Supplementary Material

Supplementary Table 1 Crude and adjusted hazard ratios (HRs) for anaemia among patients with prostate cancer during a 3-year follow-up period stratified by the different androgen deprivation therapy (ADT) exposure definition

Presence of iron-deficiency anaemia	Current ADT users (*n* =109) [d]	Past ADT users (*n* =7,153) [d]	Patients not receiving ADT (*n* = 3,631)
Three-year follow-up period			
Incidence rate per 100 person-years (95% CI)	93.65 (76.07-111.24)	0.94 (0.78-1.09)	1.01 (0.78-1.25)
Crude HR (95% CI)	90.74 (68.88-119.55)	0.93 (0.69-1.24)	1.00
Adjusted HR (95% CI) [a,b]	89.64 (67.19-119.58)	0.91 (0.68-1.22)	1.00
Adjusted HR (95% CI) [a,c]	81.52 (60.58-109.69)	0.90 (0.67-1.20)	1.00

Notes: [a] Using a Cox proportional regression with data censored if individuals died during the 3-year follow-up period; [b] Adjustments were made for patients' geographic location, monthly income, urbanisation level, age and incidence of hyperlipidemia, diabetes, hypertension, coronary heart disease and inflammatory bowel disease. [c] Adjustments were made for patients' geographic location, monthly income, urbanisation level, age and incidence of hyperlipidaemia, diabetes, hypertension, coronary heart disease, inflammatory bowel disease, other cancers and gastrointestinal bleeding. [d] We categorised the patients receiving ADT into current users (patients who had received ADT prior to the outcome date within 1 month) and past users (other remaining users).

CI, confidence interval

Supplementary Table 2 Sensitivity analysis

Outcome variable	Outcome definition: cases with anaemia diagnosis		Outcome definition: cases with anaemia diagnosis and receiving iron supplementation	
	Patients receiving ADT ($n = 7,262$)	Patients not receiving ADT ($n = 3,631$)	Patients receiving ADT ($n = 7,262$)	Patients not receiving ADT ($n = 3,631$)
Presence of iron-deficiency anaemia				
Three-year follow-up period				
Incidence rate per 100 person-years (95% CI)	1.66 (1.45-1.86)	1.01 (0.78-1.25)	1.66 (1.45-1.86)	0.08 (0.02-0.15)
Crude HR (95% CI)	1.64 (1.25-2.14)	1.00	19.56 (8.69-44.02)	1.00
Adjusted HR (95% CI) [a,b]	1.58 (1.21-2.07)	1.00	19.43 (8.63-43.76)	1.00
Adjusted HR (95% CI) [a,c]	1.62 (1.24-2.12)	1.00	19.14 (8.50-43.10)	1.00

Notes: [a] Using a Cox proportional regression with data censored if individuals died during the 3-year follow-up period; [b] Adjustments were made for patients' geographic location, monthly income, urbanisation level, age and incidence of hyperlipidaemia, diabetes, hypertension, coronary heart disease and inflammatory bowel disease. [c] Adjustments were made for patients' geographic location, monthly income, urbanisation level, age and incidence of hyperlipidaemia, diabetes, hypertension, coronary heart disease, inflammatory bowel disease, other cancers and gastrointestinal bleeding.

CI, confidence interval