

CLIMATE JUSTICE TARANAKI SUBMISSION, 24 SEPTEMBER 2013

ACTIVITY CLASSIFICATIONS UNDER THE EEZ ACT: A DISCUSSION DOCUMENT ON THE REGULATION ON EXPLORATORY DRILLING, DISCHARGE OF HARMFUL SUBSTANCES AND DUMPING OF WASTE IN THE EXCLUSIVE ECONOMIC ZONE AND CONTINENTAL SHELF

Question 1

- (a) Do you agree with the proposal that exploratory drilling for oil and gas be classified as non-notified discretionary? If not, how should the activity be classified or regulated?

No, Climate Justice Taranaki (CJT) disagrees.

CJT submits that exploratory drilling for oil and gas should be classified as **Prohibited**, based on four reasons:

- (i) The **safety, environmental and economic risks** of furthering oil and gas exploration far outweigh the short-term economic benefits from such operations. The exploratory phase is the most risky of all! Threats and impacts on NZ's many internationally and nationally significant marine species (notably [marine mammals](#) and [seabirds](#)) and their habitats are serious and can be longterm and irreversible ([NOAA Gulf Spill Restoration](#)).
- (ii) The government's current massive push for deep sea oil and gas exploration will increase the probability of catastrophic events exponentially. Yet **NZ lacks the capacity to contain a well blow-out and substantial oil spill** in the deep sea. The isolation of NZ further impedes any mitigation measures should a catastrophic accident occurs. The use of the toxic dispersants such as Corexit 9500 and 9527 as an "important" response strategy ([Maritime NZ, 2012](#)) is known to pose serious harm to people and marine life ([60 Minutes, 2013](#); [Wathen, 2013](#)).
- (iii) **The EEZ Act, in its current form, is inadequate** in "avoiding, remedying, or mitigating any adverse effects of activities on the environment" ([EEZ Act section 10 Purpose](#)). e.g. it does not provide assurance or clear guidance on risk management, liability and cost recovery. Notably, [EEZ Act sections 62 and 65](#) concerning **bonds are vague and weak** in wording, giving no assurance that the various conditions listed (e.g. remedial, restoration or maintenance; monitoring of long-term effects) will be complied with, or even be included in the consents. There is no mention of adequate [compensation for economic losses](#) from long-term damage/decline in fisheries or tourism either.
- (iv) It is not possible to safeguard "the life-supporting capacity of the environment" ([EEZ Act section 10 Purpose](#)) when climate change issues are ignored. So although EEZ Act section 59 states that "EPA must not have regard to ... the effects on climate change of discharging greenhouse gases into the air" when considering applications for marine consents, CJT argues strongly that exploratory drilling should be Prohibited, based on **serious climate change concerns**.

- (b) Are there any issues that have not been considered?

- The deep sea oil acreage international companies are planning to explore in New Zealand's EEZ range from 1400m at the Great South Basin to 1800m at the Deepwater Taranaki Basin, 2700m at the Pegasus Basin and 3100m at Raukumara Basin. At 10-20 times deeper than any existing oil/gas wells in NZ, these are '**untested territories**'. And given **NZ's extreme environments** (seismicity, wild wind and rough seas), the risks of accidents and technical failures are substantial.
- The potential **economic impact from a catastrophic well blow out and oil spill** at any one of these NZ oil fields is huge, and far exceeds the current NZ\$25-\$30 million insurance requirement for offshore oil installations under the Marine Protection Rules Part 102, or the \$250,000-\$1,500,000 cost for a discretionary application for a marine consent. The latter cost is disproportionately small

compared with the potential environmental effects of exploratory drilling gone wrong. The [BP Deepwater Horizon](#) exploratory well oil blow out at 1500m in the Gulf of Mexico costed the “US economy \$40 billion and devastated the fishing and tourism industries in the US Gulf of Mexico” (Greenpeace, 2013).

- It is not the Ministry for Environment, EPA or the EEZ Act’s mandate “to encourage greater investment in exploratory drilling activities...” This statement should be removed from the Act.
- The issue of **climate change** is “the most important environmental issue facing the world”, according to the Parliamentary Commissioner for the Environment. This view, shared by all credible, international agencies including the International Energy Agency (IEA), is being ignored intentionally in the EEZ Act and the current discussion document. [IEA, 2012](#) clearly stated, “no more than one-third of proven reserves of fossil fuels can be consumed prior to 2050 if the world is to achieve the 2°C goal, unless carbon capture and storage (CCS) technology is widely deployed.” The total global reserves, equivalent to 2,860 GtCO₂, is “already enough to take us beyond 3°C of warming” ([Carbon Tracker and Grantham Research Institute, 2013](#)). “To keep open a realistic chance of meeting the 2°C target, intensive action is required before 2020...” ([IEA, 2013](#)). Indeed, responsible consideration of inter-generational equity would preclude any further exploration for fossil fuels, given the well documented climate and related impacts.
- NZ should take the lead in halting further exploration for new fossil fuel reserves, thus contributing to the global effort in reducing greenhouse gas emission and stabilising climate change, and move onto a smarter, more sustainable economy.
- Moreover, **ocean acidification**, the direct result of fossil fuel combustion and carbon dioxide emissions, is already affecting marine food webs and will have serious [negative impacts on fisheries](#). To facilitate further exploration and mining of fossil fuels is to knowingly contribute to irreversible decline of many already over-exploited fisheries worldwide.
- The longer we delay action to reduce emissions to alleviate climate change impacts, the more costly the economic, environmental and social damage will be. We cannot keep operating as a fossil-fuel based economy when the near future economy will not be. The temporary **petroleum boom now will bust**, as investments no longer pay off. Already, “oil companies are hitting the brakes on a U.S. shale land grab that produced an abundance of cheap natural gas... The spending slowdown by international companies including [BHP Billiton Ltd. \(BHP\)](#) and [Royal Dutch Shell Plc \(RDSA\)](#) comes amid a series of write-downs of oil and gas shale assets, caused by plunging prices and disappointing wells” ([Monks et al. 2013](#)).
- NZ would be far smarter to **transition to a low carbon economy** based on clean renewables and energy efficiencies, now. It will generate far [greater economic and job opportunities](#) than a fossil-fuel based economy, and be a positive, ethical investment for future generations.

Question 2

Has section 2.3.1 correctly described the key issues related to discharges and dumping?

This section is overly simplistic. It has not described discharges from exploratory, appraisal and development drilling, all of which involve discharge of drill cuttings (water-based or synthetic). E.g. [OMV’s Environmental Impact Assessment for its Taranaki Basin exploratory, appraisal and development drilling \(2013-2014\)](#) stated that each of the 3-5 exploratory wells will produce 300-530 m³ of water-based drill cuttings, to be discharged at sea. The EIA also stated that the five development wells will produce over 800 m³ of synthetic-based drill cuttings which “may be treated on the rig until the oil on cuttings (OOC) averages <6.9% by weight and discharged overboard”. Both types of discharge will present “a **medium environmental risk**”. And there are many other wells to be drilled by other companies off Taranaki and in other regions of NZ.

The section stated “chemical discharges may have acute toxic effects on organisms, mammals, seabirds and fish etc.” Some of the discharges may have chronic as well as acute toxic effects. This is especially the case when **hydraulic fracturing (fracking)** is involved, because of the numerous toxic chemical products to be used and subsequently discharged or disposed of. **Cumulative effects** from the discharge or dumping of

materials containing assortments of chemicals, and over time, are also not mentioned, even though the [EEZ Act section 59](#) states that EPA must take into account any effects on the environment or existing interests of allowing the activity, including cumulative effects.

The section has not mentioned **radioactive substances** which are not only present naturally as NORM, but increasingly used in the drilling process. E.g. Halliburton has patented a "[perforating gun assembly and method for controlling wellbore pressure regimes during perforating](#)" in 2011 which involves the use of depleted uranium.

The section has not described the **monitoring and reporting requirements** associated with the various discharge and dumping concerned. EEZ Act section 63 states when considering granting a marine consent, "*the conditions that the EPA may impose include... (iii) monitor, and report on, the exercise of the consent and the effects of the activity it authorises...*" Section 66 also indicates that consent holders may be required to conduct monitoring (e.g. take samples, carry out analyses, provide information to EPA...). Recent communications from EPA confirmed that "*companies may be expected to conduct their own monitoring and reporting...*" **What level of independence and transparency can we expect when consent holders monitor their own activities?**

Question 3

Do you agree that 'harmful substances' should be defined as in the proposed definition in 2.3.2? If not, how should the term be defined?

The proposed definition (a) "*a substance which is ecotoxic to aquatic organisms...*" appears to exclude substances which are **ecotoxic to seabirds and marine mammals**. The [Hazardous Substances \(Minimum Degrees of Hazard\) Regulations 2001 Schedule 6 Minimum degrees of hazard](#) for ecotoxicity to aquatic organisms are limited to data concerning fish, crustaceans and algae.

Notably, the Hazardous Substances (Minimum Degrees of Hazard) Regulations 2001 seem to **defy the precautionary principle**, in respect of the burden of proof of safety. It states, "*A substance with ecotoxic properties is not hazardous for the purposes of the Act unless ... the substance is ecotoxic to aquatic organisms because ... data for the substance indicates that the fish LC₅₀ is ... data for substance indicates that the crustacean EC₅₀ is ...the substance is ecotoxic to terrestrial vertebrates because ... data for the substance indicates an acute avian or mammalian oral or dermal LD₅₀ ...*"

The reality is that such **data do not exist** for many (if not most) toxic chemicals involved in oil and gas drilling, fracking, production and discharge, many of which are ecotoxic and hazardous. The EEZ activity classifications discussion document itself acknowledges the numerous "*applications for modifications to existing approved discharge management plans, mostly seeking approval for new ecotoxic chemicals.*" Enquiries to the EPA re fracking chemicals have revealed that many **are not listed** on the HSNO [NZIoC](#) or [CCID](#) databases (See [CJT submission to the PCE, Nov 2012](#)).

The **HSNO Act and EEZ regulatory regime concerning discharges at sea are far from adequate** in regards to preventing contamination of the marine environment from the numerous and ever increasing number of drilling and fracking chemicals. Indeed, with new chemicals, products and technologies being patented and applied by industries all the time, can we expect EPA or other government institutions to have the capacity to assess, regulate and monitor the application and discharge of every chemical used in NZ? Importantly, many chemical products used by the industry, notably '[fracking products](#)', contain **undisclosed components** due to proprietary reasons. How can such products or their components possibly be regulated or monitored? Are these the reasons **why the monitoring and reporting responsibilities reside primarily on consent holders?** (See answer to question 2)

To take into account potential ecotoxicity to seabirds and marine mammals and to reduce the burden of proof on EPA (re inadequate data), the definition of **'harmful substances'** should be changed (bolded) to:

“a substance which is ecotoxic to aquatic, **marine or terrestrial** organisms **or** considered hazardous for the purposes of the Hazardous Substances (Minimum Degrees of Hazard) Regulations 2001, or

(b) oil, or

(c) garbage, or

(d) discharged sediments and/ or tailings from mineral operations.”

Question 4

Do you agree that the activities set out in Table 4 should be classified as *permitted* and regulated with these conditions? If not, how else could they be classified or regulated?

Discharges of offshore processing drainage and displacement water should be classified **discretionary** due to their hazardous content.

Question 5

Do you agree that the activities set out in Table 5 should be classified as *non-notified discretionary*? If not, how else could they be classified or regulated?

- No, Climate Justice Taranaki (CJT) disagrees.
- “Offshore process drainage and displacement water discharges exceeding the permitted thresholds ...”, production water discharges, and operational chemical discharges should all be classified “**discretionary** activities” and regulated rigorously.
- Efforts should be made to ensure consultations with iwi and other parties, maximize retrieval of chemicals for reuse, recycle or safe disposal following proper treatment, and support research into possible harm/impacts and improved disposal methods.
- Discharges of drilling fluids from oil and gas operations during the exploratory stage should be classified as “**prohibited**” (See answers to question 1).

Question 6

Do you agree that the activities set out in Table 6 should be classified as *discretionary*? If not, how else could they be classified or regulated?

Yes, these activities should be classified as discretionary and regulated rigorously to minimize environmental damage. Efforts should be made to ensure consultations with iwi and other parties, maximize retrieval of infrastructure for reuse, recycle or safe disposal following proper treatment, and support research into possible harm/impacts and improved disposal methods.

Additional comments

Section 2.3.3 Assessment of discharge and dumping package Table 8:

The third objective should read: to ensure that the regulations “are cost effective, with the cost to government and operators proportionate to the level of environmental and economic **risks** and effects addressed”. The “risk” factor cannot be ignored, especially when dealing with oil and gas exploration and development.

Section 2.4.1 What the proposed package could cost

The discussion document says *“it is not possible to estimate”* the **monitoring and reporting costs** and does not give any indication on how these costs will be recovered. Yet a scientifically robust and independent monitoring and reporting regime is crucial in ensuring that the EEZ Act is implemented effectively and transparently. The monitoring program (including technical details), reporting and enforcement procedures should be developed specifically for the various activities under different proposed classifications. The monitoring and reporting costs should be recovered primarily from the consent holders.

Importantly, the EEZ Act should be revised to **give EPA the mandate and resources to conduct actual monitoring and reporting** on the consented activities and their effects, not only to administer consent applications and approve observers selected by consent holders. Rather than ensuring *“the efficiency of the overall process for operators”*, we should be aiming for effective implementation of the EEZ Act to ensure environmental protection and sustainable management of the EEZ and continental shelf.

2.4.2 Expected impact of the proposed package of regulations

The classification of exploratory drilling as non-notified discretionary will take away the basic rights of New Zealanders to have a say (or public participation in decision making) in a high risk activity that has the potential to devastate or adversely impact on marine and coastal wildlife, fisheries, tourism, human health and cultural and amenity values (See also answers to question 1).

Table 9: Transitional provisions for discharge and dumping activities for transferred discharge and dumping activities

This table mentions various consented activities *“will be subject to the EPA’s monitoring and enforcement obligations under the EEZ Act”*. This appears to contradict EEZ Act sections 63 and 66 which seem to imply potential monitoring obligations on the consent holders rather than EPA. CJT would appreciate clarifications and elaborations on **EPA’s monitoring and enforcement obligations** re the mentioned activities.

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