

Supplementary Table 1. Clinicopathological characteristics of the training cohort (n=359) and validation cohort (n=240)

Characteristics		Training cohort (%)	Validation cohort (%)	P-value
Age, year	≤50	74 (20.6)	38 (15.8)	0.137
	>50	284 (79.4)	202 (84.2)	
Gender	Female	153 (42.6)	102 (42.5)	0.975
	Male	206 (57.4)	138 (57.5)	
HBsAg	Negative	252 (70.2)	160 (66.7)	0.361
	Positive	107 (29.8)	80 (33.3)	
AFP, ng/mL	≤20	317 (88.3)	219 (91.3)	0.249
	>20	42 (11.7)	21 (8.7)	
CA19-9, U/L	≤36	149 (41.5)	98 (40.8)	0.869
	>36	210 (58.5)	142 (59.2)	
GGT, U/L	≤36	172 (47.9)	134 (55.8)	0.057
	>36	187 (52.1)	106 (44.2)	
Liver cirrhosis	No	273 (76.0)	176 (73.3)	0.453
	Yes	86 (24.0)	64 (26.7)	
Tumor size, cm	≤5	159 (44.3)	120 (50.0)	0.170
	>5	200 (55.7)	120 (50.0)	
Tumor number	Single	258 (71.9)	179 (74.6)	0.463
	Multiple	101 (28.1)	61 (25.4)	
LVI	No	282 (78.6)	184 (76.7)	0.586
	Yes	77 (21.4)	56 (23.3)	
Lymphatic metastasis	No	306 (85.2)	210 (87.5)	0.432
	Yes	53 (14.8)	30 (12.5)	
Tumor encapsulation	Complete	62 (17.3)	29 (12.1)	0.083
	None	297 (82.7)	211 (87.9)	
Tumor differentiation	I+II	181 (50.4)	102 (42.5)	0.057
	III+IV	178 (49.6)	138 (57.5)	
TNM stage	I	182 (50.7)	129 (53.7)	0.464
	II+III+IV	177 (49.3)	111 (46.3)	
CD3	Low	152 (42.3)	76 (31.7)	0.008
	High	207 (57.7)	164 (68.3)	
CD4	Low	189 (52.6)	49 (20.4)	<0.001
	High	170 (47.4)	191 (79.6)	
CD8	Low	179 (49.9)	105 (43.7)	0.142
	High	180 (50.1)	135 (56.3)	
Foxp3	Low	256 (71.3)	128 (53.3)	<0.001
	High	103 (28.7)	112 (46.7)	
CD68	Low	218 (60.7)	156 (65.0)	0.290
	High	141 (39.3)	84 (35.0)	
CD66b	Low	301 (83.8)	188 (78.3)	0.088
	High	58 (16.2)	52 (21.7)	
Stroma	Dormant	74 (20.7)	54 (22.5)	0.902
	Fibrogenic	105 (29.2)	71 (29.6)	
	Inert	105 (29.2)	70 (29.2)	
	Fibrolytic	75 (20.9)	45 (18.7)	

AFP, alpha-fetoprotein; GGT, gamma glutamyl transferase; CA 19-9, carbohydrate antigen 19-9; LVI, lymphatic vascular invasion; TNM, tumor-node-metastasis.