Submission on CRA 1 Closure

20/08/2025

This submission urges Fisheries New Zealand to adopt management measures for CRA 1 that prioritise kelp forest restoration and ecosystem resilience over short-term commercial yield."

CRA 1 is one of the most ecologically significant lobster fisheries in Aotearoa. It includes the east Northland rocky reef systems that underpin biodiversity, fisheries productivity, and ecosystem services in the northern Hauraki Gulf and Bay of Islands. The sustainability review must account not only for catch and biomass, but also for the state of kelp forests and the prevalence of kina barrens.

Kina barren Sail Rock March 2025. Photo Shaun Lee.

Economic rationale for full closure

CRA 1 landed value: The estimated landed value of the CRA 1 commercial catch is NZ $10.4 million in 2019[1].

Extent of reef habitat: The exposed east Northland coast from Ahipara to Tāwharanui supports 32,515 hectares of shallow rocky reef (≤30 m depth), including 24,660 ha of *Ecklonia radiata* kelp forest[2]

In fished areas, kina barrens cover approximately 30% (range: 7–49%)[3] of shallow reef habitats.

30% of 32,515 ha = 9,755 ha lost kelp forest.

Overseas studies value kelp forests at $106,000–242,700 per hectare per year[4], based on global estimates of key ecosystem services such as fisheries production, nutrient removal, and carbon capture.

Low: 9,755 ha × NZ $106,000/ha/yr ≈ NZ $1.034 b/yr

High: 9,755 ha × NZ $242,700/ha/yr ≈ NZ $2.368 b/yr

The foregone ecosystem services from lost kelp forest are between 100 and 228 times greater than the value of the fishery itself.

"The best available scientific information indicates that the implementation of no-take marine protected areas is an effective means to rebuild the abundance of urchin predators (including snapper and rock lobster) and reduce urchin abundance. There are currently no examples of this type of restoration occurring outside of full no-take marine protected areas."[5]

[1] https://nzrocklobster.co.nz/stock-summaries/cra1/

[2] https://kerrandassociates.co.nz/component/easyfolderlistingpro/?view=download&format=raw&data=eNpFkEFPhDAQhf9L75sFXVkdzsbDJh69TgY6QGOhZFp0jfG_OwU2e2rnte_1eyUoS_iNUIHpgrcspo5wOoNxI_Ucj58scqDJHijG0DpKqtnQLiNPKR4_LuhdlyQ_2aZJZoksW1A0tYNil_uFY7o_oPmIq5an58020ch5LMDkpdpUZ285ahL2M6UhHz-BOT4U5XkP6JznW0B1AnNRbsQ3oZYxX8PXmLRSYot8TQqPocNF2sFN2JAITxHfg6TBa1n0K-UjGL2772bb7eR8nZ3wvZ7yUkrUDvlPTN2s6os6hL8cf2-NtU0fQu8V8O8fEWt7UQ

[3] https://www.tandfonline.com/doi/full/10.1080/00288330.2024.2336081

[4] https://www.nature.com/articles/s41467-023-37385-0

[5] https://www.mpi.govt.nz/dmsdocument/66717-Review-of-sustainability-measures-for-spiny-rock-lobster-CRA-2-for-202425/

Opposition to ineffective measures

1. **Special Permits for Urchin Removal:**

Kina removal under the current special-permit system is extremely labour-intensive—requiring around 50 diver-hours per hectare to reduce densities to ecologically meaningful levels (less than 1 kina per m^2)—making it insufficient as a long-term solution to reverse barrens.[6]

2. **Reliance on Industry-Led Non-Regulated Measures:**

Reliance on industry-led, non-regulated measures has already been proven inadequate in New Zealand rock lobster management. In CRA 2, voluntary shelving between 2015 and 2018 failed to halt the stock's decline, and Fisheries New Zealand was forced to impose a 60% cut to the TACC in 2018[7]. Although CRA 1 has not trialled voluntary shelving, the CRA 2 experience provides a clear warning that such approaches lack durability and cannot substitute for enforceable regulation.

Conclusion

STET recommends that CRA 1 be closed to commercial harvest for a period of at least 10 years, with a review at 5 years, to allow predator populations to recover and kina barrens to regress.

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[6] https://www.sustainableseaschallenge.co.nz/assets/dms/Reports/Kina-barrens/Kina-barrens-to-kelp-forests.pdf
[7] https://eds.org.nz/wp-content/uploads/2025/04/Draft-EDS-Submission-on-fisheries-reforms-20250404-Website.pdf