Allele Frequency Distribution Of The STR Loci HUMTH01, HUMTPOX, HUMCSF1PO, HUMF13A01,HUMFES/FPS, HUMVWFA31 In The Population Of Zaragoza (North- Spain)

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In order to use genetic loci in forensic identity testing, some population data are needed. This paper presents a report of allele/genotype frequency data for the tetrameric short tandem repeat loci HUMTPOX, HUMCSF1PO, HUMF13A01, HUMFES/FPS, HUMVWFA31 in the population of Zaragoza (North-Spain). Allele and genotype frequencies for the 6 loci were determined using *GenePrint*™ STR Multiplex System, electrophoresis of the PCR products in denaturing polyacrylamide gels and subsequent detection of allelic fragments by silver staining. All the loci met Hardy-Weinberg expectations. Furthermore, there was little departure from expectations of independence between loci within the sample population.

There was also obtained some statistics of medico-legal interest as allelic diversity value and the chance of exclusion in paternity cases. In conclusion, the allele frequency data can be used in identity testing to estimate the frequency of a multiple PCR-based profile in this Spanish population.