

## Supplementary file

**Table S1. Patient clinical and imaging characteristics according to treatment response**

	<b>PR</b>	<b>SD</b>	<b>PD</b>	<b>P value</b>
<b>Number</b>	8	35	31	
<b>Age, year (mean, SD)</b>	60.9 (10.8)	60.5 (12.9)	59.2 (11.1)	0.885
<b>Sex (women)</b>	1 (12.5)	5 (14.3)	4 (12.9)	0.983
<b>Tumor size (cm<sup>2</sup>, mean, SD)</b>	85.4 (65.6)	85.9 (56)	76.1 (42)	0.729
<b>Etiology</b>				
<b>Hepatitis B</b>	4 (50.0)	24 (68.6)	23 (74.2)	0.419
<b>Hepatitis C</b>	3 (37.5)	6 (17.1)	5 (16.1)	0.362
<b>Alcoholic</b>	3 (37.5)	1 (2.9)	2 (6.5)	0.005
<b>ECOG</b>				0.078
<b>0</b>	0 (0)	13 (37.1)	7 (22.6)	
<b>1</b>	8 (100.0)	22 (62.9)	24 (77.4)	
<b>AFP &gt; 400 ng/mL</b>	7 (87.5)	16 (45.7)	18 (58.1)	0.093
<b>Liver cirrhosis</b>	7 (87.5)	26 (74.3)	22 (71)	0.542
<b>Vascular invasion</b>	6 (75.0)	18 (51.4)	17 (54.8)	0.479
<b>Extrahepatic spread</b>	7 (87.5)	29 (82.9)	27 (87.1)	0.872
<b>Child-Pugh</b>				0.03
<b>5</b>	3 (27.5)	29 (82.9)	23 (74.2)	
<b>6</b>	5 (62.5)	6 (17.1)	8 (25.8)	
<b>Prior therapy</b>				
<b>Surgery</b>	2 (25.0)	20 (57.1)	14 (45.2)	0.228
<b>Ablation</b>	2 (25.0)	11 (31.4)	6 (19.4)	0.533
<b>TACE</b>	7 (87.5)	27 (77.1)	26 (83.9)	0.696

Note. – Unless otherwise indicated, data are numbers, and data in parenthesis are percentages. PR = partial response, SD = stable disease, PD = progressive disease, AFP = alpha-fetoprotein, TACE = transarterial chemoembolization, ECOG = Eastern Cooperative Oncology Group.

**Table S2. Comparison of changes of DCE-MRI parameters and cutoff values by disease control rate (DCR)**

DCE-MRI parameters	PR + SD	PD	P value	Cutoff values	AUROC	Sensitivity	Specificity
$\Delta\text{Peak\_D3 (\%)}$	-3.0 (-12.1, 3.7)	-6.4 (-13.3, 4.0)	0.722	-5.8	0.52	0.55	0.65
$\Delta\text{AUC\_D3 (\%)}$	-11.20 (-37.1, 11.9)	-12. (-31.9, 18.8)	0.969	-54.6	0.5	0.97	0.16
$\Delta\text{K}^{\text{trans}}_{\text{D3 (\%)}}$	-30.20 (-60.6, 14.9)	0.00 (-33.1, 44.9)	0.075	-9.3	0.62	0.58	0.67
$\Delta\text{Peak\_D14 (\%)}$	-3.1 (-16.3, 2.6)	-7.0 (-15.1, 5.8)	0.932	4.59	0.51	0.33	0.83
$\Delta\text{AUC\_D14 (\%)}$	-25.5 (-42.3, 8.4)	-15.3 (-49.4, 26.6)	0.656	-21.1	0.53	0.67	0.52
$\Delta\text{K}^{\text{trans}}_{\text{D14 (\%)}}$	-44.6 (-61.7, -14.9)	-3.4 (-40.9, 95.4)	0.01	-11.8	0.68	0.63	0.76

Note. – The data are expressed as median and interquartile range.

\* *P* value indicates a significant difference. Youden index is used for seeking the best cutoff value for ROC Curve.

PR = partial response, SD = stable disease, PD = progressive disease, AUROC = area under the receiver operating characteristic.