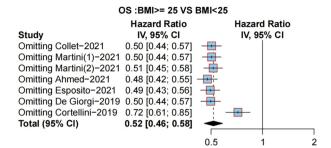
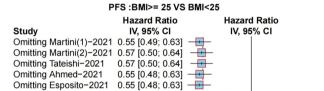
Figure S1. Quality assessment of the included studies using the Newcastle-Ottawa scale. «, the study satisfied the item; -, the study did not satisfy the item; RE, representativeness of the exposed; SNE, selection of the non-exposed; AE, ascertainment of exposure; DON, demonstration that outcome of interest was not present at start; SC, study controls for age, sex; SCA, study controls for any additional factors (chemoradiotherapy, curative resection and drug resistance); AO, assessment of outcome; FUL, follow-up time >36 months; AFU, adequacy of follow-up of cohorts.

Study _	Selection				Comparability		Outcome			_ TOTAL	Quality
	RE	SNE	AE	DON	SC	SCA	AO	FUL	AFU	- IOIAL	Quality
Yoo 2022	*	*	*	*	-	-	*	*	*	7	High
Tateishi 2021	*	*	*	*	-	-	*	*	*	7	High
Esposito 2021	*	*	*	*	-	-	*	-	*	6	Moderate
Collet 2021	*	*	*	*	-	-	*	*	*	7	High
Martini(1) 2021	*	*	*	*	-	-	*	*	*	7	High
Martini(2) 2021	*	*	*	*	-	-	*	*	*	7	High
Ahmed 2021	*	*	*	*	-	-	*	*	*	7	High
Young 2020	*	*	*	*	-	-	*	*	*	7	High
Di Filippo 2020	*	*	*	*	-	-	*	*	*	7	High
Labadie 2019	*	*	*	*	-	-	*	-	*	6	Moderate
Kichenadasse 2019	*	*	*	*	-	-	*	-	*	6	Moderate
Donnelly 2019	*	*	*	*	-	-	*	*	*	7	High
De Giorgi 2019	*	*	*	*	-	-	*	-	*	6	Moderate
Cortellini 2019	*	*	*	*	-	-	*	*	*	7	High
McQuade 2018	*	*	*	*	_	-	*	*	*	7	High

Figure S2. Sensitivity analysis of the association between BMI (<25 and ≥25 kg/m² groups) and survival in patients with cancer receiving immunotherapy. BMI, body mass index; IV, inverse variance; PFS, progression-free survival; OS, overall survival.





0.5

0.78 [0.64; 0.94]

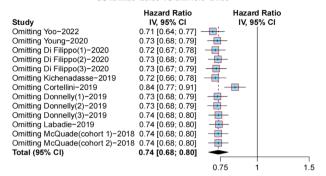
0.57 [0.51; 0.65]

Omitting Cortellini-2019

Total (95% CI)

Figure S3. Sensitivity analysis of the association between BMI (overweight, obese and normal groups) and OS in patients with cancer receiving immunotherapy. BMI, body mass index; IV, inverse variance; OS, overall survival.

OS:BMI25-29.99 VS BMI18.5-24.99



OS:BMI>=30 VSBMI18.5-24.99

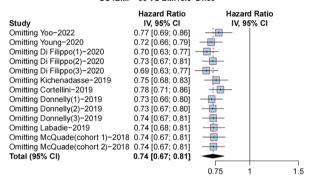
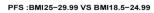
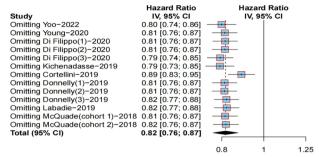


Figure S4. Sensitivity analysis of the association between BMI (overweight, obese and normal groups) and PFS in patients with cancer receiving immunotherapy. BMI, body mass index; IV, inverse variance; PFS, progression-free survival.





PFS :BMI>=30 VS BMI18.5-24.99

