

BOOK OF ABSTRACTS

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Recent Advances in Cephalopod Science



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Oral presentations

November 10, 0930-0945 [3]

Hijacking, hitchhiking and burglary behaviors of pelagic octopuses

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Pelagic octopuses are a highly specialized group of octopuses that have secondarily left the seafloor and evolved a holopelagic existence. One of the most striking adaptations amongst a suite of related pelagic octopus families (superfamily Argonautoidea) is their associations with gelatinous zooplankton (jellyfishes and salps). Here, we report footage of a never-before-seen interaction in nature (here coined as “hijacking” behavior), between a male octopus (*Haliphron atlanticus*) and a venomous jelly (*Pelagia noctiluca*) at the surface ocean. The peculiar orientation of this encounter and size of the intruder opposes the pelagic “hitchhiking” and the “burglary/weapon stealing” strategies observed to date in these pelagic octopuses. The “hijacking” behavior is a more complex interaction. While maneuvering the jelly (and possibly ingesting it), *H. atlanticus* appears to be using the jelly’s marginal nematocystic tentacles to hunt. This constitutes the first evidence that all four octopod families of the Argonautoidea display opportunistic associations with gelatinous zooplankton, and establishes a new category of biotic associations.