

Supplementary Table S11. Statistically significant associations between prediagnostic circulating levels of sex hormone and the risk of gastrointestinal cancer NOT included in meta-analysis

First author	Year	Sex	Sex hormone	Cancer site	Comparisons	OR (95% CI)
Jessica L. Petrick ¹	2019	Men	Dehydroepiandrosterone	Gastric cardia adenocarcinoma	Highest vs. lowest quartiles	0.34 (0.14-0.81)
Jessica L. Petrick ¹	2019	Men	Free estradiol	Gastric cardia adenocarcinoma	Highest vs. lowest quartiles	0.42 (0.21-0.86)
Jessica L. Petrick ²	2020	Postmenopausal women	4-androstenedione	Total liver cancer	Highest vs. lowest quartiles	0.27 (0.09-0.80)
Jessica L. Petrick ²	2020	Postmenopausal women	Androstenedione/estrone	Total liver cancer	Highest vs. lowest quartiles	0.27 (0.08-0.91)
Muktar Ahmed ³	2023	Men	Free estradiol	Total liver cancer	Per standard deviation increase	2.54 (2.19-2.93)
Muktar Ahmed ³	2023	Men	Free estradiol	Hepatocellular carcinoma	Per standard deviation increase	2.90 (2.43-3.47)
Muktar Ahmed ³	2023	Women	Free estradiol	Hepatocellular carcinoma	Per standard deviation increase	1.89 (1.42-2.50)
Muktar Ahmed ³	2023	Men	Free estradiol	Cholangiocarcinoma	Per standard deviation increase	1.76 (1.14-2.70)
Muktar Ahmed ³	2023	Women	Free estradiol	Cholangiocarcinoma	Per standard deviation increase	0.60 (0.39-0.93)

References

1. Petrick JL, Hyland PL, Caron P, et al. Associations Between Prediagnostic Concentrations of Circulating Sex Steroid Hormones and Esophageal/Gastric Cardia Adenocarcinoma Among Men. *J Natl Cancer Inst* 2019;111(1):34–41.
2. Petrick JL, Florio AA, Zhang X, et al. Associations Between Prediagnostic Concentrations of Circulating Sex Steroid Hormones and Liver Cancer Among Postmenopausal Women. *Hepatology* 2020;72(2):535–47.
3. Ahmed M, Mäkinen V-P, Lumsden A, et al. Metabolic profile predicts incident cancer: A large-scale population study in the UK Biobank. *Metabolism* 2023;138:155342.