

## FOR THE RECORD

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# Genotype Distribution of DYS385 and D10S676 in Chinese Han Population of Yunnan Province

**POPULATIONS:** Chinese Han Population ( $n = 103$ )

**KEYWORDS:** forensic science, DNA typing, short tandem repeat, polymerase chain reaction, multiplex, population genetics, Yunnan Province, DYS385, D10S676

TABLE 1—STR allele frequency for Chinese Han people of Yunnan Province.

Allele	DYS385 $n = 95$	D10S676 $n = 103$	Statistical Parameter	DYS385	D10S676
9	0.005		HO	0.126	0.252
10	0.037		HE	0.874	0.748
11	0.258	0.010	PE	0.742	0.521
12	0.158	0.058	PIC	0.850	0.691
13	0.111	0.194	PD	0.954	0.877
14	0.058	0.408			
15	0.058	0.248			
16	0.037	0.078			
17	0.095	0.010			
18	0.047				
19	0.100				
20	0.026				
21	0.005				
22	0.005				

HWE DYS385:  $\chi^2 = 51.4$   $df = 37$   $P > 0.10$ . D10S676:  $\chi^2 = 18.12$   $df = 15$   $P > 0.25$ .

Whole blood was obtained from 103 unrelated Chinese Han people from Yunnan Province. DNA was extracted by the standard phenol/chloroform extraction procedure (1). PCR amplifications were performed as duplex in a 25  $\mu$ L reaction mixture. The primers for D10S676 and DYS385 were designed according to (1). The PCR amplification was performed in a Perkin-Elmer 9600 and electrophoretic separation of the amplified product was performed in a vertical, denaturing (6M, urea), polyacrylamide gel (5%) using BRL SA32 and silver staining was performed as described

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previously (2). The alleles of the sample were identified by comparison with the allelic ladders in adjacent lanes in the gel and a 50 bp DNA molecular marker (Promega). The ladders contain the alleles 9 to 22 for locus DYS385 and 11 to 17 for locus D10S676. The alleles were assigned according to previous methods (1). Statistical analysis of the results was performed using the exact test that detected the Hardy-Weinberg equilibrium (HWE). The Homozygotes (HO), Heterozygotes (HE), Power of Exclusion (PE), power of discrimination (PD), polymorphism information (PIC) was performed using the Promega software (internet site at <http://www.promega.com/geneticidtools/powerstats/>). This simple method can provide a highly discriminatory value for those laboratories without the more expensive fluorescent detection equipment and for those laboratories familiar with manual gel electrophoresis and silver staining technology.

The complete dataset are available to any interested researcher upon request to the corresponding author Chun Jie Xiao.

## References

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