Backgrounder on "Quiet(er) Marine Protected Areas"

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Highlights

- Anthropogenic ocean noise can harm acoustically sensitive marine organisms.
- Area-based management can separate wildlife from threats, including ocean noise.
- Many risk assessments identify sites where marine mammal habitat is noisy.
- The corollary is "opportunity sites" — key marine mammal habitats that are quiet.
- Keeping quiet habitats quiet will be easier than making noisy habitats quiet.

Quotes from authors

"We tend to focus on problems in conservation biology. This was a fun study to work on, because we looked for opportunities to protect species by working with existing patterns in noise and animal distribution, and found that BC offers many important habitat for whales that are still quiet," said Rob Williams, lead author of the study. "If we think of quiet, wild oceans as a natural resource, we are lucky that Canada is blessed with globally rare pockets of acoustic wilderness. It makes sense to talk about protecting acoustic sanctuaries before we lose them." Rob is a Pew Fellow in Marine Conservation, affiliated with University of St Andrews and co-founder of Oceans Initiative.

“Marine animals, especially whales, depend on a naturally quiet ocean for survival, but humans are polluting major portions of the ocean with noise. We must make every effort to protect quiet ocean regions now, before they grow too noisy from the din of our activities.” Christopher Clark, Bioacoustics Research Program, Cornell University

“Sound is perceived differently by different species, and some are more affected by noise than others.” Christine Erbe, co-author, Director Marine Science Center Curtin University, Australia

“When protecting highly mobile and migratory species that are poorly studied, it may make sense to focus on threats rather than the animals themselves. Shipping patterns decided by humans are often more predictable than the movements of whales and dolphins.” Erin Ashe, University of St Andrews and co-founder, Oceans Initiative