What is the porpoise of overfishing?

Bycatch is organisms that are caught by accident when other types organisms are targeted. Over 650.000 marine mammals are caught as bycatch every year, most of which are caught in gillnets (Read et al., 2006). Bycatch in this way has led to the extinction of the Yangtze River dolphin in China (Turvey et al., 2007). Reducing bycatch relates to SDG-14 targets 2, 4, and 5.

Approximately 180.000 harbour porpoises inhabit Norwegian coastal waters, representing about 25% of the global population of this species. Due to the threat of bycatch for the Norwegian harbour porpoises, the Norwegian government enforced the use of pingers in Vestfjorden from 2021. Pingers are devices attached to gillnets, emitting sounds of 145 dB, intentionally scaring away marine mammals such as porpoises. For reference, 145 dB is as loud as a jet engine or a gunshot for humans.

Harbour porpoises caught in nets do not drown, rather, they suffocate as the oxygen in their blood is slowly replaced with CO_2.

Nets equipped with such pingers have been shown to reduce bycatch by up to 94%. This was the case for both cod, monkfish, and saithe fisheries. They also had no effect on the fish catch rates. Operating of pinged gillnets led to a negligible increase of 2.8 minutes per operation, meaning that pingers can be helpful in reducing bycatch without affecting the fisheries negatively (Moan & Bjørge, 2023). IMR ran a study where they analysed data from reference boats and coast guard inspections, showing a reduction in the bycatch by 35%. Data has shown that compliance of the use of pingers was only at 64% between 2021 and 2023, meaning that an increase in compliance to 90% can reduce bycatch by as much as 50% (Bjørge & Moan, 2023).

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