Evaluation of Immune Response and Disease Flares in Metabolic-Associated Fatty Liver Disease (MAFLD) Patients Following SARS-CoV-2 Vaccination: A Prospective Study

Table S1: Adverse reactions of COVID-19 vaccination between two groups

Adverse reactions	MAFLD group (n=50)	non-MAFLD group (n=114)	P
Adverse reactions within 7 days after first dose vaccination			
Total	9(18)	23 (20.2)	0.746
Grade 1	9(18)	23 (20.2)	0.746
Systemic reactions	4 (8)	9 (7.9)	>0.999
Fatigue	2 (4)	3 (2.6)	0.641
Dizziness	1 (2)	3 (2.6)	>0.999
Nausea	1 (2)	0 (0)	0.305
Diarrhea	0 (0)	0 (0)	>0.999
Fever	1 (2)	0 (0)	0.305
Pain	0 (0)	2 (1.8)	>0.999
Injection-site reactions	5 (10)	15 (13.2)	0.569
Pain	5 (10)	14 (12.3)	0.795
Swelling	0 (0)	1 (0.88)	>0.999
Adverse reactions within 7 days after second dose vaccination			
Total	10 (20)	27 (23.7)	0.603
Grade 1	10 (20)	27 (23.7)	0.603
Systemic reactions	3 (6)	10 (8.8)	0.545
Fatigue	1 (2)	5 (4.4)	0.454
Dizziness	0 (0)	0 (0)	>0.999
Nausea	0 (0)	0 (0)	>0.999
Diarrhea	1 (2)	1 (0.88)	0.546
Fever	1 (2)	2 (1.8)	0.914
Pain	0 (0)	3 (2.6)	0.247
Injection-site reactions	7 (14)	17 (14.9)	0.879
Pain	7 (14)	14 (12.3)	0.762
Swelling	1 (2)	2 (1.8)	0.914

p value of the comparison of incidence rate between two groups. Pearson χ^2 test or Fisher's exact test were used to analyze the categorical outcomes.

Table S2: Immunogenicity of COVID-19 vaccination between two groups.

Characteristics	MAFLD group (N=50)	non-MAFLD group (N=114)	p
Seroconversion of neutralizing antibody to live SARS-CoV-2			
Day 28, N (%)	8 (16)	25 (22)	0.383
Day 57, N (%)	41 (82)	103 (90)	0.132
Day 180, N (%)	19 (38)	23 (24)	0.075
Seroconversion of IgG to spike-specific SARS-CoV-2			
Day 28, N (%)	31 (62)	74 (65)	0·721
Day 57, N (%)	50 (100)	114 (100)	>0.999
Day 180, N (%)	47 (94)	94 (98)	0·334
Log10 GMT of neutralizing antibody to live SARS-CoV-2			
Day 28	0·783 (0·719, 0·971)	0·818 (0·718, 0.989)	0.36
Day 57	1.206 (1·053, 1·467)	1·329 (1·131, 1·439)	0.216
Day 180,	0·928 (0·773, 1·057)	0·879 (0·788, 0.996)	0.29
Log10 GMT of IgG to spike-specific SARS-CoV-2			
Day 28	0·159 (-0·203, 0·730)	0·239 (-0·382, 0·843)	0.665
Day 57	1·468 (1·054, 1·928)	1·643 (1.307, 1·895)	0.383
Day 180	0·851 (0·534, 1·181)	0·858 (0·559, 1·152)	0·922

Data are shown in count (%) or median (IQR). Pearson χ^2 test or Fisher's exact test for the analysis of categorical outcomes and Mann-Whitney test for the continuous outcomes. Day 28, Day 57, and Day 180 represent 28 days, 57 days, and 180 days after the first dose vaccination, respectively. GMT, Geometric Mean Titre.