missions.

MR. EHRMANN: Why don't we go ahead, Commissioner Sandifer, and have the overview on the vessel monitoring system and then take any additional questions on that or on the previous group.

VESSEL MONITORING SYSTEM

DR. SANDIFER: Vessel monitoring systems have been described as important safety advances by some and "ankle bracelets" by others. The bottom line is it is an electronic means of tracking vessels so that one could determine whether or not vessels were where they are supposed to be, that is, within permitted areas or open areas for fishing activities and what they were doing to some degree in those areas, depending on the sophistication of the equipment.

Alaska has taken the lead in this, a number of

fisheries have looked at the vessel monitoring systems and have found them to be extremely effective from a safety point of view as well as from an enforcement compliance point of view. Alaska, as I said, has taken a lead in this and has sort of bitten the bullet. Despite some, as I understood it, some early complaints

seems to be very well satisfied with it.

Our working group looked at this and considered everything from vessels all the way down to recreational vessels or vessels involved in any kind of extractive uses of the public resource in the federal waters. We came back to what made a lot of sense to us at this point, and that is, the requirement for vessel monitoring systems for commercial vessels permitted under federal fisheries plans.

The vessel monitoring systems would be a national core requirement, basically a national RFP, a standard, set for what these vessel monitoring systems could be and that they be developed and put into place through cooperative efforts of the National Marine Fisheries Service and the Coast Guard.

We also had a considerable discussion of who should pay for this. The National Marine Fisheries

Service has, in fact, planned if it gets the budgets it would like to have to pay for a good number of these, enough to outfit I think several thousand fishery vessels.

In keeping with others of our discussions,

about how best to pay for things where the user is extracting a private value from a public resource, we felt that the best recommendation should be that the cost for the installation and operation of the vessel monitoring system should be borne by the users, the fishers in this case.

We recognize that it may be necessary in some fisheries in some circumstances for the federal government to step in with the initial investment. We also recognize that perhaps another way to get there is for the federal government to provide the volume purchasing but the individual cost to be borne by the operators.

We are trying to get a point across that this is the sort of thing that should be a part of the permitted fee, or the user fee, to ensure the public that the fishery is in fact complying with the requirements of his or her permit.

Again, go back one step. This is not just a compliance issue, but this is a matter that also provides a substantial margin of safety for these vessels operating in many cases in deep and rough

waters. That is it.

DR. ROSENBERG: Well, I have to say, since we often say very appropriate but very nice things about Alaska fisheries, that in this case New England implemented a mandatory VMS system for the scallop fleet well in advance and it was paid for by the users. I just had to get that in.

DR. SANDIFER: Your amendment is accepted.

DR. ROSENBERG: I think, more to the point, the actual costs can be quite low. I mean, on a lease basis the last figures I heard were maybe $200 a month for the boats that are fishing a couple of hundred miles offshore. Now, we saw the various kinds of vessels in Alaska, and $200 a month is not a big item in their budget; it is not a matter of purchasing the equipment.

There also are, I would point out, a lot of alternatives to the regular, if you like, dedicated-VMS system in the Gulf. They have even tested and used

systems that basically use a cell phone. Anybody that has bought a cell phone recently knows they are GPS-enabled. If you call 911, they can find you. Well, you can use that same system for very, very low cost on

a small fishing vessel.

I would strongly support the idea that the cost should be borne by the fishing community. One thing that would help here is that many vessels in their capital construction funds, which is tax sheltered money that they are able to accumulate for upgrading vessels, you know, have difficulty actually spending the upgraded money.

There is a very, very large sum of money held in capital construction funds. If it was specifically allowed that these kinds of technologies were allowable purchases under capital construction funds, then that mitigates the cost quite substantially, even for a large fleet of vessels. Of course, again, it is tax-deferred money and they can only take it out for certain purposes, so if this is one of the allowable purposes, it makes it easier.

DR. SANDIFER: Excellent points, Andy. I see the members of the working group at least nodding assent on this later point you made about the capital construction funds. I think that is something we can add in here, and it would be provide an incentive as

well to the fishers and eventually to others involved in large boating activities to move to a vessel monitoring system.

MR. EHRMANN: Does any commissioner have a concern about that modification?

(No verbal response.)

MR. EHRMANN: It sounds good?

Commissioner Coleman?

DR. COLEMAN: One thing is the actual VMS sensoring itself, you have indicated you think and so has Andy, that it is to be borne by the fishers. The monitoring of this, the whole infrastructure that is needed, well, that potentially could fall upon the states to do this. I think Alaska is doing that now. How do you deal with that?

MR. RASMUSON: It is not that difficult. It is called a transponder. Every airplane has to have a transponder. Just put a grid of, let's say, New England

out there or Alaska or whatever. You have all of these little dots out there and hey see a dot going over the other side of the line, and you know exactly what that transponder number is. That is Andy Rosenberg's kids

out there and they will decide, "Well, never mind," you know.

(General laughter.)

DR. COLEMAN: I understand the technology.

(General laughter.)

MR. RASMUSON: It is not hard to look at in a big grid.

DR. COLEMAN: Yes. I understand the technology and how it is used. However, I wonder what are the inherent costs of this whole infrastructure that needs to constantly monitor it? You are going to have to (a) hire people to look at the screens, et cetera; and (b) you have to have a communications system that tells someone, "Go out there, they are violating this." Who pays for that?

DR. SANDIFER: My comment on that is while we didn't discuss that side of it, Jim, I believe it is

most of our beliefs that this will be taken up by the National Marine Fisheries Service and particularly the U.S. Coast Guard.

The Coast Guard is already monitoring, around-the-clock monitoring, vessel traffic and radio traffic

for safety and other purposes anyway, and I don't know that this takes a whole lot of additional personnel. It does require some hardware and software on the federal agency ends.

We are talking about vessels that are operating in federal waters with federal permits, so it is a federal responsibility very clearly. Who ends up responding to a given distress call or a compliance call may be subject to who is available, but the responsibility to monitor those things is, in my view at least, a federal responsibility.

I think it can be done by the Coast Guard, frankly, without a whole lot of additional activities. We have got Coast Guard folks here who can eventually respond to us in writing or something, but it would seem to me that it is part of what they do now monitoring vessel traffic.

DR. ROSENBERG: If I could just address this

point just a little bit. A lot of the actual infrastructure can be outsourced for the scallop Fleet in New England. Originally, there were a couple of certified vendors. It may be down to one or two now,

but essentially the vessel is required to contract with a certified vendor who provides a service that, essentially, then gives a data stream to the National Marine Fisheries Service or the Coast Guard.

You can automate an awful lot of things such as closed-area monitoring. It is simple to just put an alarm on that says if you get within a certain distance of the closed area, then notify personnel.

There are some personnel and data management costs, but it is not creating this huge data management and monitoring system because you can outsource quite a bit of it. I would not say it is cost-free, but most of it can be borne in terms of the contractual cost for the units.

MR. EHRMANN: All right. Any other comments on either the enforcement issues, the living marine resources enforcement, or the VMS that we were just

talking about?

Yes, Admiral?

CHAIRMAN WATKINS: While you were all discussing enforcement here, I talked to Captain Ross of the Coast Guard, who has been good enough to be a

representative here to the Commission hearings from the Commandant's Office about what might we be really able to do to support the interim enhancement of enforcement if, in fact, these kinds of statistics are going to draw off those units and preclude them from doing it.

Is there any support that can be given to the Coast Guard Auxiliary -- who are the little guys, the older guys, the smaller ships, the 40-foot yachts -- to go out here? I have watched them in the Chesapeake, and they do a great job. Can they offset anything?

Is there any support at all for volunteers that when their engines break down we help them pay for it so they can get back out there again? What about the acceleration of their acquisition program for the modernization of their fleets, a 25-year program? Is that something that we can accelerate?

Are there some alternate practices that can be employed? This technology obviously is a help. Are

there other things that we can look at? Instead of just grousing about this and saying throw money at it, is there something else we can do?

I have kind of challenged them to have maybe

the Commandant send some kind of a letter to the Commission here to say, "These are the kinds of things we are working on to enhance the value of our enforcement capability under traditional roles that might give us a little interim boost from this funding inadequacy that we now find ourselves in. If that sounds okay to all of you, that is what I was doing over there and clandestinely picking the Coast Guard's brains.

DR. SANDIFER: I think it is an excellent idea, Admiral. I would only suggest that we extend it to the National Marine Fisheries Service. We have representatives from NOAA in the room, too, and they could go back and ask NMFS's enforcement if there are things that they might do or, better yet, to integrate with the Coast Guard and how do we get this mission accomplished, the monitoring of vessels in federal waters, fisheries vessels.

I think the question of cost and adequacy of

manpower, what have they got to have, needs to be dealt with. Here is an application of technology that we know works. We have examples on the East Coast and the West Coast that should be cited in our paper that we

know works. We know it provides both compliance information for fisheries and safety information. It is very useful, so let's move ahead.

CHAIRMAN WATKINS: Captain Ross endorsed that.

MR. EHRMANN: Any additional need from staff for clarification or comments before we move on?

THE STAFF: (Shaking heads.)