MARINE MAMMAL/VESSEL STRIKE (MMVS) WORKING GROUP
NMFS Protected Species Branch Conference Room, Gloucester
9:00am to 5:45pm
3 May 2004
Meeting 5

MEETING SUMMARY

ACTION: **April 5 Meeting Summary Modifications**
The Working Group (WG) requested the following changes to be made to the April 5 Meeting Summary:

- **Page 2, second paragraph of "Old Business and Action Items" –** Change "*Although statistics were not prepared for this meeting the group agreed that the northeast region probably has the highest whale watching effort.*" to read "*One member proposed that the northeast region probably has the highest whale watching effort compared to other regions in the United States.*"
- **Page 9, second paragraph –** Change "*In this example a boat cannot be a boat because a larger boat takes longer to stop or slow down*" to read *"Large, deep-draft commercial vessels take longer to stop or slow down and therefore operate differently than other smaller vessels."*

ACTION: **Whale Watch Compliance Data – Speed Tracking Data**
Phase 2 analysis of the whale watch compliance data looked at speed over distance rather than speed over time. Several WG members were unclear as to what the speed tracking graphs were trying to show. Dave Wiley, Stellwagen Bank National Marine Sanctuary (SBNMS) has been asked to present the raw data used to develop the graphs to interested WG members at the next meeting.

ACTION: **Take Exemptions**
The WG was unclear what constitutes a "take" exemption under section 118 of the Marine Mammal Protection Act. Specifically, the group was interested in determining if exemptions would apply to fishing vessels while in transit across the Sanctuary or just entanglements of marine mammals while fishing. David Gouveia, National Marine Fisheries Service (NMFS), will determine the legal definition/interpretation.

ACTION: **Rationale for Speed Restrictions in Stellwagen Bank National Marine Sanctuary (SBNMS)**
Regina Asmutis, IWC, and Colleen Coogan, Conservation Representative, to develop a rationale for instating speed restrictions within SBNMS.

ACTION: **Rationale against Speed Restrictions in SBNMS**
WG members representing commercial vessel operators, led by Bill Eldridge, will develop a rationale opposing speed restrictions within SBNMS.

ACTION: **Pilot Science Project**
In order to help minimize the potential for vessel strikes and promote information sharing and communication between the Sanctuary and commercial vessels operating within SBNMS, the WG has recommended the development of a Pilot Science Project. The project would involve Sanctuary Staff communicating the location of whales to commercial vessels (defined as any vessel in the AIS system (currently 65' or greater)) that are in close proximity to the animals and provide vessel masters with optimal strike avoidance options. Vessel masters would then report back on which, if any, actions were taken by the vessel to avoid a strike. WG members representing the commercial vessel operators will develop recommendations for feasible strike avoidance options for vessels in close proximity to whales,

as well as develop recommendations on the best way to communicate information between the Sanctuary and Vessels and vise versa. Conservationists would then review the draft actions to see if they were deemed sufficient to reduce the risk of a strike.

ACTION: **Opinions on Whale Watch Guidelines vs. Regulations vs. Special Use Permit**
Three rationales/opinions are to be written regarding Whale Watch Guidelines vs. Regulations vs. Special Use Permit:

1. **Regulations:** Regina Asmutis and Colleen Coogan to develop a rationale supporting the need for current whale watch guidelines to become regulations that pertain to all vessels operating within the Sanctuary (excluding commercial vessels).
2. **Guidelines:** Rick Nolan, Boston Harbor Cruises, to develop a rationale supporting that current whale watch guidelines remain guidelines and that they continue to pertain only to whale watch vessels operating within the Sanctuary.
3. **Special Use Permit:** Sharon Young, Human Society of the U.S., to work with Karen Steuer or other team members to develop a rationale recommending the implementation of special use permits for all vessels that wish to operate in close proximity to whales within the Sanctuary.

ACTION: **Opinions Regarding the NMFS Right Whale Plan**
Three rationales/opinions are to be written regarding the NMFS proposed Right Whale Plan:

1. **Fully Support:** Colleen Coogan to develop a rationale for the Sanctuary's full support of the Right Whale Plan as developed by NMFS (Wording for this Rationale is included as Appendix C of this document).
2. **Agency Collaboration:** Regina Asmutis to develop a rationale for the development and support of a Right Whale Plan created through cooperation between SBNMS and NMFS.
3. **Not Support:** WG members representing commercial vessel operators to develop a rational to not support the Right Whale Plan developed by NMFS.

ACTION: **Sanctuary Enforcement**
WG members were interested in determining if a particular agency has been designated to support SBNMS with the enforcement of Sanctuary rules. Dave Wiley will determine which agency if any has been designated to support Sanctuary enforcement.

ACTION: **Enforcement Rational**
WG members representing commercial vessel operators will develop a rationale stating there is no need for a specific "Sanctuary Enforcement Agency" within the Sanctuary.

ACTION: **High Speed Vessels**
A SBNMS representative will obtain, from the U.S. Coast Guard, information regarding the Coast Guard's classification of high speed vessels.

ACTION: **Rational Due Dates**
All write-ups and rationales must be submitted to Dave Wiley and Mason Weinrich no later than COB Monday, May 17.

ACTION: **Points of Discussion**
If WG members have issues/concerns with any of the proposed Action Plans or Rationales they should be emailed to Dave Wiley and Mason Weinrich prior to the next WG meeting to serve as target points of discussion.

ACTION: **Next Meeting**
The next MMVS WG meeting will be held on Tuesday, May 25 (Location TBD).

AGREEMENT: **Development of an Information and Communication System**
WG must establish a method of providing commercial vessels with the maximum amount of information on the location and aggregation of whales within the Sanctuary so Masters of the Ship can take the necessary steps to avoid potential strikes. A commercial vessel will be considered any vessel engaged in commercial activities such as carrying cargo, transporting passengers, or engaged in fishing activities. Real-time information can be transmitted using a method such as the AIS system.

AGREEMENT: **Pilot Project for 2005**
The WG has agreed to develop a strategy for the development of a 2005 Pilot Project to deliver real-time information to commercial vessels transiting the Sanctuary and provide avoidance recommendations to vessel operators. Vessel operators will craft avoidance options based on current guidelines and their general knowledge of what Masters of a Ship can do to safely maneuver a vessel under various scenarios. While the desired program would involve all vessels in the AIS system (i.e. those 65' or greater), funds may restrict the program to large commercial vessels (ships of 300GT or greater, including combined weight for tugs and barges under tow). If such restriction is necessary, a second year of the pilot project would be considered to expanded to include all vessels 65ft or greater, any vessel with an AIS system, and any vessel conduction commercial activities (i.e., carrying cargo, transporting passengers, or engaged in fishing activities).

AGREEMENT: **Education and Outreach**
In addition to getting information to operators an educational program and an incentive program to propagate understanding and awareness is desired. It was recommended that the SBNMS design an educational program which would include sending an individual to commercial vessels to educate the personnel and the operators. Educational strategies should draw on current materials (e.g., the right whale educational efforts) and partner with other groups where appropriate.

AGREEMENT: **Agency Partnerships**
For strategies to be effective SBNMS should work closely and in partnership with other agencies who have the ability to enforce and take regulatory action.

AGREEMENT: **Enforcement of Whale Watch Guidelines**
Sanctuary should continue to take an active role in monitoring compliance with whale watch guidelines, but these efforts need not be funded by industry.

Working Group Attendees – May 3, 2004

NAME	WG SEAT and AFFILIATION
Team Members:	
Mason Weinrich	WG Chair, Whale Center of New England
David Wiley	WG Team Lead, SBNMS
Amy Knowlton	NEAq Right Whale Research, Science
Andy Glynn	General Category Tuna Association, Tuna Fishing
Bill Eldridge	Peabody Lane Shipping, Shipping
Brad Wellock	MassPort, Shipping
Colleen Coogan	Independent, Conservation
David Gouveia	NMFS Protective Resources, NMFS
Hauke Kite-Powell	WHOI, Science
Michael Prew	Captain John Boats, Charter Boats
Regina Asmutis	IWC, Conservation
Richard Meyer	Boston Shipping Association, Shipping
Rick Nolan	Boston Harbor Cruises, Shipping
Sharon Young	Humane Society of the US (alternate for Karen Steuer)
Observers:	
Jennifer Ghiloni	PSGS
James Douglass	Cape Ann Whale Watch
S. Jay Frontierro	Seven Seas Whale Watch
Jeff Egan	Cape Ann Whale Watch
Tim Cole	NMFS NEFSC, NMFS
Tim Feehan	PSGS

WELCOME, INTRODUCTIONS, AND ADOPTION OF AGENDA

Mason Weinrich (Chair) opened the meeting and reviewed the action items from the last meeting. The agenda and an overview of the presentations of the meeting were highlighted.

OLD BUSINESS AND ACTION ITEMS

Presented by Mason Weinrich, WCNE

Action Items from the April 5, 2004 MMVS meeting at National Marine Fisheries Service NE Region, Gloucester MA were reviewed the following is a brief summary of each completed task:

Contact Alaska and Hawaii Regions to obtain a better count of Whale Watching boats within those regions.

Current industry data for the socioeconomic profile for whale watching in New England, Alaska and Hawaii was obtained from "Whale Watching 2001" by Erich Hoyt. Hard copies of the New England, Alaskan and Hawaiian profile were provided to WG members; however, the full report containing data from around the world can be accessed on line at: http://www.ifaw.org/ifaw/dfiles/file_106.pdf

Contact Coast Guard for attendance at the next meeting.

Greg Hitchen of the U.S. Coast Guard was invited to attend the MMVS meeting; however, due to a prior commitment he was unable to attend.

Contact New England Aquarium about Jet Propulsion
To date, no contact has been made at the New England Aquarium regarding information on jet propulsion

Rationales
All newly developed rationales were presented to WG members for discussion, and are attached as submitted as appendices below.

PRESENTATIONS
It was agreed by the WG that the majority of the meeting should be focused on Action Plan development, however hearing and understanding the data to be presented during each presentation was important to further the groups understanding on various issues. As a result, presenters were asked to provide only brief overviews of their presentation and focus on the most important data and aspects.

The following are brief summaries of each presentation as well as WG questions and comments regarding the data and information presented.

Compliance with Voluntary Guidelines by the Commercial Whale Watching Industry in and around Stellwagen Bank National Marine Sanctuary, A Speed Over Distance Analysis
Presented by David Wiley, SBNMS

Data used to determine compliance with voluntary commercial whale watching guidelines had previously been presented to the WG as a speed over time analysis. The presentation today focused on the results of the same compliance data (35 trips across 11 different companies) as it related to distance. As expected when the same vessel data was tracked over distance, vessels appeared to be in greater compliance to whale watching guidelines (62% compliance; 38% non-compliance). One rationale for this difference in compliance vs. non-compliance can be explained via the "fast boat bias." This bias is due to the fact that the faster a vessel is, the more space it can travel over a shorter period of time and therefore through the data analysis the vessel appears to be in compliance.

Questions and Answers:

Question1: Based on the varying conclusions reached when using distance vs. time, which method would be used to present the data to interested parties?
Answer 1: Both versions of the data would be presented along with a description of the problems associated with each of the methods.

Questions 2: What types of whales are being watched when this data was gathered?
Answer 2: All types of whales were being watched, and the guidelines do not distinguish between whale species.

Question3: In the analyses was there a difference in the species type and vessel type (i.e., prop vs. jet)?
Answer 3: That data for these analyses are not that specific. That type of data was not required of the observer. The purpose of these initial analyses was to obtain a general look.

Question 4: If we look at the worst case scenario under this data, what is the take-home message?
Answer 4: The answer is that the areas where we thought compliance was moderately high no longer appeared to be.

Question 5: Is time or distance a better indicator of risk? In general we all agree that compliance with the guidelines reduces risk of a strike to the whales, but has non-compliance increased this risk?
Answer 5: The amount of risk to the animal and potential for strike is not really correlated because we do not have a notion of what the whale's behavior was like before, therefore we cannot say if risk has increased or decreased.

Comments and Discussions:

Comment 1: One WG member pointed out that it might be important to know what kind of whale was being watched when the data was collected because different species of whales travel at different speeds and therefore the speed and distance it takes to stay on a whale for watching will change. However, David Wiley, indicated that regardless of the whale the ½ mile zone used in developing this model moves with the whale.

Comment 2: One WG member noted that much of this non-compliance is due to a general lack of whales in the area. If the same whale population existed that did back in the late 1990's there would be more whales for vessels to target and therefore less pressure on the whales and whale watching vessels. These guidelines were based on the density of boats to whales and because the density of the whale population has dropped boats are required to "zoom" towards the whales and switch off continuously with other vessels. This suggests that the current guidelines do not work well at times of low density. However, it was also noted that having more whales on the courseline could mean it could take significantly longer to reach a desired area if the guidelines were adhered to.

Comment 3: It was noted by a WG member that the data here could be skewed based on assumptions of when the whale was sighted—if you don't see the whale are you still considered out of compliance? In addition, you might have greater compliance on the way out of the approach rings because you know where the whale was left.

Comment 4: It was felt by all WG members that when this compliance data is reported to the SAC that SBNMS staff have verified that all data has been checked for fairness and accuracy and that all pertinent factors and values have been considered. In addition, the report-back should also speak to the density of boats to whale populations in the Sanctuary—noting that whale watching guidelines have been written to capture the "known" whale; if populations of whales are dense vessels will have to be much more cautious.

Comment 5: It was stressed by some WG members that we cannot differentiate professional whale watching boats from non-professional whale watchers. In order to protect whales both need to be equally as cautious. While other WG members agreed with this point, it was their feeling that making the professionals act more cautiously would serve as an example and thus increase caution throughout the Sanctuary overall.

A Computer Tool to Determine Effects of Speed Restrictions in the SBNMS
Presented by David Wiley, SBNMS, and Tim Feehan, Perot Systems

SBNMS in partnership with Perot Systems Government Services (PSGS) have developed a tool for modeling the effects of speed change scenarios within the Sanctuary. Using aggregated baleen whale sighting data over a 20 year period, the tool has the ability to determine the impacts of speed zone

scenarios throughout the Sanctuary and/or in isolated regions. The purpose of this tool is to aid Sanctuary managers develop strike risk reduction measures for whales within Sanctuary boarders.

Comments and Discussions:

> **Comment 1:** Some WG members were concerned about how the vessel tracking graphs were representing the aggregated whale sighting data. It was requested that specific information on what the data represents be added as part of the MMVS Action Plan Appendices.

Traffic Management in National Parks
Presented by David Wiley, SBNMS

Based on investigations, different national parks around the country have decided reducing speeds is an important part of protecting the resources they represent as well as the public. Across the nation speed restrictions within national park areas are both common and regular, and in those areas without specific speed restrictions, signs have been posted suggesting visitors should travel with caution within the area.

Questions and Answers:

> **Question1:** In those parks with speed restrictions, are the restricted roads federal or state roads?
> **Answer 1:** Both federal and state roads have been restricted and some are significant roadways.
>
> **Question1:** Are there any speed restrictions currently posted in any of the national sanctuaries?
> **Answer 1:** There are some speed restrictions associated with various sanctuaries, however, these restrictions have not been developed or proposed by the sanctuary itself and they have not been instated for sanctuary purposes.

ACTION PLAN DEVELOPMENT

Mason Weinrich, WCNE, presented the WG with the 3 straw-man Action Plans. A straw-man Action Plan and rationales were developed by Regina Asmutis of the IWC, David Wiley of SBNMS, and Rick Nolan of Boston Harbor Cruises, and Colleen Coogan. Each individual was asked to present their straw-man to WG members and explain their position and rationale. Individuals were allowed 15 minutes for each presentation and WG members were asked to hold comments or discussion, and only ask clarifying questions. After completion of the presentations, the straw-men were discussed and modified by WG members as necessary. Each of the draft Action Plans developed have been included as Appendices A through D in this document.

Marine Mammal Vessel Strike Action Plan
Developed By Regina Asmutis, IWC

This Action Plan presented Strategies for the development of regulations to govern the operation of vessels in the vicinity of whales, porpoises, and dolphins. This strategy would be supported by the following activities:

- The development of draft regulations based on the currently existing NMFS (NE region: 100 feet) guidelines applicable to all vessels (ref. CG Rule 3 (a)) in the vicinity of whales (with existing exceptions applicable for commercial fishing vessels engaged in fishing or authorized vessels investigating entanglements.

- The development of a required Traffic Separation Scheme (TSS) for commercial vessels transiting the Sanctuary.

The Action Plan as presented by Regina is provided as Appendix A.

The following is a brief summary of the discussions, comments, and questions that were raised while developing this draft Action Plan.

Questions and Answers

> **Question 1:** Regarding proposed Activity 1.2 which suggests that the Sanctuary require commercial ship traffic to use the Traffic Separation Scheme (TSS) when transiting the Sanctuary unless otherwise directed, what will the consequences be for vessels not in the shipping lane?
> **Answer 1:** The overall concept in Activity 1.2 is that the shipping lane will be a requirement. This group will need to determine where the shipping lane should be located and whether or not the current lane is the best option or a new one will have to be established.

Comments and Discussions

> **Comment 1:** WG members pointed out that SBNMS has no authority to regulate traffic through the sanctuary. However the group was reminded that this presentation would only be made as a recommendation to the SAC.
>
> **Comment 2:** Based on the discussion of the group it has been inferred that whales are at increased risk when vessels are not aware of the whale and are transiting the Sanctuary, therefore it can be assumed that significant risk to whales is not occurring during whale watching. Based on this conclusion, having guidelines and/or regulations pertain to all vessels will reduce the risk of strikes overall. At the very least it should be the general practice of all boaters who see a whale in the sanctuary to follow the guidelines. Boaters should also be expected to know that when in the Sanctuary they need to be on the lookout for whales, and should be expected to know when they are present.

Information System Rationale
Developed by Rick Nolan

This straw-man rationale supports the need for the development of a Stellwagen Bank Marine Mammal Information and Reporting Center for the purpose of tracking and broadcasting real time information from the boating community that relates to the most current known location of marine mammals within Sanctuary boarders.

The rationale as presented by Rick is provided as Appendix B.

The following is a brief summary of the discussions, comments, and questions that were raised while reviewing this rationale.

Questions and Answers

> **Question 1:** Do you have any thoughts on how we can access real-time data?

Answer 1: All vessels could report this type of data, but commercial vessels would be the vessels we rely on. However, data from commercial vessels would drop significantly during winter months due to decreased operations.

Comments and Discussions

Comment 1: It was acknowledged by the WG members that creating a center such as this and having a way to capture real-time shipping data would be an excellent opportunity to track the actual traffic through the Sanctuary. There is potential here to merge this rational into the Action Plan proposed by Regina. Having access to the type of real-time vessel information could serve as warning trigger for actions to take place to protect whales in the area.

Marine Mammal Vessel Strike Action Plan
Presented By David Wiley, SBNMS

This straw-man rationale supports the need for the development of the following:

- A maximum speed limit to be instated throughout the Sanctuary for all commercial vessels
- The establishment of SBNMS Special Use Permit for Commercial Whale Watch Boat
- Fees for Special Use Permits go towards monitoring guideline compliance
- The creation of 2 approach lanes within the Sanctuary for commercial vessel traffic

The Action Plan straw-man as presented by David is provided as Appendix C.

The following is a brief summary of the discussions, comments, and questions that were raised while reviewing this rationale.

Questions and Answers

Question 1: Does the 13 and 20 knot speed restrictions apply only to commercial within the Sanctuary? Would the speed component be required year round?
Answer 1: This restriction would only apply to commercial vessels, as it is written now recreational boats can do what they wish. Any seasonality of the speed restriction is for the WG to determine.

Question 2: Regarding conditions for revoking a special use permit, would a loss of a permit mean the operator or the company would lose the permit? And what would the percent out of compliance be before a permit would be revoked?
Answer 2: These issues are for the WG to determine.

Question 3: How would these strategies reduce mammal strikes?
Answer 3: These strategies would increase incentive for vessels to comply with the rules and guidelines designed to protect the animals.

Question 3: The collection of fees in general is tricky. Has a precedent been set for how a fee for a permit could be enforced within the Sanctuary?
Answer 3: Yes, there is currently a special use permit fee for the cable that crosses through the Sanctuary.

Comments and Discussions

Comment 1: Some WG members raised the legal concern for targeting certain vessels for these types of restrictions and permits.

Rationale to Support the NMFS Right Whale Plan
Developed by Colleen Coogan

This straw-man rationale supports the NMFS in the there efforts to develop a Right Whale Plan.

The rationale as presented by Colleen is provided as Appendix D.

The following is a brief summary of the discussions, comments, and questions that were raised while reviewing this rationale.

Comments and Discussions

Discussion 1: There is an overall lack of agreement in the WG in regard to supporting the NMFS Right whale plan. As a result of the general lack of agreement, 3 options will be provided in the Action Plan:

1. **Fully Support:** Colleen Coogan to develop a rationale for the Sanctuary's full support of the Right Whale Plan as developed by NMFS (Wording for this Rationale is included as Appendix C of this document).
2. **Agency Collaboration:** Regina Asmutis to develop a rationale for the development and support of a Right Whale Plan created through cooperation between SBNMS and NMFS.
3. **Not Support:** WG members representing commercial vessel operators to develop a rational to not support the Right Whale Plan developed by NMFS.

Open Discussion of Action Plans and Rationales
After reviewing each proposed Action Plan and Rationale the WG was asked to discuss and edit the straw-mans as necessary. The following is a brief summary of the discussions, comments and general agreements reached as a result of this session.

Issue 1: Speed Restrictions
WG members representing commercial operators would like to stay way from the option that suggests speed restrictions throughout the Sanctuary. They feel this will take away the discretionary authority and of the Master of the Ship to properly and safely operate his vessel. Their argument is that regardless of the type of vessel (rudder or jet) vessels may have greater maneuverability with greater speeds and can better allow them to respond if a situation should arise. As a compromise these WG members would favor a group focus on the creation of traffic lanes as well as the establishment of an information system that would supply them with real-time information on the location of marine mammals so they can make the proper avoidance and/ ,or safety measures.

Issue 2: Regulations vs. Guidelines vs. Special Use Permits
There is an overall lack of agreement in the WG in regard to making whale watching guidelines into regulations and whether or not these regulations and/or guidelines should pertain to all vessels in the sanctuary. As a result of the general lack of agreement, 3 options will be provided in the Action plan:

1. **Regulations:** Regina Asmutis and Colleen Coogan to develop a rationale supporting the need for current whale watch guidelines to become regulations that pertain to all vessels operating within the Sanctuary (excluding commercial vessels).
2. **Guidelines:** Rick Nolan, Boston Harbor Cruises, to develop a rationale supporting that current whale watch guidelines remain guidelines and that they continue to pertain only to whale watch vessels operating within the Sanctuary.
3. **Special Use Permit:** Sharon Young, Human Society of the U.S., will work with Karen Steuer and/or other WG members to develop a rationale recommending the implementation of special use permits for all vessels that wish to operate in close proximity to whales within the Sanctuary.

Issue 3: Sanctuary Run Enforcement

Regarding enforcement within the Sanctuary, WG members representing vessel operators disagree with the idea of establishing a Sanctuary run enforcement program. As an alternative it was recommend that other technologies are investigated to trigger warnings. Once warnings are triggered the Sanctuary should work with other agencies with enforcement authority (e.g., NMFS) to enforcement the necessary guidelines or regulations. The idea of a Sanctuary-owned vessel was discussed; while the WG members supported the idea of the vessel for outreach, education, and research, there was no agreement on the need for such a vessel for enforcement. This was partly because it was unclear, based on the lack of agreement on most of the other topics, on what exactly was being enforced, and what the legal authority of the sanctuary was to enforce non-Sanctuary regulations. It was agreed that the sanctuary should continue whale watch guideline compliance monitoring.

***Gerry E. Studds* Stellwagen Bank National Marine Sanctuary**
Management Plan Review

Vessel Strike Working Group – Draft Agenda

Date: 3 May 2004
Location: NMFS Protected Species Branch Conference Room, Gloucester

TIME	TOPICS AND OBJECTIVES
9:00-9:15	**Old Business** - Review Meeting Summary - Updates on Requested Information **Discussion Leader**: Mason Weinrich /Dave Wiley
9:15-9:45	**Whale Watch Compliance Data: Phase 2 analysis** **Presenter**: David Wiley, SBNMS
9:45-10:05	**Presentation**: **A Computer Tool to Determine Effects of Speed Restrictions in the SBNMS** **Presenter: Michael Thompson, Perot Systems, or Just Muller, SBNMS**
10:05 – 10:15	**Presentation: Traffic Management in National Parks** **Presenter:** Dave Wiley, SBNMS
10:30 – 12:30	**Presentation and Discussion: Straw Man Position(s) for the Vessel Strike Action Plan** **Discussion Leader:** Mason Weinrich, Chair
12:30-13:00	**Working Lunch**
13:00-14:30	**Continue discussion: Vessel Strike Action Plan**
14:30 – 15:00	**Discussion: Vessel Strike Enforcement Plan** **Discussion Leader:** Mason Weinrich, Chair
15:00 – 15:30	**Discussion: Vessel Strike Education/Outreach Plan** **Discussion Leader:** Mason Weinrich, Chair
15:30 – 16:00	**Discussion: Vessel Strike Research Plan** **Discussion Leader:** Mason Weinrich, Chair
16:00 – 16:25	**Discussion: Emerging Issues**
16:25-16:45	**Wrap-Up** - Review progress and tasks - Timelines for Action Plan Review - Next Meeting Agenda
16:45	**Adjourn**

APPENDIX A: Proposed Straw Man for Vessel Strike Working Group Plan - 1
(As Developed by Regina Asmutis)

Action Plan: SBNMS Marine Mammal Vessel Strike

Goal Statement

Our goal is to determine where and when the potential of collision to marine mammals exists within the sanctuary, to determine what mitigation measures might be necessary and appropriate to minimize that potential, and, if necessary, determine what steps might be taken to assess the potential of collision where insufficient information currently exists. *Additional goals are to foster cooperation with cross-jurisdictional partner addressing the issue, and educate Sanctuary users regarding the issues."*

Introduction

Public scoping identified particular concern ---------- Specific concerns from the public scoping process to be answered include:

Background:

Little is known regarding vessel collisions with whales. Historical records date back only to the mid 20th century and fewer than 300 records exist world-wide (Jensen and Silber 2003). These data likely represent a gross underestimation of the problem as many strikes go unreported and most carcasses are lost at sea. These reports include actual known collisions as well as reports of floating and/or stranded carcasses, some of which were necropsied confirming that the fatality was likely due to a collision with a vessel. Where the vessel type is known, the primary reporter of whale collisions is from the Navy/USCG (14.9%) and commercial whale watch boats (14.2%) (Jensen and Silber 2003). However, these data are likely to be heavily biased, as it is standard operating practice for the Navy/USCG to report a strike and commercial whale watch vessel operators are more likely to be aware of, and report, a collision than other sources.

The circumstances under which collisions are more likely to occur is not known and may depend on a variety of factors including, but not limited to, the time of day, the density of whales, the density of vessels and the awareness of the whale and the vessel operator. Data suggests that a ship traveling at greater than 14 kts striking a whale is likely to result in a fatality (Knowlton 19XX). However, any vessel is capable of causing a fatal strike as the intensity of the collision depends on the size (tonnage) of the vessel, and the speed at which it is traveling. Therefore, a small vessel traveling at high speed can apply the same force as a large vessel moving slowly. Although a vessel traveling at a reduced speed, may increase the reaction time of the vessel operator, and the whale.

Approximately 10% (31/296) of the world-wide data regarding collisions was collected from the greater Stellwagen Bank Sanctuary area (including Cape Cod Bay and Boston Harbor). Strikes were reported in all months of the year with the 85% occurring between May and August, a time when whales and opportunistic observations increase, and approximately 48% of the reported strikes resulted in a mortality (Jensen and Silber, unpubl. data). Species involved included four endangered species (humpback, finback, sei, right) and one protected species (minkes) with most strikes involving humpback whales (42%). Commercial whale watch vessels were involved in 25% of the strikes while 13% of the strikes involved a USCG vessel, a commercial ferry, a recreational vessel, and a container ship. However, as mentioned previously, these data are likely to be heavily biased as 61% of the strikes lacked information

regarding the vessel involved, and commercial whale watch vessels are substantially more likely to report a strike than any other vessel type. (See Table 1).

Vessel traffic in the Sanctuary is year-round and includes commercial, fishing and recreational vessels. At least 396 large commercial vessels enter Boston annually including 59 container ships, 161 tankers, 95 cruise ships and 22 salt ships. As many as XX tug and tows move through the Sanctuary annually as they exit, or enter, the Cape Cod Canal. In 2003, licenses to operate within Massachusetts were distributed to 472 charter boats, 37 party boats, and 13 regular guide. More than 13 different commercial whale watch companies depart from Massachusetts and, at least three ferry services, bound for Provincetown, operate seasonally. Commercial fisheries operating within the Sanctuary include lobster, jonah crab, hagfish, scallop, tuna, and gillnetting. An unknown number of recreational and military vessels also visit the Sanctuary. Additionally, a Traffic Separation Scheme (TSS) transects the Sanctuary but this TSS is not mandatory and ship traffic maneuvers throughout the Sanctuary.

However, there is no reliable database to indicate the vessel movement within, and through, the Sanctuary there is no means of determining vessel density at any time. As such, the SBNMS VSWG offers the following Action Plan to reduce the risk to marine mammals within the Sanctuary.

Existing Regulations

- NMFS Whale Watch Guidelines—Northeast Region (See Appendix I)

- Vessel Approach Regulations

In February 1997, NOAA's Fisheries Service implemented a regulation to minimize boat disturbance of right whales by restricting vessel approaches. These regulations prohibit all approaches within 500 yards (460m) of any right whale, whether by ship, aircraft or other means. Exceptions exist for emergency situations and where certain authorizations are provided.

- Mandatory Ship Reporting

Each ship of 300 gross tons or greater must participate in the reporting systems, except government ships exempted from reporting by regulation V/8-1(c) of SOLAS. However, exempt ships are encouraged to participate in the reporting systems. Participating ships must report to the shore-based authority upon entering the area covered by a reporting system. Additional reports are not necessary for movements made within a system or for ships exiting a system. A ship equipped with IMMARSAT C must report in IMO standard format as provided in Table 169.140 in §169.140. A ship not equipped with INMARSAT C must report to the Coast Guard using other means, listed below in order of precedence: (1) Narrow band direct printing (SITOR). (2) HF voice communication, or (3) MF or VHF voice communications. SITOR or HF reports made directly to the Coast Guard's Communications Area Master Station Atlantic (CAMSLANT) in Chesapeake, VA, or MF or VHF reports made to Coast Guard activities or groups, should only be made by ships not equipped with INMARSAT C. Ships in this category must provide all the required information to the Coast Guard watchstander. Each ship report made to the shore-based authority must follow the standard reporting and format requirements listed in table 169.140.

Telegraphy	Function	Information required
Name of system	System identifier	Ship reporting system WHALESNORTH or WHALES SOUTH
A	Ship	The name, call sign or ship station identity, IMO number, and flag of the vessel.
B	Date and time of event	A 6-digit group giving day of month (first two digits), hours and minutes (last four digits).
E	True course	A 3-digit group.
F	Speed in knots and tenths of knots	A 3-digit group.
H	Date, time and point of entry into system	Entry time expressed as in (B) and entry position expressed as-
		(1) a 4-digit group giving latitude in degrees and minutes suffixed with N (north) or S (south) and a 5-digit group giving longitude in degrees and minutes suffixed with E (east) or W (west); or
		(2) True bearing (first 3 digits) and distance (state distance) in nautical miles from a clearly identified landmark (state landmark).
I	Destination and expected time of arrival	Name of port and date group expressed as in (B).
L	Route information	Intended track.

Mandatory Ship Reporting Systems (WHALESNORTH and WHALESSOUTH), have been established within the area of this Coast Pilot. These MSR systems require all vessels, 300 gross tons or greater, to report to the U.S. Coast Guard prior to entering two designated reporting areas off the east coast of the United States. (See 33 CFR 169, chapter 2, for limits and regulations.) Sovereign immune vessels are exempt from the requirement to report, but are encouraged to participate. The two reporting systems will operate independently of each other. The system in the northeastern United States will operate year round and the system in the southeastern United States will operate each year from November 15 through April 15. Reporting ships are only required to make reports when entering a reporting area during a single voyage (that is, a voyage in which a ship is in the area). Ships are not required to report when leaving a port in the reporting area nor when exiting the system.

Vessels shall make reports in accordance with the format in IMO Resolution A.648 (16) General Principles for Ship Reporting Systems and Ship Reporting Requirements. (See 33 CFR 169.135 and 169.140, chapter 2, for additional information.) Vessels should

report via INMARSAT C or via alternate satellite communications to one of the following addresses:

Geographical boundaries of the northeastern area include the waters of Cape Cod Bay, Massachusetts Bay, and the Great South Channel east and southeast of Massachusetts. The coordinates (NAD 83) of the area are as follows: from a point on Cape Ann, Massachusetts at 42°39'N, 70°37'W; then northeast to 42°45'N, 70°13'W; then southeast to 42°10'N, 68°31'W; then south to 41°00'N, 68°31'W; then west to 41°00'N, 69°17'W; then northwest to 42°05'N, 70°02'W, then west to 42°04'N, 70°10'W; and then along the Massachusetts shoreline of Cape Cod Bay and Massachusetts Bay back to the point on Cape Ann at 42°39'N, 70°37'W.

- SAS

In an effort to reduce ship collisions with the critically endangered right whale, Right Whale Sighting Advisory System (SAS) was developed in late 1996. The System provides real-time right whale sighting information to the commercial shipping industry and other marine traffic from aerial and shipboard surveys conducted by several agencies and organizations and from verified opportunistic sightings. In 1998, the National Marine Fisheries Service (NMFS), the U.S. Coast Guard, the Center for Coastal Studies, the MA Division of Marine Fisheries, Woods Hole Oceanographic Institution , the International Wildlife Coalition, the Whale Center of New England, several whale watch companies, and a high speed ferry company, contributed sightings reports to the NE Right Whale SAS. In the years since it's inception, there has been a wide variety of reporting sources due to the expanding awareness of the plight of the right whale and their vulnerability to collisions with ships and entanglement in fishing gear. Principally, the Cape Cod Bay (CCB) and Great South Channel (GSC) critical habitats are surveyed from January - early July (the peak period of right whale residency in these waters) by air and ship with right whale sightings information coordinated and processed by a NMFS coordinator. Sightings for each survey day (survey days are weather dependent) are plotted in an ARCINFO based GIS program and circled with a buffer zone greater than or equal to 5 kilometers around the right whale locations. Coordinates for the right whale sightings and geographic maps of the sighting locations are disseminated to cooperators by an automated fax system immediately after processing. Coordinates and a radius of the right whale sighting circles are broadcast for 24 hours by CG via Broadcast Notice to Mariners and NAVTEX, NOAA Weather Radio, and Army Corps of Engineers (ACOE) Traffic Controllers at Cape Cod Canal to target shipping traffic and to a lesser degree, other marine traffic. Additionally, shipping agents and pilots provide the most recent sighting information from the right whale faxes to vessel captains inbound or outbound from Boston and Portland ports. General right whale advisories are also broadcast to or given verbally to observed commercial vessels throughout the survey period. Maps with right whale sightings are also posted on a timely basis to several web pages such as Whalenet, and the NMFS NER and NEC web pages which are cross linked to Whalenet.. A NMFS Inquiry Line at the Northeast Region Office in Gloucester, MA (978) 281- 9278 provides right whale sighting faxes on demand to all interested callers. Additional cooperators, including but not limited to, the MA Environmental Trust, NOAA, Stellwagen Bank National Marine Sanctuary, New England Aquarium, Navy and Massport, the Boston port authority, are involved in supporting and planning network operations.

APPENDIX B: Proposed Straw Man for Vessel Strike Working Group Plan - 2
(As Presented by David Wiley)

Straw Man Proposal – Avoiding Vessel Strikes of MarMam – MW 4-30-03

Strategies:

All vessels

- Maximum speed limit of 20 knots
- Maximum speed of 13 knots in high use areas (NW, SW corner) when whales are present between sunset and sunrise, and limited visibility
- No speeds greater than 10 kts within a mile of a whale except for commercial ships
- Dedicated, trained lookout for all boats with >= 3 crew members

Whale Watch Boats

A. SBNMS Special Use Permit for Commercial Whale Watch (WW) Boats

- Permit required for WW boat to be allowed entry into Close Approach Zone, as defined by the NMFS/SBNMS *Whalewatching Guidelines*
- Permit applied to vessel/company (not operator)
- Permit issued annually
- Permit conditioned on:
    a. boat operator being certified by SBNMS/NMFS
    b. vessel prominently posting official notice of NMFS/SBNMS guidelines
- Certification must be renewed annually
- Permit revoked for remainder of year upon second violation of NMFS/SBNMS guidelines [formal warning issued for first violation] – cause for revocation includes noncompliance with guidelines in the entirety
- Fee assessed for each permit issued to allow for vessel monitoring and analysis by SBNMS to determine compliance with guidelines
- Exemption (two weeks) for permitted vessel losing certified operator during WW season; May through mid-October)

SBNMS/NMFS Whale Watch Operator Certification

- Curriculum co-developed by SBNMS and NMFS
- Two publicly announced training dates scheduled per year (intermittent training to remedy vessel exemption conducted on as-needed basis during WW season)
- Companies using certified operators, along with explanation of what certification means relative to close approach by WW vessels, posted both on SBNMS and NMFS websites [posting would include contact information for all WW companies accessing SBNMS, but would distinguish those companies permitted for entry to the close approach zone]
- Certification affords marketing advantage to WW companies

Commercial ships (> 300 tons?)

Establish 2 approach lanes – Existing and one between Jeffreys and Stellwagen

- If whale aggregations exist in lane, use new lane
- At all times, suggested speed < (12, 14) kts, required dedicated trained lookout posted

Right whales – All boats 65 ft or greater

- Support NMFS plan to eliminate right whale ship strikes.
- Support MA plan for W/W approaches for health check

Enforcement

- Stellwagen Enforcement Vessel
- Cooperative agreement with Mass DMF/DEP
- Sanctuary monitoring of whale watch compliance with guidelines/regs paid for by W/W industry.

Research

- Forward looking sonar or other remote detection mechanism
- Comprehensive info on vessel use and trends in SBNMS
- SBNMS/NMFS maintains database of all details around any known strikes
- Add'l studies of the movement and responses of whales to approaching vessels

Emerging Issues

- Coastal Highway shipping
- New Ferry Routes
- Effects of strikes from jet boats vs. propellers; effects of jet boat intake.

APPENDIX C: Rationale In Support of a Stellwagan Bank Marine Mammal Information and Reporting Center
(As Developed by Rick Nolan)

Rationale # 3 Presented by Frederick L. Nolan III May 3, 2004

Stellwagan Bank Marine Mammal Information and Reporting Center

The ship strike sub-committee proposes that the most effective approach to reducing the potential of ship or vessel strikes with marine mammals in the Sanctuary is through the sharing of real time information to both the commercial and recreational Masters of vessels operating in and around the Sanctuary as to the actual known locations, numbers and types of marine mammals in and around it. Recent advancements in GPS technologies, and a very recent federal mandate of commercial vessels over sixty- five feet, create a unique and timely opportunity for SBNMS

Accordingly, the sub-committee recommends that the SBNMS dedicate the required recourses for the build-out of the Stellwagan Bank Marine Mammal Reporting and Information Center (Center) which would be manned 24 / 7 / 365 at its headquarters in Scituate, MA. At minimum the Center should be equipped with a telephone, VHF, Single Side Band Radios, Electronic Charts of the Sanctuary and receiving equipment for Automated Identification Systems (AIS).

As part of the Maritime Security Act of 2003, beginning January 1, 2005 all commercial domestic and foreign flag vessels over 65' in length operating in US waters will be required to be equipped with AIS. This new technology will continuously broadcast real time tracking information for vessels so equipped, to other vessels or facilities with corresponding receiving equipment. At minimum the information transmitted by each vessels AIS will include the vessels name, location, track line and speed.

The requirement of owners to make this financial investment to all applicable vessels creates an opportunity for SBNMS to have real time monitoring of a majority of vessel traffic within the Sanctuary much sooner than had been anticipated, and makes this recommendation financially and operationally practical.

Through the development of the Center, the Sanctuary will be equipped to garner and broadcast all of the real time information provided to it by the boating population of the Sanctuary, as it relates to the most current known location of animals. The amount of information which it receives will be directly proportionate to the number of vessels reporting. The Center will have available to it, an abundance of information when the combined density of vessels and animals is highest, and the potential for conflict is greater. It will avoid blanket regulations such as course changes, specific track lines, and speed restrictions, which could elevate the risk to vessels and animals as opposed to diminishing it. It avoids the delays which will certainly result from a long and perhaps contentious public review and debate on weather or not SBNMS has the authority to create regulations which conflict with International Rules of the Road.

Following is an outline of how the Center would function.

Receiving information on actual locations of marine mammals

- SBNS would establish a hotline for mariners to report sightings. The number would be distributed to all commercial vessel operators, and could be made available to recreational owners.
- All vessels transiting in the Sanctuary will be required to report all sightings of marine mammals in and around the Sanctuary.
- SBNS would identify and publish the radio frequencies, (both VHF and SSB) which the Center will continuously monitor for of receiving sighting reports.
- All commercial vessels transiting in the sanctuary will agree to provide immediate information on all sightings to the Center via telephone, radio, or other mutual communication systems which they and the Center may have.
- Each report would include as much information as possible including the location, type, number, activity engaged in, and approximate track of transiting animals.

Receiving information of the actual location of commercial vessels

- The Center will have the ability to monitor every commercial vessel transiting in the Sanctuary which are in excess of sixty-five feet through AIS. Additionally, the SBNS could determine that all vessels without AIS report in prior to, and at the conclusion of, transiting the sanctuary. At minimum, the report would include information on the size of the vessel, intended track through the sanctuary and anticipated speed during transit.

Broadcasting or communicating to vessels within the sanctuary

- With the benefit of real time sighting reports, and the ability to track all vessels equipped with AIS as they transit the Sanctuary, the Center will communicate the most current known location of animals within it, or least those known to be in close proximity to a particular vessels intended track. Additionally, the Center would request that the Master of any vessel consider an alternate track if it had serious concerns of a transit which will bring a vessel into close proximity of a known location of animal(s). This request would be made early enough, to allow the Masters of larger ships adequate time to review all of their options. These communications could be accomplished through any one of the modes available to the Center.
- To reach vessels without AIS, the Center would make hourly broadcast on prescribed and advertised VHF and SSB frequencies. The broadcast would identify the most current information available on the known location of animals in and around the Sanctuary. The structure and format of these communications would be similar to USCG Notice to Mariners broadcast.

APPENDIX D: Rational In Support of NMFS Right Whale Plan
(As Developed by Colleen Coogan)

Activity:

(*I don't have the actual wording that we proposed at the meeting or the actual title of the proposal that was reviewed by Greg Silber. Here's what I recall and pulled from my notes.)*

SBNMS should work with NMFS and support their efforts to implement the portions of the "Measures to Reduce Ship Strikes of Northern Right Whales" for the management area that overlaps a large portion of the SBNMS. Specifically, measures will shortly be proposed to require vessels 65 feet and greater transiting an area off of Race's Point between April 1 and May 15 of each year to operate at a low speed.

Rationale: NMFS presented an overview of a national plan that will soon be published as an Advanced Notice of Proposed Rulemaking (ANPR) to reduce vessel strikes on right whales along the east coast. One of the proposed areas, off of Race's Point, occurs largely within the Stellwagen Bank Sanctuary. The measures were developed to increase protection of right whales, while minimizing impacts on vessel operators. This goal is consistent with the goals of the SBNMS. The season and area proposed reportedly encompass observed routes that right whales take when leaving Cape Cod Bay. The minimum vessel size was selected because it is smaller than the smallest vessel identified in a lethal strike of a whale, and is a standard size used for other maritime industry management and regulatory purposes. The actual ANPR is not yet available for a complete review by the working group, therefore some group members were concerned with the adequacy of the precise area designated, the likely speed restrictions to be proposed, or the size of vessels designated for speed restrictions. However, the proposed plan was developed after more than a year of deliberations by right whale scientists, regulatory agency personnel, and members of the Implementation Teams for the Recovery of Northern Right Whales. Lacking the resources to deliberate as fully as the authors of the NMFS shipstrike plan, the SBNMS should work cooperatively with NMFS to implement the portions of the national shipstrike plan for the waters off of Race's Point.