

Via Certified and Electronic Mail

December 7, 2017

Scott Pruitt, Administrator Environmental Protection Agency 1200 Pennsylvania Ave., NW Washington, DC 20460 Email: Pruitt.Scott@epa.gov

Samuel Coleman, Acting Regional Administrator Environmental Protection Agency, Region 6 Fountain Place, 1445 Ross Ave. Dallas, TX 75202

Email: Coleman.Sam@epa.gov

Wilbur Ross, Secretary U.S. Department of Commerce 1401 Constitution Ave., NW Washington, DC 20230 Email: TheSec@doc.gov

Ryan Zinke, Secretary
U.S. Department of the Interior
1849 C Street, NW
Washington, DC 20240
Email: secretary_of_the_interior@ios.doi.gov

RE: Sixty-Day Notice of Intent to Sue for Violations of the Endangered Species Act

Dear Administrator Pruitt, Acting Regional Administrator Coleman, Secretary Ross, and Secretary Zinke:

Pursuant to 16 U.S.C. § 1540(g), this letter serves as the Center for Biological Diversity's official notice of intent to sue the U.S. Environmental Protection Agency ("EPA"), its Administrator, and Region 6 Regional Administrator for violations of the Endangered Species Act ("ESA")¹ in connection with the agency's issuance of the National Pollutant Discharge Elimination System General Permit for New and Existing Dischargers in the Offshore Subcategory of the Oil and Gas Extraction Point Source Category for the Western Portion of the Outer Continental Shelf of the Gulf of Mexico, General Permit No. GMG290000 (the "NPDES Permit"). Specifically, EPA issued the NPDES Permit without first completing consultation with the U.S. Fish and Wildlife Service or the National Marine Fisheries Service (collectively, "the Services") on the potential impacts of the permit on threatened and endangered species or their critical habitat, in violation of Section 7 of the ESA.²

The Western Gulf of Mexico is littered with thousands of offshore oil and gas platforms and tens of thousands of offshore wells—the largest concentration of offshore oil and gas activity in the country. The NPDES Permit allows oil companies to dump unlimited amounts of produced water, including chemicals used in fracking and other well stimulations, from these facilities into the Gulf of Mexico, along with drill cuttings and fluids, well treatment fluids, and other wastes. The chemicals present in such wastes include dangerous chemicals like benzene, arsenic, lead,

_

¹ 16 U.S.C. § 1531, et seq.

² *Id.* § 1536.

mercury, phenol formaldehyde resins, and hexavalent chromium that can have myriad negative effects on marine wildlife.

Yet EPA issued the NPDES Permit without consulting with the expert wildlife agencies on the potential impacts of the permit on threatened and endangered species in the Gulf of Mexico or their critical habitat. Without engaging in such consultation, EPA cannot know the impacts of the dangerous discharges allowed under the NPDES Permit on imperiled species or their critical habitat, and cannot ensure that its issuance of the NPDES Permit will not jeopardize the continued existence of listed species or adversely modify their critical habitat, as required by Section 7(a)(2) of the ESA.³ Moreover, EPA's authorization of the discharge of numerous waste fluids from offshore oil and gas facilities into the Gulf of Mexico before completing the consultation process violates Section 7(d) of the ESA.⁴ If EPA does not remedy these violations within 60 days of this letter, the Center intends to file suit in federal court to resolve the matter.

I. LEGAL BACKGROUND

In enacting the ESA, Congress recognized that certain species "have been so depleted in numbers that they are in danger of or threatened with extinction." Accordingly, a primary purpose of the ESA is "to provide a means whereby the ecosystems upon which endangered species and threatened species depend may be conserved, [and] to provide a program for the conservation of such . . . species."

To reach these goals, Section 9 of the ESA generally prohibits any person, including any federal agency, from "taking" any endangered species. The term "take" is statutorily defined broadly as "to harass, harm, pursue, hunt, shoot, wound, kill, trap, capture, or collect, or to attempt to engage in any such conduct. The definition of "harm" has been defined broadly by regulation as "an act which actually kills or injures wildlife. Such act may include significant habitat modification or degradation where it actually kills or injures wildlife by significantly impairing essential behavioral patterns, including breeding, feeding or sheltering. Courts have found federal agencies liable for take of listed species where agency-authorized activities resulted in the killing or harming of ESA-listed species.

Additionally, Section 7(a)(2) of the ESA requires federal agencies to "insure that any action authorized, funded, or carried out by such agency . . . is not likely to jeopardize the continued existence of any endangered species or threatened species or result in the destruction

⁵ *Id.* § 1531(a)(2).

³ 16 U.S.C. § 1536(a)(2).

⁴ *Id.* § 1536(d).

⁶ *Id.* § 1531(b).

⁷ *Id.* § 1538(a)(1)(B); *see also* 50 C.F.R. § 17.31(a) (extending the "take" prohibition to threatened species managed by the U.S. Fish and Wildlife Service).

⁸ 16 U.S.C. § 1532(19).

⁹ 50 C.F.R. § 17.3; see also Babbitt v. Sweet Home Ch. of Communities for a Great Oregon, 515 U.S. 687 (1995) (upholding regulatory definition of harm).

¹⁰ See e.g., Defenders of Wildlife v. Envtl. Prot. Agency, 882 F.2d 1294, 1300-01 (8th Cir. 1989); Strahan v. Coxe, 127 F.3d 155, 163 (1st Cir. 1997).

or adverse modification of [the critical] habitat of such species." "Action" is broadly defined to include "all activities or programs of any kind authorized, funded, or carried out, in whole or in part" by federal agencies and includes granting permits and licenses, as well as "actions directly or indirectly causing modifications to the land, water, or air."

To facilitate compliance with Section 7(a)(2), an "agency shall . . . request" from the Services information regarding whether any listed species "may be present" in a proposed action area, and, if so, the "agency shall conduct a biological assessment" to identify species likely to be affected. ¹³ If the agency determines, with the concurrence of the Services, that the action is not like ly to adversely affect a listed species, formal consultation is not required. ¹⁴

However, an agency must initiate formal consultation with the Services if a proposed action "may affect" any listed species.¹⁵ The "may affect" standard broadly includes "[a]ny possible effect, whether beneficial, benign, adverse or of an undetermined character."

After formal consultation, the Services issue a biological opinion to determine whether the agency action is likely to "jeopardize" any species' existence based on the best available science. ¹⁷ If jeopardy is found, the opinion may specify reasonable and prudent alternatives that avoid jeopardy. ¹⁸ Additionally, the Services may "suggest modifications" to an action during consultation to "avoid the likelihood of adverse effects" to the listed species even when the action would not by itself jeopardize the species' continue existence. ¹⁹

If the Services conclude that the action or the alternatives will not cause jeopardy, but will result in take of listed species, the Services will issue an incidental take statement ("ITS") as part of the biological opinion that specifies "the impact, i.e., the amount or extent, of . . . incidental taking" that may occur, and any measures necessary or appropriate to minimize such impact on the listed species. ²⁰ The take of a listed species in compliance with the terms of a valid ITS is not prohibited under Section 9 of the ESA. ²¹

But an action agency's consultation duties do not end with the issuance of a biological opinion. Instead, an agency must reinitiate consultation when: (1) the amount of take specified in an ITS is exceeded; (2) new information reveals that the action may have effects not previously

¹¹ 16 U.S.C. § 1536(a)(2); 50 C.F.R. § 402.14(a).

¹² 50 C.F.R. § 402.02.

¹³ 16 U.S.C. § 1536(c); 50 C.F.R. §§ 402.12(c), (d).

¹⁴ 50 C.F.R. § 402.14(b).

¹⁵ *Id.* § 402.14(a).

¹⁶ 51 Fed. Reg. 19,926 (June 3, 1986).

¹⁷ 16 U.S.C. § 1536(a)(2); 50 C.F.R. § 402.14(d).

¹⁸ 16 U.S.C. § 1536(b); 50 C.F.R. § 402.14(h)(3).

¹⁹ 50 C.F.R. § 402.13(b).

²⁰ *Id.* § 402.14(h)(3), (i). When those listed species are marine mammals, the take must first be authorized pursuant to the Marine Mammal Protection Act ("MMPA"), and the ITS must include any additional measures necessary to comply with the MMPA take authorization. *Id.*

²¹ 16 U.S.C. §§ 1536(b)(4), (o)(2); 50 C.F.R. § 402.14(i)(5).

considered; (3) the action is modified in a way not previously considered; or (4) new species are listed or critical habitat designated that may be impacted by the agency's action.²²

In addition, after consultation is initiated, Section 7(d) of the ESA prohibits the agency from "mak[ing] any irreversible or irretrievable commitment of resources" toward an activity that would "foreclos[e] the formulation or implementation of any reasonable and prudent alternative measures."²³ Congress enacted Section 7(d) "to prevent Federal agencies from 'steamrolling' activity in order to secure completion of the projects regardless of their impact on endangered species."²⁴ The 7(d) prohibition "is in force during the consultation process and continues until the requirements of section 7(a)(2) are satisfied."²⁵

FACTUAL BACKGROUND II.

The Gulf of Mexico is one of the most productive—and fragile—marine ecosystems in the nation. It supports a staggering array of marine life that represents an important contribution to the Gulf coast economy. It is home to thousands of marine species, ranging from simple invertebrates such as gastropods and sponges to complex and highly evolved fish and marine mammals. It is estimated that there are thousands of species of invertebrates, at least 600 species of fish, and dozens of species of cetaceans in the Gulf. In addition, five of the world's eight species of sea turtles as well as tens of thousands of shore and coastal birds reside in or migrate to the Gulf of Mexico. More than 300 species of coral, combined with other hard-bottom communities, wetlands, seagrass beds, mangroves, and soft-bottom communities, provide the necessary habitat to support this rich assemblage of marine life. These diverse and highly complex habitats provide food, shelter, and spawning grounds for all of the Gulf's species at different points during their life history.

Many of the species that are found in the Gulf of Mexico are listed as threatened or endangered under the ESA. The area is home to endangered sperm whales, fin whales, and sei whales; five threatened and endangered sea turtle species including green, hawksbill, Kemp's ridley, leatherback, and loggerhead turtles; ten listed bird species; numerous listed fish species, including Gulf sturgeon and smalltooth sawfish; and multiple listed coral species.²⁶ Critical habitat is designated in the Gulf for loggerhead turtles, Gulf sturgeon, smalltooth sawfish, among other species.²⁷

The Western Gulf of Mexico is also littered with thousands of offshore oil and gas platforms and tens of thousands of offshore wells, placing these imperiled species at further risk. On September 19, 2017, EPA permitted these facilities to discharge unlimited amounts of produced water, including chemicals used in fracking, as well as drill cuttings and fluids, well

²⁴ Pacific Rivers Council v. Thomas, 936 F. Supp. 738, 745 (D. Idaho 1996) (quoting North Slope Borough v. Andrus, 486 F. Supp. 332, 356 (D.D.C.), aff'd in part and reversed in part on other grounds, 206 U.S. App. D.C. 184, 642 F.2d 589 (D.C. Cir. 1980)).

4

²² 50 C.F.R. §§ 402.16, 402.14(h)(3). ²³ 16 U.S.C. § 1536(d).

²⁵ 50 C.F.R. § 402.09.

²⁶ BOEM, 2017-2022 Outer Continental Shelf Draft Proposed Program at 6-12 (Jan. 2015).

²⁷ *Id.*; *id.* at 6-11.

treatment fluids, and other wastes into the Gulf of Mexico. The permit also applies to any new offshore oil and gas development and production facilities in the Western Gulf.

The discharge of such wastes from new and existing facilities in the Western Gulf raises grave ecological concerns because of the dangerous chemicals present in such wastewater. Produced water contains several chemicals that are toxic to aquatic life. These compounds include aromatic hydrocarbons and alkylphenols, heavy metals, biocides, corrosion inhibitors, emulsion breakers, coagulants, oxygen scavengers, and naturally occurring radioactive materials.²⁸ The most common metals in produced water are arsenic, cadmium, copper, chromium, lead, mercury, nickel, and zinc.²⁹ In addition, produced water can contain substantial amounts of organic material, inorganic salts, small particles, organic acids (e.g., acetic acid and propionic acid), and can have high levels of sulfur and sulphide.³⁰

Several compounds in produced water are known to have negative biological effects. Polycyclic aromatic hydrocarbons and alkylphenols, which are abundant in produced water, are potent carcinogens causing DNA damage³¹ and can lead to oxidative stress,³² cardiac function defeats, 33 embryotoxicity in fish, 34 reduction of lysosomal membrane stability in kidney cells, 35 elevated hepatic activity, ³⁶ and neoplasia of fish liver. ³⁷ Studies show that other chemicals such as alkyl phenols at concentration found in produce waters have hormone-disrupting effects in

²⁸ Neff, J., K. Lee, and E. M. DeBlois, Produced water: overview of composition, fates, and effects. Pp. 3–54 Produced water. Springer (2011).

²⁹ Bakke, T., J. Klungsøyr, and S. Sanni, Environmental impacts of produced water and drilling waste discharges from the Norwegian offshore petroleum industry, 92 Marine Environmental Research 154–169 (2013). ³⁰ *Id*.

³¹ Aas, E., T. Baussant, L. Balk, B. Liewenborg, and O. K. Andersen, PAH metabolites in bile, cytochrome P4501A and DNA adducts as environmental risk parameters for chronic oil exposure: a laboratory experiment with Atlantic cod, 51 Aquatic Toxicology 241–258 (2000).

³² Hasselberg, L., S. Meier, and A. Svardal, Effects of alkylphenols on redox status in first spawning Atlantic cod (Gadus morhua), 69 Aquatic Toxicology 95–105 (2004); Sturve, J., L. Hasselberg, H. Fälth, M. Celander, and L. Förlin, Effects of North Sea oil and alkylphenols on biomarker responses in juvenile Atlantic cod (Gadus morhua), 78 Aquatic toxicology S73–S78 (2006).

³³ Incardona, J. P., T. K. Collier, and N. L. Scholz, Defects in cardiac function precede morphological abnormalities in fish embryos exposed to polycyclic aromatic hydrocarbons, 196 Toxicology and Applied Pharmacology 191–205 (2004).

³⁴ Carls, M. G., L. Holland, M. Larsen, T. K. Collier, N. L. Scholz, and J. P. Incardona, Fish embryos are damaged by dissolved PAHs, not oil particles, 88 AquaticToxicology 121-127 (2008).

³⁵ Holth, T. F., J. Beckius, I. Zorita, M. P. Cajaraville, and K. Hylland, Assessment of lysosomal membrane stability and peroxisome proliferation in the head kidney of Atlantic cod (Gadus morhua) following long-term exposure to produced water components, 72 Marine Environmental Research 127-134 (2011).

³⁶ Meier, S., et al., Development of Atlantic cod (Gadus morhua) exposed to produced water during early life stages: Effects on embryos, larvae, and juvenile fish, 70 Marine Environmental Research 383-394 (2010).

³⁷ Myers, M. S., J. T. Landahl, M. M. Krahn, and B. B. McCain, Relationships between hepatic neoplasms and related lesions and exposure to toxic chemicals in marine fish from the US West Coast, 90 Environmental Health Perspectives 7 (1991).

fish,³⁸ can change the lipid composition in hepatic cells of free-living cod and haddock,³⁹ lead to cytotoxicity in liver cells in rainbow trout,⁴⁰ disrupt normal larval pigmentation and increase jaw deformities in cod, which reduces feeding ability and results in larval mortality.⁴¹

Fracking chemicals also have negative impacts on a wide variety of marine life. Scientific research has indicated that 40 percent of the chemicals used in fracking can harm aquatic animals and other wildlife. For example, some of the chemicals used in fracking operations can break down into nonylphenol, a very toxic substance with a wide range of harmful effects that include the development of intersex fish and altered sex ratios at the population level. Nonylphenol can also inhibit the development, growth and survival of marine invertebrates, and has been shown to bioaccumulate in marine mammals such as sea otters.

Phenol formaldehyde resins are also used in offshore fracking. These resins are toxic and can cause cancer and mutations; if released into the marine environment, these pollutants have the potential to absorb other chemical compounds such as nonylphenol, increasing their toxicity to marine life. Indeed, scientists have determined that chemicals frequently used in fracking are among the most toxic in the entire world with respect to aquatic life. Indeed, scientists have determined that chemicals frequently used in fracking are among the most toxic in the entire world with respect to aquatic life.

Additionally, recent studies using fluids produced by fracking to examine their impact on aquatic animals found that the fluids have significant negative effects on rainbow trout, even at greater than 100-fold dilutions.⁴⁷ These effects include oxidative stress, endocrine disruption, and biotransformation which may lead to longer term impacts on populations where spills have

³⁸ Arukwe, A., T. Celius, B. T. Walther, and A. Goksøyr, Effects of xenoestrogen treatment on zona radiata protein and vitellogenin expression in Atlantic salmon (Salmo salar), 49 Aquatic Toxicology 159–170 (2000); Arukwe, A., S. W. Kullman, and D. E. Hinton, Differential biomarker gene and protein expressions in nonylphenol and estradiol-17β treated juvenile rainbow trout (Oncorhynchus mykiss), 129 Comparative Biochemistry and Physiology Part C: Toxicology & Pharmacology 1–10 (2001); Meier, S., et al., Effects of alkylphenols on the reproductive system of Atlantic cod (Gadus morhua), 81 Aquatic Toxicology 207–218 (2007).

³⁹ Grøsvik, B. E., et al., PAH and biomarker measurements in fish from condition monitoring in Norwegian waters in 2005 and 2008, ICES (2010).

⁴⁰ Tollefsen, K. E., R. C. Sundt, J. Beyer, S. Meier, and K. Hylland, Endocrine modulation in Atlantic cod (Gadus morhua L.) exposed to alkylphenols, polyaromatic hydrocarbons, produced water, and dispersed oil, 74 Journal of Toxicology and Environmental Health, Part A 529–542 (2011); Meier et al. 2010.

⁴¹ Meier et al. 2010.

⁴² CCST, Advanced Well Stimulation Technologies in California: An Independent Review of Scientific and Technical Information, Aug. 28, 2014.

Diehl, J., et al., The distribution of 4-nonylphenol in marine organisms of North American Pacific Coast estuaries, 87 Chemosphere 490-497 (2012).
 Id

⁴⁵ Mato, Y. et al., Plastic resin pellets as a transport medium for toxic chemicals in the marine environment, 35 Environmental Science & Technology 318-324 (2001). ⁴⁶ CCST. 2015, Vol. II at 76.

⁴⁷ Yuhe He, et al., Effects on Biotransformation, Oxidative Stress, and Endocrine Disruption in Rainbow Trout (Oncorhynchus mykiss) Exposed to Hydraulic Fracturing Flowback and Produced Water, 51 Environ. Sci. Technol. 940–947 (2017); Tamzin A. Blewett, et al., The effect of hydraulic flowback and produced water on gill morphology, oxidative stress and antioxidant response in rainbow trout (*Oncorhynchus mykiss*), 7 Nature: Scientific Reports 46582 (2017).

occurred. A similar study analyzed the impacts of fracking fluids on water fleas, and found exposure to fracking fluids caused a significant decline in reproduction and increased mortality.⁴⁸ And another study found acute toxicity of zebrafish embryos from fracking fluid.⁴⁹ The federal government has previously acknowledged that wastewater discharges from well stimulations may impact benthic organisms;⁵⁰ marine and coastal fish;⁵¹ marine mammals;⁵² and ESA-listed sea turtles.⁵³ EPA's issuance of the NPDES Permit, which allows unlimited amounts of produced water, including chemicals used in fracking, to be dumped into the Gulf of Mexico puts imperiled species at further risk.

III. VIOLATIONS OF THE ENDANGERED SPECIES ACT

EPA's issuance of the NPDES Permit without first completing consultation with the Services on the direct, indirect, and cumulative impacts of the discharges authorized under the permit on threatened and endangered species or their critical habitat violates the ESA. As explained above, federal agencies are required to consult whenever they take an "action" that "may affect" ESA-listed species or their critical habitat. 54 EPA's issuance of the NPDES Permit, which allows waste fluids from offshore fracking and other oil and gas activities to be discharged into the Gulf of Mexico, constitutes an "action" under the ESA and its implementing regulations.⁵⁵ And the information above makes clear that the "may affect" threshold is met for numerous ESA-listed species and critical habitat found in and around the Gulf of Mexico.

Nevertheless, EPA issued the decision without first consulting with the Services. This failure violates the procedural requirements of Section 7 of the ESA. ⁵⁶ By issuing the permit without first completing consultation, EPA is also in violation of its substantive duty under Section 7(a)(2)⁵⁷ to ensure that its actions do not jeopardize the continued existence of threatened and endangered species found in the waters and coastal areas near where offshore drilling occurs. These species include, but are not limited to sperm whales, loggerhead sea turtles, elkhorn and staghorn coral, and the other species in Appendix A. Similarly, EPA is also in violation of its substantive duty under Section $7(a)(2)^{58}$ to ensure its actions do not result in the destruction or

⁴⁸ Tamzin A. Blewett, et al., Sublethal and Reproductive Effects of Acute and Chronic Exposure to Flowback and Produced Water from Hydraulic Fracturing on the Water Flea Daphnia magna, 51 Environ. Sci. Technol. 3032-3039 (2017).

⁴⁹ Yuhe He, et al., Chemical and toxicological characterizations of hydraulic fracturing flowback and produced water, 114 Water Research 78-87 (2017).

⁵⁰ BOEM and BSEE, Programmatic Environmental Assessment of the Use of Well Stimulation Treatments on the Southern California Outer Continental Shelf, May 2016.

⁵¹ *Id.* at 4-54.

⁵² *Id.* at 4-55.

⁵³ *Id.* at 4-60.

⁵⁴ 16 U.S.C. § 1536(a)(2); 50 C.F.R. § 402.14(a) ("Each Federal agency shall review its actions at the earliest possible time to determine whether any action may affect listed species or critical habitat. If such a determination is made, formal consultation is required..."); see Wash. Toxics Coalition v. E.P.A., 413 F.3d 1024, 1032 (9th Cir. 2005); Defenders of Wildlife v. E.P.A., 882 F.2d 1294 (8th Cir. 1989). ⁵⁵ 50 C.F.R. § 402.02.

⁵⁶ 16 U.S.C. § 1536(a)(2).

⁵⁷ *Id*.

⁵⁸ *Id*.

adverse modification of critical habitat for loggerhead sea turtles, and the other critical habitat listed in Appendix A.

To the extent EPA is relying on any existing biological opinions, or any other permits, authorizations, management decisions or other actions related to discharges from offshore oil and gas platforms in the Western Gulf of Mexico, those biological opinions and other documents are outdated, not based on the best available science, and fail to evaluate the impacts that discharging massive quantities of waste fluid from offshore oil and gas operations, including chemicals used in offshore fracking, may have on ESA-listed species. Thus, EPA's reliance on these old biological opinions (or other permits, authorizations or management decisions) does not satisfy their Section 7 obligations.

The ESA requires EPA to reinitiate consultation when: (1) new information reveals that the action may have effects not previously considered; (2) the action is modified in a way not previously considered; or (3) new species are listed or critical habitat designated that may be affected by the action.⁵⁹ Here, reinitiation is required for all three reasons.

First, "new information" demonstrates that oil companies are now authorized to use offshore fracking and other well stimulation treatments and that these activities will impact wildlife in ways that were "not previously considered" in past consultations. Second, the oil and gas discharge activities authorized by EPA have been "modified in a way not previously considered" because offshore fracking and other well stimulation techniques increase pollution and other harms, prolong the life of offshore oil and gas drilling activities, and exceed the amount of drilling activity anticipated in past consultations. Third, as detailed in Appendix A, numerous species have been listed since the existing consultations were completed; new critical habitat has also been designated. Offshore oil and gas drilling activities may affect these newly-listed species and critical habitats. EPA's failure to reinitiate consultation on the effects of its permitting of wastewater discharges from offshore oil and gas drilling activities in the Western Gulf of Mexico OCS violates the agency's procedural and substantive duties under Section 7(a)(2) of the ESA.⁶⁰

Finally, Section 7(d) of the ESA provides that, after the initiation of formal consultation, an agency is prohibited from making "any irreversible or irretrievable commitment of resources... which has the effect of foreclosing the formulation or implementation of any reasonable and prudent alternative measures" until consultation is complete. EPA is in violation of Section 7(d) of the ESA by making an irreversible and irretrievable commitment of resources in issuing the NPDES Permit before completing the consultation process. EPA is in the consultation process.

5

⁵⁹ *Id.* § 402.16(b), (c), (d).

⁶⁰ 16 U.S.C. § 1536(a)(2). To the extent EPA claims that their failure to consult and/or reinitiate consultation was based on their conclusion that the discharges would have "no effect" on listed species or critical habitat, those conclusions are unreasonable and unlawful.

^{61 16} U.S.C. § 1536(d).

⁶² The fact EPA can amend the permit "does not diminish the irretrievable nature of the decision to issue the permit" because "amendments are discrete actions" that are "independent from the decision to issue the permit in the first instance." *In re: Desert Rock Energy Company, LLC*, 2009 EPA App. Lexis 28 (EPA App. 2006).

IV. CONCLUSION

As described above, EPA's failure to complete consultation with the Services prior to issuing the NPDES Permit violates EPA's procedural and substantive duties under Section 7 of the ESA. The Center welcomes the opportunity to discuss how EPA might resolve these ongoing violations without the need for litigation on these issues. An appropriate remedy that would prevent the need for litigation on these issues would be for EPA to amend the NPDES Permit to implement a zero-discharge requirement for drill cuttings, drilling fluids, well treatment fluids, and produced water unless and until Section 7 consultation is completed. If, however, the EPA does not remedy these violations, the Center will initiate litigation in federal court to resolve the matter. If you have any questions or wish to discuss this matter please feel free to contact me.

Sincerely,

/s/ Kristen Monsell
Ocean Legal Director, Senior Attorney
Center for Biological Diversity
1212 Broadway, Ste. 800
Oakland, CA 94612
kmonsell@biologicaldiversity.org

APPENDIX A:

List of Threatened and Endangered Species and Designated Critical Habitat that May be Affected by EPA's Action

Threatened and Endangered Species:

Fin whale (Balaenoptera physalus) -- Endangered, 35 Fed. Reg. 18,319 (Dec. 2, 1970)

Sei whale (Balaenoptera borealis) -- Endangered, 35 Fed. Reg. 18,319 (Dec. 2, 1970)

Sperm whale (*Physeter macrocephalus*) -- Endangered, 35 Fed. Reg. 18,319 (Dec. 2, 1970)

West Indian manatee (*Trichechus manatus*) -- Threatened, 35 Fed. Reg. 18,319 (Dec. 2, 1970); 82 Fed. Reg. 16,668 (Apr. 5, 2017)

Green sea turtle (*Chelonia mydas*), North Atlantic and South Atlantic Distinct Population Segments -- Threatened, 81 Fed. Reg. 20,057 (Apr. 6, 2016)

Hawksbill sea turtle (*Eretmochelys imbricate*) -- Endangered, 35 Fed. Reg. 8,491 (June 2, 1970)

Kemp's ridley sea turtle (*Lepidochelys kempii*) -- Endangered, 35 Fed. Reg. 18,319 (Dec. 2, 1970)

Leatherback sea turtle (*Dermochelys coriacea*) -- Endangered, 35 Fed. Reg. 8,491 (June 2, 1970)

Loggerhead sea turtle (*Caretta caretta*), Northwest Atlantic Distinct Population Segment -- Threatened, 43 Fed. Reg. 32,800 (July 28, 1978)

Gulf sturgeon (*Acipenser oxyrinchus desotoi*) -- Threatened, 56 Fed. Reg. 49,653 (Sept. 30, 1991)

Nassau grouper (Epinephelus striatus) -- Threatened, 81 Fed. Reg. 42,268 (June 29, 2016)

Smalltooth sawfish (*Pristis pectinate*), U.S. Distinct Population Segment -- Endangered, 79 Fed. Reg. 73,978 (Dec. 12, 2014)

Rough cactus coral (*Mycetophyllia ferox*) -- Threatened, 79 Fed. Reg. 53,852 (Sept. 10, 2014)

Pillar coral (*Dendrogyra cylindrus*) -- Threatened, 79 Fed. Reg. 53,852 (Sept. 10, 2014)

Lobed star coral (*Orbicella annularis*) -- Threatened, 79 Fed. Reg. 53,852 (Sept. 10, 2014)

Mountainous star coral (*Orbicella faveolata*) -- Threatened, 79 Fed. Reg. 53,852 (Sept. 10, 2014)

Boulder star coral (*Orbicella franksi*) -- Threatened, 79 Fed. Reg. 53,852 (Sept. 10, 2014)

Staghorn coral (Acropora cervicornis) -- Threatened, 79 Fed. Reg. 53,852 (Sept. 10, 2014)

Elkhorn coral (*Acropora palmate*) -- Threatened, 79 Fed. Reg. 53,852 (Sept. 10, 2014)

Critical Habitat:

Loggerhead sea turtle -- 79 Fed. Reg. 39,856 (July 10, 2014)

Gulf sturgeon -- 68 Fed. Reg. 13,370 (Mar. 19, 2003)

Smalltooth sawfish -- 74 Fed. Reg. 45,353 (Sept. 2, 2009)