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Allele Frequencies of Nine STR Loci in Chinese She Ethnic Group from Zhejiang, China

POPULATION: Chinese, She ethnic group (Zhejiang, China, $n = 120$)

KEYWORDS: forensic science, Chinese She ethnic group, STR typing, population genetics, D3S1358, vWA, FGA, D8S1179, D21S11, D18S51, D5S818, D13S317, D7S820

Blood samples were collected from 120 unrelated individuals of Chinese She ethnic group in Zhejiang province, China. DNA was extracted from blood samples using Chelex method (1). The PCR amplification of the nine STR loci (D3S1358, vWA, FGA, D8S1179, D21S11, D18S51, D5S818, D13S317, D7S820) was carried out by using reagents provided in the AmpF ℓ STR Profiler Plus™ kit (PE-Biosystems, Foster City, CA) and using a GeneAmp PCR System 9600 (PE-Biosystems, Foster City, CA) according to the technical manual. The amplified products were analyzed by ABI Prism™ 310 Genetic Analyzer (PE-Biosystems, Foster City, CA) according to the manufacturer's recommendation protocol. Data of population genetics and forensic science were analyzed using POWERSTATS program (2). The genotype distribution was analyzed for Hardy-Weinberg equilibrium according to Hou's

method (3) and no deviation from Hardy-Weinberg equilibrium was observed.

The complete data can be accessed at <http://www.legalmed.org/dna/zhejiang9.htm>.

References

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TABLE 1—Allele frequencies of 9 STR loci in She ethnic group from Zhejiang, China.

Allele	D3S1358	vWA	FGA	D8S1179	D21S11	D18S51	D5S818	D13S317	D7S820
6									0.004
7							0.067		0.004
8							0.008	0.371	0.206
9							0.033	0.142	0.025
10				0.217			0.125	0.096	0.126
11				0.092		0.004	0.358	0.128	0.361
12				0.142		0.042	0.296	0.238	0.239
13	0.004			0.183		0.133	0.088	0.021	0.035
13.2						0.008			
14	0.067	0.300		0.121		0.163	0.025	0.004	
14.2						0.025			
15	0.267	0.021		0.208		0.192			
16	0.404	0.129		0.029		0.150			
17	0.188	0.288		0.008		0.100			
18	0.070	0.183	0.004			0.038			
19		0.054	0.025						
20		0.025	0.021			0.054			
21			0.092			0.004			
22			0.070			0.050			
23			0.263			0.033			
24			0.300			0.004			
24.2			0.008						
25			0.129						
26			0.088						
28					0.013				
28.2					0.004				
29					0.263				
29.2					0.013				
30					0.221				
31					0.137				
31.2					0.063				
32					0.078				
32.2					0.137				
33.2					0.067				
34					0.004				

TABLE 2—Population genetics and forensic values of 9 STR loci in She ethnic group.

Locus	PIC	DP	Pm	CE	H
D3S1358	0.68	0.878	0.122	0.379	0.667
vWA	0.74	0.907	0.093	0.584	0.792
FGA	0.78	0.924	0.076	0.615	0.808
D8S1179	0.81	0.946	0.054	0.679	0.842
D21S11	0.81	0.946	0.054	0.524	0.758
D18S51	0.86	0.960	0.040	0.662	0.833
D5S818	0.72	0.898	0.102	0.510	0.750
D13S317	0.72	0.904	0.096	0.496	0.742
D7S820	0.71	0.899	0.101	0.363	0.655

* PIC: polymorphism information content, DP: discrimination power, Pm: probability of match, CE: chance of exclusion, H: observed heterozygosity.