Department of Fish and Wildlife Office of Spill Prevention and Response

2025

APPLICATION FORMS AND INSTRUCTIONS

for the

California Department of Fish and Wildlife, Office of Spill Prevention and Response (CDFW-OSPR)

LICENSING, RENEWAL & EXEMPTION

of

OIL SPILL CLEANUP AGENTS (OSCAs)

State of California

Gavin Newsom

Natural Resources Agency
Wade Crowfoot, Secretary
Department of Fish and Wildlife
Charlton Bonham, Director
Office of Spill Prevention and Response
Heather Geldart, Administrator

FOREWORD

The 1995 California Legislature authorized the Administrator of the Office of Spill Prevention and Response (OSPR), Department of Fish and Game (since January 1, 2013 named the Department of Fish and Wildlife) to license and regulate the use of oil spill cleanup agents (OSCAs). Prior to this time, OSCAs were licensed by the State Water Resources Control Board (SWRCB), with review and enforcement by the Department of Fish and Game.

This document uses much of the historic framework and current toxicity test standards established by the SWRCB but receives periodic updates from OSPR to maintain currency with current state and federal test standards. All products must be reviewed and/or licensed for use before they can be used on oil spills impacting, or potentially impacting, California state surface waters.

A few important points we wish to highlight:

- 1) Government Code Section 8670.13.1(b) states that sorbents and other cleanup devices that do not employ the use of active chemical cleanup agents or are otherwise determined not to cause aquatic toxicity during an oil spill response, are not subject to the licensing provisions. An exemption can be considered if no other aquatic hazards are expected (Title 14, Subdivision 4, Section 885.2; and Fish and Game Code Section 5650). You may apply for an exemption from licensing if you believe your product falls into this category. We believe that some self-contained solid (flake or particulate) solidifiers may also fall into this category and may, upon review, qualify for a license exemption.
- 2) Product and testing data required for either the licensing or exemption of a product are essentially the same; all requested information and test data must be provided for review in either case.
- 3) Applicable trace/heavy metals thresholds established by the SWRCB within the California Ocean Plan apply to California OSCA licensing and may change periodically. Please see Table II-3 of the Ocean Plan: https://www.waterboards.ca.gov/water_issues/programs/ocean/.
- 4) The California licensing and exemption process is separate from the federal process under the National Contingency Plan (NCP). Products, such as sorbents, that are categorically exempt under the NCP are not necessarily exempt from California licensing.
- 5) Bioremediants currently listed on the National Contingency Plan (NCP) may or may not require additional testing to obtain a license for use in California.

All the information and forms you will need to apply for a license, a renewal of an existing license, or a license exemption can be found in this document. Any questions may be directed to Ms. Annie Nelson at annie.nelson@wildlife.ca.gov.

TABLE OF CONTENTS

	Page
FOREWORD	D QUESTIONS L SPILL CLEANUP AGENTS (OSCAS) 9 ffectiveness Testing 14 16 22 23 or a Currently Licensed OSCA) 28 29 31 36 38 39 ness Tests on Solid OSCAS 41 45
GENERAL INFORMATION AND COMMONLY ASKED QUESTIONS	5
LICENSING REQUIREMENTS AND PROCESS FOR OIL SPILL CLEANUP AGENTS (OSCAS) 9
Licensing Instructions Table 1: Protocol Sources for Toxicity and Effectiveness Testing License Application Form Table 2: Test Results for Trace/Heavy Metals Table 3: Test Data Summaries	14 16 22
License Renewal Requirements and Process (for a Currently Licensed OSCA) License Renewal Form	
License Exemption Requirements and Process License Exemption Form Table 4: Test Results for Trace/Heavy Metals (Solid OSCAs) Table 5: Summary of Toxicity and Effectiveness Tests on Solid OSCAs	36 39
Billing Form	44
Appendix I	45
 A. Effectiveness Testing of liquid OSCAs i. Dispersant ii. Surface Washing Agent a. Effectiveness b. Floatation iii. Liquid Solidifier/Gelling Agent iv. Herding Agent, Emulsion Treatment v. Bioremediant 	45
 B. Trace Metals and Toxicity Testing of Liquid OSCAs i. Trace Metals a. Test Protocols b. Trace Metals Thresholds ii. Toxicity Test Protocols 	46

		Page
C.	Effectiveness and Sinking Tests of Solid OSCAs i. Effectiveness ii. Sinking	46
D.	Trace Metals and Toxicity Testing of Solid OSCAs i. Preparing a Leachate ii. Testing Using Leachate of Solid OSCA	48
E.	Accredited NELAP and ELAP Laboratories i. NELAP ii. ELAP	49
Ар	pendix II	49
A.	Federal Plans and Regulations i. National Contingency Plan (NCP) ii. NCP Product Schedule iii. Appendix C of Subpart J of NCP (Testing Protocols) iv. Regional Contingency Plan (RCP): RRT IX Policies on Use of ARTs	49
B.	State Plans and Regulations i. CDFW-OSPR Oil Spill Cleanup (OSCA) Regulations ii. OSPR Currently Licensed or Exempted Products iii. California Fish and Game Code, Section 5650 iv. California State Water Resources Control Board (SWRCB) Ocean Plan	49
C.	Additional Federal and State Web Links and Resources i. 2015 Draft Updates to NCP Subpart J ii. National Response Team: Selection Guide iii. Best Achievable Technology: ART 2017 Report to the California Legislature iv. Potential Uses and Approval Processes for ARTs in California	50

GENERAL INFORMATION AND COMMONLY ASKED QUESTIONS

1. What is the statutory authority for licensing of OSCAs in California?

Government Code Section 8670.13.1 requires the Administrator of the Office of Spill Prevention and Response (OSPR) to license all oil spill cleanup agents for use in waters of the State. Government Code Section 8670.3(an) and 14 CCR 790(w)(1) define "Waters of the State" or "State Waters" as any surface water, including saline waters, marine waters, and freshwaters, within the boundaries of the state but does not include groundwater. OSCA use that can be reasonably expected to cause a potential impact to state waters will also be reviewed.

2. What are the regulations that govern the licensing and use of OSCAs in California?

The regulations governing the licensing and use of OSCAs are set forth in Chapter 8, Sections 884-886.6, and Title 14 of the California Code of Regulations. These regulations are "essentially similar to the ones" previously used by the State Water Resources Control Board (SWRCB). A link to these regulations is included in Appendix II.B.i of this document.

3. What is the definition of an OSCA?

An oil spill cleanup agent (OSCA) is defined as a chemical or biological substance used for removing, dispersing, or otherwise cleaning up oil or any residual products of petroleum in, or on, any waters of the State. This category of substances would include surface washing agents, dispersants, gelling and solidifying agents, herding agents, emulsifiers and deemulsifiers, sorbents and bioremediants. This category does not include mechanical equipment used for oil spill containment and recovery (e.g., hard boom, skimming systems).

4. What types of products are exempted from the OSCA licensing procedures?

Within the broad category of substances considered OSCAs, the statute provides an "exemption" from the licensing procedures for products that would otherwise be considered "inert." Specifically, Government Code Section 8670.13.1(b) states that sorbents and other cleanup devices that do not employ the use of active chemical cleanup agents, or otherwise determined by the Administrator not to cause aquatic toxicity or other deleterious effects (per Fish and Game Code Section 5650¹) for purposes of oil spill response, are not subject to the licensing provisions.

It is important to keep in mind that a product is not necessarily "inert" simply because it is "naturally occurring." For example, sorbent clays and peat-moss products are naturally occurring and, as such, people may believe them to be inert. However, some clay contains

¹ Fish and Game Code Section 5650(a)(6) states "...it is unlawful to deposit in, permit to pass into, or place where it can pass into the waters of this state any ... substance or material deleterious to fish, plant life, mammals, or bird life."

high heavy metal concentrations which can leach into the water, and peat moss products can cause water acidification if not used properly. Elevated heavy metal concentrations (also present in some magnetic coatings of sorbents and other oil collection products), and excess hydrogen ion concentrations, are deleterious to many aquatic organisms, especially in shallow or freshwater environments. It is for these reasons that it is necessary for the Administrator to make the final determination whether a product must be licensed, and/or whether there will be any mitigating conditions added to the license to limit possible adverse effects to the "receiving" environment during an oil spill response.

If a determination is made that a product does not pose aquatic toxicity or other deleterious aquatic hazards for purposes of oil spill response, an exemption letter will be issued to the vendor for the product. Some conditions of use (e.g., open-water use of sorbents and solidifiers may be limited to self-contained forms) may be stated in the exemption cover letter to assure product use is in a form and manner consistent with other California state and Regional Response Team (RRT) use policies. Licensing (rather than exemption) and incident-specific authorizations may be imposed if there is concern about whether a particular sorbent product will only be used in self-contained form.

A license exemption is valid indefinitely if the material information used in making the determination has not been altered in any substantial way and is being used in an approved manner. The forms and procedures required for an exemption determination are included in this document.

5. If my product is already listed on the Federal Environmental Protection Agency (EPA)
National Contingency Plan (NCP) Product Schedule, or reviewed and subsequently given
an exemption letter by federal EPA, do I still need to apply for a State license?

In most cases, YES.

If a product is required to be listed on the NCP before use (or reviewed by the federal EPA and subsequently given an exemption letter), it will also need to be licensed by the state of California before use in, on or near California state surface waters. NCP-listed products include dispersants, surface washing agents, gelling and solidifying agents, herding agents, emulsifiers, de-emulsifiers, and chemical boom products.

The EPA currently exempts from NCP Product Schedule listing all products that meet the EPA definition of a sorbent. However, California does not offer a similar categorical exemption for sorbents from its licensing review process. Determination of how a sorbent product will be handled by the state (*i.e.*, requirement for a state license versus issuance of a state exemption from licensing) will depend upon the product's constituents and the aquatic toxicity or other deleterious aquatic hazards the material may present.

Bioremediant products are generally treated similarly by both the NCP Product Schedule

listing process and the California state product licensing process. If a bioremediant is listed on the NCP, the OSPR requests that the materials provided to obtain NCP listing also be submitted to the OSPR for review. After this review, a license is usually issued. In a few cases, additional information may need to be submitted prior to issuing a license, and additional conditions of use may be imposed.

6. Do I need to have my product listed on the NCP Product Schedule as well as have a State license before it can be used in California?

Generally, YES. Federal regulations governing the listing of OSCAs state that only those products appearing on the Product Schedule can be requested for use by the Federal On-Scene Coordinator (FOSC) during a spill event. The exception is for sorbents and a few other products, which are exempted from the NCP listing process. For more information on the federal listing process, please refer to the NCP Product Schedule web site at: http://www2.epa.gov/emergency-response/national-contingency-plan-subpart-j

Although the FOSC can use any NCP-listed or exempted product on spills in federal waters offshore California, it will generally be the case that they will first consider use of a product that has also been issued a California license (or license exemption) for use in, on or near surface waters of the State.

7. Once my product has a State license and is listed on the NCP Product Schedule, what is the process for its use?

Once a product is listed (or granted an exemption from listing) on the NCP Product Schedule, it can <u>potentially</u> be used in, near or on all navigable waters. To be used in, near or on California state waters, it also requires a state license (or state license exemption). However, unless 1) the product has been granted federal listing and/or state licensing exemptions, or 2) the RRT has issued a specific pre-authorization to the FOSC for use of a particular OSCA, <u>the FOSC must make a request of the RRT for authorization of each OSCA</u> for each spill event.

This means that although a product *can* be used, it does not *have* to be used to address all circumstances. The FOSC will determine the appropriateness of any particular OSCA use during a given spill incident and will determine whether a product can be used under existing exemptions, an existing RRT pre-authorization, or will require incident-specific RRT review and authorization before use.

Incident-specific RRT authorization is done through a formal request of the RRT IX (RRT Region IX covers California) by the FOSC. All OSCAs (except exempted sorbents) must be authorized by the RRT in advance of use. This includes dispersants, in-situ burning and non-dispersant OSCAs (surface washing agents, herding agents, bioremediants, etc.). Once the RRT grants authorization, a product can be used.

Per Chapter 8, Section 886.1, Title 14 of the California Code of Regulations use of OSCAs in California state waters also requires a separate authorization from the OSPR Administrator.

8. What if I do not want my product to be used for on-water oil spills?

The California state licensing of an OSCA is specifically for use on or near marine or inland surface waters of the State. If the primary use of your product is to be on land, where it will not impact surface waters of the State, you do not need to obtain a license for its use.

LICENSING REQUIREMENTS AND PROCESS FOR OIL SPILL CLEANUP AGENTS (OSCAs)

California regulations governing the licensing and use of OSCAs require that specific information be provided to the State. This information allows an application to receive adequate review. The regulations for the information requirements are in Appendix II.B.i of this document.

It is important that the application form contain a summary of all test results, and that any reference to attached lab reports clearly specify the attachment number. Any application which fails to summarize all data on the application form and clearly reference attachments will result in return of the application without processing. Additionally, we request that the completed application be submitted in a binder or pdf-folder format, with individual attachments of supporting documentation separated by clearly labeled tabs or descriptively named pdf files. This format greatly expedites review and evaluation of an application.

Once issued, a license remains valid for a period of five years unless revoked for cause. A license can be renewed for an additional five-year period if the product has not changed from that described in the initial application (see renewal information on page 28 of this document) and meets all current licensing requirements, including toxicity testing using current protocols, and metals testing that meets current thresholds.

LICENSING INSTRUCTIONS

This information will help you complete the License Application Form (Form 1959, page 16)

<u>Section 1 - Product Trade Name</u>

Please provide the product trade name and any other present or previous synonyms of that name.

<u>Section 2 - Product Classification</u>

Check the block that is applicable to the product.

- A sorbent is a product whose primary mode of action is to adsorb oil to its exterior surface or absorb it into its interior core.
- Elasticity modifiers (aka vasoelastizers, solidifiers, gelling agents) increase the viscoelasticity of spilled oil, often causing it to "gel" or solidify.
- A herding agent acts to reduce the spread of oil by having a greater spreading pressure than the oil.

- A dispersant or dispersing agent functions to reduce the interfacial surface tension between oil and water. Dispersing agents have surfactant-based (i.e., soap like) compounds composed of both water and oil compatible constituents. They enhance natural degradation of the oil particles by breaking the surface oil slick into smaller particles that more easily enter and mix into the three-dimensional space of the water column, thereby reducing the amount of sticky oil at the water's surface that birds, whales and dolphins, seals and sea lions and turtles need to transit through.
- A surface washing agent (SWA) also has soap-like properties. They facilitate the removal of oil from shoreline substrates or other oiled surfaces, including oiled vegetation and, in some cases, oiled wildlife. The primary effect of this type of OSCA is to act as a wetting agent to soften or lower the viscosity of the oil, increasing the effectiveness of water in displacing the oil from the surface it is attached to. A surface washing agent cannot act as a dispersant. When used to clean oiled surfaces near water, the surrounding area must be protected with boom (hard and/or sorbent) and rinse water containing the oil plus the SWA must float to the water surface in that contained area and collected for disposal.

A product cannot be licensed as both a dispersing agent and a surface washing agent. A product should be categorized for licensing based on its primary intended function, although any probable secondary action of an OSCA should be noted on the license application. State law (Title 14, California Code of Regulations, Section 886.1(e)) prohibits the use of a dispersant on the shoreline. Therefore, the primary mechanism of a surface washing agent shall be to "lift" oil from an oiled surface/shoreline and allow it to move and float on top of the water where it can be subsequently removed, or by preventing oil from sticking to surface or shoreline substrate prior to oiling. Surface washing agents will receive limited authorizations for use if more than 10 percent of their function to break up oil and disperse it into surrounding water, rather than floating it. License applications should include results of tests indicating lift-and-float capabilities of the surface washing agent. The test may be of the applicant's choosing but those test procedures must be well documented in an attachment to the license application.

Bioremediants or bioremediation agents contain oil-degrading bacteria that serve a
seeding function, or nutrients that serve to enhance the growth of naturally occurring
bacteria, or enzymes, biosolvents, biosurfactants, or combinations of these
components. These agents are deliberately introduced into an oil discharge to increase
the rate of biodegradation to mitigate the effects of the discharge. If a product is
categorized as a bioremediant and is listed on the NCP Product Schedule, the OSPR may
not require any additional information from that required by the Federal Environmental
Protection Agency (EPA).

To obtain a state OSCA license for an NCP-listed bioremediant, begin by submitting to OSPR the OSCA data as submitted to the EPA. Include the Billing Form (page 36) and applicable application review fee. The OSPR will review the product information and

test results and may issue a license without further data requirements. If further data are required, the applicant will be provided with a list of the additional information and/or tests required to complete the licensing process.

- Emulsion treating agents act to break oil-in-water emulsions. They can facilitate oil-water separation processes and in some cases extend the period of time other OSCAs can be effectively used to treat the spill.
- When 10 percent or more of the "agent-plus-oil" sinks, the product shall be considered
 a sinking agent and will not be licensed for use in the State. This may be of particular
 concern for applicants requesting a license for un-waterproofed cellulose products,
 hair, or clay- or mineral-based sorbent products.

Section 3 - Contact Personnel

Please provide the names, addresses (postal and email) and telephone numbers (office, fax, emergency) of the applicant, manufacturer, vendor and a technical representative that can serve as a point of contact in California.

Section 4 - Product Availability

Please provide information on the availability of the product from its main warehouse or stockpile locations to the three California ports specified on the form (for dispersants), or to other city locations specified by the applicant (for other OSCAs).

<u>Section 5 - General Product Information</u>

Please provide general product information including a product label, Safety Data Sheet (SDS), and any pertinent product brochures. Please reference (by attachment number) where this information can be found in the application.

Labeling Instructions: State law (Title 14, California Code of Regulations, Section 885.8) requires that the following information be printed on the product label. A copy of the label must be attached to the application, and must contain the following:

- a. The name, brand or trademark, if any, under which the OSCA is sold;
- b. The name and address of the manufacturer, importer or vendor;
- c. Special handling, storage or worker safety precautions;
- d. The product's flash point and freezing point;
- e. Recommended application procedure(s), concentration(s) and conditions for use regarding water salinity, water temperature, and types and ages of oils; and,
- f. Shelf life/Expiration date.

Section 6 - Material Classification and Analytical Data

Describe the product by chemical type and percent composition of each component. It is not adequate to say a product is "from natural origin and therefore inert." All data must be verified by attached laboratory reports that identify the method, test instruments, and detection limits used in heavy metal and other analyses.

Hydrogen ion activity of the product as applied to the water surface should be between 6.5 and 8.5 pH units. Some exceptions may be allowed if the product will be used in a manner that protects receiving waters and biota from impacts when the pH is outside this range.

Flash point information is required since it is possible that containers of OSCA exposed to direct sun or high heat may attain temperatures greater than 100°F. To lessen the opportunity for ignition, an open cup flash point of 170°F or greater is strongly recommended. Products with lower flash points may be considered for a license if proper temperature-controlled storage will be provided by the applicant during a response.

No specific standards or criteria are established for some other classes of information, such as solubility, freezing point, viscosity, color and conductivity. This information is necessary, however, for a complete review of the application.

<u>Section 7 – Methods of Use and Treatment Concentrations</u>

Please indicate the recommended amount of product needed to address a spill of 3 liters. This information will be used to estimate the toxicity of the treatment concentration when compared to the test data from toxicity tests conducted on marine species. The oils used in treatment tests should include diesel, Alaskan North Slope Crude and Bunker C oils but may include other oil types (with a range of oil densities) at the discretion of the license applicant.

<u>Section 8 – Product Toxicity and Effectiveness</u>

Product Toxicity

There are two categories of aquatic toxicity testing: 1) testing for trace/heavy metals, and 2) testing for toxicity. Most tests will be required for most OSCA products.

Testing for trace/heavy metals: This will be required on a sample of all products
considered for OSCA licensing, and even for some solid sorbent and solidifier products
under consideration for a license exemption. Some trace metals are known to
accumulate and be retained in fish flesh and to be harmful to human health and are
therefore restricted. Test protocol sources are noted in Table 1 below.

Metals shall not be present in the OSCA more than the threshold concentrations established by the California State Water Resources Control Board (SWRCB) under their

Ocean Plan. As these thresholds may change periodically, the applicant should check current Ocean Plan thresholds (Table II-3): https://www.waterboards.ca.gov/water issues/programs/ocean/docs/oceanplan2019.pdf

2. <u>Testing for toxicity</u>: Toxicity testing is conducted with standard marine test species and using the protocols established by the US EPA or as outlined in the Appendices to this document. See Table 1 below.

Toxicity testing of <u>liquid</u> OSCA products (e.g., dispersant, surface washing agent, herding agent) are to be conducted by an accredited laboratory (see Appendix I.E). The protocols your selected lab will use are found in Appendix C, Subpart J of the National Contingency Plan. Protocol sources are found in the Appendices to this document as indicated in Table 1 below.

Testing of <u>solid</u> OSCA products (e.g., self-contained (boom, sock, pillow, pad, fabric) sorbents or solidifiers are to be conducted by an accredited laboratory (see Appendix I.E of this document) using a leachate of the product. Use Table 1 below to find the suggested protocols.

Aquatic toxicity test data already acquired as part of EPA required testing for listing of an OSCA on the NCP Product Schedule may be submitted as part of the California State license or license exemption review application.

A complete laboratory report, detailing the methods, materials, reference toxicant and results as appropriate to the type of test and species must accompany the license or license exemption review application.

Product Effectiveness

Effectiveness (aka efficacy) test protocols are available for some OSCA products, but not all. Some effectiveness tests are already required by the US EPA for NCP Product Schedule listing (e.g., dispersants, bioremediants), others (e.g., surface washing agents, sorbents, solidifiers) are currently optional at both the federal and state levels but would provide valuable information for decision-makers if provided.

Please complete the section appropriate to the type of OSCA submitted for State licensing or license exemption and provide documentation regarding the performance effectiveness of the product. Effectiveness test protocols and/or links for each OSCA product (where available) are presented in the Table below and repeated in the Appendices to this document.

Table 1: Protocol Sources for Toxicity and Effectiveness Testing (* indicates test is optional)

	Type of Test						
OSCA Type	Trace/Heavy Metals	Toxicity	Effectiveness (Lab Test)				
	Appendix	Appendix	Appendix				
Dispersant	I.B.i	I.B.ii	I.A.i				
Surface Washing Agent	I.B.i	I.B.ii	* Under EPA development; can use I.A.a and I.A.b in interim				
Liquid solidifier/gelling agent	I.B.i	I.B.ii	No existing protocol, can use I.A.iii in interim*				
Herder, emulsion treatment	I.B.i	I.B.ii	No existing protocol, can use I.A.iv in interim*				
Bioremediant	I.B.i	Under EPA development	I.A.v				
Solid sorbent or solidifier	I.D.i	I.D.i	I.C.i*				
	I.D.ii	I.D.ii	I.C.ii*				

Section 9 - Degradation

It is important to understand the dynamics of how a specific OSCA will degrade in the environment and any toxicity associated with this degradation.

Applicants are asked to estimate the half-life of a product in the environment of use. This information can be supplied for just the most environmentally persistent component within the OSCA formula. How that half-life is determined is at the discretion of the applicant, although the method used must be reported.

Section 10 - Hazards to Operators

Describe the known hazards to operators posed by the oil spill cleanup agent. Additionally, please attach the Safety Data Sheet (SDS) or the laboratory report which provides the methods and test animals used to arrive at the reported data.

Health hazards are of concern to the State with respect to the protection of those using the chemicals as well as to the general public. The requested information pertaining to public health hazards will be subject to interpretation by the State Department of Health Services or their designee. Therefore, recommendations regarding safeguards during use should be printed on labels and/or containers. If the OSCA constitutes a serious occupational hazard to health, it will not be licensed for use.

Signature Requirement

Applicants shall submit test results and supporting data, along with a certification signed by responsible corporate officials of the manufacturer and laboratory stating that the tests were conducted on a representative product sample, the testing was conducted using generally accepted laboratory practices and by an accredited lab, and they believe the results to be accurate.

LICENSE APPLICATION FORM

Form 1959

California State Review and Licensing of an

Oil Spill Cleanup Agent (OSCA)

Date of Request: **SECTION 1 Product Trade Name:** Synonyms: (1) (2) (3) (4) **SECTION 2 Product Classification** (check all boxes that apply). Primary intended use and effects: Collecting Agent: Other: ☐ Sorbent (solid) ☐ Dispersant ☐ With a coating ☐ Surface Washing Agent/ ☐ With an infusion Shoreline Cleaner ☐ Emulsion Treatment ☐ Elasticity Modifier ☐ Bioremediant □ Solidifier (solid particulate) ☐ Gelling agent (liquid) ☐ Herding Agent Please name and briefly describe any product not falling into any of the above

categories):

SECTION 3 Contact Personnel

Contact Person:	
Company Name:	
Street Address:	
City/State:	
Telephone:	FAX:
	Company Name: Street Address: City/State:

Manufacturer: Contact Person:

Company Name: Street Address: City/State:

Emergency:

Telephone: FAX: Emergency: Email:

Email:

Vendor in Contact Person:
California: Company Name:
Street Address:

Street Address: City/State:

Telephone: FAX: Emergency: Email:

Technical Contact Person: Representative: Company Name:

Street Address:

City/State:

Telephone: FAX: Emergency: Email:

SECTION 4 Product Availability

Dispersants:

Delivery to:	Dispersant name	Amount (gallons)	Delivery time (hours)	Coming from (city,state)	Contact (name, phone)
Los Angeles					
San Francisco					
Eureka					

Other (Non-Dispersant) Liquid OSCAs:

Delivery to: (specify city)	OSCA name	Amount/form (gallons, boom ft., # pads)	Delivery time (hours)	Closest stockpile (city,state)	Contact (name, phone)

]					
•								
•								
SECTIO	ON 5	Produ	ıct Informatio	on (0	General)			
			of Product La act Brochures:			<u> </u>	Attachment No	<u>).</u>
SECTIO	ON 6	Mate	rial Classifica	tion	and Analytica	ıl Data		
			•			•	•	mponent. This and its agents.
		(Supp	orting docum	ent	ation is in Atta	chment No	o. <u> </u>)	
		Physic	cal Properties	s:				
		Less t	ility at 15°C ir han 0.5 parts rts per thousa	per	thousand sali	nity:		
			(visual):		Viscosi	-	in:	(units)
			uctivity: ing Point:		Flash Po Specific	oint: gravity:	pH:	
		(Supp	orting docum	ent	ation is in Atta	chment No	o)	

SECTION 7 Treatment Concentrations and Methods of Use

Treatment Concentrations

Information in this section will be used to identify the margin of safety between the recommended working concentration of the product in the environment (as suggested by the vendor/manufacturer) and the NOEC/LOEC concentrations as determined by the toxicity assay data.

Please provide the amount of product (by volume or weight) that would be required to treat 3 liters of the following petroleum hydrocarbons:

Diesel: Alaskan North Slope Crude: Bunker C: Other oil/product type (specify):

Methods of Use

Dispersing Agents

Describe recommended procedures for product use in open ocean or any other areas proposed for use. May include links to Product Schedule listing, SDS, RRT IX Dispersant Use Plan, etc.

(Supporting documentation is in Attachment No.___)

Surface Washing Agents

Describe recommended procedures for product use in open ocean, bays and estuaries, docking areas, marinas, rivers, lakes or any other areas proposed for use. Pay particular attention to dilution ratio needed to assure at least 90% of the SWA + oil will "lift and float", as otherwise the product will be considered a "lift and disperse" SWA that may require re-classification or restrictions on use. License applications must include results of tests indicating lift-and-float capabilities of the surface washing agent. The test may be of the applicant's choosing but those test procedures must be well documented in an attachment to the license application. Discuss marine v. freshwater applications, and provide

any trace metals, developmental toxicity or effectiveness test data that are distinguished by marine v. freshwater uses. May include links to Product Schedule listing, SDS, etc.
(Supporting documentation is in Attachment No)
<u>All Other Liquid Agents</u> (e.g., surface collecting agent/herder, liquid gelling agent, emulsifiers, de-emulsifiers)
Describe recommended procedures for product use in open ocean, bays and estuaries, docking areas, marinas, rivers, lakes or any other areas proposed for use. May include links to Product Schedule listing, SDS, etc. Discuss marine v. freshwater applications, if relevant.
(Supporting documentation is in Attachment No)
Bioremediants, nutrients, enzyme additives
Describe recommended procedures for product use in open ocean, bays and estuaries, docking areas, marinas, rivers, lakes or any other areas proposed for use. May include links to Product Schedule listing, SDS, etc. Discuss marine v. freshwater and on-water v. on-land applications.
(Supporting documentation is in Attachment No.)

All Other Water-Insoluble Agents (e.g., particulate sorbents and solidifiers)

Describe recommended procedures for product use in open ocean, bays and estuaries, docking areas, marinas, rivers, lakes or any other areas proposed for use. Additionally, describe proven recovery techniques and recommended method of disposal of the OSCA-oil mass.

(Supporting documentation is in Attachment No.___)

SECTION 8

Product Toxicity and Effectiveness

Product Toxicity

Trace/Heavy Metals

All liquid OSCAs shall be assayed for trace/heavy metals using the general procedures described in this document and via its links (e.g., to USEPA Subpart J, CA Ocean Plan) and Appendices to this document. Some solid (e.g., sorbent, solidifier) OSCAs may also require trace/heavy metals analysis, as determined by OSPR as part of license exemption review. A complete laboratory report, detailing the methods, materials and results as appropriate to the type of test must accompany the license or license exemption review application.

Trace/heavy metal thresholds are established by the California State Water Board under its Ocean Plan. Current thresholds are noted in the table below. You will also supply here the trace/heavy metals data from analysis of your product.

Use an accredited laboratory (see Appendix I.E) and <u>verify that their instrumentation</u> <u>can accurately detect at these low (ppb) threshold levels</u>.

Table 2: Test results for trace/heavy metals (concentrations in ppb)

		Ocean Plan (OP) thresholds								
		Test method								
Component	Flame Atomic Absorption (FAA)			Inductively Coupled Plasma (ICP)		r Coupled /Mass metry MS)				
	OP Threshold (ppb)	Your Product (ppb)	OP Threshold (ppb)	Your Product (ppb)	OP Threshold (ppb)	Your Product (ppb)				
Arsenic		(pp=)	10.	(660)	2.	(ββ2)				
Cadmium	10.		10.		0.2					
Chromium (total)	50		10.		0.5					
Copper	20.		10.		0.5					
Lead	20.		5.		0.5					
Mercury					0.5					
Nickel	50.		20.		1.					
Selenium			10.		2.					
Silver	10.		10.		0.2					
Zinc	20.		20.		1.					

Toxicity

Most of the toxicity testing conducted on liquid OSCAs uses standard marine test species and the protocols established by the US EPA for the products listed on the <u>National Contingency Plan (NCP) Product Schedule</u>. The methods for required toxicity tests on dispersants, surface washing agents, surface collecting agents, miscellaneous oil spill control agents and bioremediation agents tests are found at Appendix C to 40 CFR part 300 (PDF)EXIT

Protocols for toxicity testing on a leachate of a solid OSCA (e.g., sorbent, solidifier) may be found in Appendix I.D.ii. This test will only be required if determined by OSPR (and based on the physical composition of the sorbent or solidifier product) as necessary for license exemption consideration. There is space on Table 3 below to report results of the leachate test if it has been required. Toxicity test results may be reported in Table 3 below.

Product Effectiveness

Effectiveness test protocols are available for some OSCA products, but not all. Some effectiveness tests are required (e.g., dispersants, bioremediants) and are detailed by the US EPA as part of Product Schedule listing. Effectiveness tests of other products (e.g., surface washing agents, sorbents, solidifiers) are currently considered optional and/or still under development but would provide valuable information for decision-makers if available.

Summary of Product Toxicity and Effectiveness Tests

The toxicity and effectiveness data reported to the US EPA to support OSCA listing on the NCP Product Schedule may be copied to the table below, as relevant to the OSCA product name/type that is part of the CA State licensing application. Data from leachate tests on solid (sorbent, solidifier) tests may also be reported below, as well as any of the optional effectiveness test data (e.g., surface washing agent, sorbent, solidifier).

Table 3: Test Data Summaries

Dispersant

		Toxicity (LC	50 in ppm))	Effectiveness (9/) *		
Product Name	Product Only		1:10 Product to No. 2 Fuel Oil		Effectiveness (%) * Baffled Flask Test (App. I.A.i)		
Name	Menidia (96-hr)	Mysidopsis (48-hr)	Menidia (96-hr)	Mysidopsis (48-hr)	Prudhoe Bay Crude Oil	S. Louisiana Crude Oil	Average of Crude Oils
			,	,			

^{*}Please note that the dispersant efficacy test required by the US EPA (Swirling Flask) is different than that required for CA State OSCA licensing (baffled flask).

Surface Washing Agents (SWAs)

Product	, ,	.C50 in ppm) .No. 2 Fuel Oil Test	Effectiveness* Percent of oil removed, per volume of product		
Name			In 2 hours, at	In 6 hours, at	
	Menidia (96-hr)	Mysidopsis (48-hr)	SWA:oil dilution	SWA:oil dilution	
			Diesel:	Diesel:	
			ANS:	ANS:	
			Bunker C:	Bunker C:	
			Other oil type:	Other oil type:	

^{*}Please note that neither the US EPA or the California State licensing process currently require a SWA effectiveness test, although SWA effectiveness information on different oil types can help support SWA use decisions in the field. Until an EPA-approved SWA effectiveness protocol is available, can optionally use Appendix I.A.ii and report results in the column in the table above to provide some sense of effectiveness on a range of oil types.

Surface Collecting Agents (SCA, e.g., herders)

Don't de	1:10 Produc	LC50 in ppm) ct-to-No. 2 Fuel	Effectiveness (%)* Percent of oil collected, per volume of product		
Product Name	Menidia (96-hr)	Mysidopsis (48-hr)	In 2 hours, at SCA : oil dilution	In 6 hours, at SCA : oil dilution	
			Diesel: ANS: Bunker C: Other oil type:	Diesel: ANS: Bunker C: Other oil type:	

^{*}Please note that neither the US EPA or the California State licensing process currently require a SCA effectiveness test, although effectiveness information can help support use decisions in the field. Until an EPA-approved SCA effectiveness protocol is available, can optionally use Appendix I.A.iv. and the column in the table above to provide some sense of effectiveness on a range of oil types.

Liquid Solidifiers/Gelling Agents

Product	Toxicity (LC50 in ppm) 1:10 Product-to-No. 2 Fuel Oil Test		Effectiveness (%)* Percent of oil encapsulated, per volume of product		
Name	Menidia (96-hr)	Mysidopsis (48-hr)	In 2 hours, at OSCA: oil dilution Diesel: ANS: Bunker C: Other oil type:	In 6 hours, at OSCA: oil dilution Diesel: ANS: Bunker C: Other oil type:	

^{*}Please note that neither the US EPA or the California State licensing process currently require an effectiveness test for liquid solidifiers or gelling agents, although effectiveness information can help support use decisions in the field. Until an EPA-approved effectiveness protocol is available for this type of OSCA, can optionally use Appendix I.A.iii and the column in the table above to provide some sense of effectiveness on a range of oil types.

Bioremediation Agents

Product Name	Toxicity (LC50 in ppm) 1:10 Product-to-No. 2 Fuel Oil Test		Effectiveness (%) 28 day – ANS 521 Oil Test	
	Menidia (96- hr)	Mysidopsis (48-hr)	Alkanes Reduction (%)	Aromatics Reduction (%)

Solid Sorbents and Solidifiers

Report here only if pursuing an OSCA <u>license</u>. If submitting Form 1958 for License Exemption Review, report instead on page 41.

	Short-Term Chronic Toxicity					
Product Name	Preferred test species: Haliotis rufescens (48-hr)	Alternative test species: Strongylocentrotus purpuratus (72-hr)	Effectiveness (%)* Amount oil sorbed or encapsulated (Protocols in Appendix I.C.)			
	NOEC:	NOEC:	Summary of Drip Test (full report in Attachment)			
	LOEC:	LOEC:				
	EC50:	EC 50:				
	Other data:	Other data:	Sink Test			T
			Oil Type (specify)	At Hour	OSCA + Oil % Sinking	OSCA Alone % Sinking
				0		
				2		
				6		
				24		
				0		
				6		
				24		
				0		
				2		
				6		
				24		
				0		
				2		
				6 24		
				24		

(Supporting documentation is in Attachment No.___)

^{*}Neither the US EPA nor the California State licensing process currently require a solid sorbent/solidifier effectiveness test, although effectiveness information can help support use decisions in the field. Use Appendix __ and the column in the table above to provide available effectiveness data.

	Shelf Life	Opened:	Sealed:
	Estimated Half-Life in	n Ocean Waters:	
	Explain Computation	Method:	
	(Supporting docume	ntation is in Attachment No	_)
SECTION 10	Hazards to Operator	s	
	In addition to the Saf background data.	ety Data Sheet, please attach	any other pertinent
	Inhalation (acute LC₅	o):	
	Skin irritation or sense Eye irritation:	sitivity concentration:	
	Lyc iiiitatioii.		
	Sensory threshold pr		
	Sensory threshold pr	operties: duced on combustion:	

Degradation

SECTION 9

I declare, under penalty of perjury, that the information provided in this application and any accompanying documentation is true and correct. I further certify that all tests were conducted on a representative product sample in accordance with generally accepted laboratory practices, and I believe all results to be accurate.

Signatory			
Printed Nam	ne		
Title			
 Date			

LICENSE RENEWAL REQUIREMENTS AND PROCESS (FOR A CURRENTLY LICENSED OSCA)

- 1. An OSCA license is issued for a term of five years and may not be used after the expiration date unless renewed.
- 2. OSCAs may be renewed if the material information used in initial licensing of the product (*i.e.*, product formulation, appropriate treatment concentrations, heavy metal concentrations, toxicity testing methodologies and thresholds, secondary actions, effectiveness testing), is still accurate and complete. To obtain a renewal:
 - a. Complete the License Renewal Form (Form 1967, page 29) and submit it to the OSPR for review and authorization.
 - b. Complete the Billing Form (Form 1969, page 44) and submit it with the License Renewal Form and the appropriate fee.

If you are uncertain whether your product meets current licensing requirements, please contact the OSCA licensing representative before your current license expires for a determination of what additional testing or information may be required before your license can be renewed.

OSCA Licensing Representative Contact:

Ellen Faurot-Daniels CDFW-OSPR 20 Lower Ragsdale Drive, Suite 100 Monterey, CA 93940

831-649-2888 or 831-233-0723 (cell) ellen.faurot-daniels@wildlife.ca.gov

LICENSE RENEWAL FORM

California State Review and Licensing of an

Oil Spill Cleanup Agent (OSCA)

Date of Request:

	·				
1.	Product Name (As Licensed):				
	Also/Previously Known As:				
	Name of Manufacturer : Address: Telephone: Email:				
	Vendor in California: Address: Telephone: Email:				
	Technical Representative: Address: Telephone: Email:				
2.	Product Changes				
	 □ Change in formula (active or inactive ingredients added or removed) □ No change in components, but % of one or more components has changed □ Change in product construction or packaging □ Change in applied dilution recommendations or application equipment 				
	Provide supporting documentation for any checked boxes in Attachment				
3.	Additional Testing Conducted Since Previous Renewal(s)				
	 □ Additional effectiveness tests conducted □ Additional toxicity tests conducted □ Additional metals tests conducted □ Cases of actual use in spill response 				
	Provide supporting documentation for any checked boxes in Attachment				

4.	Supporting Reasons for Considering This Product as Substantively the Sam Previously Licensed:	e as
lice	signatory, do swear, under penalty of perjury, that the information submitt ensing of the product named above is still true and accurate. I understand t nformation is determined to be inaccurate or incorrect, I could face civil and penalties.	hat if any
	Signature	
	Printed Name	
	Title	
	Date	

LICENSE EXEMPTION REQUIREMENTS AND PROCESS

LICENSE EXEMPTION CRITERIA

Government Code Section 8670.13.1(b) states that sorbents and other cleanup devices that do not use active chemical cleanup agents, or otherwise determined by the Administrator not to cause aquatic toxicity for purposes of oil spill response, are not subject to the licensing provisions.

Any applicant wishing to obtain an exemption from the licensing procedures must demonstrate the "inert" nature of the OSCA in question.

LICENSE EXEMPTION INSTRUCTIONS

All applicants must provide the following information for OSPR review:

- The completed <u>License Exemption From</u> (Form 1958, page 36). Please be sure that all
 the information is included on the form. The applicant will need to provide additional
 documentation verifying the information contained in the analytical chemistry portion
 of the form. This documentation may be in the form of a Material Safety Data Sheet or
 any other mechanism that identifies the chemical components of your product.
- 2. The completed **Billing Form** (Form 1969, page 44).

The information below will help you complete the License Exemption Form.

Section 1 - Product Trade Name

Please provide the product trade name and any other present or previous synonyms of that name.

<u>Section 2 - Contact Personnel</u>

Please provide the names, addresses, telephone numbers (office, fax, emergency) and email addresses of the applicant, manufacturer, vendor and a technical representative that can serve as a point of contact in California.

<u>Section 3 – Product Forms</u>

Although license exemptions will only be processed for sorbent and solidifier products available in self-contained forms (boom, sock, pillow, pad, fabric, etc.), there may be some limited future consideration by the OSPR and the RRT IX for use of products in a loose form but within an otherwise contained (diked, bermed, pooled) area.

Section 4 - Product Availability

Please provide information on the availability of the product from its main warehouse to city locations specified by the applicant (for other OSCAs).

<u>Section 5 - General Product Information</u>

Please provide general product information including a product label, Safety Data Sheet (SDS), and any pertinent product brochures. Please reference (by attachment number) where this information can be found in the application.

Labeling Instructions: State law (Title 14, California Code of Regulations, Section 885.8) requires that the following information be printed on the product label. A copy of the label must be attached to the application, and must contain the following:

- a. The name, brand or trademark, if any, under which the OSCA is sold;
- b. The name and address of the manufacturer, importer or vendor;
- c. Special handling, storage or worker safety precautions;
- d. The product's flash point and freezing point; and,
- e. Recommended application procedure(s), concentration(s) and conditions for use with regard to water salinity, water temperature, and types and ages of oils.
- f. Shelf life/Expiration date.

<u>Section 6 - Material Classification and Analytical Data</u>

Describe the product by type and percent composition of each type. It is not adequate to say a product is "from natural origin" and "therefore inert." All data must be verified by attached laboratory reports that identify the method, test instruments, and detection limits used in heavy metal and other toxicity analyses.

- A sorbent is a product whose primary mode of action is to adsorb oil to its exterior surface or absorb it into its interior core. Sorbent exemptions will only be provided for products in self-contained form (e.g., boom, sock, pillow, pad, fabric, curtain) that can be recovered from the environment when soiled.
- A particulate solidifier in self-contained form (e.g., boom, sock, pillow, pad, fabric, curtain), or a sorbent with solidifying properties, may also be considered by OSPR as appropriate for license exemption review.
- Please also identify any coatings (e.g., magnetic or nano particles, water-proofing or oil sorbing enhancements) or infusions (e.g, bioremediants) in the sorbent or solidifier product that could affect whether the product can be considered for license exemption.
- The self-contained sorbent or solidifier product must be capable of floating at the

water surface for at least 6 hours. If after 6 hours, 10 percent or more of the "agent-plus-oil" sinks, the product shall be considered a sinking agent and will not be issued a license or license exemption for use in the State. This may be of particular concern for applicants requesting a license exemption for products made primarily of untreated cellulose, hair, clay- or mineral-based constituents. A simple sinking test protocol is provided in Appendix I.C.ii.

Hydrogen ion activity of the product as applied to the water surface shall be between 6.5 and 8.5 pH units. Substances that are known to accumulate and be retained in fish flesh and to be harmful to human health should be restricted in their use in OSCAs.

Flash point is considered pertinent to the problem of fire hazard since it is conceivable that some oil spill cleanup agents may be used in the vicinity of extreme heat or fires during a spill response. To lessen the opportunity for ignition, an open cup flash point of 170° F or greater is recommended. Documentation provided by the applicant on best management practices for storage and protection (from extreme heat and fire) of products with lower flash points will be taken into consideration.

No specific standards or criteria are established for some other categories of requested information, such as solubility, freezing point, viscosity, color and conductivity, but are still necessary for a complete review of the application.

Section 7 – Methods of Use and Treatment Concentrations

Please provide the amount of product (by volume or weight) that would be required to treat 3 liters of the following petroleum hydrocarbons:

Diesel: Alaskan North Slope Crude: Bunker C: Other oil/product type (specify):

Section 8 – Product Toxicity and Effectiveness

Product Toxicity

Depending on the physical composition of the sorbent, OSPR may require that a leachate of the sorbent be tested for toxicity to red abalone (*Haliotis rufescens*) larvae. The leachate shall be prepared according to the attached protocols.

Metals shall not be present in the sorbent or solidifier leachate in excess of the threshold concentrations established by the California State Water Resources Control Board (SWRCB) under their Ocean Plan. As these thresholds may change periodically, the applicant should check current Ocean Plan thresholds (Table II-3): https://www.waterboards.ca.gov/water issues/programs/ocean/docs/oceanplan2019.pdf

Any requested laboratory reports for both the trace metals and red abalone larval tests, detailing the methods, materials and results as appropriate to the type of test, must accompany the license exemption review application.

Any testing conducted to satisfy the EPA review of a sorbent product for federal exemption, or of a solidifier product considered for NCP Product Schedule listing, may be submitted as part of the OSPR license exemption review application.

A complete laboratory report, detailing the methods, materials, reference toxicant and results as appropriate to the type of test and species must accompany the license exemption review application.

Product Effectiveness

Effectiveness (aka efficacy) test protocols are optional for sorbent and solidifier products but would provide valuable information for decision-makers if provided.

Please complete the section appropriate to the type of sorbent or solidifier product OSCA submitted for license exemption review and provide documentation regarding the performance effectiveness of the product.

Summary of Sorbent/Solidifier Product Toxicity and Effectiveness Tests

The solidifier toxicity and effectiveness data reported to the US EPA to support OSCA listing on the NCP Product Schedule, or to support the EPA sorbent exemption, may be copied to Tables 4 (pg. 39) and 5 (pg. 41). Trace metals and toxicity test data from tests on leachate (if required or recommended by OSPR as part of State License Exemption Review) and optional effectiveness data may also be reported on Tables 4 and 5.

Section 9 - Degradation

Self-contained sorbent and solidifier products are expected to be retrieved from the environment when soiled.

If there is any expectation or desire to use the product in a loose form, then please:

- 1. Estimate the half-life of a product in the environment of use. This information can be supplied for just the most environmentally persistent component within the sorbent or solidifier formula. How that half-life is determined is at the discretion of the applicant, although the method used must be reported.
- 2. Describe whether the particles could be perceived by fish or wildlife as food, and subsequently ingested.

Section 10 - Hazards to Operators

Describe the known hazards to operators posed by the oil spill cleanup agent. Additionally, please attach the Safety Data Sheet (SDS) or the laboratory report which provides the methods and test animals used to arrive at the reported data.

Health hazards are of concern to the State with respect to the protection of those using the chemicals as well as to the public. The requested information pertaining to public health hazards will be subject to interpretation by the State Department of Health Services or their designee. Therefore, recommendations regarding safeguards during use should be printed on labels and/or containers. If the OSCA constitutes a serious occupational hazard to health, it will not be licensed for use.

Signature Requirement

Applicants shall submit test results and supporting data, along with a certification signed by responsible corporate officials of the manufacturer and laboratory stating that the test was conducted on a representative product sample, the testing was conducted using generally accepted laboratory practices, and they believe the results to be accurate.

The OSPR Licensing Representative will conduct a product review after all the required information has been received. After review and based upon the recommendation of the OSPR Licensing Representative, the OSPR Administrator will either issue an OSCA exemption authorization letter or an exemption denial letter. If the exemption is denied, the applicant will be informed of the reasons for that denial and will be given a list of the additional information and tests required to complete the licensing process. The average time for a determination to be issued is approximately six weeks from date of receipt.

California State Review of a Petition to Exempt from Licensing an

Oil Spill Cleanup Agent (OSCA)

Date of Request: **SECTION 1. Product Trade Name:** Synonyms: (1) (2) (3) (4) ☐ Yes ☐ No Copy of Label Attached: **SECTION 2 Product Classification** (check all boxes that apply). **Primary intended use and elements:** ☐ Sorbent (solid) ☐ Solidifier (solid) ☐ With a coating ☐ With a coating □ With an infusion ☐ With an infusion **Available Forms:** ☐ Yes ☐ No Loose/Flake: Self-Contained ☐ Yes ☐ No (e.g., boom, sock, pillow, sheet): SECTION 3. **Contact Personnel** Applicant: **Contact Person:** Company Name: Street Address: City/State: FAX: Telephone: Email: Emergency: Manufacturer: Contact Person: Company Name: Street Address: City/State FAX: Telephone:

Emergency:

Email:

Vendor in	Contact Person:	
California:	Company Name:	
	Street Address:	
	City/State:	
	Telephone:	FAX:

Telephone: FAX: Emergency: Email:

Technical Contact Person:
Representative: Company Name:
Street Address:

City/State:

Telephone: FAX: Emergency: Email:

SECTION 4 Product Availability

Delivery to: (specify city)	OSCA name	Amount/form (gallons, boom ft., # pads)	Delivery time (hours)	Closest stockpile (city,state)	Contact (name, phone)

SECTION 5 Product Information (general)

Attachment No.

Copy of Product Label: Product Brochures:

SDS:

SECTION 6 Material Classification and Analytical Data

SECTION 7

Please provide the chemical information will be treated a		•	
(Supporting documentation i	is in Attachment No)		
Physical Properties:			
Solubility at 15°C in water of Less than 0.5 parts per th 30 parts per thousand sa	nousand salinity:		
Color (visual):	Viscosity:	in:	(units)
Conductivity:	Flash Point:	pH:	
Freezing Point:	Specific gravity:		
(Supporting documentation i	is in Attachment No)		
Methods of Use and Treatm	ent Concentrations		
Describe recommended procestuaries, docking areas, manuse. Additionally, describe perfectly method of disposal of the OS	rinas, rivers, lakes or any oth roven recovery techniques a	er areas prop	oosed for
Please provide the amount o required to treat 3 liters of the		• .	ıld be
Diesel: Bunker C:	Alaskan North Slope Other oil/product ty		
(Supporting documentation i	is in Attachment No		

SECTION 8 Product Toxicity and Effectiveness

Product Toxicity

Trace/Heavy Metals

All liquid OSCAs shall be assayed for trace/heavy metals using the general procedures described in this document) and via links (e.g., to USEPA Subpart J, CA Ocean Plan) and appendices to this document. Some solid (e.g., sorbent, solidifier) OSCAs may also require trace/heavy metals analysis, as determined by OSPR as part of license exemption review. A complete laboratory report, detailing the methods, materials and results as appropriate to the type of test must accompany the license or license exemption review application.

Trace/heavy metal thresholds are established by the California State Water Board under its Ocean Plan. Current thresholds are noted in the table below. You will also supply here the trace/heavy metals data from analysis of your product.

Use an accredited laboratory (see Appendix I.E) and <u>verify their instrumentation can accurately detect at these low (ppb) threshold levels.</u>

Table 4: Test Results for Trace/Heavy Metals for Solid OSCAs (concentrations ppb):

	Ocean Plan (OP) thresholds								
		Test method							
Component	Flame Atomic Absorption (FAA)		Inductively Coupled Plasma (ICP)		Inductively Plasma Spectro (ICP	/Mass metry			
	OP	Your	OP	Your	OP	Your			
	Threshold	Product	Threshold	Product	Threshold	Product			
	(ppb)	(ppb)	(ppb)	(ppb)	(ppb)	(ppb)			
Arsenic			10.		2.				
Cadmium	10.		10.		0.2				
Chromium (total)	50		10.		0.5				
Copper	20.		10.		0.5				
Lead	20.		5.		0.5				
Mercury					0.5				
Nickel	50.		20.		1.				
Selenium			10.		2.				
Silver	10.		10.		0.2				
Zinc	20.		20.		1.				

Toxicity

Protocols for (short-term chronic) toxicity testing on a leachate of a solid OSCA (e.g., sorbent, solidifier) may be found in Appendix I.D.ii. This test will only be required if determined by OSPR (and based on the physical composition of the sorbent or solidifier product) as necessary for license exemption consideration. There is space on Table 6 below to report results of the chronic toxicity test if it has been required.

Toxicity test results may be reported in Table 5 below.

Product Effectiveness

Effectiveness test of sorbents and solidifier products are currently considered optional but would provide valuable information for decision-makers if provided. Protocols for these optional effectiveness tests, if available, may be found in Appendix I.C.

Summary of Product Chronic Toxicity and Effectiveness Tests

The toxicity and effectiveness data reported to the US EPA to support their sorbent exemption letter or Miscellaneous Oil Spill Control Agent (MOSCA, used for solidifiers) listing on the NCP Product Schedule may be copied to Table 5 below. Data from leachate tests on sorbents and solidifiers may also be reported below, as well as any of the optional effectiveness test data.

Table 5: Summary of Toxicity and Effectiveness Tests on Solid OSCAs

	Short-Term Chronic Toxicity					
Product Name	Preferred test species: Haliotis rufescens (48-hr)	Alternative test species: Strongylocentrotus purpuratus (72-hr)	Effectiveness (%)* Amount oil sorbed or encapsulate (Protocols in Appendix I.C.)			psulated
	NOEC:	NOEC:			ary of Drip Te in Attachme	
	LOEC:	LOEC:				
	EC50:	EC 50:				
	Other data:	Other data:	Sink Test			
	other data.	other data.	Oil Type (specify)	At Hour	OSCA + Oil % Sinking	OSCA Alone % Sinking
				0		
				2		
				6		
				24		
				0		
				2		
				6		
				24		
				2		
				6		
				24		
				0		
				2		
				6		
				24		

^{*}Neither the US EPA nor the California State licensing process currently require a solid sorbent/solidifier effectiveness test, although effectiveness information can help support use decisions in the field. Use Appendix __ and the column in the table above to provide available effectiveness data.

(Supporting documentation is in Attachment No.___)

SECTION 9	Degradation				
	Shelf Life	Opened:	Sealed:		
	Estimated Half-Life in	Ocean Waters:			
	Explain Computation	Method:			
	(Supporting documer	ntation is in Attachment No	_)		
SECTION 10	Hazards to Operators				
	In addition to the Safety Data Sheet, please attach any other pertinent background data.				
	Inhalation (acute LC ₅₀ Skin irritation or sens Eye irritation: Sensory threshold pro Hazardous gases prod Chronic hazards:	itivity concentration:			
	Any other advice or c	onsiderations in use of this pr	oduct:		
	(Supporting documer	ntation is in Attachment No	_)		

I declare, under penalty of perjury, that the information provided in this application and any accompanying documentation is true and correct. I further certify that all tests were conducted on a representative product sample in accordance with generally accepted laboratory practices, and I believe all results to be accurate.

Signatory			
Printed Name			
Title			
 Date			

BILLING FORM

Form 1969

California State Review and Licensing of

Oil Spill Cleanup Agents (OSCAs)

	riease check the appropriate bo	ox and enclose	the correct donar amount.			
	<u>Licensing Fee</u>	\$1000.00				
	This fee applies to all applications for licensing an oil spill cleanup agent.					
	Renewal Fee	\$100.00				
	This fee applies to all applications for cleanup agent.	or renewal of a	currently licensed oil spill			
	Exemption Review Fee	\$100.00	Inert agents (Appendix II.B, Section 885.2(a)(1)(A)			
		\$250.00	All other products			
	cleanup devices that do not employ determined not to cause aquatic to spill response, are not subject to the	the use of acti xicity or delete e licensing prov	b) which states that sorbents and other ive chemical cleanup agents, or otherwise rious aquatic hazards for purposes of oil visions.			
	Make remittance payable to:					
	Oil Spill Prevention and Administration Fund Send a copy of this form along with the remittance and your check to:					
	Ellen Faurot-Daniels Department of Fish and Wildlife, Office 20 Lower Ragsdale Drive, Suite 100 Monterey, CA 93940	of Spill Prevent	ion and Response			
****	**********	*****	********			

APPENDIX I

A. Effectiveness Testing of Liquid OSCAs

i. Dispersant

Baffled Flask Test, Pages 3427-3434 of 2015 Proposed Rule, NCP Product Schedule Subpart J updates:

https://www.govinfo.gov/content/pkg/FR-2015-01-22/pdf/2015-00544.pdf

ii. Surface Washing Agent

a. <u>Effectiveness</u>: Updated protocol still under development by EPA. In the interim, a simple test may be conducted. Consider testing with freshwater as well as artificial seawater, and describe any additional actions (e.g, gentle scrubbing or water flushing) used to remove treated oil. Describe procedures used in attachment to the license application.

Report percent of oil removed, per volume of product and at manufacturer recommended treatment dilution, on different oil types (diesel, ANS, Bunker C or other specified oil) and for two treatment time periods (2 hr, 6 hr).

b. Floatation: There is no set protocol for determining how much of a surface washing agent, when added to oil, causes that oil to float on the water surface for later collection. The manufacturer may suggest and describe a protocol of their own. It should describe how a known volume of SWA product (at the manufacturer's recommended dilution) is added it to a known volume of a specified oil, how vigorously and for how long the SWA + oil mixture is agitated, and then how the volume of SWA + oil that resurfaces is measured.

iii. Liquid Solidifier/Gelling Agent

No known effectiveness testing protocols are currently used by either the EPA or OSPR for this type of OSCAs. In the interim the optional test below can be conducted for liquid solidifiers or gelling agents and the results reported.

% Effectiveness: Percent oil encapsulated, per volume of product In 2 hours, at manufacturer-recommended agent: oil dilution:

On diesel: On Bunker C:

On ANS: On other (specify) oil type:

In 6 hours, at manufacturer-recommended agent: oil dilution:

On diesel: On Bunker C:

On ANS: On other (specify) oil type:

iv. Herding Agent, Emulsion Treatment

No known effectiveness testing protocols are currently used by either the EPA or OSPR for these types of OSCAs. In the interim the optional test below can be conducted for herders and the results reported.

% Effectiveness: Percent oil collected, per volume of product

In 2 hours, at manufacturer-recommended SCA : oil dilution:
On diesel:
On Bunker C:

On ANS: On other (specify) oil type:

In 6 hours, at manufacturer-recommended SCA: oil dilution:

On diesel: On Bunker C:

On ANS: On other (specify) oil type:

v. Bioremediant

Pages 233-243, NCP Subpart J Pt. 300, App.C https://www.govinfo.gov/content/pkg/CFR-2006-title40-vol27/pdf/CFR-2006-title40-vol27-part300-appC.pdf

- B. Trace Metals and Toxicity Testing of Liquid OSCAs
 - i. Trace Metals
 - a. Test Protocols:

https://www.ecfr.gov/current/title-40/chapter-I/subchapter-J/part-300/subpart-J/section-300.915

- b. Trace Metals Thresholds (Table II-3 of CA Ocean Plan):
 https://www.waterboards.ca.gov/water issues/programs/ocean/docs/oceanplan2019.pdf
- ii. Toxicity Test Protocols

https://www.govinfo.gov/content/pkg/CFR-2006-title40-vol27/pdf/CFR-2006-title40-vol27-part300-appC.pdf

- C. Effectiveness and Sinking Tests of Solid OSCAs
 - i. Effectiveness: ASTM standard tests protocols are available, but the tests are often difficult to conduct. ASTM is developing alternatives. In the interim, the approach taken in the paper linked below may be considered, with the additional recommendation that a range of oil types be tested.

https://www.academia.edu/es/11936855/Standardization of Oil Sorbent Performance Testing

ii. Sinking: Any additional information on how much of solid OSCA (alone and combined with oil) sinks after various time intervals would be helpful, especially for products with a higher likelihood of sinking when soaked with either water or oil (e.g., cellulose, hair, mineral or clay-based products).

Protocol (adapted from Aquatic Testing Laboratories, Ventura, CA):

- Place 8 liters of filtered seawater in an all-glass, disposable 10-liter tank.
- Add 100 ml of the specified test oil to the water surface of the first tank, avoiding contact with tank sides.
- Add 50 ml (7.3 g) of the solid OSCA to the oil in the first tank (a 1:2 ratio of OSCA:oil) and mix with a glass stir rod.
- Establish a separate tank containing 100 ml of the OSCA alone and 8 liters of seawater.
- Observe and estimate/quantify the percent of sinkage from both tanks (OSCA + oil, OSCA alone) at 0, 2, 6 and 24 hrs.
- Conduct test at 15-20 °C

D. Trace Metals and Toxicity Testing of Solid OSCAs

i. Preparing a leachate

From:

- Blenkinsopp, S.A., K. Doe and A. Huybers. 1998. Simple Test Guidelines for Screening Oilspill Sorbents for Toxicity. In: Proceedings of the Twenty-First Arctic Marine Oilspill Program Technical Seminar, Environment Canada, Ottawa, Ontario. Pp. 473-483.
- LeMay, J. 2011. Oil Spill Cleanup Agent Marine Short-Term Chronic Inertness Test, Aquatic Testing Laboratories, Ventura, CA.
- a. Concentration: 8.0 grams of the product into 800 ml of reference water in a 1 liter glass vessel.
- b. Use natural saltwater from a clean source (0.45 to 0.8 μm filtered), or 1 liter of artificial seawater. Specify type of water used.
- c. Add measured amount of sorbent/solidifier into the measured amount of water. The sorbent/solidifier product may be used in one of three ways:
 - As loose/particulate, not bound within any mesh or fabric structure
 - Loose/particulate products that are normally marketed for use as self-contained products (boom, sock): First cut open to remove 8.0 grams of the product, then re-tie within a sufficient portion of the mesh to again secure it from escaping.
 - Cohesive self-contained sorbent/solidifier products (foam, sponge, sheet, fabric, roll), cut into 1-cm squares to equal 8.0 grams.
- d. Place the glass vessel on a rotary shaker for 24 hours at a speed of 30 revolutions per minute (sufficient to maintain the sample in a state of agitated suspension.
- e. Remove sorbent/solidifier product from the vessel and place in a Whatman #1 filter.
 - Self-contained products can be lifted out by hand, squares can be removed with a clean, small dip net, loose product can be removed using a clean dip net (approximately 0.5 mm mesh size).
 - Any water soaked into the product should be gently squeezed through the Whatcom filter and back into the test solution.
- f. The control solution (method blank) is prepared in a manner similar to that described above, however 800 ml of the reference seawater alone is placed in a 1 liter glass vessel.
- ii. Trace Metals and Toxicity Testing Using Leachate of Solid OSCA
 - a. Use the undiluted leachate solution as prepared above for trace/heavy metals and red abalone larval tests.
 - b. Use Accredited (NELAP, ELAP) testing laboratories with equipment and capabilities

to detect trace metals to ppb concentrations, and with demonstrated experience conducting toxicity testing using EPA methodologies.

E. Accredited NELAP, EPAL Laboratories

NELAP: https://lams.nelac-institute.org/

ELAP: https://www.waterboards.ca.gov/drinking_water/certlic/labs/index.html

Your selected lab will use the toxicity test protocols as in:

https://www.govinfo.gov/content/pkg/CFR-2006-title40-vol27/pdf/CFR-2006-title40-vol27-part300-appC.pdf

Also as Section 14 (for the preferred test on red abalone larvae) or Section 15 (for the alternative test on purple urchin larvae) in:



APPENDIX II

A. Federal plans and regulations

- National Contingency Plan (NCP)
 https://www.epa.gov/emergency-response/national-oil-and-hazardous-substances-pollution-contingency-plan-ncp-overview
- ii. NCP Product Schedule <u>National Contingency Plan (NCP) Product Schedule</u>
- iii. Appendix C of Subpart J (testing protocols) https://www.govinfo.gov/content/pkg/CFR-2006-title40-vol27/pdf/CFR-2006-title40-vol27-part300-appC.pdf
- iv. Regional Contingency Plan (RCP): RRT IX policies on use of ARTs https://wildlife.ca.gov/OSPR/Contingency

B. State plans and regulations

- i. CDFW-OSPR OSCA regulations
 https://leginfo.legislature.ca.gov/faces/codes displaySection.xhtml?lawCode=GOV§ionNum=8670.13.1.
- ii. OSPR currently licensed or license exempted products <u>https://wildlife.ca.gov/OSPR/OSRO/Oil-Spill-Cleanup-Agents</u>

- iii. Section 5650, CDFW Fish and Game Code https://leginfo.legislature.ca.gov/faces/codes displayText.xhtml?lawCode=FGC&divisio n=6.&title=&part=1.&chapter=2.&a rticle=1.
- iv. California State Water Resources Control Board (SWRCB) Ocean Plan https://www.waterboards.ca.gov/water issues/programs/ocean/
- C. Additional Federal and State Web Links and Resources
 - i. 2015 Draft NCP Subpart J updates https://www.govinfo.gov/content/pkg/FR-2015-01-22/pdf/2015-00544.pdf
 - ii. NRT: Selection Guide https://nrt.org/sites/2/files/NOAA Selection Guide.pdf
 - iii. Best Achievable Technology: ART 2017 Report to the Legislature https://nrm.dfg.ca.gov/FileHandler.ashx?DocumentID=148308&inline
 - iv. Potential uses and approval processes for ARTs in California



06.2019 Some Potential Applications for California Licensed and Exempt Oil Spill Cleanup Agents.pdf