

Supplementary Table 2. Baseline characteristics of patients, stratified by NASH or non-NASH on histology in the training or validation groups.

	Training Group (n=613)			Validation Group (n=153)		
	Non-NASH (n=195)	NASH (n=418)	P-value	Non-NASH (n=55)	NASH (n=98)	P-value
Demographics						
Age, (years)	43.9 ± 11.6	40.2 ± 12.9	< 0.001	43.1 ± 9.8	38.2 ± 12.9	0.017
Male sex, n (%)	149 (76.4%)	291 (69.6%)	0.082	44 (80.0)	64 (65.3)	0.056
BMI, kg/m ²	26.0 (24.1-27.7)	27.3 (24.8-29.7)	< 0.001	25.3 (23.4-27.7)	27.1 (25.0-29.8)	0.003
Type 2 diabetes, n (%)	47 (24.1)	100 (23.9)	0.961	17 (30.9)	26 (26.5)	0.563
Hypertension, n (%)	48 (24.6)	89 (21.3)	0.358	13 (23.6)	24 (24.5)	0.906
Biochemical measurements						
Albumin (g/L)	45.7 ± 3.6	46.3 ± 4.0	0.031	44.9 ± 4.0	46.8 ± 3.8	0.002
Platelet count (×10 ⁹)	240.9 ± 61.0	244.4 ± 62.5	0.467	251.6 ± 66.6	243.3 ± 60.8	0.588
AST (U/L)	27.0 (22.0-35.5)	39.0 (27.0-58.0)	< 0.001	26.0 (20.5-34.0)	47.0 (30.0-64.8)	< 0.001
ALT (U/L)	38.0 (25.0-57.5)	61.0 (38.0-104.0)	< 0.001	34.0 (21.0-56.5)	68.5 (36.6-130.8)	< 0.001
ALP (U/L)	80.0 (66.0-98.5)	83.0 (69.3-99.0)	0.118	74.0 (60.5-88.0)	83.0 (68.2-103.5)	0.019
Glucose (mmol/L)	5.2 (4.8-6.0)	5.4 (4.9-6.4)	0.017	5.4 (4.9-6.8)	5.3 (4.9-6.5)	0.905
Total cholesterol (mmol/L)	4.9 (4.0-5.5)	5.2 (4.4-6.0)	< 0.001	4.9 (4.3-5.5)	5.4 (4.6-6.0)	0.024
Triglycerides (mmol/L)	1.8 (1.2-2.5)	2.0 (1.5-3.0)	< 0.001	1.9 (1.4-3.0)	1.7 (1.3-2.5)	0.302
HDL-C (mmol/L)	1.0 ± 0.3	1.0 ± 0.3	0.106	1.0 (0.2)	1.1 (0.2)	0.015
LDL-C (mmol/L)	2.9 ± 0.8	3.1 ± 0.9	0.002	3.0 (0.9)	3.2 (1.0)	0.259
CK-18 M30 (U/L)	105.3 (55.0-175.0)	214.8 (108.5-468.5)	< 0.001	107.6 (54.8-155.9)	345.0 (148.8-678.1)	< 0.001
Body Composition						
Body Composition Analysis						
Intracellular water (e)	24.6 ± 4.1	24.6 ± 5.0	0.865	24.8 ± 4.1	24.4 ± 4.6	0.524
Extracellular water (e)	14.9 ± 2.4	15.0 ± 2.8	0.684	15.0 ± 2.3	14.7 ± 2.6	0.348
Total body water (e)	39.6 ± 6.7	39.7 ± 7.6	0.799	39.8 ± 6.4	39.0 ± 7.1	0.440

Soft lean mass (g)	50.9 ± 8.8	50.9 ± 10.3	0.835	51.0 ± 8.6	50.2 ± 9.2	0.529
Fat free mass (kg)	53.9 ± 8.9	54.3 ± 11.0	0.654	54.3 ± 8.8	53.2 ± 9.8	0.454
Muscle-Fat Analysis						
Weight (kg)	74.4 ± 12.6	78.1 ± 15.1	0.002	72.7 ± 10.6	77.0 ± 13.8	0.102
Skeletal muscle mass (kg)	30.2 ± 5.4	30.5 ± 6.9	0.715	30.3 ± 5.5	29.7 ± 6.0	0.531
Body fat mass (kg)	20.4 ± 6.8	23.6 ± 7.9	<0.001	18.3 ± 5.1	23.7 ± 7.5	<0.001
Obesity Diagnosis						
Percent body fat (%)	27.2 ± 6.5	30.1 ± 6.6	<0.001	25.2 ± 5.8	30.6 ± 6.9	<0.001
Waist-hip ratio	0.9 ± 0.0	0.9 ± 0.1	0.084	0.9 ± 0.0	0.9 ± 0.1	0.012
Lean Balance						
Right arm (kg)	3.1 ± 0.6	3.1 ± 0.8	0.541	3.1 ± 0.7	3.0 ± 0.7	0.286
Left arm (kg)	3.1 ± 0.6	3.0 ± 0.8	0.884	3.1 ± 0.7	3.0 ± 0.7	0.338
Trunk (kg)	24.7 ± 3.8	24.6 ± 4.7	0.965	24.8 ± 4.3	24.2 ± 4.3	0.306
Right leg (kg)	8.3 ± 1.6	8.3 ± 2.0	0.607	8.2 ± 1.6	8.1 ± 1.6	0.985
Left leg (kg)	8.2 ± 1.6	8.3 ± 2.0	0.658	8.1 ± 1.6	8.1 ± 1.6	0.955
Visceral fat area						
Visceral fat area (cm ²)	97.4 ± 24.4	104.7 ± 29.2	0.008	92.3 ± 23.6	106.4 ± 28.9	0.002
Additional Data						
Body cell mass (kg)	35.2 ± 5.8	35.5 ± 7.0	0.666	35.5 ± 6.0	35.0 ± 6.7	0.631
Bone mineral content (kg)	2.9 ± 0.5	3.0 ± 0.6	0.250	2.9 ± 0.5	3.0 ± 0.6	0.896
Basal metabolic rate (kcal)	1535.9 ± 204.0	1544.2 ± 268.0	0.630	1551.9 ± 217.7	1514.1 ± 210.9	0.326
Arm circumference (cm)	32.9 ± 2.5	33.8 ± 3.4	0.002	32.7 ± 2.6	33.6 ± 3.2	0.110
Arm muscle circumference (cm)	27.2 ± 2.2	27.4 ± 2.6	0.229	27.5 ± 2.6	27.1 ± 2.7	0.343
Non-invasive NASH scores						
LEARN	0.50 ± 0.03	0.53 ± 0.02	<0.001	0.50 ± 0.03	0.53 ± 0.03	<0.001
ION	29.0 (15.4-45.8)	43.9 (27.8-71.1)	<0.001	25.1 (15.5-37.1)	44.6 (33.5-83.1)	<0.001

