

Project Update: January 2017

We conducted genetic and eco-toxicological analysis of skin samples from three dolphin species collected in La Guajira. Mitochondrial results indicate genetic connectivity between *Steno bredanensis* individuals from La Guajira and other Caribbean regions. Similarly, *Stenella frontalis* shows a high genetic flow and low genetic structure among dolphins distributed in some Caribbean areas. For *Tursiops truncatus* we found mainly individuals from the “worldwide distributed form”, which suggest low philopatry in La Guajira. Toxicological results in skin samples show for all species low levels of total mercury in compared to liver of individuals from other populations in Brazil and Japan, except for *S. bredanensis* that showed intermediate values. Isotopic analyses show high $\delta^{15}\text{N}$ values and negative $\delta^{13}\text{C}$ values, which indicates that dolphins are top predators and they feed fluvial preys. These results show that La Guajira is an important area for transit of dolphins.



Left: Collecting samples using PAXARM system. Right: An adult of bottle nose dolphin jumping.



Left: The team work with our boat. Right: An adult and a juvenile of bottlenose dolphin swimming.