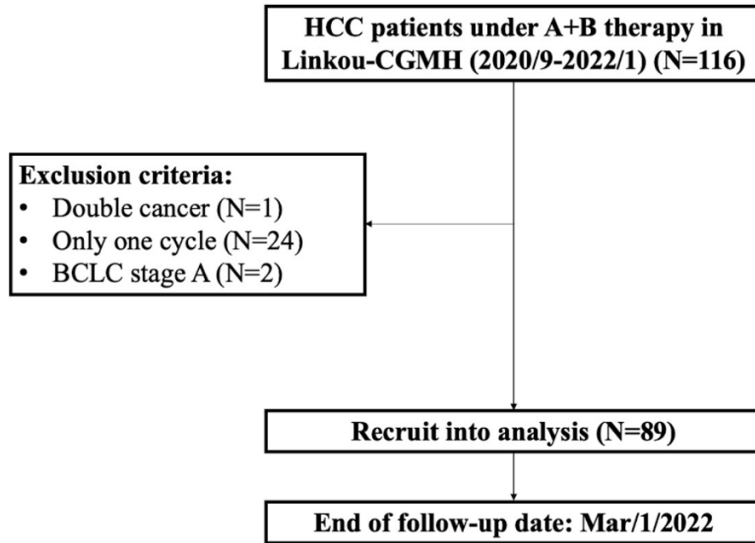
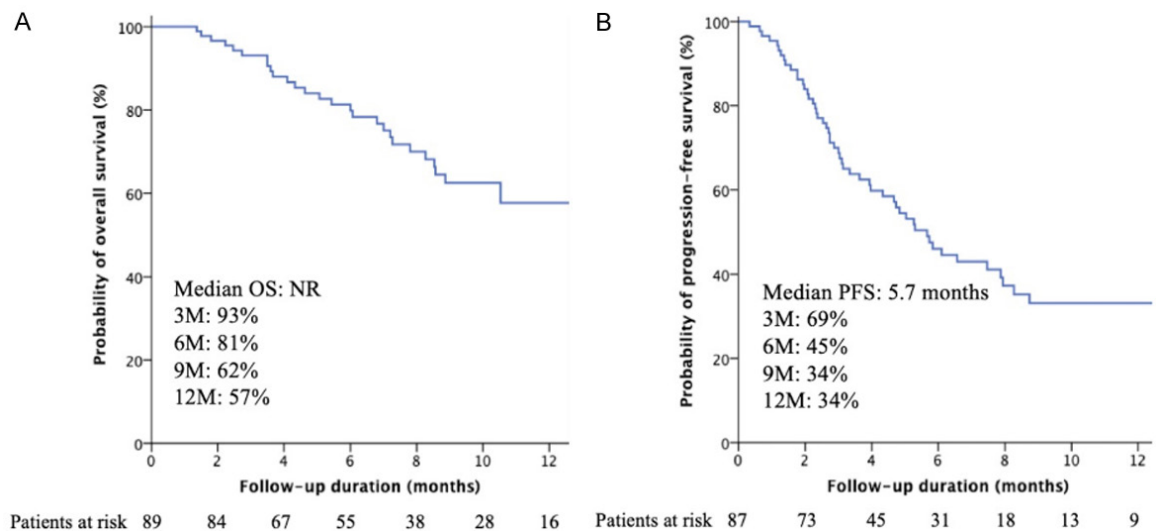


CAR classification determined prognosis of unresectable HCC patients



Supplementary Figure 1. Flowchart of patient recruitment.



Supplementary Figure 2. Kaplan-Meier curves of overall patients. (A) Overall survival (OS) (B) progression-free survival (PFS).

CAR classification determined prognosis of unresectable HCC patients

Supplementary Table 1. Accuracy for prediction of OS, PFS and tumor response

	OS	PFS	Tumor response
Sensitivity			
CRAFITY score	71.4%	50.0%	72.7%
AFP response at 6 weeks	53.8%	50.0%	90.5%
CAR classification	76.7%	71.0%	100%
Specificity			
CRAFITY score	69.2%	71.4%	43.6%
AFP response at 6 weeks	66.7%	75.0%	48.4%
CAR classification	89.5%	95.2%	62.5%
PPV			
CRAFITY score	45.5%	71.4%	26.7%
AFP response at 6 weeks	41.2%	72.7%	37.3%
CAR classification	63.6%	90.0%	36.2%
NPV			
CRAFITY score	87.1%	50.0%	85.0%
AFP response at 6 weeks	76.9%	52.9%	93.8%
CAR classification	81.0%	57.6%	100%

Abbreviations: AFP, Alpha-fetoprotein; CAR, CRAFITY score and AFP-Response; CRAFITY, CRP and AFP in Immunotherapy; NPV, negative predictive value; PPV, positive predictive value.

Supplementary Table 2. Treatment-related adverse events due to Atezolizumab and bevacizumab

Adverse events	Any grade	Grade ≥ 3
Any adverse event	54 (61)	9 (10)
Hypertension	19 (21)	2 (2)
Aspartate aminotransferase increased	17 (19)	1 (1)
Alanine aminotransferase increased	15 (17)	2 (2)
Fatigue	12 (13)	0 (0)
Anorexia or nausea	11 (12)	1 (1)
Proteinuria	9 (10)	0 (0)
Dermatitis	8 (9)	1 (1)
Pyrexia	8 (9)	1 (1)
Diarrhea	7 (8)	0 (0)
Upper gastrointestinal bleeding	4 (4)	4 (4)
Muscle soreness	3 (3)	1 (1)
Hypothyroidism	3 (3)	0 (0)
Hoarseness	3 (3)	0 (0)
Platelet decrease	3 (3)	0 (0)
Blood bilirubin increased	2 (2)	0 (0)
Hyperthyroidism	2 (2)	0 (0)
Headache	2 (2)	0 (0)
Chills	2 (2)	0 (0)
Dizziness	2 (2)	0 (0)
Cough	2 (2)	0 (0)
Epistaxis	2 (2)	0 (0)
Oral ulcer	1 (1)	0 (0)
Infusion reaction	1 (1)	0 (0)
Alkaline phosphatase increase	1 (1)	0 (0)