

HUMAN DNA IDENTIFICATION OF NINE BODIES DISARTICULATED, FRAGMENTED AND MIXED RECOVERED OF TWO CONTIGUOUS MASS GRAVES LOCATED IN MAGDALENA DEPARTMENT OF COLOMBIA FROM 35 BONES FRAGMENTS

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Approval in Colombia of Law 975 of 2005 (Justice and Peace Law) promulgating the right to truth, justice and reparation, and due process to promote national reconciliation, has led to the confession of crimes of forced disappearance by groups outside the law. According to information extracted from the website of the Attorney General of the National Subunit of Justice and Peace, to June 2010, 2719 graves have been exhumed for a total of 3299 corpses recovered. Of these 973 victims have been fully identified and delivered to their families.

We received in the laboratory of genetics of National Institute of Legal Medicine and Forensic Sciences 35 bone fragments from two contiguous mass graves in the Department of Magdalena. A previous autopsy and anthropological analysis identified four bodies in each one. The skeletal remains of upper and lower limbs were disarticulated, fragmented, mixed and only five (5) fragmented and incomplete skulls were recovered.

Initially, DNA was extracted from the bone pieces grouped by anthropology as belonging to the same individual with the phenol chloroform method and we typically use all STR's kits available in the laboratory for genotyping: PowerPlex® 16, HUM FFFL, Sefiler and Identifier. After getting the first result, it was necessary to perform DNA extraction and analysis of all fragments, because there was no correspondence between the individualization anthropological and DNA results.

Finally, making a comparison against reference samples from relatives (parents and / or children) we can identify the nine individuals who by the confession of the perpetrators, were buried in these graves, with probabilities exceeding 99.999%.