

FOR THE RECORD

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Population Genetics of Two STR Loci D13S796 and DYS439 in a Chinese Han Population

POPULATION: Chinese

KEYWORDS: forensic science, Han ethnic group, China, DNA typing, short tandem repeats, population genetics, D13S796, DYS439

TABLE 1—Allele frequencies of D13S796 in Chinese population.

Allele	Frequency D13S796 (N = 100)
11	0.009
12	0.069
13	0.157
14	0.241
15	0.236
16	0.194
17	0.060
18	0.028
19	0.005
Total	1.000
HWE*	P > 0.05

* Test for Hardy-Weinberg equilibrium.

TABLE 2—Population genetics and forensic data of D13S796.

Locus	PIC	DP	Pm	EP	H _o	H _e
D13S796	0.79	0.923	0.077	0.680	0.843	0.82393

PIC: polymorphism information content; DP: power of discrimination; Pm: probability of match; EP: power of Exclusion; H_o: observed heterozygosity; H_e: expected heterozygosity.

Blood samples were collected from unrelated healthy individuals of Chinese Han ethnic group in Chengdu of Sichuan. Genomic DNA samples were extracted using Chelex-100 method (1). PCR amplification conditions can be accessed at <http://www.legalmed.org/dna/D13S796 and DYS439.htm>. The volume of PCR reaction for each locus was 37.5 μ L. The PCR products were analyzed by horizontal non-denaturing polyacrylamide gel electrophoresis with discontinuous buffer system and visualized by silver staining (2). Data of population genetics and forensic science of the locus D13S796 was analyzed using POWERSTATS program (3). Data of population

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TABLE 3—Allele frequencies and gene diversity of DYS439.

Allele	Frequency (N = 100)	Gene Diversity	SE
9	0.040	0.7578	0.06786
10	0.190		
11	0.32		
12	0.29		
13	0.16		

genetics and forensic science of the locus DYS439 was analyzed according to Hou's method (4). The genotype distribution of the locus D13S796 was analyzed for Hardy-Weinberg equilibrium according to Hou's method (5). No deviation from Hardy-Weinberg equilibrium was observed.

The complete data can be accessed at <http://www.legalmed.org/dna/D13S796 and DYS439.htm>.

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