



LP Bulletin

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Bulletin 612 - 12/08 - US Environmental Protection Agency (EPA) Vessel General Permit (VGP) requirements - USA

From 19 December 2008, all commercial vessels, except commercial fishing vessels, of 79 feet (24.08 meters) in length or greater with discharges of pollutants incidental to their normal operation, including but not limited to ballast water discharges, into the US three mile territorial sea or inland waters will become subject to the EPA final Vessel General Permit (VGP) requirements [see [Club circular 16/08](#)]. Members whose vessels will be calling at US ports after this date are recommended to begin development of a compliance programme based upon the requirements found in the EPA proposed VGP.



General information on the VGP requirements, including the proposed VGP, can be accessed at: http://cfpub.epa.gov/npdes/home.cfm?program_id=350

The following information on VGP requirements has been obtained from GMS' recent Client Advisory (7-08) EPA –NPDES – Vessel General Permit and Compliance:

What does the permit regulate?

The VGP sets 5 effluent limit requirements applicable to all vessels:

- Material Storage
- Toxic and Hazardous Materials
- Fuel Spills and Overflow
- Discharges of Oily and Oily Mixtures;
- Compliance with other Regulations and Statutes.

Additionally, the VGP identifies and regulates 28 specific discharge types that are "incidental to the operation of a vessel". Many of these effluents, such as oil, bilge water and ballast water discharges, are already regulated and current management practices will likely need little change

to be compliant. Most of the other limitations typically are through “Best Management Practices” – deemed practical methods to minimize or eliminate discharge. A Matrix listing these discharge types and the method to control their discharge follows this Advisory.

Some of the 28 listed effluents, such as sonar dome water discharge and gas turbine water wash waste, are not likely to be generated by most commercial vessels involved in trade.

In addition to the above, there are 8 vessel-specific requirements for: Large and medium cruise ships, large ferries, tankers, barges, research vessels, rescue boats, and vessels with experimental ballast water treatment systems.

Documentation

The documentation requirements for the VGP are quite extensive and involve a series of inspections, corrective actions, and self-reporting of violations. Many of the activities, such as routine inspections and training, are already being performed by conscientious ship owners and may be required by their SMS, but there are new and additional record keeping and reporting requirements specific to the VGP that will have to be met.

What should my company or vessels do now?

There are steps that can be taken immediately to make eventual compliance with VGP easier.

1. Heighten awareness of vessel crews that nothing which constitute a pollutant should be sent overboard, particularly within the Territorial Seas of the US.
2. Review the listing of the 28 discharges on the attached matrix and begin to apply the procedures listed in “how to comply”. Except for some effluents that are regulated elsewhere besides the VGP (oily water and ballast water for example) most of the effluent limits can be met through “Best Management Practices”.
3. Ensure Toxic and Hazardous materials are adequately stowed and protected.
4. Assemble drydocking reports, paying particular attention to any hull paint certificates, as hulls with exposed Tributyltin (TBT) paints have a zero discharge level and thus would not be permitted. Paints should comply with the US Federal Insecticide, Fungicide, and Rodenticide Act (40 CFR 142.15).
5. Observe overboard discharges on a regular basis and investigate and correct causes of anomalies.
6. Correct any rudder bearing or stern tube lubricant leaks.
7. Conduct the following operations outside the Territorial Seas of the US: Deck washdowns, AFFF discharge, boiler/economizer bottom blows, pumping chain lockers, pump graywater, operate OWS, chemical treatment of saltwater piping systems (anti-biofouling).

GMS NPDES compliance matrix

Effluent	Limits	How to Comply
1. Deck wash-down and runoff	Minimize discharges	If possible, deck wash-downs should be postponed until the vessel is outside of the regulated waters. When wash-downs are necessary in port, remove all debris, garbage and residues prior to conducting wash-downs. Environmentally friendly/biodegradable cleaners should be used wherever possible. Machinery containment/drip pans in place and cleaned regularly with oily waste disposed of properly. Discharges from deck wash-downs should be free from

		floating solids, visible foam, halogenated phenol compounds and dispersants.
2. Ballast water	33 CFR Part 151. + may not contain oil, NLS's, or haz subs	Comply with current ballast water management requirements.
3. Bilge water	If treated bilgewater is discharged vessels must be underway (sailing at speeds greater than 6 knots), unless doing so would threaten the safety and stability of the ship	Comply with 40 CFR Part 110 (Discharge of Oil), 116 (Designation of Hazardous Substances), and 117 (Determination of Reportable Quantities for Hazardous Substances) and 33 CFR §151.10 (Control of Oil Discharges). MARPOL Annex I fulfills permit requirement. Do not discharge untreated bilgewater into waters subject to this permit. Do not use dispersants, detergents, emulsifiers, chemicals or other substances to remove the appearance of a visible sheen in their bilgewater discharge. Do not add substances that drain to the bilgewater that are not produced in the normal operation of a vessel. Vessels shall not discharge treated bilgewater within 1 nautical mile (nm) of shore unless the discharge is necessary to maintain the safety and stability of the ship.
4. Anti-fouling leachate from anti-fouling hull coatings	Tributyltin (TBT) is prohibited by this permit. Therefore, vessel operators covered by this permit have a zero discharge standard for TBT.	If a vessel is not in compliance, every effort should be made to apply approved hull coatings at the next dry-docking. Hull coatings purchased from a US company must be in compliance with 40 CFR 142.15, Federal Insecticide, Fungicide, and Rodenticide Act. If purchased overseas, the hull coating cannot contain any materials banned for use in the US.
5. Aqueous film forming foam (AFFF)		AFFF is authorized to be discharged for emergency purposes and when needed to ensure the safety of the ship. Maintenance and training discharges are not permitted in port. Other than for emergency purposes, vessels operating in or within 1 NM of protected/conservation areas are not permitted to discharge AFFF. If discharge occurs in these areas it must be logged with an explanation.
6. Boiler/economizer blowdown	Boiler/Economizer blowdown may not be discharged in or within 1 nm of waters referenced in part 12.1 of the permit except for safety purposes.	In port, discharges are to be reduced and/or eliminated to the extent achievable using control measures (including best management practices) that are technologically available and economically practicable and achievable in light of best marine practice, if chemicals or other additives are used to reduce impurities or prevent scale formation. Except for safety purposes, vessels that leave the territorial sea at least once per week may not discharge blow down in waters subject to the permit.
7. Cathodic protection	Minimize flaking	Sacrificial metals must be replaced or cleaned during dry-docking so that the release of metals to the environment is to be reduced and/or eliminated to the extent achievable using control measures (including best management practices) that are technologically available and economically practicable and achievable in light of best marine practice. Magnesium is the least toxic metal used and should be used whenever feasible, economically practical, and achievable.
8. Chain locker effluent		To remove sediment, it is a general, good practice for anchor chains to be thoroughly washed down as it is being hauled out of the water. When dry-docked, cleaning of the chain locker should take place. A log entry should be made in the deck log book whenever anchor wash down is conducted.
9. Controllable pitch propeller hydraulic fluid		Comply with 33 CFR Part 155, VRP/NTVRP
10. Distillation and reverse osmosis brine		Shall not contain or come in contact with machinery contaminated with hazardous materials or wastes.
11. Elevator pit effluent	Must be treated with an oily-water separator and may be discharged with an oil content below 15 ppm as measured by EPA Method 1664.	Except in case of emergency, elevator pit effluent is not authorized for discharge unless it has passed through a properly functioning oily water separator.
12. Firemain		Except in emergency situations, or when washing down the

systems		anchor chain, firemain systems discharges are authorized when needed to ensure safety and security of vessel.
13. Freshwater layup		Use only minimum amounts of disinfectants during freshwater layup required to prevent aquatic growth.
14. Gas turbine water wash		Must not be discharged in waters subject to this permit. It should be collected in a separate tank and discharged ashore. Where feasible, wash water should be prevented from comingling with the bilge water allowed to be discharged in permit waters (after passing through an oily water separator).
15. Graywater		Vessels that can store graywater shall not discharge it in protected/conservation areas. Disposal of kitchen oils in graywater must be reduced as much as practicable. Non-toxic detergents used must be free from bio-accumulative compounds and must not affect the PH of the receiving water. Vessels with adequate storage shall not discharge in the nutrient impaired waters of the Chesapeake Bay or Puget Sound. Vessels without adequate storage must only discharge when underway in waters with significant circulation and depth
16. Motor gasoline and compensating discharge	Effluent must have oil concentrations of less than 15 ppm as measured by EPA Method 1664	Minimize discharge of motor gasoline and compensating discharge in port.
17. Non- oily machinery wastewater		Must be free from oils and toxic or bio-accumulative additives
18. Refrigeration and air condensate discharge		Must not come in contact with oily or toxic materials
19. Rudder bearing lubrication discharge		Seals must be in good operating order to prevent leaking of oil. If leaking/discharge occurs, this is governed by 33 CFR Part 155
20. Seawater cooling overboard discharge	EPA recommends that if discharged into waters, should be discharged more than 50 nm from shore	When possible, seawater cooling should be discharged overboard when underway. Removed fouling organisms shall not be discharged into waters subject to this permit
21. Seawater piping biofouling prevention		Chemicals subject to 40 CFR 142.15, Federal Insecticide, Fungicide, and Rodenticide Act registration must be used in accordance with manufacturer's label. No pesticides or banned chemicals may be discharged. Discharge must contain as little chlorine as possible. Fouling organism must be removed from piping on a regular basis and can only be discharged into the water more than 50 NM from shore.
22. Small boat engine wet exhaust		Small boat engines (usually on lifeboats) must be maintained and tuned in accordance with manufacturer. Low sulfur or alternative fuels should be used. EPA encourages vessel operators to consider four stroke versus two stroke engines for vessels covered under this permit. Use of a four stroke engine may minimize the discharge of pollutants to US waters.
23. Stern tube oily discharge		Maintain stern tube seals to reduce chances of leakage. If leaking/discharge occurs, this is governed by 33 CFR Part 155
24. Sonar dome discharge		Water inside the Sonar Dome shall not be discharged
25. Underwater ship husbandry	Vessels that use copper based anti-fouling paint must not clean the hull in copper impaired waters (e.g., San Diego) within the first 365 days after paint application unless there is a significant visible indication of hull fouling.	Whenever possible, hull-cleaning activities should take place in dry-dock.
26. Welldeck	Discharges from	Shall not be discharged in permit affected waters

discharges	equipment and vehicle washdowns must be free from garbage and must not contain oil in quantities that may be harmful	
27. Graywater mixed with sewage from vessels		Co-mingled discharge of graywater mixed with sewage must comply with gray-water discharge rules and sewage requirements set forth in section 312 of the Clean Water Act
28. Exhaust gas scrubber wash water discharge	Must not contain oil, oily mixtures in quantities that may be harmful. Sludge generated from wash water must not be discharged	Do not discharge in permit area waters.

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