RELEVANT GENETIC CONTRIBUTION OF AMERINDIAN TO THE EXTANT POPULATION OF ARGENTINA

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The extant population of Argentina claims to be the most European country of Latin America. The statement has been held for over one century, and started when the Campaign Against the Dessert took place in 1870. This military mission was directed against the aboriginal communities in order to obtain their possessions. No scientific approach was available, till recent, for checking the supposed to be pure European ancestries. Uniparentally inherited genetic markers, such as mitochondrial DNA (mtDNA) and Single Nucleotide Polymorphisms (SNP) located in the non recombinant regions of the Y chromosome may clarify the strict European ancestry of the nowadays population of Argentina. A set of 322 unrelated males were chosen to evaluate if Amerindian markers such as the mitochondrial haplogroups A, B, C and D, as well as the C to T transition in locus DYS199 of the Y chromosome were present. Its detection in the tested individuals might suggest an ancestral contribution of Amerindian lineages. Hiper Variable Region (HVR) I and II were sequenced by Big Dye termination approach and the 9bp ins/del in Region V was detected in automated platforms (ABI, 310 and 3100Avant). DYS199 C to T transition detection was carried out by primer specific PCR. Over 65% of the individuals tested carried either mtDNA or Y Amerindian markers, 10% both, 20% were of Amerindian patrilineage and less than 35% denoted non Amerindian contribution in the uniparentally inherited markers. By this simple approach a different contribution can be suggested within the most European country of Latin America.