

visualization and annotation of open access and confidential passive acoustic monitoring data archives.

The impact of underwater noise on marine life is a rapidly increasing focus for research, regulatory change, and conservation actions. Digital hydrophone records from Ocean Networks Canada's cabled observatory systems represent the largest data volume delivered to the science community, supporting research into marine mammal responses to vessel traffic, seasonal use of ocean habitats by whales, fish sound emissions, and the development of automated classification algorithms. Access to the online archive is facilitated by ONC's Oceans 2.0 interface. Individual hydrophone records can be reviewed for length, contiguity, and instrument specifications. Quick view spectrograms permit rapid scanning of data records for events of interest prior to data downloads. The archive will soon support hydrophone data searches based on time-stamped annotations (from manual or automated classification), and linking with online analytical tools. ONC's open data policy applies to all hydrophone records collected by the observatory network but the data acquisition system and archive also accommodate military security and third party data ownership requirements. For example, during naval exercises near ONC seafloor listening stations, shore-based military computers divert real-time hydrophone data streams, for review and redaction before release. Password access to third party hydrophone data was introduced in 2017.

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