

**Supporting Statement  
for  
Plan Approval and Records for Marine Engineering  
Systems – 46 CFR Subchapter F**

**A. Justification.**

1. Circumstances that make this information collection necessary.

(a) The collection of information pertaining to the marine engineering systems of commercial vessels is necessary to protect personnel and property on board U.S.-flag commercial vessels. Subchapter F provides the specifications, standards, and requirements for strength and adequacy of design, construction, installation, and materials for machinery, boilers, pressure vessels, safety valves, and piping systems.

(b) The Code of Federal Regulations (CFR) currently addresses the technical criteria for the safe and reliable construction of these vessels. As charged and authorized by 46 U.S.C. 3306 and 49 CFR 1.46, the Coast Guard promulgated safety regulations for marine engineering systems. The need for safety standards to ensure safety of life at sea is recognized by industry and documented by numerous Coast Guard casualty investigations. In addition, these regulations implement certain requirements of the International Convention for the Safety of Life at Sea. The U.S. is a signatory to this convention.

This information collection supports the following strategic goals:

Department of Homeland Security

- Prevention
- Protection

Coast Guard

- Maritime Safety
- Protection of the Natural Resources

Marine Safety, Security and Stewardship Directorate (CG-5)

- Reduce the number of passenger and maritime worker fatalities and injuries
- Reduce the consequences of pollution incidents

2. By whom, how, and for what purpose the information is to be used.

This information, which is collected by the Coast Guard, is used to determine compliance with safety regulations. Through the review of the plans prior to construction, the vessel owner or builder may be assured that the vessel, if built in accordance with the plans, will meet the regulatory standards.

3. Consideration of the use of improved information technology.

The Coast Guard Marine Safety Center (MSC) established a Web site<sup>1</sup> that details the procedure for submitting plans via electronic formats. Due to convenience and speed, the large majority of electronic submissions are usually via email. However, CDs, floppy disks, and zip disks are also acceptable alternatives. Electronic submission is voluntary, and we estimate that 13% of respondents submit their plans electronically.

4. Efforts to identify duplication. Why similar information cannot be used.

(a) There are no other Federal agencies with similar programs, therefore there is no duplication of other Federal information collections.

(b) The unique design and construction of individual marine engineering systems generally precludes the existence and the use of prior design information. Coast Guard experience has shown that the other information collections presently authorized by OMB for Title 46 of the Code of Federal Regulations are not entirely appropriate or adequate to determine the compliance of marine engineering systems with the performance standards of the subject rules. In cases where a class of similar or identically designed vessels is evaluated, information is required for the first vessel only. Similarly, where previously approved plans and information are to be used in an identical manner and meet the criteria of 46 CFR 50.20-15, re-submittal is not required.

5. Methods to minimize small businesses if involved.

Marine engineering plans are necessary for the safety of the vessel and its personnel. The required submissions are the minimum consistent with this objective. Furthermore, the time dedicated to the submission is minimal. Therefore, this collection of information will not significantly affect small businesses.

6. Consequences to the Federal program if collection were done less frequently.

If this information was not collected, the Coast Guard would not be able to carry out its responsibility for the promotion of safety on commercial vessels. The information cannot be collected any less frequently, as the information is submitted when the owner seeks Coast Guard approval during construction or modification of a commercial vessel.

7. Explain any special circumstances that would cause the information collection to be conducted in a manner inconsistencies with the guidelines.

This information collection is conducted in manner consistent with the guidelines in 5 CFR 1320.5(d)(2).

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<sup>1</sup> Located at -- <http://homeport.uscg.mil> , select Missions >> Electronic Commerce.

8. Consultation.

A 60-day (See [USCG-2008-1177], January 6, 2009, 74 FR 452) and 30-day (See [USCG-2008-1177], April 10, 2009, 74 FR 16411) Notice were published in the *Federal Register* to obtain public comment on these collections. The USCG has not received any comments on these collections.

9. Explain any decision to provide any payment or gift to respondents.

There is no offer of monetary or material value for this information collection.

10. Describe any assurance of confidentiality provided to respondents.

There are no assurances of confidentiality provided to the respondents for this information collection.

11. Additional justification for any questions of a sensitive nature.

There are no questions of a sensitive nature.

12. Estimates of reporting and recordkeeping hour and cost burdens of the collection of information.

(a) The average annual number of respondents is 151. Each respondent averages 21.9 submissions. The total number of submissions is 3,312 submissions. The information submission is not an annual requirement. This information must be supplied to the Coast Guard only upon ship construction or modification. Plan development is not performed to meet information collection requirements, but rather in order to develop the plans necessary to build or modify the vessel. The hour burden reported by the respondents of 200 hours per plan developed reflects not just the requirements of information collection, but also the time required to develop these plans for their intended use as blueprints for ship construction. The actual hour burden solely due to information collection would only be that time necessary to print and mail an extra set of plans and drawings to submit to the Coast Guard, approximately one hour. Therefore the annual burden may be calculated by multiplying the hours per submission times the number of submissions.

$$\begin{aligned} \text{Hour Burden} &= \text{Submission} * \text{Hours per submission} \\ 3,312 \text{ hours} &= 3,312 \text{ submissions} * 1 \text{ hour/submission} \end{aligned}$$

(b) The annualized cost to respondents solely for the information collection would be the duplication and mailing costs for an extra set of plans and drawings. This cost would be approximately one hour per submission at the approximate rate of

thirty-one dollars per hour. This wage rate is “loaded”; it accounts for overhead costs.

$$\begin{aligned} \text{Cost Burden} &= \text{Submission} * \text{Cost per submission} \\ \$102,672 &= 3,312 \text{ submissions} * 1 \text{ hour/submission} * \$31/\text{hour} \end{aligned}$$

13. Estimates of annualized capital and start-up costs.

There are no capital, start-up or maintenance costs associated with this information collection.

14. Estimates of annualized Federal Government costs.

With some minor exception, the federal burden of items covered by this supporting statement will be borne by the Coast Guard’s field technical office, the Marine Safety Center. This office is responsible for the review and processing of vessel plans and information. The average annual personnel cost of those actually performing the review is \$ 68,625. These costs are multiplied by a factor of two to account for administrative overhead, retirement costs, medical costs, etc., and an experience factor of .85 to account for military-related tasks of the field technical office. Using these factors and an estimated total annual time spent reviewing plans of 8,637, the estimated cost to the Coast Guard for the plan review function would be—

$$\begin{aligned} & (8,637 \text{ hours/year})(.85)(2)(\$68,625/\text{year}) \\ & (40 \text{ hours/week}) (52 \text{ weeks/year}) \\ \text{Total} & = \$ 484,430/\text{year} \end{aligned}$$

15. Explain the reason for the change in burden.

The change in burden is an ADJUSTMENT due to a decrease in the estimated number of plans to be submitted to the CG annually. The change in the number of respondents is due to a change in the procedure used to count the number of unique respondents—needed to eliminate double-counting. Double counting can occur when the same submitter uses two slightly different names (e.g. Joe instead of Joseph). The new procedure assures that such double counting is unlikely to occur. For this reason, however, there is a change in the number of respondents.

16. For collections of information whose results are planned to be published for statistical use, outline plans for tabulation, statistical analysis, and publication.

This information collection will not be published for statistical purposes.

17. Explain the reasons for seeking to not display the expiration date for OMB approval of the information collection.

The Coast Guard will display the expiration date for OMB approval of this information collection.

18. Explain each exception to the certification statement.

The Coast Guard does not request an exception to the certification of this information collection.

B. Collection of Information Employing Statistical Methods.

The collection does not employ statistical methods.