light*		glas/d		glas/v
Coca Cola/Pepsi		glas/d		glas/v
Annan läsk/ saft, *light*		glas/d		glas/v
Annan läsk/saft		glas/d		glas/v
Grönt te		kopp/d		koppar/v
Örtte/rött te		kopp/d		koppar/v
Te (vanligt svart)		kopp/d		koppar/v
Kaffe (brygg/snabb)		kopp/d		koppar/v
Kaffe (kok)		kopp/d		koppar/v
Socker		tesked bitar/d		tesked bitar/v
Honung		msk/d		msk/v
Keso/kvarg		msk/d		msk/v
Mjukost, *mager*		msk/d		msk/v
Mjukost		msk/d		msk/v
Hårdost, *mager*		skivor/d		skivor/v
Hårdost		skivor/d		skivor/v
Dessertost		msk/d		msk/v
Leverpastej, *light*		msk/d		msk/v
Leverpastej		msk/d		msk/v
Knäckebröd		skivor/d		skivor/v
Vitt bröd/ limpa		skivor/d		skivor/v
Fiberberikat bröd		skivor/d		skivor/v
Grovt/fullkornsbröd		skivor/d		skivor/v

16. Använder Du vanligtvis mjölk i kaffe eller te?
☐ Ja, i kaffe ☐ Ja, i te ☐ Nej

17. Kryssa för hur ofta Du i genomsnitt brukar äta av följande. *Sätt bara* ***ett*** *kryss på varje fråga.*
Kryssa *i ”0-rutan” om Du* ***sällan eller aldrig*** *äter livsmedlet.*

	Gånger per månad		per vecka			per dag		
SPANNMÅL	0	1-3	1-2	3-4	5-6	1	2	3+
Havregryn/råggröt	☐	☐	☐	☐	☐	☐	☐	☐
Annan gröt/välling	☐	☐	☐	☐	☐	☐	☐	☐
Müsli	☐	☐	☐	☐	☐	☐	☐	☐
Frukostflingor	☐	☐	☐	☐	☐	☐	☐	☐
Vete- eller havrekli	☐	☐	☐	☐	☐	☐	☐	☐
Linfrön	☐	☐	☐	☐	☐	☐	☐	☐
Sesamfrön	☐	☐	☐	☐	☐	☐	☐	☐
Solrosfrön/pumpafrön mm	☐	☐	☐	☐	☐	☐	☐	☐
Fullkornsmakaroner/spagetti	☐	☐	☐	☐	☐	☐	☐	☐
Spagetti/makaroner/pasta	☐	☐	☐	☐	☐	☐	☐	☐
Pannkakor/plättar	☐	☐	☐	☐	☐	☐	☐	☐
Cous-cous/bulgur	☐	☐	☐	☐	☐	☐	☐	☐
Råris	☐	☐	☐	☐	☐	☐	☐	☐
Ris	☐	☐	☐	☐	☐	☐	☐	☐

	Gånger per månad		per vecka			per dag		
KÖTT	0	1-3	1-2	3-4	5-6	1	2	3+
Köttfärsrätter (köttbullar/ pannbiff/köttfärssås)	☐	☐	☐	☐	☐	☐	☐	☐
Fläskkött (helt/gryta)	☐	☐	☐	☐	☐	☐	☐	☐
Nöt/kalvkött (helt/gryta)	☐	☐	☐	☐	☐	☐	☐	☐
Bacon/sidfläsk	☐	☐	☐	☐	☐	☐	☐	☐
Annat kött	☐	☐	☐	☐	☐	☐	☐	☐
Mager korv	☐	☐	☐	☐	☐	☐	☐	☐
Falukorv	☐	☐	☐	☐	☐	☐	☐	☐
Annan korv	☐	☐	☐	☐	☐	☐	☐	☐
Blodpudding/blodkorv	☐	☐	☐	☐	☐	☐	☐	☐
Lever/njure	☐	☐	☐	☐	☐	☐	☐	☐
Köttpålägg (t ex skinka/kalkon)	☐	☐	☐	☐	☐	☐	☐	☐
Korvpålägg (t ex salami)	☐	☐	☐	☐	☐	☐	☐	☐

	Gånger per månad		per vecka			per dag		
FISK, FÅGEL & ÄGG	0	1-3	1-2	3-4	5-6	1	2	3+
Rökt fisk	☐	☐	☐	☐	☐	☐	☐	☐
Sill/strömming/makrill	☐	☐	☐	☐	☐	☐	☐	☐
Lax	☐	☐	☐	☐	☐	☐	☐	☐
Sardiner	☐	☐	☐	☐	☐	☐	☐	☐
Torsk/sej/spätta/hoki	☐	☐	☐	☐	☐	☐	☐	☐
Tonfisk	☐	☐	☐	☐	☐	☐	☐	☐
Gädda/gös/abborre	☐	☐	☐	☐	☐	☐	☐	☐
Fiskpinnar	☐	☐	☐	☐	☐	☐	☐	☐
Annan fisk	☐	☐	☐	☐	☐	☐	☐	☐
Rom (t ex stenbit)	☐	☐	☐	☐	☐	☐	☐	☐
Kaviar (t ex Kalles)	☐	☐	☐	☐	☐	☐	☐	☐
Skaldjur (t ex räkor, kräftor etc.)	☐	☐	☐	☐	☐	☐	☐	☐
Kyckling/annan fågel	☐	☐	☐	☐	☐	☐	☐	☐
Ägg/omelett	☐	☐	☐	☐	☐	☐	☐	☐

POTATIS/ROTFRUKTER	Gånger per månad 0	1-3	per vecka 1-2	3-4	5-6	per dag 1	2	3+
Kokt potatis	☐	☐	☐	☐	☐	☐	☐	☐
Stekt potatis	☐	☐	☐	☐	☐	☐	☐	☐
Bakad potatis, potatismos	☐	☐	☐	☐	☐	☐	☐	☐
Pommes frites	☐	☐	☐	☐	☐	☐	☐	☐
Morötter	☐	☐	☐	☐	☐	☐	☐	☐
Rödbetor	☐	☐	☐	☐	☐	☐	☐	☐

GRÖNSAKER/BÖNOR	Gånger per månad 0	1-3	per vecka 1-2	3-4	5-6	per dag 1	2	3+
Sallat/isbergssallat	☐	☐	☐	☐	☐	☐	☐	☐
Vitkål/rödkål/salladskål	☐	☐	☐	☐	☐	☐	☐	☐
Blomkål	☐	☐	☐	☐	☐	☐	☐	☐
Broccoli/brysselkål	☐	☐	☐	☐	☐	☐	☐	☐
Tomat/tomatjuice	☐	☐	☐	☐	☐	☐	☐	☐
Paprika	☐	☐	☐	☐	☐	☐	☐	☐
Spenat	☐	☐	☐	☐	☐	☐	☐	☐
Gröna ärtor	☐	☐	☐	☐	☐	☐	☐	☐
Lök	☐	☐	☐	☐	☐	☐	☐	☐
Vitlök	☐	☐	☐	☐	☐	☐	☐	☐
Purjolök	☐	☐	☐	☐	☐	☐	☐	☐
Blandade frysta grönsaker	☐	☐	☐	☐	☐	☐	☐	☐
Andra grönsaker	☐	☐	☐	☐	☐	☐	☐	☐
Ärtsoppa	☐	☐	☐	☐	☐	☐	☐	☐
Bönor/linser/kikärter	☐	☐	☐	☐	☐	☐	☐	☐
Avokado	☐	☐	☐	☐	☐	☐	☐	☐
Oliver	☐	☐	☐	☐	☐	☐	☐	☐
Majs	☐	☐	☐	☐	☐	☐	☐	☐

FRUKT/BÄR	Gånger per månad 0	1-3	per vecka 1-2	3-4	5-6	per dag 1	2	3+
Apelsin/citrusfrukt	☐	☐	☐	☐	☐	☐	☐	☐
Apelsinjuice/grapefruktjuice	☐	☐	☐	☐	☐	☐	☐	☐
Äpple/päron	☐	☐	☐	☐	☐	☐	☐	☐
Banan	☐	☐	☐	☐	☐	☐	☐	☐
Annan frukt	☐	☐	☐	☐	☐	☐	☐	☐
Bär (färska eller frysta)	☐	☐	☐	☐	☐	☐	☐	☐
Lingonsylt	☐	☐	☐	☐	☐	☐	☐	☐
Annan sylt	☐	☐	☐	☐	☐	☐	☐	☐
Fruktkräm/fruktsoppor	☐	☐	☐	☐	☐	☐	☐	☐
Katrinplommon (inkl juice)	☐	☐	☐	☐	☐	☐	☐	☐
Russin	☐	☐	☐	☐	☐	☐	☐	☐
Aprikoser/annan torkad frukt	☐	☐	☐	☐	☐	☐	☐	☐

KAKOR/GODIS M.M.	Gånger per månad 0	1-3	per vecka 1-2	3-4	5-6	per dag 1	2	3+
Kaffebröd (bullar, kakor)	☐	☐	☐	☐	☐	☐	☐	☐
Kex/rån/skorpor	☐	☐	☐	☐	☐	☐	☐	☐
Tårta/konditoribit/"GoBit"	☐	☐	☐	☐	☐	☐	☐	☐
Choklad	☐	☐	☐	☐	☐	☐	☐	☐
Godis (ej choklad)	☐	☐	☐	☐	☐	☐	☐	☐
Glass	☐	☐	☐	☐	☐	☐	☐	☐
Chips/popcorn/ostbågar	☐	☐	☐	☐	☐	☐	☐	☐
Jordnötter	☐	☐	☐	☐	☐	☐	☐	☐
Nötter/mandlar	☐	☐	☐	☐	☐	☐	☐	☐

ÖVRIGT	Gånger per månad 0	1-3	per vecka 1-2	3-4	5-6	per dag 1	2	3+
Salladsdressing, *Lätt/fettfri*	☐	☐	☐	☐	☐	☐	☐	☐
Salladsdressing	☐	☐	☐	☐	☐	☐	☐	☐
Majonnäs, *Lätt/fettfri*	☐	☐	☐	☐	☐	☐	☐	☐
Majonnäs	☐	☐	☐	☐	☐	☐	☐	☐
Crème fraiche, *Lätt/mini*	☐	☐	☐	☐	☐	☐	☐	☐
Crème fraiche	☐	☐	☐	☐	☐	☐	☐	☐
Grädde	☐	☐	☐	☐	☐	☐	☐	☐
Matlagningsgrädde, gräddfil	☐	☐	☐	☐	☐	☐	☐	☐
Yoghurt till matlagning (8-10%)	☐	☐	☐	☐	☐	☐	☐	☐
Pizza	☐	☐	☐	☐	☐	☐	☐	☐
Ketchup	☐	☐	☐	☐	☐	☐	☐	☐
Örtkryddor (färska)	☐	☐	☐	☐	☐	☐	☐	☐
Örtkryddor (torkade)	☐	☐	☐	☐	☐	☐	☐	☐
Kanel	☐	☐	☐	☐	☐	☐	☐	☐
Peppar	☐	☐	☐	☐	☐	☐	☐	☐
Salt (extra vid bordet)	☐	☐	☐	☐	☐	☐	☐	☐

18. Kryssa för den typ av matfett Du brukar använda

…i matlagning

☐ Smör ☐ Bregott
☐ Hushållsmargarin ☐ Flytande smör
☐ Flytande margarin ☐ Olivolja
☐ Rapsolja ☐ Majs- eller solrosolja
☐ Annat ☐ Inget

…i hemgjord dressing

☐ Olivolja ☐ Rapsolja
☐ Majs- eller solrosolja ☐ Annan olja ☐ Ingen

…på smörgåsar

☐ Smör ☐ Bregott
☐ Smörgåsmargarin ☐ Lättmargarin
☐ Becel ☐ Olja ☐ Annat

19. Hur många brödskivor med matfett (smör/margarin) brukar Du äta per dag **eller** per vecka?

☐ skivor/dag ☐ skivor/vecka
☐ Använder inget matfett på smörgåsar

20. Hur tjockt brukar Du breda Dina smörgåsar?

☐ Ganska tjockt ☐ Tunt ☐ Mycket tunt

21. Hur ofta brukar Du äta dessa stekta maträtter?

	Gånger/månad	Aldrig/ Sällan
Korv/biff/fläskkotlett *(stekt i stekpanna)*	☐	☐
Fisk stekt i stekpanna	☐	☐
Kyckling/filéer/gryta *(stekt/brynt i stekpanna)*	☐	☐
Grillad/ugnstekt kyckling	☐	☐
Sky/sås av sky	☐	☐

22. Kryssa för hur hårt stekt Din mat brukar vara.

☐ Lätt stekyta (ljust brun) ☐ Kraftig stekyta
☐ Måttlig stekyta (brun) ☐ Mycket kraftigt stekt
☐ Äter inte stekt mat

KOSTTILLSKOTT OCH MEDICINER

23. Äter Du vitamin-, mineral- eller annat tillskott?

☐ Aldrig ☐ Ja, då och då ☐ Ja, regelbundet

Aldrig= Ingen eller enstaka gång
Då och då= 1-2 tabl/vecka eller mindre än 100 tabl/år
Regelbundet= 3-7 tabl/vecka

Kryssa för	Hur ofta? Aldrig	Då och då	Regelbundet	Sedan hur många år? Mindre än 1	1-4	5-9	10-19	20 eller mer
KOSTTILLSKOTT								
Multivitaminer med mineraler	☐	☐	☐	☐	☐	☐	☐	☐
Multivitaminer utan mineraler	☐	☐	☐	☐	☐	☐	☐	☐
Vitamin B komplex	☐	☐	☐	☐	☐	☐	☐	☐
Vitamin B12	☐	☐	☐	☐	☐	☐	☐	☐
Vitamin B6	☐	☐	☐	☐	☐	☐	☐	☐
Folsyra	☐	☐	☐	☐	☐	☐	☐	☐
Vitamin C	☐	☐	☐	☐	☐	☐	☐	☐
Vitamin E	☐	☐	☐	☐	☐	☐	☐	☐
Beta-karoten	☐	☐	☐	☐	☐	☐	☐	☐
Magnesium	☐	☐	☐	☐	☐	☐	☐	☐
Kalcium	☐	☐	☐	☐	☐	☐	☐	☐
Vitamin D	☐	☐	☐	☐	☐	☐	☐	☐
Järn	☐	☐	☐	☐	☐	☐	☐	☐
Zink	☐	☐	☐	☐	☐	☐	☐	☐
Selen	☐	☐	☐	☐	☐	☐	☐	☐
Fiskolja	☐	☐	☐	☐	☐	☐	☐	☐
Linfröolja	☐	☐	☐	☐	☐	☐	☐	☐
Levande bakteriekultur Verum, Actimel, ProViva, Cultura	☐	☐	☐	☐	☐	☐	☐	☐

Kryssa för	Hur ofta? Aldrig	Då och då	Regelbundet	Sedan hur många år? Mindre än 1	1-4	5-9	10-19	20 eller mer
MEDICINER								
Kortison i tablettform eller inhalation	☐	☐	☐	☐	☐	☐	☐	☐
Alvedon, Panodil, Reliv, Citodon, Panocod	☐	☐	☐	☐	☐	☐	☐	☐
Ipren, Diklofenak, Voltaren, Ibumetin, Naproxen	☐	☐	☐	☐	☐	☐	☐	☐
Magnecyl, Bambyl, Treo, Aspirin, Albyl, Trombyl	☐	☐	☐	☐	☐	☐	☐	☐
Sömnmedel	☐	☐	☐	☐	☐	☐	☐	☐

24. Kryssa för om Du äter något av följande preparat.

☐ Ginseng/Gerimax ☐ Jästpreparat ☐ Q10
☐ Johannesört ☐ Rosenrot ☐ Krom
☐ Curbisin/Sabamin ☐ Ginkgo Biloba ☐ Tone
☐ Tarmreglerande ☐ Fibertillskott ☐ Cernitol
☐ Valerina Natt/Forte ☐ Remifemin ☐ Litozin
☐ Vitlökskapslar ☐ Echinacea / Kan Jang / Esberitox

ALKOHOL

25. Kryssa för hur ofta Du brukar dricka alkohol.

☐ Jag har aldrig druckit alkohol

☐ Jag slutade dricka alkohol när jag var ☐ år gammal

	Gånger per månad			per vecka			
Jag brukar dricka	**Aldrig**	**0-1**	**2-3**	**1-2**	**3-4**	**5-6**	**7**
Lättöl, kl I	☐	☐	☐	☐	☐	☐	☐
Folköl, kl II	☐	☐	☐	☐	☐	☐	☐
Starköl	☐	☐	☐	☐	☐	☐	☐
Rött vin	☐	☐	☐	☐	☐	☐	☐
Vitt vin	☐	☐	☐	☐	☐	☐	☐
Likör/sherry/starkvin	☐	☐	☐	☐	☐	☐	☐
Starksprit	☐	☐	☐	☐	☐	☐	☐

26. Hur mycket brukar Du dricka per gång av följande?

Öl ☐ cl Vin ☐ cl Likör ☐ cl Sprit ☐ cl

1 burk öl=33/50 cl, flaska vin/sprit=75 cl, 1 dl=10 cl

TOBAK

27. Kryssa för om Du har rökt cigaretter regelbundet.

Regelbundet= mer än 5 cigaretter/vecka

☐ Nej, jag har aldrig rökt cigaretter regelbundet
☐ Ja, jag röker
☐ Ja, men jag slutade röka för ☐ år sedan

Ange antal rökta cigaretter per dag vid olika åldrar

51-60 år	61-70 år	71-80 år	81- år	i år

28. Kryssa för om Du har snusat regelbundet.

Regelbundet= mer än 5 portioner snus/vecka

☐ Nej, jag har aldrig snusat regelbundet
☐ Ja, jag snusar
☐ Ja, men jag slutade snusa för ☐ år sedan

Ange antal portioner (”prillor”) snus per dag vid olika åldrar

51-60 år	61-70 år	71-80 år	81- år	i år

UTOMHUSVISTELSE

29. Hur mycket brukar Du vistas utomhus under…

(t ex i naturen, i trädgården, i parken, på terrass/balkong, på promenad)

...vår och sommar ☐ tim/vecka ☐ Mycket sällan

…höst och vinter ☐ tim/vecka ☐ Mycket sällan

Jag har läst bifogat informationsbrev och vill fortsätta delta i studien.

……
Underskrift

Det är bra om Du kan gå igenom och kontrollera att frågorna är fullständigt besvarade

Skicka formuläret i det bifogade portofria svarskuvertet

STORT TACK FÖR DIN MEDVERKAN

KAROLINSKA
INSTITUTET

STUDIE OM KOST OCH LEVNADSVANOR DEL 2

- Använd en svart eller blå kulspetspenna.
- Om Du vill ändra Ditt svar fyll den felaktigt ikryssade rutan **helt** och kryssa därefter i rätt ruta.

Personnummer |_|_|_|_|_|_| – |_|_|_|_|

LÄNGD OCH VIKT

1. Hur lång är Du och vad väger Du?

Längd: |_|_|_| cm Vikt: |_|_|_| kg

2. Vad var Din födelsevikt?

Vikt: |_|_|_| kg

3. Vad vägde Du när Du var 18 år?

Vikt: |_|_|_| kg

4. Vad vägde Du för fem år sedan?

Vikt: |_|_|_| kg

5. Vad vägde Du ett år före Din cancerdiagnos?

Vikt: |_|_|_| kg

6. Hur mycket har Du vägt som mest och vid vilken ålder?

Vikt: |_|_|_| kg Ålder: |_|_| år

KVINNOFRÅGOR

7. Hur gammal var Du när Du fick Din första menstruation?

Ålder: |_|_| år

8. Har Du fortfarande menstruationsblödningar?

☐ Ja, "naturliga"

☐ Ja, p.g.a. hormonbehandling

☐ Nej, de upphörde när jag var |_|_| år gammal

Om nej: ☐ menstruationen upphörde naturligt

☐ p.g.a. att äggstockarna blev bortopererade

☐ p.g.a. att livmodern blev bortopererad

☐ p.g.a. att både livmoder och äggstockarna blev bortopererade

☐ menstruationen upphörde efter cytostatikabehandlling (cellgifter) el strålbehandling

9. Hur många gånger har Du varit gravid?

Antal: |_|_| graviditeter

Hur gammal var Du vid första graviditeten? |_|_| år

10. Hur många barn har Du fött?

Antal: |_|_| barn

Hur gammal var Du vid första barnets födelse? |_|_| år

Har Du ammat Ditt/Dina barn?

☐ Nej

☐ Ja, jag ammade mitt/mina barn i sammanlagt

|_|_| månader.

11. Har Du någon gång använt p-piller, p-spruta eller p-stavar?
Räkna inte s.k. minipiller.

☐ Ja, totalt i |_|_| år

☐ Nej, jag har aldrig använt p-piller/p-spruta/p-stavar

12. Har Du tagit hormoner (östrogen/progesteron, plåster el tablett) vid övergångsåldern eller senare? Om ja, hur länge?

☐ Ja, för att lindra blodvallningar, svettningar m.m.
totalt i ☐☐ år

☐ Ja, för att avhjälpa torrhet/besvär i underlivet
totalt i ☐☐ år

☐ Ja, för andra orsaker (t ex benskörhet)
totalt i ☐☐ år

☐ Nej, jag har aldrig haft någon hormonbehandling

13. Har Du genomgått IVF-behandling?

☐ Nej

☐ Ja, jag har genomgått IVF-behandling totalt
☐☐ gånger

mellan åldrarna ☐☐ - ☐☐ år

14. Frågor om mammografi.
Vilket år gjorde Du mammografi första gången?

år ☐☐☐☐

Jag har genomgått mammografi regelbundet:

☐ 1 gång/år

☐ Var 18:e månad

☐ Vart annat år

från och med ☐☐ års ålder

Vilket år gjorde Du mammografi senast?

år ☐☐☐☐

Skriv ned **var** Du gjorde Din första och Din senaste mammografi:
Första: .....

Senaste: .....

15. Har Du någon gång genomgått en röntgenundersökning av bröstkorgen eller fått strålbehandling mot bröstkorgen?
☐ Nej ☐ Ja

Om ja, ange vilken typ av undersökning/behandling och vid vilken ålder (ange alla tillfällen)?

..... ☐☐ år

..... ☐☐ år

..... ☐☐ år

..... ☐☐ år

HÄLSA

16. Har du diabetes (sockersjuka)?

☐ Nej

☐ Ja, jag har diabetes sedan år ☐☐☐☐
☐ Kost-, tablettbehandling
☐ Insulinbehandling

17. Har Du regelbundet (minst 1 tablett/vecka) använt blodfettssänkande mediciner (t.ex Simvastatin, Pravachol, Zocord)?

☐ Nej ☐ Ja

Om ja: ☐☐ tabl/vecka från år ☐☐☐☐

ÖVRIGA FRÅGOR

18. Vilka utbildningar/skolor har Du gått?

☐ Folkskola/Grundskola ☐ Gymnasium
☐ Realskola ☐ Universitet/Högskola
☐ Yrkesskola/Flickskola ☐ Annan utbildning

19. Var växte Du upp?

☐ I storstad/förort ☐ I en mellanstor stad
☐ I mindre stad/samhälle ☐ På landsbygden

20. Hur många hel/halvsyskon har Du?

Systrar ☐☐ Bröder ☐☐

21. Har ytterligare någon i familjen insjuknat i cancer sedan ärftlighetsutredningen gjordes? Ange i sådana fall vem (syster, mor, farfar osv), vilket år och vilken typ av cancer (*obs: denna fråga besvaras endast av Dig som utretts för ärftlig bröstcancer).*

.....

.....

.....

Ange gärna ett telefonnummer som vi kan nå Dig på om det uppkommer frågor:

Telefon: .....

Det är bra om Du kan gå igenom och kontrollera att frågorna är fullständigt besvarade
Skicka formuläret i det bifogade portofria svarskuvertet

STORT TACK FÖR DIN MEDVERKAN !