

Supplementary Information

Table S1. Information of primers and probes for TaqMan allelic discrimination.

SNPs (Genotype)	Nearby Gene	Region	MAF ^{a/b}	TaqMan-MGB Probe/Primers Sequences (5'-3')
rs3077 C>T	HLA-DPA1	3-UTR	0.352/0.378	Probe-C: FAM-AAACTACCCAGTGGC-MGB Probe-T: HEX-AAACTACTCCAGTGGCT-MGB Forward primer: TCAGCTTTCTTCTCACTTCATGTG Reverse primer: GAGCTTGAAAGGGTCAGCAATTG
rs2395309 G>A	HLA-DOA HLA-DPA1	N/A	0.355/0.378	Probe-G: FAM-CAGATAGTTGTAAGTGAGATG-MGB Probe-A: HEX-CAGATAGTTATAAGTGAGATGG-MGB Forward primer: GGTCTTATCCAGTTGGTGGTCAA Reverse primer: AGAGGGCTATGGGAAGAGAATGA
rs2856718 T>C	HLA-DQB1 HLA-DQA2	Intergenic	0.471/0.475	Probe-T: FAM-AGAGCTGTTAACCC-MGB Probe-C: HEX-AGAGCTGTCTAACCC-MGB Forward primer: GAGCTCCCTCTGGCAGGTT Reverse primer: TATGCTTCAACCAACTCCTTCAC

MAF: minor allele frequency. ^a minor allele frequencies in control group; ^b minor allele frequencies from HapMap of Han Chinese in Beijing, China (CHB) (dbSNP, build128; available at <http://www.ncbi.nlm.nih.gov/SNP/>).

Table S2. Linkage disequilibrium information of HLA class II single nucleotide polymorphisms.

	Group A and Group B ^a			Group (A + B) and Group C ^b		
	Rs3077	Rs2395309	Rs2856718	Rs3077	Rs2395309	Rs2856718
Rs3077	—	1.0 ^c	0.194 ^c	—	0.993 ^c	0.16 ^c
Rs2395309	0.957 ^d	—	0.202 ^c	0.971 ^d	—	0.159 ^c
Rs2856718	0.031 ^d	0.036 ^d	—	0.016 ^d	0.016 ^d	—

Group A: HCV persistent female carriers; Group B: HCV natural clearance female subjects; Group C: Healthy female controls; Group (A + B): HCV-infected female patients.

^a Linkage disequilibrium information of the comparison between “Group A and Group B” with “Group B” served as a control group; ^b Linkage disequilibrium information of the comparison between “Group (A + B) and Group C” with “Group C” served as a control group; ^c D' value; ^d R² value.

Table S3. Haplotypes frequencies constituted with polymorphisms of HLA class II SNPs among three groups.

Haplotype ^a	Group A (%)	Group B (%)	Group C (%)	OR (95% CI) ^b	p ^b	OR (95% CI) ^c	p ^c
	n = 740	n = 388	n = 1946	The Outcome: HCV Susceptibility		The Outcome: HCV Clearance	
CGT	301 (40.7)	173 (44.6)	809 (41.6)	1	1	1	1
TAC	181 (24.5)	89 (22.9)	470 (24.1)	0.975 (0.804–1.182)	0.794	1.094 (0.785–1.525)	0.597
CGC	154 (20.8)	69 (17.8)	442 (22.7)	0.840 (0.687–1.029)	0.092	1.194 (0.835–1.707)	0.332
TAT	99 (13.4)	53 (13.7)	212 (10.9)	1.277 (1.001–1.630)	0.050	1.190 (0.794–1.782)	0.399
Others ^d	5 (0.6)	4 (1.0)	13 (0.7)	0.904 (0.377–2.169)	0.821	0.417 (0.108–1.611)	0.205

SNPs: single nucleotide polymorphisms; Group A: HCV persistent carriers; Group B: HCV natural clearance subjects; Group C: Healthy controls; Group (A + B): HCV-infected patients; ^a Order of single nucleotide polymorphisms comprising the HLA class II haplotypes: rs3077, rs2395309 and rs2856718; ^b Logistic regression model, adjusted by age, and route of infection for Group (A + B) *versus* Group C; ^c Logistic regression model, adjusted by gender, age, route of infection, and viral genotype for Group A *versus* Group B; ^d Haplotypes with a frequency of less than 5% were combined with others.