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Enhancing Wildlife Preparedness and Response: The Critical Role of Exercises, an example from Brazil

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Integrating wildlife responders into the Incident Management Team (IMT) is crucial for effectively responding to oil spills and other environmental emergencies. Oiled wildlife response integration is a key component of a comprehensive oil spill response program, as illustrated in the tiered preparedness and response wheel (IPIECA, 2015). The most well-prepared programs incorporate wildlife response into their contingency plans. Therefore, conducting exercises and drills that simulate various challenging scenarios enhances both preparedness and response capabilities.

In Brazil, the regulatory agency responsible for environmental protection, the Brazilian Institute of Environment and Renewable Natural Resources (IBAMA), mandates periodic drills and exercises as part of the licensing process for offshore oil and gas exploration and production. These exercises play a vital role in ensuring that response actions align with the companies' contingency plans, in Brazil so called "Individual Emergency Plan" ("*Plano de Emergência Individual*" – PEI).

Brazil is setting a strong example of best practices for oiled wildlife preparedness and response. Since 2016, our team has participated in more than 200 exercises and drills, categorized into three main types: communication, tabletop, and full deployment exercises. Of these, 43.9% (97/221) were conducted remotely (online), while 29.0% (64/221) took place in person at the Command Post and/or in the field. Additionally, 27.1% (60/221) involved field activities such as aerial surveillance, wildlife surveys, capture, and transportation to the designated rehabilitation facility. In some cases, local partners participated as Tier 1 responders, depending on the exercise location. In 2024, a record 52 exercises were conducted, the highest number in a single year to date. The majority, 82.7% (43/52), were held in person at the Command Post and/or in the field, while 17.3% (9/52) were conducted remotely (online). A significant portion, 42.3% (22/52), included field activities.

Some of the exercises varied in their operational approach based on our team's response role. Typically, we integrate into the Command Post as part of the Wildlife Branch within the Incident Management Team (IMT), supporting both the Planning and Operations sections, as well as contributing to scenario planning as part of the simulation cell (SIMCELL) team. However, depending on the scenario, the wildlife team may also be deployed to the field to carry out operational response actions.

Aiuká has participated in large-scale response exercise mobilizations, such as those conducted in Pirambu (SE), Rio de Janeiro (RJ), Bombinhas (SC), and along the coast of Ceará—including the cities of Caucaia, Icapuí, and Fortaleza - Brazil. These exercises involved wildlife monitoring, capture, and rehabilitation teams, with the goal of implementing practical field response actions and identifying potential vulnerabilities in response strategies. Exercises simulating large-scale spill scenarios (Tier 3), even if limited to Command Post operations, are critical for response planning and preparedness. One such example was an exercise held in Rio de Janeiro (RJ) in August 2022, which facilitated discussions about new response strategies beyond those outlined in the contingency plan.

Exercises are essential for reinforcing learning, testing and validating individual skills, and assessing the existing contingency plan—creating opportunities for improvement. The involvement of the wildlife response team in both the Command Post and field activities strengthens communication between industry personnel and wildlife specialists, who provide critical expertise to support wildlife response efforts. While remote (online) exercises are cost-effective and can be quickly mobilized, they have limitations. If the Command Post is not fully virtual, remote specialists may experience delays in receiving information and engaging in discussions with the IMT, potentially impacting the efficiency of the wildlife response and, consequently, the overall response effort.