

Supplementary Table 1. Diagnostic performance of the FAST score and other widely non-invasive fibrosis scores for identifying steatohepatitis + NAS ≥ 4 + F ≥ 2 in the derivation and validation cohort

Score(s)	AUROC (95% CI)	Thresholds*	Gray zone (%)	Sensitivity (%)	Specificity (%)	PPV (%)	NPV (%)	LR+	LR-
Derivation									
FAST	0.801 (0.739-0.863)	< 0.285	37.3	91.0	50.2	26.6	95.1	1.76	0.25
		> 0.605		51.8	90.0	51.8	90.0	4.25	0.55
APRI	0.687 (0.604-0.770)	< 0.235	69.4	89.3	19.6	18.7	90.0	1.11	0.55
		> 0.805		26.8	90.0	35.7	85.6	2.69	0.81
FIB-4	0.594 (0.506-0.683)	< 0.515	76.1	91.0	13.3	17.8	87.8	1.05	0.67
		> 1.765		25.0	90.4	35.0	85.4	2.61	0.83
NFS	0.625 (0.543-0.707)	< -0.690	67.8	89.3	22.5	19.2	91.1	1.15	0.48
		> 2.355		19.6	90.0	28.9	84.4	1.97	0.89
BARD	0.640 (0.565-0.714)	> 2		91.1	32.5	21.8	94.6	1.34	0.28
Validation									
FAST	0.742 (0.617-0.868)	< 0.285	40.8	88.9	42.8	18.4	96.4	1.55	0.26
		> 0.605		50.0	83.9	31.1	92.1	3.10	0.59
APRI	0.702 (0.569-0.835)	< 0.235	62.7	94.4	22.6	15.0	96.6	1.22	0.25
		> 0.83		38.9	86.3	29.2	90.7	2.84	0.71
FIB-4	0.693 (0.568-0.818)	< 0.515	64.1	100.0	25.8	16.4	100.0	1.35	0.00
		> 1.775		33.3	89.5	31.6	90.2	3.18	0.74
NFS	0.711 (0.589-0.833)	< -0.71	64.1	94.4	26.7	15.7	97.1	1.29	0.21
		> 2.375		22.2	89.5	23.5	88.8	2.12	0.87
BARD	0.696 (0.589-0.803)	> 2		72.2	58.1	20.0	93.5	1.72	0.48

AUROC, area under the receiver-operating characteristic curve; CI, confidence interval; APRI, aspartate aminotransferase-to-platelet ratio index; FIB-4, Fibrosis-4;

NFS, NAFLD fibrosis score; NPV, negative predictive value; PPV, positive predictive value; LR+, likelihood ratio for positive results; LR- likelihood ratio for positive results.

*Thresholds were determined from the individual patient data study group as corresponding to 90% sensitivity (lower value) and 90% specificity (upper value).