

Adaptive Harvest Management (AHM) Task Force

International Association of Fish & Wildlife Agencies (IAFWA)

Status Report #2

Request for Flyway Feedback

February 18, 2004

The AHM Task Force was established in December 2002 by the president of the IAFWA. The mission of the AHM Task Force is to foster understanding and support for continued strategic development and implementation of AHM. Task Force members are:

- *Wayne MacCallum*, Atlantic Flyway (MA Division of Fish & Wildlife)
- *Roy Grimes*, Mississippi Flyway (KY Dept. Fish & Wildlife Resources)
- *John Cooper*, Central Flyway (SD Game, Fish & Parks Department)
- *Don Childress*, Pacific Flyway (MT Fish, Wildlife & Parks)
- *Ken Babcock* (Ducks Unlimited)
- *Rollie Sparrowe* (Wildlife Management Institute)
- *Ken Williams* (U.S.G.S. Cooperative Research Units)
- *Ralph Morgenweck* (U.S. Fish and Wildlife Service)
- *Dave Case*, facilitator (D. J. Case & Associates)

Further information about the mission of the AHM Task Force, as well as its first Status Report, can be found at

<http://www.iafwa.org/Attachments/IAFWA%20AHM%20TF%20Status%20Report%209-12-03.pdf> and <http://migratorybirds.fws.gov/mgmt/ahm/taskforce/taskforce.htm>.

The AHM Conference

In its September 12, 2003 Status Report, the AHM Task Force recommended that the IAFWA, the four Flyway Councils (both Technical Committees and Councils) and the USFWS hold a special conference to discuss the strategic direction of AHM. That conference was held on January 14, 2004 in Denver, Colorado. There were 116 people in attendance at the Conference and 78 subsequently completed evaluation forms.

When asked “How useful was the AHM conference from your perspective?”

- 68% of the respondents said “extremely” or “very useful”;
- 29% said “somewhat;” and
- 3% “not very” or “not at all.”

When asked “Did the AHM Conference meet your expectations?”

- 63% of the respondents said “yes;”
- 32% said “sort of;”
- 5% said “no.”

From the written comments received on the evaluation, it was clear that many participants felt the AHM Task Force needed to provide specific guidance and/or recommendations for addressing the issues identified in the September 12, 2003 Status Report and discussed at the AHM Conference. This Status Report articulates the Task Force’s timetable for doing that.

Request for Feedback

In its first Status Report and at the AHM Conference, the Task Force presented the waterfowl management community with a number of questions and challenges concerning the future direction of AHM. The Task Force is seeking feedback from the Flyway Councils that would help with the formulation of a small set of strategic alternatives that could be further reviewed and evaluated by all interested parties. The Task Force wishes to emphasize again that its focus is primarily on policy issues (i.e., those involving social values), recognizing of course that any strategic direction must be consistent with long-term conservation of waterfowl resources and with extant capabilities for science-based monitoring and assessment.

The Task Force has chosen to focus on the following three themes. For each theme, we have provided some brief background material, as well as a list of questions that the Flyway Councils should attempt to address. Feedback relating to these questions can be forwarded to the facilitator (Dave Case, dave@djcase.com) for distribution to the Task Force.

A. What should be the goals and objectives of harvest management?

It is becoming increasingly clear that maximizing the (sustainable) size of the waterfowl harvest may not be the most important objective of harvest management. Most waterfowl managers seem more interested in maximizing hunter satisfaction and participation, recognizing that these are affected only in part by regulations and harvesting success. The Wildlife Management Institute (WMI) has convened a “Think Tank” to explore the relationships between hunting regulations and hunter satisfaction and participation, and ultimately they will provide some considerations for how these relationships might be considered more explicitly in harvest management.

In the short-term, however, the Task Force believes that harvest and population size continue to be appropriate performance measures for the AHM process. On the other hand, the existence of these dual, potentially antagonistic objectives (i.e., harvest and population size) leaves much room for discussion and debate. The pursuit of maximum harvest does not require the imposition of an explicit population goal because population maintenance is a necessary condition for maximizing long-term cumulative harvest. However, there is a tradeoff between the average size of the harvest and the average size of the population, and an objective to maximize cumulative harvest may sometimes lead to population sizes that are too low to be

socially acceptable. In these cases, an explicit population goal may be imposed to constrain the level of hunting opportunity.

The Task Force recognizes that the North American Waterfowl Management Plan (NAWMP) provides a convenient source of population goals, but believe these goals may be somewhat problematic for use in AHM because they:

- Reflect a presumed increase in the "carrying capacity" of the environment (i.e., NAWMP population goals are generally not attainable with current landscape conditions;
- Are tied to "average" (yet not explicitly defined) environmental conditions;
- Are implicitly tied to the harvest regime of the 1970s; and
- Are not specified for all stocks of interest in harvest management.

In light of these difficulties, specific questions to the management community include:

1. *Should AHM:*
 - a. *Explicitly recognize NAWMP goals in the development of regulatory strategies?*
 - b. *If so, to what degree should hunting opportunity be constrained by the NAWMP goals?*
 - c. *And, how should we account for those situations when uncontrollable environmental conditions (e.g., precipitation) are not "average?"*
2. *If not:*
 - a. *Then how would we communicate the apparent disconnect between the two principal programs for waterfowl management?*
 - b. *And how would we ensure that general duck-hunting regulations based on mallards are not overly liberal for some duck species or stocks?*

B. What should the set of regulatory alternatives look like?

After considerable discussion, the Task Force has concluded that there could/should be some simplification of the current set of regulatory alternatives. Moreover, any modification of regulatory alternatives now or in the future should reflect several important considerations:

- The number of regulatory alternatives should be small to facilitate the identification of optimal choices, although the set of alternatives can be expanded or limited as the need and desire to do so is widely recognized.
- Regulatory alternatives should be designed so that they result in relatively distinct ranges of harvest rates, and the same alternatives should be in place long enough to measure their effects.
- The regulatory alternatives should reflect the preferences and skills of hunters, an acceptable distribution of hunting opportunity, and law-enforcement capabilities.

The management community faces a number of challenges in meeting these criteria:

- There is a continuing desire to “improve” the set of regulatory alternatives, but frequent changes and regulations outside historical experience make it difficult to assess associated harvest rates.
- Within the range of traditional regulations, the ability to regulate harvest rate is imprecise.
- Evidence suggests that within the range of historical experience, stock-specific regulations generally are not very effective.
- Social considerations are the overarching concern within the acceptable range of regulatory options, but agreement on priorities is an on-going challenge.

Ultimately, the specification of the regulatory alternatives will be determined in large part based on their perceived sociological consequences. Specific questions for the management community include:

3. *What are the minimum season lengths, bag limits, and framework dates needed to ensure that states retain an interest in establishing open hunting seasons?*
4. *Are current Flyway differences in regulatory alternatives acceptable?*
5. *Are less complex regulations (e.g., fewer species restrictions within the total bag limit) desirable?*
6. *Which is more preferred: infrequent, but large changes in annual regulations or more frequent, but smaller changes in annual regulations?*
7. *Would aggregate bag limits (e.g., one hen mallard or one pintail) be an acceptable means to reduce harvest pressure on particular stocks?*
8. *Would states be willing to give up days in the liberal alternative to foster annual stability in regulations, and to help ensure that there are no closures or partial-season closures on some species?*
9. *How often should the regulatory alternatives be reviewed, and what should be the criteria for modifying them?*

C. How should AHM account for species other than mallards?

Since its inception, AHM has focused on the population dynamics and harvest potential of mallards, especially those breeding in midcontinent North America. Midcontinent mallards constitute a large portion of the total U.S duck harvest and traditionally have been a reliable indicator of the status of many other species. However, not all duck stocks (i.e., species and populations) have the same potential as midcontinent mallards to support harvest. Moreover, in recent years there has been a growing disparity between midcontinent mallards and some duck stocks in population status. As a consequence there is considerable interest in developing an

AHM approach that explicitly recognizes and accounts for stock-specific variation in harvest potential.

The AHM Working Group recently considered a number of conceptual alternatives for multi-stock AHM. These alternatives were:

- Continue the current approach based on mallards (midcontinent, eastern, and western stocks), but constrain the use of hunting regulations that would be expected to result in population levels of other species below their respective NAWMP goals; an important feature of this alternative is the option to have independent season or bag limits for stocks of special concern (e.g., pintails); or
- Specify two groups of ducks based on relative differences in harvest potential, and then have independent regulations for the two groups; in contrast to the first alternative, there would be no independent seasons (i.e., all stocks eventually must be assigned to one of the two groups); or
- Set a general duck season based on the stock(s) with the lowest harvest potential.

These alternatives were discussed at length at the Working Group meeting in April 2003, but they have not been sufficiently reviewed by the management community at large. Specific questions for the management community that can help identify a preferred approach include:

10. Should we:

- a. Continue to base the choice of regulatory alternative on the status of mallards?*
- b. If so, how should we account for those stocks with lower harvest potential?*
- c. Or, would one of the other alternatives described by the AHM Working Group be more appropriate?*

11. Regardless of the general approach, for which species (if any) would separate hunting regulations (including species-specific season lengths, bag limits, and framework dates) be acceptable?

12. If the length of the general duck season were based on a single species like mallards, for which species (if any) would bag limits that varied annually be acceptable?

13. For which species (if any) would periodic closed seasons be acceptable?

14. Should further divisions within Flyways:

- a. Be considered at this time as a means to address geographic differences in harvest derivation or other regional issues?*
- b. If so, where?*

Proposed Timetable

Below is the timetable the AHM Task Force proposes for completion of its charge over the next year or so. (*Note: Comments on this process/timetable would be appreciated.*)

- *February/March 2004:* Flyway Technical Committees meet and continue discussion started at AHM Conference.
- *March:* North American Wildlife & Natural Resources Conference - Flyway Councils, IAFWA Committees, and National Flyway Council meet and continue discussion. Councils provide feedback to the Task Force.
- *April:* AHM Task Force distributes a framework of options/considerations for Flyway Technical Committees and Councils to review and discuss at the summer meetings.
- *July:* Flyway Technical Committees and Councils meet to discuss framework of options.
- *August:* AHM Task Force submits report with a narrower set of alternatives at the IAFWA annual meeting in Atlantic City, NJ.
- *Fall:* AHM Working Group meets and provides technical feedback on alternatives to Technical Committees, Councils, and USFWS.
- *January 2005:* AHM Task Force identifies the preferred alternative(s) it will recommend to the waterfowl management community.
- *February/March:* Flyway Technical Committees and Councils review and act on AHM Task Force recommendations for possible implementation in the 2005-06 regulation setting process.