

Coffee consumption and risk of endometrial cancer: a dose-response meta-analysis of prospective cohort studies

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Appendix 1

Quality assessment according to the Newcastle-Ottawa scale.

Study	Country	Selection	Comparability	Outcome	Score
Jacobsen,1986	Norway	4	0	3	7
Stensvold,1994	Norway	2	0	3	6
Shimazu,2008	Japan	4	2	3	9
Friberg,2009	Sweden	3	0	3	6
Nilsson,2010	Sweden	4	1	2	7
Giri,2011	USA	4	2	2	8
Je,2011	USA	2	2	3	7
Gunter,2012	USA	2	2	3	7
Uccella,2013	USA	4	2	2	8
Gavrilyuk,2014	Norway	4	1	3	8
Weiderpass,2014	Sweden	4	2	3	9
Merritt,2015	Europe	4	2	3	9
Owenyang,2015	United Kingdom	4	2	2	8

Appendix 2

Power calculations: The methodology use is described by Hedges 2001¹ and this macro was obtained from the supplementary material in Cafri 2009². The SAS code for power calculations is below:

Power calculation for meta-analysis of total coffee intake and risk of endometrial cancer(highest versus lowest category)

```

data coffeel;
input es v;
cards;
-0.653926467 1.205550833
-0.223143551 0.192672522
-0.967584026 0.196635863
-0.287682072 0.017211028
-0.127833372 0.127112971
-0.15082289 0.025628571
-0.287682072 0.018394813

```

```

-0.446287103  0.013189878
-0.342490309  0.028631249
-0.174353387  0.225159622
-0.446287103  0.065061102
-0.653926467  0.046256523
-0.210721031  0.00821073
-0.083381609  0.003383255
;
run;
%metapower (test='M', model='fixed', raw_data='yes', alpha=.05,
tau2=99, heterogeneity=99, n1=99, n2=99, k=99, eff_type='or',
T= -0.356674944, Dataset=coffee1, B=NA, v=v, x=NA, es=es, p=NA,
weight=NA);
run;

```

Power calculation for meta-analysis of caffeine dosage and risk of endometrial cancer(highest versus lowest category)

```

data coffee2;
input es v;
cards;
-0.328504067  0.019439167
-0.210721031  0.019194016
-0.020202707  0.176308224
-0.274436846  0.045146398
;
run;
%metapower (test='M', model='fixed', raw_data='yes', alpha=.05,
tau2=99, heterogeneity=99, n1=99, n2=99, k=99, eff_type='or',
T= -0.261364764, Dataset=coffee2, B=NA, v=v, x=NA, es=es, p=NA,
weight=NA);
run;

```

Power calculation for meta-analysis of caffeinated coffee intake and risk of endometrial cancer(highest versus lowest category)

```

data coffee3;
input es v;
cards;
-0.116533816  0.031983705
-0.356674944  0.02518142
-0.776528789  0.024755988
-0.430782916  0.026529825
-0.162518929  0.17755308

```

```

;
run;
%metapower (test='M', model='random', raw_data='yes', alpha=.05,
tau2=99, heterogeneity=99, n1=99, n2=99, k=99, eff_type='or',
T=-0.415515444, Dataset=coffee3, B=NA, v=v, x=NA, es=es, p=NA,
weight=NA);
run;

```

Power calculation for meta-analysis of decaffeinated coffee intake and risk of endometrial cancer(highest versus lowest category)

```

data coffee4;
input es v;
cards;
-0.673344553 0.130456071
-0.248461359 0.026578977
-0.210721031 0.041494074
-0.274436846 0.045146398
0.076961041 0.240204395
;
run;
%metapower (test='M', model='fixed', raw_data='yes', alpha=.05,
tau2=99, heterogeneity=99, n1=99, n2=99, k=99, eff_type='or',
T=-0.261364764, Dataset=coffee4, B=NA, v=v, x=NA, es=es, p=NA,
weight=NA);
run;

```

Power calculation for meta-analysis of boiled coffee intake and risk of endometrial cancer(highest versus lowest category)

```

data coffee5;
input es v;
cards;
-0.274436846 0.264202037
-0.798507696 0.160530659;
run;
%metapower (test='M', model='fixed', raw_data='yes', alpha=.05,
tau2=99, heterogeneity=99, n1=99, n2=99, k=99, eff_type='or',
T=-0.597837001, Dataset=coffee5, B=NA, v=v, x=NA, es=es, p=NA,
weight=NA);
run;

```

Power calculation for meta-analysis of filtered coffee intake and risk of endometrial cancer(highest versus lowest category)

```
data coffee6;
input es v;
cards;
0.104360015    0.099021256
-0.597837001    0.274887469
;
run;
%metapower (test='M', model='random', raw_data='yes', alpha=.05,
tau2=99, heterogeneity=99, n1=99, n2=99, k=99, eff_type='or',
T= -0.287682072, Dataset=coffee6, B=NA, v=v, x=NA, es=es, p=NA,
weight=NA);
run;
```

References

- 1 Hedges, L. V. & Pigott, T. D. The power of statistical tests in meta-analysis. *Psychological methods* **6**, 203-217 (2001).
- 2 Cafri, G., Kromrey, J. D. & Brannick, M. T. A SAS macro for statistical power calculations in meta-analysis. *Behavior research methods* **41**, 35-46, doi:10.3758/BRM.41.1.35 (2009).