

Tennessee as disaster areas due to damages caused by severe storms, tornadoes and flooding occurring on May 4, 2003 and continuing.

In addition, applications for economic injury loans from small businesses located in the contiguous counties of Clay and Jackson in the State of Tennessee; Crittenden County in the State of Arkansas; Monroe County in the State of Kentucky; and DeSoto and Marshall Counties in the State of Mississippi may be filed until the specified date at the previously designated location. All other counties contiguous to the above named primary counties have been previously declared.

All other information remains the same, *i.e.*, the deadline for filing applications for physical damage is July 7, 2003, and for economic injury the deadline is February 6, 2004.

(Catalog of Federal Domestic Assistance Program Nos. 59002 and 59008).

Dated: May 28, 2003.

**Herbert L. Mitchell,**

*Associate Administrator for Disaster Assistance.*

[FR Doc. 03-13777 Filed 6-2-03; 8:45 am]

**BILLING CODE 8025-01-P**

## SMALL BUSINESS ADMINISTRATION

### Public Federal Regulatory Enforcement Fairness Hearing; Region V Regulatory Fairness Board

The Small Business Administration Region V Regulatory Fairness Board and the SBA Office of the National Ombudsman will hold a public hearing on Thursday, June 12, 2003, at 1 p.m. at the Minnesota State Capitol, Room 107, 75 Reverend Martin Luther King Jr. Boulevard, St. Paul, Minnesota 55155, to receive comments and testimony from small business owners, small government entities, and small non-profit organizations concerning regulatory enforcement and compliance actions taken by Federal agencies.

Anyone wishing to attend or to make a presentation must contact Ed Daum in writing or by fax, in order to be put on the agenda. Ed Daum, District Director, U.S. Small Business Administration, Minnesota District Office, 100 North 6th Street, Butler Square, Suite 210-C, Minneapolis, MN 55403, phone (612) 370-2306, fax (612) 370-2303, e-mail [ed.daum@sba.gov](mailto:ed.daum@sba.gov).

For more information, see our Web site at <http://www.sba.gov/ombudsman>.

Dated: May 27, 2003.

**Michael L. Barrera,**

*National Ombudsman.*

[FR Doc. 03-13873 Filed 6-2-03; 8:45 am]

**BILLING CODE 8025-01-P**

## SMALL BUSINESS ADMINISTRATION

### Public Federal Regulatory Enforcement Fairness Hearing; Region VII Regulatory Fairness Board

The Small Business Administration Region VII Regulatory Fairness Board and the SBA Office of the National Ombudsman will hold a public hearing on Monday, June 16, 2003, at 1 p.m. at the University of Iowa Town Center, 221 3rd Avenue, SE., Suite 200, Cedar Rapids, IA 52401 with interactive videos—satellite locations at: Davenport, West Burlington, Dubuque, Des Moines, Sioux City, Spencer, Fort Dodge, Mason City, Council Bluffs, Ottumwa, and Creston, to receive comments and testimony from small business owners, small government entities, and small non-profit organizations concerning regulatory enforcement and compliance actions taken by Federal agencies.

Anyone wishing to attend or to make a presentation must contact Keith W. McBride in writing or by fax, in order to be put on the agenda. Keith McBride, U.S. Small Business Administration, Cedar Rapids District Office, 215 4th Avenue S.E., the Lattner Building, Suite 200, Cedar Rapids, IA 52401, phone (319) 362-6405 Ext. 221, fax (319) 362-6405, e-mail [keith.mcbride@sba.gov](mailto:keith.mcbride@sba.gov).

For more information, see our Web site at <http://www.sba.gov/ombudsman>.

Dated: May 27, 2003.

**Michael L. Barrera,**

*National Ombudsman.*

[FR Doc. 03-13874 Filed 6-2-03; 8:45 am]

**BILLING CODE 8025-01-P**

## DEPARTMENT OF TRANSPORTATION

### Federal Aviation Administration

#### Aviation Rulemaking Advisory Committee Meeting on Transport Airplane and Engine Issues

**AGENCY:** Federal Aviation Administration (FAA), DOT.

**ACTION:** Notice of public meeting.

**SUMMARY:** This notice announces a public meeting of the FAA's Aviation Rulemaking Advisory Committee (ARAC) to discuss transport airplane and engine (TAE) issues.

**DATES:** The meeting is scheduled for June 17 and 18, 2003, beginning at 8:30 a.m. on June 17. Arrange for oral presentations by June 12.

**ADDRESS:** Homewood Suites, 6955 Ft. Bent Way, Tukwila, WA 98188.

**FOR FURTHER INFORMATION CONTACT:** Effie M. Upshaw, Office of Rulemaking, ARM-209, FAA, 800 Independence Avenue, SW., Washington, DC 20591, Telephone (202) 267-7626, FAX (202) 267-5075, or e-mail at [effie.upshaw@faa.gov](mailto:effie.upshaw@faa.gov).

**SUPPLEMENTARY INFORMATION:** Pursuant to section 10(a)(2) of the Federal Advisory Committee Act (Pub. L. 92-463; 5 U.S.C. app. III), notice is given of an ARAC meeting to be held June 17-18 in Renton, WA.

The agenda will include:

#### June 17

- Opening Remarks
- FAA Report
- Joint Aviation Authorities Report
- Transport Canada Report
- Executive Committee Report
- Harmonization Management Team Report

• ARAC Tasking Priorities Discussion/Moratorium

- Mechanical Systems Harmonization (HWG) Report
- Ice Protection HWG Report
- Powerplant Installation HWG Report
- Human Factors HWG Report
- Design for Security HWG Report

#### June 18

- General Structures HWG Report and Approval
- Airworthiness Assurance Working Group Report and Approval
- Avionics HWG Report
- Written or verbal reports may be provided for the Continued Airworthiness and Extended Range Operations Working Groups, and the following HWGs: Engine, Electromagnetic Effects, Flight Test, Seat Test, Flight Control, Flight Guidance, System Design and Analysis, and Electrical Systems.

Two working groups will present documents for approval:

1. The General Structures HWG will seek approval of documents addressing fuel tank access and operations test.
2. The Airworthiness Assurance Working Group will seek approval of a multiple Supplemental Type Certificates report.

Attendance is open to the public, but will be limited to the availability of meeting room space and telephone lines. For those participating by telephone, the call-in number is (425)

**Aviation Rulemaking Advisory Committee (ARAC)**  
**Transport Airplane and Engine (TAE) Issues**

**Meeting Minutes**

**DATE:** June 17-18, 2003

**TIME:** 9:00 a.m.

**LOCATION:** Homewood Suites

6955 Ft. Bent Way

Tukwila, WA 98188

**Call to Order/Administrative Reporting**

Craig Bolt, Assistant Chair, called the meeting to order. Mike Kaszycki, Assistant Executive Director, read the required statement for conducting the meeting. Mr. Bolt introduced Mike Romanowski as the new representative of Aerospace Industries Association of America; he replaces Bob Robeson. Mr. Bolt then asked the other attendees to introduce themselves. (See attached *attendance sheet*. -- [PDF](#) )

Mr. Bolt reviewed the agenda (*handout 1* [WORD](#)), the Open/Completed Taskings chart (*handout 2* [PPT](#)), and the following Action Items from the February Meeting:

<b>Item</b>	<b>Status</b>
1-3	Closed
4	Ongoing; working group involvement will probably be requested for disposition of controversial public comments to proposed rulemakings

5	Closed
6	Addressed under Design for Security Harmonization Working Group Report
7	Closed
8	Ms. Krebs provided the FAA website for policy statements. Mr. Kaszycki, however, indicated that because of several complaints about difficulty in finding the website, the FAA is moving to simplify the search in the future
9	Closed
10	Closed. Mr. Kaszycki indicated the FAA had received two additional letters from the Technical Oversight Group on Aging Aircraft, but the agency's position remains unchanged
11	To be discussed under General Structures Harmonization Working Group (HWG) report
12	Open
13	Open

Mr. Bolt did not receive any comments on the TAEIG Working Group (WG) Meeting Location Approval Form (*handout 3 [WORD](#)*). Discussion items included extending the submittal time from 6 weeks to 90 days, and adding a line to report the meeting host. Mr. Bolt will revise and forward the form to the working group chairs with instructions to implement the form immediately.

A discussion of the Items of Interest Since February 2003 Meeting (*handout 4 [WORD](#)*) revealed that the Aircraft Certification Service Engine & Propeller Directorate is carrying the engine critical parts requirements as two separate projects--critical parts and static parts. Attendees asked Mr. Kaszycki to clarify the scope of § 33.14 if it is referring to static parts.

Mr. Bolt then distributed a list of Tasks that are Active Within WGs as of 6/17/03 (*handout 5 [PDF](#)*).

### **Transport Canada Civil Aviation (TCCA) Report**

Maher Khouzam provided his report via telephone. The following items were discussed:

- Canadian Transportation Safety Board (TSB) final report on Swissair Flight 111. Mr. Khouzam indicated that the last series of recommendations were addressed to the "Authorities." The Ministry sent recommendation to all its partners and subdivided the recommendations within the best appropriate international groups that could deal with the subjects.

Mr. Bolt discussed a March 27 letter from Transport Canada to TAE about the recommendations in the TSB final report (*handout 6 [TIFF](#)*). Mr. Bolt indicated that the ARAC would have to get any taskings from the FAA. Mr. Kaszycki said that the FAA's response is in coordination. The FAA response, however, indicates that it expects to address the TSB report through existing rulemaking activities and numerous research and development projects.

Attendees agreed that Mr. Bolt should respond to the Transport Canada (with a copy to the FAA) supporting any appropriate tasking from the FAA.

- The Changed Product Rule. The rule was promulgated on June 10; it is expected to be published June 17.
- European Aviation Safety Agency (EASA). The TCCA is actively discussing an agreement or an arrangement with the European Union (EU). One main issue to be resolved by the EU is to have one focal point that foreign authorities can communicate with on maintenance and production issues, i.e. EASA. However, each foreign authority may have to deal with each EU-National Airworthiness (Approval) Authority (NAA ) on the same subject. Mr. Kaszycki asked for clarification as it relates to manufacturers. Mr. Khouzam said that the rules say that EASA will approve everybody that is outside the foreign authorities. If you have a production certificate, EASA will have to accept it. He indicated, however, that the NAAs have not delegated authority to EASA to act on their behalf. He also said that, if there is no agreement, Canada had a two-way approach on certification of product with the JAA that the TCAA can use to fall back on.
- **Documentation:** TCCA is streamlining its advisory material (AMA), staff instructions, and policy letters, to link them to the Canadian Aviation Regulations (CAR) and to de-link the AMA from the Standards. The agency will also be changing the title of the advisory material to advisory circulars. Mr. Khouzam said he believed the total package, including a proposed CAR 521, will be ready for publication by mid 2004.

## **FAA Report**

Dionne Krebs addressed accomplishments since the last TAE meeting and the prioritization initiative (*handout 7 [PPT](#)*).

Accomplishments. Two final rules were issued, 14 final rules and three notices of proposed rulemaking were in headquarters for review. Additionally, four policy

notices, two notices of availability of advisory circulars, and eight notices of proposed policy were issued. (See *handouts 8 and 9* [RTF](#) for a complete status of part 25 rulemaking and nonrulemaking projects.)

Prioritization Activities. Ms. Krebs indicated that the FAA, Joint Aviation Authorities, and the TCAA had drafted and coordinated a joint rulemaking list. The list contained 26 projects (23 ongoing and 19 harmonized projects). Recommendations have been received from 13 of the 19 projects. Industry-- General Aviation Manufacturers Association, Aerospace Industries Association, and Aircraft European Contractors Manufacturers Association--also identified 12 of the 23 projects as priorities. All three authorities identified three new initiatives: phase 2 of § 25.1309, low level fuel warning, fuel tank protection, and wheel well protection from debris, impact, fire.

A meeting with ad hoc team members will probably be scheduled in July to determine the appropriate method for updating the rulemaking priorities list to address and identify any pop-up rulemaking that may occur.

The FAA priority initiative has been divided into three parts: An “A” list/feeder list, an Alternative Rulemaking Process List, and a Do by Other Means List. The “A” list contains the top 36 agency rulemaking project, 6 of which are Transport Airplane Directorate (TAD) projects. Thirty-nine projects make up the feeder list (also called unscheduled and B projects). Of these projects, 19 are TAD projects, 4 are headquarters, 4 are Engine and Propeller Directorate, and several projects are listed from other directorates

The Alternative Rulemaking Process List contains rulemaking projects that will be developed using a streamlined process in the directorates. Fifteen TAD projects are on the list. The alternative rulemaking process is still being developed.

The Do by Other Means List contains 46 projects, of which 19 are TAD, 2 are HQ, and 6 are from the Engine and Propeller Directorate. The recommendations from these projects can be applied to certification projects through other means, such as policy, exemptions, and equivalent level of safety findings.

Ms. Krebs indicated that they would be looking at those projects that did not make the cut on any portion of the priority list. The FAA will be untasking those related to existing working groups. Work that has been accomplished should be documented or archived before stopping work on the task. Directorate rulemaking will be aligned with the prioritization list developed for the Associate Administrator for Regulation and Certification. Ms. Krebs indicated that the FAA is requesting support from TAE member organizations to communicate to the technical organization why certain tasks were deactivated, based on their safety benefit as well as other considerations.

### **Joint Aviation Authorities (JAA) Report**

Thaddee Sulocki reported that the JAA continues to operate. EASA's Management Board and Commission will try to nominate an Executive Director at their July 10 meeting. The Executive Director will serve a 5-year term.

Mr. Sulocki noted JAR 25 Amendment 16, which is similar to a draft certification specification for EASA (Certification Specification 25), was published May 1. NPA 25F344 and NPA AWO16 for flight guidance system will be published for comments on July 1.

### **Executive Committee**

Mr. Bolt indicated that he had participated in the meeting by telephone. The new FAA Administrator participated in the meeting, which provided her an opportunity to introduce herself to the committee members. Glenn Rizner had prepared a package citing the work done by ARAC.

### **Harmonization Management Team (HMT) Report**

Mr. Kaszycki reported that, at the meeting, the authorities spent a lot of time on the rulemaking prioritization initiative. He also said that the meeting should continue to be industry's venue for hearing industry's comments on the

prioritization initiative. The next meeting will be held November 19-21 in Washington, DC. An item raised for discussion was what organization would be participating at the meeting, i.e., JAA or EASA. Mr. Sulocki said that he did not know.



ARAC Tasking Priorities Discussion/Moratorium

Mr. Kaszycki indicated that the moratorium is an interim step; the detasking will be the final step.

Powerplant Installation Harmonization Working Group (HWG)

Mike McRae reported for Andrew Lewis-Smith, who had provided a status report (*handout 10* [PDF](#)). He provided the following highlights:

Section	Discussion/Action
25.903(d)	--Group developed a plan/schedule for technical agreement, associated recommendations, and items of record  --Group expects to have report November 14
25.975	--Team has not met since June 2001 because SFAR 88 is taking the specialist's time
25.1305	AIR/AECMA sanctioned this task in anticipation of ARAC assigning it to the HWG;

Mr. McRae indicated that at the June working group meeting, members were concerned about the moratorium and assumed that its June meeting would be its last. The

Avionics Systems Harmonization Working Group had the following questions:

- (1) Is ARAC supporting the moratorium? Working group is looking for an official TAE position.
- (2) Will PPIHWG meet after ARAC makes the moratorium official?
- (3) What is the proposed alternative for ongoing or new harmonization working groups to obtain coordinated consensus, related technical positions, and support (i.e., AC 25-11 for the Avionics Harmonization

Working Group, § 25.841 for the Mechanical HWG, and supercooled large droplets (SLD) for the Ice Protection HWG)?

(4) When/if PPIHWG is reactivated, will other related taskings be reactivated?

Discussion items included confusion/disconnect about industry support, authorities' failure to take full advantage of industry resources, clarification/designation of person responsible for writing the closeout report, and form of final report. Mr. Bolt indicated that he would talk further with Mr. Lewis-Smith.

#### **Mechanical Systems HWG**

Pat Waters provided a status report (*handout 11* [PDF](#)). Highlights of his presentation included:

<b>Section</b>	<b>Discussion/Action</b>
25.831(g)	<p>--WG having difficulty designing a single point humidity condition, especially since air conditioning is lost</p> <p>--No major issues; technical team is making sound progress</p> <p>--Expect to have report to TAE no later than August</p>
25.841(a)	<p>--Team has made good progress and has reached agreement or consensus on most issues</p> <p>--Removed wheel and rim failures since there is no rim failure; did not remove tire failure</p> <p>--Need PPIHWG model for engine debris hole size. China Lake model was mentioned, but it would be too late to run for the working group's June 23 meeting</p> <p>--TAE has action to develop plan so that PPIHWG can work on model independent of moratorium</p>

Mr. Waters expressed concern that the JAA and FAA rules and policies are not harmonized and that medical community representation is sparse. There is some concern about support from the CAMI representative. Mr. Waters said that he expects to have at least one dissenting opinion.

**Ice Protection HWG**

Jim Hoppins, reporting by telephone, presented the status report (*handout 12* [PPT](#))

Highlights of Mr. Hoppins' presentation included the following:

<b>Section</b>	<b>Discussion/Action</b>
25.1419	--Received letter from FAA accepting recommendation

	<p>package</p> <p>--TSO has not been addressed; request is with Aircraft Certification for decision on whether to pursue</p>
<p>SLD, 25X1420</p>	<p>--Working group is still working on advisory circular; about 75 percent is completed</p> <p>--Will combine with AC 25.1419-1; reduces redundancies</p> <p>--Working on definitions of Appendix X; expect to have more development</p> <p>--SLD aspects of task 5 will be incorporated into task</p> <p>--Flight Test HWG has drafted statement of work (SOW) with proposed deliverables</p> <p>--Engine HWG has drafted SOW with deliverable date of June 2005</p> <p>--PPIHWG is developing a SOW. The group expects to continue supporting the IPHWG once Mr. Bolt sends specifics on moratorium</p>
<p>25.1419 and Miscellaneous Requirements</p>	<p>--Will not be addressed until technical agreement on § 25X1420-is resolved</p> <p>--CAST activities may affect ARAC activities</p>

Mr. Hoppins indicated that the final report isn't expected to be completed before 2005. Mr. Bolt suggested that if the interim report is coming along fairly well, that the working group might want to submit it earlier; suggestion to be discussed further at next TAE meeting.

**Flight Test HWG**

Bob Park, provided a status report of the working group meeting held to support the IPHWG task 2 (*handout 13 [PPT](#)*) and a copy of the SOW supporting the task as it relates to the flight test aspects of the task (*handout 14 [WORD](#)*). Discussion items included whether there was clear definition of issues in the SOW, the need to have clarification of the intent of § 25.21(g), and how the task

is ranked within the FAA/JAA priorities. Mr. Bolt indicated the SOW from the Engine HWG should be reviewed at the next TAE meeting.

**Avionics HWG**

Clark Badie provided a status report (*handout 15 [PPT](#)*) and the following highlights:

<b>Section/Task</b>	<b>Discussion/Action</b>
25.1322	--Problems defining "warning," "caution", and "advisory"  --Expect to see lots of industry comment  --No expectation of dissenting position  --Ready to be submitted to TAE
Advisory Circular Joint to 25.1322	--Near Completion  --Plan to submit to TAE July 2003
25.1309 and 25.1329	With FAA and JAA representatives; expect to be completed July 2003
AC 25-11 and ACJ 25-11	--Plan to submit to TAE after next working group meeting  --May need to coordinate with Human Factors and Powerplant HWGs  --Plan to complete by January 2005

**Review of February 2003 Meeting Minutes**

TAE members provided revisions to meeting minutes. Corrected copy of minutes will be sent to Mr. Bolt for distribution to members.

#### Human Factors HWG

Curt Graeber provided a status report (*handout 16 [PPT](#)*). He indicated that the working group continues to draft a general applicability rule. The test pilot community believes a new rule is needed. The draft rule ties to existing rules, and the working group is refining clarity in methods of compliance and usability by industry and regulators. Issues include the lack of JAA test pilot participation since the first of the year; Bombardier has not participated for three or more meetings and has not commented on any electronic drafts; and Honeywell's participation has been reduced to one representative. Mr. Graeber indicated that both the schedule and scope are ambitious. The group lacks people who are experienced in the certification process.. Also, extra meetings may need to be scheduled to meet the December 2003 deadline for a finalized report. TAE members requested the working group to review the proposed rule and guidance material for clarity and report back to the TAE.

Mr. Sulocki indicated that he would have a draft rule by the end of June. The JAA is willing to accept updates at least until September and may be beyond that date.

Discussion items included expectation for § 25X1302 compliance, level of risk, JAA policy, whether industry would be able to meet requirements of rule, type of system that would be improved by draft rule, concern about JAA's policy, and qualification of members. TAE members requested the working group to review the draft rule.

#### Design for Security HWG

Mark Allen distributed a status report (*handout 17 [PPT](#)*) and summarized the working group activities and projects that have been finalized. He also summarized the working group's reaction to why TAE rejected the Ease of Search project. Mr. Allen indicated that he met with Boeing to determine common items for agreement. The FAA and industry are at odds--industry thinks ease of search task should be optional, whereas the FAA wants areas closed off. The FAA wanted specific design approaches incorporated into an advisory circular. Industry, on the other hand, is concerned that advisory circular material would become required. As a result, the working group is at an impasse with

industry, including Boeing and Bombardier, and the authorities. Mr. Kaszycki requested that the working group explain by July 7 why industry wants a reduced scope and why some parts of the task are acceptable and others are not. He indicated that the FAA would take what the working group provides and go forward with a proposed rule.

**General Structures HWG**

Andy Kasowski, reporting by telephone, provided a status report (*handout 18 PPT*). He indicated no meetings were scheduled for the working group because it had no new tasks and the remaining issues could be handled by e-mail or teleconference. He provided the following highlights:

<b>Section</b>	<b>Discussion/Action</b>
25.365(d)/AC 25-20	<p>--Working group reached tentative technical agreement at the meeting; however the JAA member had to table the proposed agreement until he got the concurrence of two other JAA members</p> <p>--The JAA found problems with two specific issues: (coefficient discharge in AC 25-20 and altitude above added requirement)</p> <p>--Working group is being asked to approve its report in July so that it can be submitted to TAE in August</p>
25.571	<p>--Review of fast track report resulted in minor revision</p> <p>-- FAA management supports the working group's decision</p> <p>--Report is in review; plan to submit to TAE in July</p>
25.603	<p>--The working group will take some of the ACJ material and insert it into Advisory Circular 20-107T</p> <p>--Draft in circulation with working group; expect to have to TAE by July</p>
25.621	<p>--With FAA tech writer</p> <p>--Draft NPA completed (some differences with what working group proposes; some things will be incorporated</p>

25.631	<p>--Working group at an impasse; harmonization cannot be obtained within working group</p> <p>--Each party is to draft an issue paper</p> <p>--Document will be submitted to TAE as an unharmonized report at the end of July</p>
25.683	<p>--Submitted to TAE in March for approval</p> <p>--No additional advisory material needed based on original equipment manufacturers' compliance with JAA; no economic impact</p> <p>--Members approved unanimously to forward report to FAA</p>
25.963(e)	<p>--Submitted to TAE for approval in March</p> <p>--Fire resistance not harmonized; recommend retasking to another HWG for fire resistance of fuel tanks</p> <p>--Working group harmonized impact resistance and remain willing and able to address structures part but tasking goes beyond working group expertise</p> <p>--Members approved unanimously to forward report to FAA; transmittal letter will recommend that FAA retask fire resistance of fuel tank to different working group</p>

Mr. Kasowski indicated that the working group wanted to submit a full report. Mr. Kaszycki agreed that the proposed § 25.571 and bird rule should be included in the report. Mr. Bolt recommended that the working group work toward closure by the October TAE meeting.

**Airworthiness Assurance Working Group**

Amos Hoggard distributed a status report and a summary of reports (*handout 19 PDF*) submitted for TAE approval to forward to the FAA. Highlights of the presentation included:



<b>Section/Task</b>	<b>Discussion/Action</b>
Multiple Complex Supplemental Type Certificates (MCSTC)	<p>--Final report submitted for approval</p> <p>--Discussion items included point when STC become complex; interpretation of "change" from minor to major; relationship of STC to significant under the changed product rule (CPR); need to recognize interaction between the MCSTC and CPR; how complex STC would be judged against other STCs; recommendation for certification review; broadening linkage to find STC</p> <p>--Members approved unanimously to forward recommendation to FAA</p>
Widespread Fatigue Damage Bridging Tasks	<p>--Three reports, with a 30-day comment period, will soon be available to working group; expect to get approval at the July 23 working group meeting; expect to submit to TAE after meeting</p> <p>--Submittal of reports will complete last task assigned to working group</p>

Mr. Hoggard indicated that the working group expects to be tasked to harmonize the requirements of the interim rule on aging airplane safety (§ 121.370(a)). Discussion items included the need to include the working group recommendation on the SMT, having the ATA sponsor the working group, and impact of comments to aging aircraft proposal on delay of final rule.

### **Loads and Dynamics HWG**

Mr. Bolt reviewed the status report (*handout 20 [PPT](#)*) submitted by Larry Hanson. Highlights of his report included:

<b>Section</b>	<b>Discussion/Action</b>
25.503	<p>--Some tests accomplished in Atlantic City to address pivoting</p> <p>--Airbus concern was addressed and accepted by</p>

	working group --Package forwarded to Mr. Bolt who forwarded package to FAA
25.865	--Fire protection task group is monitoring test set up and progress

The working group has completed all its taskings but members will be available if further work is necessary through e-mails and telecons.

## **Short Updates**

### Engine HWG

Working group is supporting IPHWG. FAA will check on status of airport bird control recommendation.

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### Electromagnetic Effects HWG

Package is being prepared for FAA coordination. No update on Lightning recommendation.

### Continued Airworthiness WG

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Mr. Kaszycki expressed concern with implementation of AC 39-XX in FAA certification offices. FAA management may allow trial implementation at a few aircraft certification office locations.

### Seat Test

Bill Shultz indicated that, as a result of the Seat Testing HWG recommendation, the FAA drafted AC 25.562-1B, dated December 12, 2002; the AC was made available for public comment on January 2, 2003. Although the official public

comment period closed April 2, 2003, the FAA continues to remain receptive to any additional comments industry and other authorities may wish to offer.

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#### Flight Control HWG

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Larry Schultz indicated that some review had been conducted by the Civil Aviation Authority (CAA). The working group has not formally received any dissenting position. Discussion addressed coordination process for dissenting opinions.

Mr. Sulocki indicated that that the CAA had discussed some dissenting views. The report and dissenting views will be attached and put forward into the EASA inventory. He indicated that it would be premature for the working group to respond to the dissent at this time.

#### Flight Guidance

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Technical and legal concerns in draft notice of proposed rulemaking will be sent to working group for review. FAA legal raised concern that AC language was rulemaking. TAE members were concerned that the proposed § 25.1329 rule should not be used as a worst case icing condition for part 25. The JAA and FAA may have different view in terms used for SLD icing.

#### Electrical Systems HWG

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Nothing new to report

#### **Wrap-Up**

**Action Items:** Mr. Bolt reviewed the Action Items, and indicated that the list would be sent to members electronically.

**Next Meeting:** October 15-16, Aerospace Industries Association of America, Arlington, VA.

**Proposed Future Meeting Schedule:** After discussing whether the number of meetings should be reduced to 2 per year and the number of days to 1, attendees indicated a need to meet 3 times yearly for 1 ½ days. The following scheduled was proposed for 2004

<b>Date</b>	<b>Location</b>
February 10, 11	Washington, DC
June 15,16	Seattle Washington
October 13,14	Washington, DC

The Federal Register published an announcement notice of this meeting on June 3, 2003

### **Approval**

I certify the minutes are accurate.

Craig Bolt

TAEIG – June 16/17, 2003 Action Items

-

1. C. Bolt to send form on meeting group location (as revised) to WG for us.  
– Done
  
2. M. Kaszycki to contact Peter White re: clarification of Static Parts rule versus critical parts task. Does 33.14 apply to static parts? AIA to close with its members.
  
3. C. Bolt to send response to Transport Canada letter on potential taskings re: Swissair accident. – Done
  
4. C. Bolt to send letter to PPIHWG answering questions asked in their report.
  
5. C. Bolt/M. Kaszycki to contact PPIHWG to get engine debris model support for MSHWG.
  
6. DFSWG to document by July 7 positions for ease of search indicating at an impasse. What has been agreed and not agreed and why? – Done
  
7. M. Kaszycki to investigate FAA position on request made at SID meeting to retask AAWG on portion of the Aging Aircraft Interim rule.
  
8. C. Bolt to contact Larry Hanson re: timing for completion of Tech Center fire test work in support of 25.865.

9. Dionne Krebs to reissue link for policy notes.- Done
  
10. Thaddee Sulocki to provide FAA copy of dissenting CAA opinion on 25.671.

**Carryover from October 2002 Meeting**

Effie Upshaw to check status of EHWG recommendation on Airport Bird Control.

**AVIATION RULEMAKING ADVISORY COMMITTEE  
ON  
TRANSPORT AIRPLANE AND ENINGE ISSUES**

Sign-In Sheet

June 17-18, 2003

Name	MEMBER	NONMEMBER	Organization/Affiliation	Telephone No.	Fax No.	E-Mail Address
CRAIG BOLT			ASST CHAIR YAEIG PTW	860-565-9348	860-565-1345	craig.bolt@pw.utc.com
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**AVIATION RULEMAKING ADVISORY COMMITTEE  
ON  
TRANSPORT AIRPLANE AND ENGINE ISSUES**

Sign-In Sheet

June 17-18, 2003

Name	MEMBER	NONMEMBER	Organization/Affiliation	Telephone No.	Fax No.	E-Mail Address
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**Transport Airplane and Engine Issues Group Meeting**  
**Homewood Suites (206-433-8000)**  
**6955 Fort Dent Way**  
**Tukwila, WA 98188**

**DRESS: BUSINESS CASUAL**

**Tuesday, June 17, 2003 - *Call in Number: 425-227-1570, Passcode--5555***

8:30	Call to Order, Reading of the Procedures Statement, Review of Agenda, Meeting Logistics, Review of Action Items, Items of Interest	C. Bolt/M. Kaszycki
9:00	FAA Report	M. Kaszycki
9:15	JAA Report	T. Sulocki
9:30	Transport Canada Report <ul style="list-style-type: none"><li>Letter from TC to TAEIG proposing new tasking as a result of Swissair 111 investigation.</li></ul>	M. Khouzam
9:45	Excom Report	C. Bolt
10:00	-- <b>BREAK</b> --	C. Bolt
	Harmonization Management Team Report	No Report / No Meeting
10:15	ARAC Tasking Priorities Discussion / Moratorium	FAA / TAEIG
11:00	Mechanical Systems HWG Report	P. Waters
11:30	-- <b>LUNCH</b> --	
12:30	Ice Protection HWG Report <ul style="list-style-type: none"><li>Include discussion of EHWG / FTHWG / PPIHWG support</li></ul>	J. Hoppins (J. McRoberts, Bob Park, A. Lewis-Smith)
1:30	Avionics HWG	C. Badie
2:00	-- <b>BREAK</b> --	
2:15	Powerplant Installation HWG <ul style="list-style-type: none"><li>Implementation of moratorium</li></ul>	A. Lewis-Smith
2:45	Human Factors HWG Report	C. Graeber
3:15	Design for Security WG Report <ul style="list-style-type: none"><li>Concur with WG proposal on Ease of Search Task</li></ul>	M. Allen
3:45	-- <b>ADJOURN</b> --	

**Transport Airplane and Engine Issues Group Meeting**  
**Homewood Suites (206-433-8000)**  
**6955 Fort Dent Way**  
**Tukwila, WA 98188**  
(Continued)

**Wednesday, June 18, 2003 - [Call in Number: 425-227-1570](tel:425-227-1570), [Passcode--5555](tel:425-227-1570)**

- |       |                                                                                                                                                                                                                                                                                                                                                                               |                                       |
|-------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|---------------------------------------|
| 8:30  | Call to Order/Review of Minutes from previous meeting                                                                                                                                                                                                                                                                                                                         | C. Bolt/M. Kaszycki                   |
| 9:00  | General Structures HWG Report <ul style="list-style-type: none"><li>• Vote on Fuel Tank Access and Operations Test Packages</li><li>• Implementation of Moratorium</li></ul>                                                                                                                                                                                                  | A. Kasowski /A. Hoggard               |
| 9:45  | Airworthiness Assurance HWG Report <ul style="list-style-type: none"><li>• Vote on Multiple STC Report</li></ul>                                                                                                                                                                                                                                                              | A. Hoggard                            |
| 10:30 | <b>-- BREAK --</b>                                                                                                                                                                                                                                                                                                                                                            |                                       |
| 10:45 | <ul style="list-style-type: none"><li>• Engine HWG</li><li>• Continued Airworthiness WG Status</li><li>• Electromagnetic Effects HWG</li><li>• Flight Test HWG</li><li>• Seat Test HWG</li><li>• Flight Control HWG</li><li>• Flight Guidance HWG</li><li>• System Design and Analysis</li><li>• Electrical Systems HWG Report</li><li>• ETOPS Working Group Status</li></ul> | Written or verbal reports as required |
| 11:15 | Review Action Items / 2004 Meeting Schedule                                                                                                                                                                                                                                                                                                                                   | C. Bolt                               |
| 11:30 | <b>-- ADJOURN --</b>                                                                                                                                                                                                                                                                                                                                                          |                                       |

Legend:

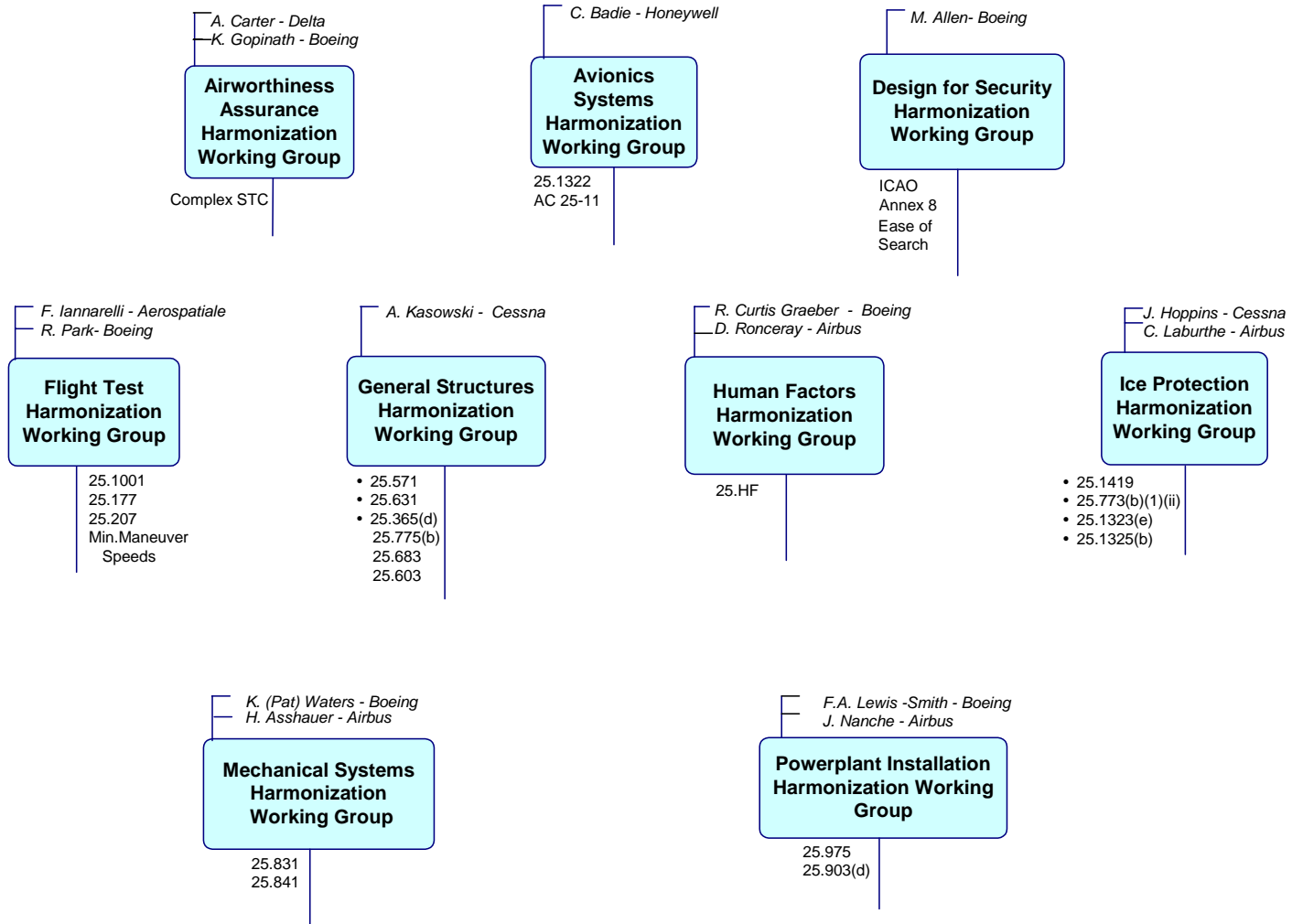
Presently Tasked:

To be Tasked:

## Working Groups Under TAEIG - Open Taskings

FAA Part 21, 25, 33, 35  
JAR 21, 25, E, P, Subpart J

### Transport Airplane and Engine Issues Group



• Indicates SRD items.

# Working Groups Under TAEIG - Completed Taskings

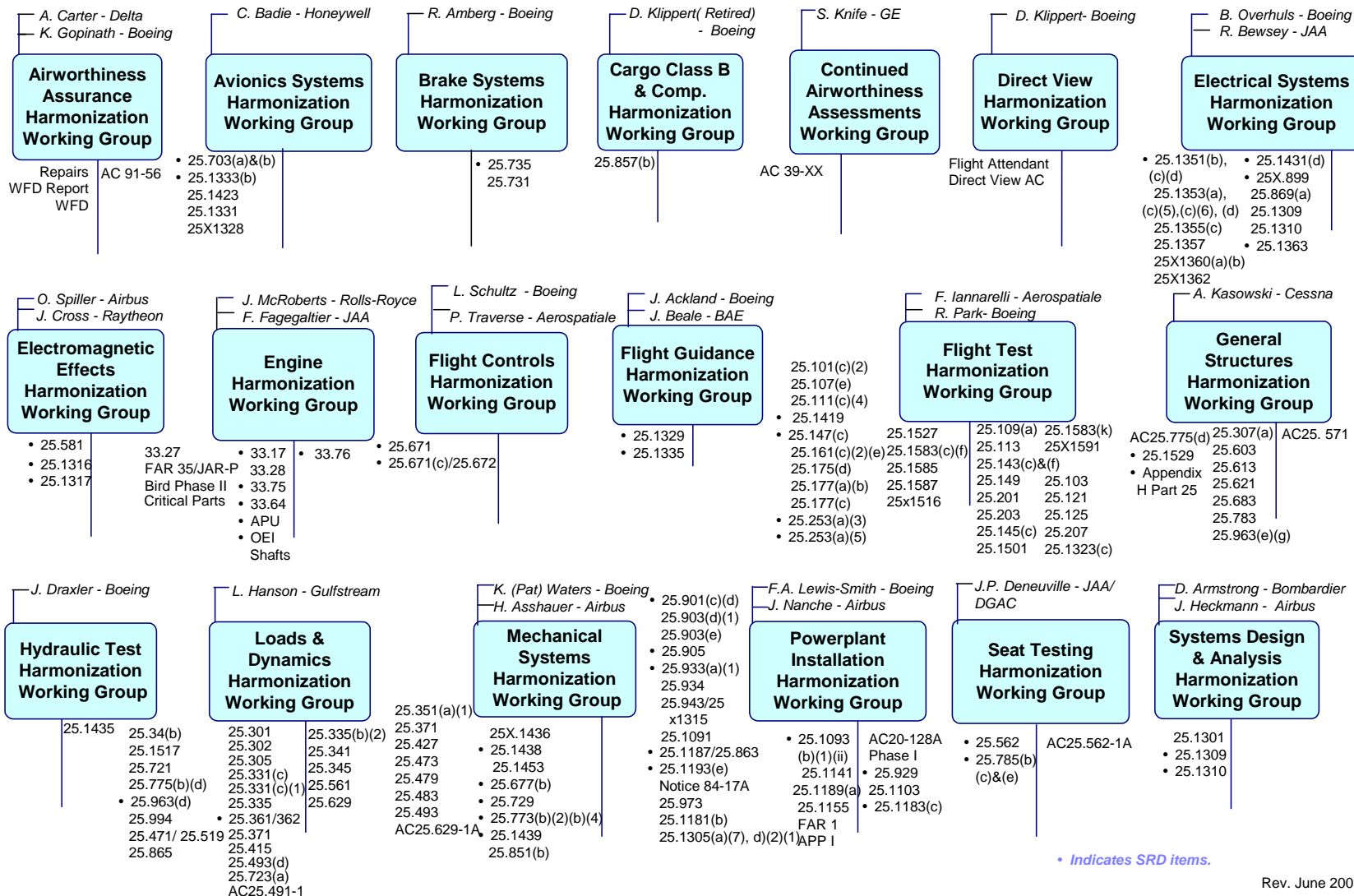
FAA Part 21, 25, 33, 35  
JAR 21, 25, E, P, Subpart J

Legend:

FAA Actions  
Pending

FAA Actions  
Completed

## Transport Airplane and Engine Issues Group



• Indicates SRD items.

## **E-MAIL UPDATE SINCE FEBRUARY 2003 MEETING**

01/27/03 TAEIG Action Item

01/27/03 Updated E-mail List

1/27/03 Updated Agenda for the February Meeting

1/28/03 TAEIG: MSHWG Report to TAEIG

1/28/03 1/28/03 Updated Agenda

1/30/03 Tasking Charts as of January 2003

2/3/03 TAEIG: Ice Protection Harmonization Working Group Status Report

2/3/03 To TAEIG: Please see attached report for Tuesday's meeting

2/4/03 TAEIG: Electronic Transmission of MCSTC Report

2/4/03 TAEIG: FTHWG Status Report

2/4/03 TAEIG: Design for Security Presentation

2/4/03 FW: AAWG Presentations

2/4/03 GSHWG Presentation

2/10/03 TAEIG: APO Benefit Cost Analysis Handbook

2/10/03 TAEIG: PPIHWG Meeting Location

2/11/03 TAEIG: Action Item closure

2/11/03 FW: TAEIG: AVHWG - Draft of 25.1322 for Alerting

2/11/03 TAEIG: GSHWG Report Feb '03

2/12/03 TAEIG: FAA Regulatory Standards Course

2/12/03 TAEIG action item

2/13/03 TAEIG – February 2003 Action Items

2/14/03 FW: TAEIG: FAA Regulatory Standards Course

3/7/03 TAEIG: Revised October 16-17 Meeting Minutes

4/7/03 TAEIG: TOGAA letter- Action item closure

5/12/03 TAEIG: Design for Security Ease of Search Position

5/14/03 TAEIG: Tasking Moratorium for GSHWG and PPHIWG

5/14/03 TAEIG: ARAC recommendations used as basis for ESF/Exemption

5/15/03 TAEIG:GSHWG Reports

5/15/03 TAEIG: regulatory project status for June TAEIG meeting

5/15/03 TAEIG JUNE MEETING

5/19/03 Draft Agenda for June 17 and June 18 ARAC Meeting

5/22/03 Revised Agenda for the June 17-18 TAEIG meeting

6/2/03 June 17/18 TAEIG meeting

6/2/03 TAEIG Meeting Location Change

6/6/03 Federal Register - Meeting Announcement

6/6/03 L&D HWG report for June TAEIG meeting

6/9/03 TAEIG Meeting-Design for Security Report

6/9/03 TAEIG Form for meeting location

6/9/03 Canadian Transportation Safety Board Letter

## Tasks That Are Active Within WG's as of 6/17/03

A task is considered active if:

- There has not been a formal ARAC recommendation  
or
- There has not been a submittal of a proposed NPRM or AC for formal economic or legal review.

- Airworthiness Assurance – 1) WFD Bridging Tasks  
2) Multiple Complex STC's (to be voted on this meeting)

Avionics – 25.1322/AC25-11

Braking Systems – None

Continued Airworthiness Assessment Methodology – None

Cargo Compartment – None

Design for Security – Ease of Search (to be resolved this meeting)

Direct View – None

Electromagnetic Effects - None

Electrical Systems - None

Engine - None

Flight Control - None

Flight Guidance - None

Flight Test – None

*(handout 5)*



Tasks That Are Active Within WG's as of 6/17/03 (continued)

- General Structures -
- 1) 25.365(d) High Altitude Flight – Moratorium planned
  - 2) 25.571(e), 25.631, 755(b) – Bird Strike – Moratorium planned
  - 3) 25.571 Fatigue and Damage Tolerance – Moratorium planned
  - 4) 25.683 Operational Tests – (to be voted on this meeting)
  - 5) 25.603 Material Properties – Moratorium planned
- Human Factors -
- Hydraulic – None
- Ice Protection - Tasks 2 through 7
- Loads and Dynamics - None
- Mechanical Systems -
- 1) 25.831/25.841 Amdt. 25-97 Press./Temp.
- Powerplant Installation -
- 1) 25.903(d) Rotor Burst – Moratorium planned
  - 2) 25.975 Fuel Tank Vent Fire Protector – Moratorium planned
- Systems Design & Analysis- Phase II Pending
- Seat Test - None

*not expected by moratorium*



# June 2003 TAEIG Meeting

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## Topics

- Part 25 Rulemaking Project Status
- Part 25 Non-Rulemaking Project Status
- Background of Rulemaking Prioritization Activities
- HMT Ad Hoc Rulemaking Prioritization Team
- Status of AVR Rulemaking Priorities List
- Future HWG Activities



# June 2003 TAEIG Meeting

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## Part 25 Rulemaking Project Status:

- Final Rules (FR) issued since February 2003:
  - SFAR 92-5 Security Considerations for Flightdeck Doors  
(issued 4/9/03)
  - Lower Deck Service Compartments \* (issued 6/6/03)
- 14 FRs in Headquarters coordination for issuance
- 3 Notices of Proposed Rulemaking (NPRM) in Headquarters coordination for issuance

\* Fast Track Project



# June 2003 TAEIG Meeting

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## Part 25 Non-Rulemaking Project Status:

- Policy/Advisory Material Status (since February 2003):
  - 4 Final Policy Notices were issued:
    - Factors to Consider when Reviewing an Applicant's Proposed Human Factors Methods of Compliance for Flight Deck Certification (2/7/03)
    - SFAR 88 Mandatory Action Decision Criteria (2/25/03)
    - Policy Statement on Exit Bands (4/2/03)
    - Guidance for the Certification of Honeywell Primus EPIC Systems (5/30/03)
  - 2 Notices of Availability of an ARAC Recommendation were issued:
    - Proposed Changes to 14 CFR 25.1329 and Draft Advisory Circular 25.1329 (3/20/03)
    - Proposed Changes to 14 CFR 25.1309 and Draft Advisory Circular 25.1309-1A (4/14/03)



# June 2003 TAEIG Meeting

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## Part 25 Non-Rulemaking Project Status:

- Policy/Advisory Material Status (since February 2003):  
*continued*
  - 8 Notices of Proposed Policy Issued for Comment:
    - Below Deck Class C Cargo Compartment Smoke Penetration (2/7/03)
    - Guidance for Demonstration of System, Hardware, and Software Development Assurance Levels on Transport Category Airplanes (2/13/03)
    - ATC Transponder Operation (2/25/03)
    - Identification of Flight Critical System Components (3/3/03)
    - Testing of Flightcrew Oxygen Masks (3/3/03)
    - No Smoking Placards and Signs (3/9/03)
    - Installation of Transport Category Airplane Flightdeck Liquid Crystal Displays (4/2/03)
    - Interim Policy on Amendment 25-87 Requirements (5/15/03)



# June 2003 TAEIG Meeting

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## **Background of Rulemaking Prioritization Activities:**

- Two prioritization activities were initiated in the 1<sup>st</sup> Qtr of 2002 to develop:
  - FAA/JAA/TCCA Joint Rulemaking Priorities List
  - FAA AVR Rulemaking Priorities List
- The objectives of these prioritization activities were to define rulemaking priorities that:
  - Recognize realistic limitations on authority and industry rulemaking resources
  - Reduce the backlog of rulemaking initiatives
  - Focus resources on critical safety issues prioritized through a data driven process
  - Consider CAST, JSSI, CPS initiatives



## June 2003 TAEIG Meeting

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### **HMT Ad Hoc Rulemaking Prioritization Team:**

- The ad hoc team objectives defined during the November 2002 HMT meeting included:
  - Develop prioritization process
  - Identify lower priority, unfinished ARAC taskings to be placed under a moratorium until prioritization is complete
  - Use draft FAA AVR Rulemaking Priority List to develop a joint FAA/JAA/TCCA rulemaking list
  - Finalize joint rulemaking list for 20<sup>th</sup> Annual JAA/FAA International Conference



# June 2003 TAEIG Meeting

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## **HMT Ad Hoc Rulemaking Prioritization Team:**

*continued*

- FAA committed to a moratorium on low priority ARAC HWG activities until prioritization is completed and implemented
  - FAA/JAA/TCCA agreed on the projects proposed for the moratorium
  - The projects identified included the active taskings for the Powerplant Installations HWG and General Structures HWG
  - The moratorium (and affected projects) was coordinated with the ARAC Transport Airplane and Engines Issues Group
- Industry input on rulemaking prioritization was obtained during March 2003 HMT meeting
  - Input received from GAMA and AIA
  - Identified specific projects of priority to industry
  - Requested that the authorities continue to work unfinished HWP projects with completed recommendations





# June 2003 TAEIG Meeting

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## **HMT Ad Hoc Rulemaking Prioritization Team:**

*continued*

- The Draft Joint Rulemaking List was developed March 5, 2003
  - FAA input based on draft FAA AVR Rulemaking Priorities List
  - JAA input was based on the HWP and JSSI recommendations
  - Considered industry input obtained during March 2003 HMT meeting
  - The Draft List was coordinated with FAA/JAA/TCCA management
- The final Joint FAA/JAA/TCCA Rulemaking List was presented at the 20<sup>th</sup> Annual FAA/JAA International Conference



# June 2003 TAEIG Meeting

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## **HMT Ad Hoc Rulemaking Prioritization Team:**

*continued*

- The Final FAA/JAA/TCCA Rulemaking List contains 26 projects:
  - 23 on-going projects
    - 19 Harmonization Work Program (HWP) projects
      - 6 projects still in HWGs
      - 13 recommendations received from HWG
    - 4 harmonization projects not in HWP
      - All 4 recommendations received from HWG
    - 12 projects were identified by industry as priorities
  - 3 new initiatives
    - Not yet tasked to ARAC



# June 2003 TAEIG Meeting

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## **HMT Ad Hoc Rulemaking Prioritization Team:**

*continued*

- Next steps for the Ad Hoc Team:
  - Determine an appropriate cycle for updating the Joint FAA/JAA/TCCA Rulemaking List
  - Develop a process to address and prioritize “pop-up” rulemaking activities



# June 2003 TAEIG Meeting

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## **Status of AVR Rulemaking Priorities List:**

- AVR rulemaking priority was finalized May 2003
- The list was developed using Expert Choice Software
  - Criteria includes those items identified by HMT Ad Hoc Rulemaking Prioritization Team:
    - supports safety enhancements
    - addresses safety/security concerns
    - implements ICAO standards/NTSB recommendations/etc
    - improves efficiency of certification process
    - addresses new/emerging technology



# June 2003 TAEIG Meeting

## **Status of AVR Rulemaking Priorities List:** *continued*

The AVR Rulemaking Priorities List is divided into 3 parts:

- A-List/Feeder List:
  - 36 top priority (“A”) rulemaking projects
    - 6 TAD projects, 7 HQ projects
  - 39 additional rulemaking projects for the feeder list (“unscheduled” or “B” projects)
    - 19 TAD projects, 4 HQ projects, 4 Engine & Propeller Directorate (E&PD) projects
- Alternative Rulemaking Process List:
  - 15 projects (all TAD projects)
  - SMT is developing Alternative Rulemaking Process
- Do by Other Means List:
  - 46 projects
    - 19 TAD projects, 2 HQ projects, 6 E&PD projects
  - These projects will be implemented through other means such as policy, ESF/Exemptions, etc.



# June 2003 TAEIG Meeting

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## Status of AVR Rulemaking Priorities List: *continued*

- The projects not on the AVR Rulemaking Priorities List will be discontinued.
  - The FAA will untask the related existing ARAC WGs
  - Work accomplished will be documented and archived
- AIR implementation plan of AVR rulemaking priority list is in-work:
  - Align Directorate rulemaking work with priorities
  - Develop Alternative Rulemaking Process
  - Identify appropriate mechanisms for those projects on “Do by Other Means” List



# June 2003 TAEIG Meeting

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## Future HWG Activity:

- The FAA is currently:
  - Implementing the HWG task moratorium
  - Developing AVR Rulemaking Priorities List and FAA/JAA/TCCA Joint Rulemaking List implementation plans
    - Will include plan for tasking new HWG activities
    - Will include plan for untasking and archiving existing low priority HWG activities
- Management support needed from TAEIG member groups to implement results of prioritization activities
  - Communicate to technical community why deactivation of certain initiatives will be necessary

*Regulatory Project Report as  
of 5/14/03*



**Branch Airframe**

AR-00-24	Ground Handling Conditions				
<b>Priority</b>		<b>Status</b>	ARAC WG		
		<b>Engineer</b>	Martin	Haynes	<b>ARACWG</b> LDHWG
<b>Background</b>	Present regulations do not cover multi main gear. Have to write Special Conditions for each large airplane project.				
<b>Work Statement</b>	Update regulations and harmonize				
<b>Output</b>					
<b>Section</b>	25.471-25.519, 25.473, 25.509				
AR-00-57	Flight Loads Validation				
<b>Priority</b>		<b>Status</b>	ENG I		
		<b>Engineer</b>	Martin	<b>ARACWG</b>	LDHWG
<b>Background</b>	Harmonization				
<b>Work Statement</b>	Harmonize advisory materials.				
<b>Output</b>					
<b>Section</b>	25.301				
AR-93-12	Bird Strike				
<b>Priority</b>	FTA/Cat 3	<b>Status</b>	3.0 In ARAC		
		<b>Engineer</b>	Yarges	<b>ARACWG</b>	GSHWG
<b>Background</b>	FAA proposed rulemaking to upgrade bird strike requirements in 1992. Became harmonization effort in 1993.				
<b>Work Statement</b>	Review current FAA/JAA requirements, study bird threat levels, and develop harmonized regulations.				
<b>Output</b>					
<b>Section</b>	25.571, 25.631, 25.775(b)				

AR-93-15 Engine Failure Loads

**Priority** FTA/Cat 2      **Status** 3.8 RPR-RMC  
**Engineer** Martin      **ARACWG** LDHWG

**Background** Modernization. Current rule for "sudden engine stoppage" is inadequate for modern engine designs. Special conditions are required to address this issue on transport airplanes.

**Work Statement** Review FAR and JAR sections 25.361, and ACJ 25.361 and provide a criteria to handle the transient load time history resulting from engine failures.

**Output**

**Section** 25.361(b), 25.362

AR-94-12 Checked Pitch Maneuver

**Priority** FTA/Cat 3      **Status** 5.7a Doc-HQ  
**Engineer** Martin      Haynes      **ARACWG** LDHWG

**Background** Harmonization, Modernization. JAR and FAR have different methods that result in different loads for same condition. FAR and JAR not adequate for fly by wire airplanes. Equivalent safety findings are required on most transport airplanes.

**Work Statement** Review FAR and JAR sections 25.331(c)(2) and provide criteria to account for a checked pitching maneuver that is appropriate for conventional as well as fly-by-wire active controlled airplanes.

**Output**

**Section** 25.331(c)(2)

AR-94-13 Interaction of Systems and Structures

**Priority** FTA/Cat 3      **Status** 3.8 RPR-RMC  
**Engineer** Martin      **ARACWG** LDHWG

**Background** Special conditions. Structural design safety factors need to account for the loads that are caused by system failures, especially for advanced fly-by-wire airplanes. Special conditions are needed on transport airplanes

**Work Statement** Review the existing special conditions on this issue and recommend a general rule for the safety factors associated with the interaction of systems and structures.

**Output**

**Section** 25.1329, 25.302, App New

AR-94-14 Continuous Turbulence Loads

**Priority** FTA/Cat 3      **Status** 5.7a Doc-HQ  
**Engineer** Martin      Haynes      **ARACWG** LDHWG

**Background** Modernization/Safety: The continuous turbulence loads need to be upgraded according to the modern operational environment. Also NTSB recommends a multi-axis gust condition for wing mounted nacelles.

**Work Statement** Review FAR and JAR sections 25.341(b) and provide a criteria to update the continuous gust intensities, methods, and also provide a response to the NTSB recommendation.

**Output**

**Section** 25.341(b) alias 25.305(d)

AR-95-4 Material Strength Properties and Design Values

**Priority** FTA/Cat 3      **Status** ARM  
**Engineer** Yarges      **ARACWG** GSHWG

**Background** Harmonization

**Work Statement** Harmonize FAR/JAR 25.613 and advisory material.

**Output**

**Section** 25.613

AR-95-5 Damage Tolerance and Fatigue

**Priority** FTA/Cat 2      **Status** 3.0 In ARAC  
**Engineer** Yarges      **ARACWG** GSHWG

**Background** Harmonization

**Work Statement** Harmonization FAR/JAR 25.307.

**Output**

**Section** 25.571

AR-95-6 Proof of Structure

**Priority** FTA/Cat 3      **Status** 3.7 RPR-Intdire  
**Engineer** Yarges      **ARACWG** GSHWG

**Background** Harmonization

**Work Statement** Harmonize FAR/JAR 25.307 and advisory material.

**Output**

**Section** 25.307

AR-96-7 Fuselage Doors

**Priority** FTA/Cat 3      **Status** 6.1 FR Framework  
**Engineer** Gardlin      **ARACWG** GSHWG

**Background** Safety: Two back-to-back catastrophic accidents in early 1989 from door failures led to four NTSB recommendations and a special ATA task force study which also provided a list of recommendations.

**Work Statement** Review FAR 25.783 and JAR 25.783 including advisory material and provide recommendations that respond to the NTSB and ATA recommendations.

**Output**

**Section** 25.783

AR-98-20 Flight Control System

**Priority** FTA/Cat 3      **Status** 3.0 In ARAC  
**Engineer** Martin      Stimson      **ARACWG** FCHWG

**Background** Harmonization and NTSB recommendations

**Work Statement** Develop revised rule and advisory material.

**Output**

**Section** 25.671, 25.672

AR-98-23            Structural Integrity of Fuel Tanks

**Priority**    FTA/Cat 3                      **Status**        3.10 Doc-Draft Rvw  
**Engineer**    Martin                              **ARACWG**        LDHWG

**Background**                      Harmonization: Additional phase added to AR 94-14. Both 25.963(d) and 25.721 treat the protection of fuel tanks in a minor crash landing and 25.994 also has requirements for protections of fuel systems in nacelles.

**Work Statement**                      Review the results of the harmonization of FAR and JAR sections 25.963(d) in task AR 94-14 and provide a complete harmonization package for sections 25.963(d), 25.721, and 25.994.

**Output**

**Section**                              25.561, 25.721, 25.963(d), 25.994

AR-98-24            Fire Protection of Structure

**Priority**    FTA/Cat 3                      **Status**        3.0 In ARAC  
**Engineer**    Martin                              Haynes                      **ARACWG**        LDHWG

**Background**                      Harmonization, FAR 1 definitions for fireproof are also undergoing changes and effects this effort.

**Work Statement**                      Review JAR/FAR 1 definitions, FAR/JAR 25.865 and FAA issue papers on this subject. Recommend harmonized changes to 25.865 and prepare appropriate advisory material.

**Output**

**Section**                              25.865

AR-98-33            Casting Factors

**Priority**    FTA/Cat 3                      **Status**        3.7 RPR-Intdire  
**Engineer**    Yarges                              **ARACWG**        GSHWG

**Background**                      Harmonization

**Work Statement**                      Harmonize FAR/JAR 25.261 and advisory material.

**Output**

**Section**                              25.621

AR-99-26 Fuel Tank Access Covers

**Priority** FTA/Cat 3      **Status** 3.4 RPR-Draft  
**Engineer** Yarges      **ARACWG** GSHWG

**Background** Harmonization, FAR has fire resistance requirements; JAR does not.

**Work Statement** Harmonize FAR/JAR 25.963 and AC 25.963-1.

**Output**

**Section** 25.963 (e) (g)

AR-99-47 Materials

**Priority** FTA/Cat 1      **Status** 7.0 Complete  
**Engineer** Yarges      **ARACWG** GSHWG

**Background** Harmonization and technical update

**Work Statement** Update and harmonize guidance material for composite structure.

**Output** Current rules are harmonized (no further action).

**Section** 25.603

AR-99-48 Ops Tests

**Priority** FTA/Cat 1      **Status** 4.2 HWG Rvw  
**Engineer** Yarges      **ARACWG** GSHWG

**Background** Harmonization

**Work Statement** JAA have additional requirements for testing envelope. Adopt JAR as written.

**Output**

**Section** 25.683

AR-99-49 Pressurized Compt Loads (high alt)

**Priority**      **Status** ARAC WG  
**Engineer** Yarges      **ARACWG** GSHWG

**Background** Harmonization

**Work Statement** Harmonize FAR/JAR factors for pressurization loads for operations above 45K and related advisory material.

**Output**

**Section** 25.365(d)(e)

AR-99-66 Design for Security - ICAO

**Priority** **Status** ARAC WG  
**Engineer** Gardlin **ARACWG** DFSHWG

**Background** Implementation of the ICAO amendment 97 rules.

**Work Statement** Implement the proposed requirements into FAR 25 and FAR 121 as appropriate.

**Output**

**Section**

AR-99-67 Aging Aircraft Program: Widespread Fatigue Damage

**Priority** A **Status** ANM100  
**Engineer** Bandley **ARACWG** AAWG

**Background** AAP Task 5 has produced regulatory and advisory material recommendations which require action.

**Work Statement** Develop new requirements for WFD in FAR 25.1529 & App H, FAR 91, 121, 125, 129, and 135.

**Output**

**Section** 121, 129

AR-99-68 Ground Gust Conditions

**Priority** FTA/Cat 3 **Status** 3.8 RPR-RMC  
**Engineer** Martin **ARACWG** LDHWG

**Background** Harmonization: The JAA has moved forward with an NPA that will require the accounting for dynamic loads for control surfaces. A harmonized approach is needed.

**Work Statement** Review FAR/JAR 25.415 and NPA 25C-284 and develop information necessary for a harmonized rule and AC.

**Output**

**Section** 25.415







**Section** 25.810

AR-99-58a Emergency Egress Markings

**Priority** FTA/Cat 1      **Status** 3.9 Doc-Draft  
**Engineer** Claar      **ARACWG** EEIG

**Background** Harmonization

**Work Statement** Harmonize requirements for emergency egress markings.

**Output**

**Section** 25.811

AR-99-59 Lower Deck Service Compartments

**Priority** FTA/Cat 1      **Status** 6.11a FR-HQ coord  
**Engineer** Claar      **ARACWG** EEIG

**Background** Harmonization

**Work Statement** Develop additional requirements for service compartments.

**Output**

**Section** 25.819

AR-99-60 Emergency Exit Access

**Priority** FTA/Cat 3      **Status** 3.3 WG Report to TW  
**Engineer** Claar      **ARACWG** EEIG

**Background** Harmonization

**Work Statement** Develop new requirements for access to Type III exits.

**Output**

**Section** 25.813

FR-00-22 Standards for Private Use Jets TCA

**Priority** **Status** 3.9 Doc-Draft  
**Engineer** Sinclair **ARACWG** TAEIG-NEW

**Background** Continually writing exemptions for private use jets

**Work Statement** Write an SFAR to cover private use jets.

**Output**

**Section** 25

FR-90-1 Misc. cabin safety changes final rule

**Priority** B **Status** 6.7 FR-TAD coord  
**Engineer** Gardlin **ARACWG** FAA

**Background** Address various NTSB recommendations and a number of cabin requirement upgrades.

**Work Statement** Revise Rules.

**Output**

**Section** 25.1447

**Section** 25.809

**Section** 121.333

**Section** 121.310

**Section** 25.812

**Section** 25.855

**Section** 25.813

FR-99-9 Thermal/Acoustic Insulation Blankets

**Priority** A **Status** OST/OMB  
**Engineer** Gardlin **ARACWG** FAA

**Background** Several incidents and one accident support a Tech Center test conclusion that present insulation flammability qual. tests are inadequate.

**Work Statement** Develop threat based rule and detailed qual. test procedures.

**Output**

*Section* 25.853/855/856/apx F

*Section* 91.613, 121.312, 125.113, 135.170

**Branch Electrical Systems**

AR-00-32 Power Supply/Essential Load

**Priority** FTA/Cat 1      **Status** 3.9 Doc-Draft  
**Engineer** Slotte      **ARACWG** ESHWG

**Background** A fast track project. No technical change. Making new 25.1310 out of 25.1309 (e) & (f) to improve awareness of the requirement to define essential loads and the conditions under which those loads must be supplied.

**Work Statement** Harmonize and clarify requirements.

**Output**

**Section** 25.1310, 25.1351(b), (c), (d)

AR-00-33 Electrical appliances and motors

**Priority** FTA/Cat 1      **Status** 3.10 Doc-Draft Rvw  
**Engineer** Slotte      **ARACWG** ESHWG

**Background** A Fast Track Project. Need new requirements for miscellaneous equipment.

**Work Statement** Create new FAR/JAR intended to reduce ambiguity.

**Output**

**Section** 25.1309, 25.1365

AR-93-14 Powerplant Equipment, Systems and Installations/ Safety Assessment (PPI Task 1)

**Priority** FTA/Cat 1      **Status** 3.8 RPR-RMC  
**Engineer** Le      **ARACWG** SDAHWG

**Background** Harmonization: Also anticipate NTSB rec on this subject.

**Work Statement** Develop rule revisions and advisory materials.

**Output**

**Section** 25.1309, 25.901(c), 25.1301

AR-97-2 Automatic Flight Control and Guidance Systems

**Priority** FTA/Cat 3      **Status** 3.8 RPR-RMC  
**Engineer** Bartley      **ARACWG** FGSHWG

**Background** Harmonization and update rule for modern airplanes, also related to an NTSB recommendation

**Work Statement** Develop revised rule.

**Output**

**Section** 25.1329, 25.1335

AR-98-17a Electrical Bonding and Protection Against Lightning

**Priority** FTA/Cat 1      **Status** 4.2 HWG Rvw  
**Engineer** AIR-130 Dimtroff      **ARACWG** EEHWG

**Background** NOT ANM's

**Work Statement**

**Output**

**Section** 25.1316, 23, 27, 29

AR-98-17b HIRF

**Priority** FTA/Cat 2      **Status** 5.4 Doc-Draft Rvw  
**Engineer** AIR130 Dimtroff      **ARACWG** EEHWG

**Background** NOT ANM's

**Work Statement**

**Output**

**Section** 25.1317

AR-98-17c Protection from Lightning Strikes -(Electrical Bonding)

**Priority** FTA/Cat 1      **Status** 5.1 Team Rvw  
**Engineer** Slotte      Dimtroff      **ARACWG** EEHWG

**Background** NOT ANM's

**Work Statement**

**Output**

**Section** 25.581, 25.899, 25.1353(e)

AR-98-26 Electrical Generating System

**Priority** FTA/Cat 1      **Status** 3.9 Doc-Draft  
**Engineer** Slotte/Sadeghi      **ARACWG** ESHWG

**Background** Harmonization

**Work Statement** This is a Fast Track Project to adopt the JAR.

**Output**

**Section** 25.1351(b)

AR-98-26a External Power

**Priority** FTA/Cat 1      **Status** 4.2 HWG Rvw  
**Engineer** Sadeghi      **ARACWG** ESHWG

**Background** FAR and JAR have minor difference.

**Work Statement** This is a Fast Track Project to adopt JAR 25.1351(d).

**Output**

**Section** 25.1351(c)

AR-98-26b Operations w/o normal electrical power

**Priority** FTA/Cat 1      **Status** 3.9 Doc-Draft  
**Engineer** Slotte      **ARACWG** ESHWG

**Background** Harmonization

**Work Statement** This is a Fast Track project to adopt the JAR.

**Output**

**Section** 25.1351(d)

AR-98-28            Takeoff Warning System

**Priority**    FTA/Cat 1                      **Status**    4.2 HWG Rvw  
**Engineer**    K Baker                              **ARACWG**    ASHWG

**Background**                      Harmonization

**Work Statement**                Harmonize JAA/FAA rule, 25.703 to incorporate the most stringent        requirements.

**Output**

**Section**                            25.703(a),(b),(c)

AR-99-16            Cockpit Instrument System

**Priority**    FTA/Cat 1                      **Status**    4.2 HWG Rvw  
**Engineer**    K Baker                              **ARACWG**    ASHWG

**Background**                      Harmonization

**Work Statement**                Harmonize and clarify requirements. Policy statement issued based on an FAA safety recommendation.

**Output**

**Section**                            25.1333(b)

AR-99-22            Electrical Bonding and Protection

**Priority**    FTA/Cat 1                      **Status**    5.1 Team Rvw  
**Engineer**    Slotte                                **ARACWG**    ESHWG

**Background**                      Harmonization: FAR does not have section 25.899.

**Work Statement**                This is a Fast Track Project to adopt the JAR.

**Output**

**Section**                            25X899, 25.581, 25.1353(e), 25.1360(a)





**Section** 25.1357, 25.1363, 25.1365

AR-99-23e Electrical System Test

**Priority** FTA/Cat 1      **Status** 3.10 Doc-Draft Rvw  
**Engineer** Slotte      SEE AR-99-23d **ARACWG**      ESHWG

**Background** Harmonization: JAR is more stringent.

**Work Statement** This is a Fast Track Project to adopt the JAR.

**Output**

**Section** 25.1363, 25.1365, 25.1357

AR-99-23f Design and Installation of Electronic Equipment

**Priority** FTA/Cat 1      **Status** 6.5 FR-RPR  
**Engineer** Sadeghi/Slotte      **ARACWG**      ESHWG

**Background** Harmonization

**Work Statement** This is a Fast Track Project to adopt the JAR.

**Output**

**Section** 25.1431(d)

AR-99-23g Fire Protection of Electrical System

**Priority** FTA/Cat 1      **Status** 6.5 FR-RPR  
**Engineer** Slotte/Sadeghi      **ARACWG**      ESHWG

**Background** Harmonization

**Work Statement** This is a Fast Track Project to adopt the JAR.

**Output**

**Section** 25.869(a)



**Section** 25.1331

AR-99-31 Direction Indicator

**Priority** FTA/Cat 1 **Status** 3.8 RPR-RMC

**Engineer** K Baker **ARACWG** ASHWG

**Background** Harmonization

**Work Statement** Harmonize and clarify rule.

**Output**

**Section** 25.1327, 25.1328

AR-99-32 Warning, caution, and advisory lights

**Priority** **Status** 3.0 In ARAC

**Engineer** K Baker **ARACWG** ASHWG

**Background** Modernization and Harmonization

**Work Statement** Develop rules and advisory material.

**Output**

**Section** 25.1322

**Branch Flight Test**

AR-00-23	Minimum Maneuver Speeds for Flight in Icing Conditions (SFAR)
<b>Priority</b>	<b>Status</b> RPR 2
	<b>Engineer</b> Stimson <b>ARACWG</b> TAEIG-NEW
<b>Background</b>	COMAIR EMB-120 accident occurred during decelerating turn in icing conditions. NTSB concern for operating speeds that provide maneuver capability in icing conditions.
<b>Work Statement</b>	Draft new regulation.
<b>Output</b>	
<b>Section</b>	121
AR-00-34	Mandatory Artificial Stall Warning
<b>Priority</b>	<b>Status</b> TOR
	<b>Engineer</b> Stimson <b>ARACWG</b> TAEIG-NEW
<b>Background</b>	CASA 212 accident attributed, in part, to inadequate aero buffet to provide clear and unmistakable stall warning.
<b>Work Statement</b>	Develop new rule.
<b>Output</b>	
<b>Section</b>	25.207
AR-00-68	Stability
<b>Priority</b>	<b>Status</b> TOR
	<b>Engineer</b> Stimson <b>ARACWG</b> TAEIG-NEW
<b>Background</b>	Harmonization
<b>Work Statement</b>	Harmonize requirements.
<b>Output</b>	
<b>Section</b>	25.177

AR-01-02 Fly By Wire, sidestick, flight envelope

**Priority**

**Status** TOR

**Engineer**

**ARACWG**

TAEIG-NEW

**Background**

**Work Statement**

**Output**

**Section**

25

AR-94-2 Performance and handling qualities in icing (IP 4/FT Task 3)

**Priority**

**Status** APO

**Engineer** Stimson

**ARACWG**

FTHWG

**Background**

Review of regulations identified a need to define standardized requirements for flight in icing conditions.

**Work Statement**

Develop harmonized regulations and policy material for flight in icing conditions.

**Output**

**Section**

25.1419, 25.21(g)

AR-98-32 Harmonization of Airworthiness Standards: Flight Rules (FT Task 4)

**Priority** FTA/Cat 1 & Cat 3

**Status** 5.4 Doc-Draft Rvw

**Engineer** Stimson

**ARACWG**

FTHWG

**Background**

Harmonization

**Work Statement**

Harmonize FAR/JAR requirements for the speed margin between liftoff speed and minimum unstick speed.

**Output**

**Section**

25.107(e)(1)(iv), 25.177(a-d), 25.253(a-3,4,5)

AR-99-25 Harmonization of Airworthiness Standards Flight Rules, Static Lateral-Directional Stability, and Speed Increase and Recovery Characteristics (FT Task 4)

**Priority** FTA/Cat 1 & Cat 3      **Status** 5.7a Doc-HQ  
**Engineer** Stimson      **ARACWG** FTHWG

**Background** Harmonization

**Work Statement** Harmonize requirements for roll control capability from a lateral upset condition at high speeds.

**Output**

**Section** 25.107, 25.177, 25.253(a)(3),(a)(4),(a)(5)

AR-99-28 Airspeed Indicating System

**Priority** FTA/Cat 1      **Status** 7.0 Complete  
**Engineer** Stimson      **ARACWG** FTHWG

**Background** Harmonization

**Work Statement** Harmonize requirements for airspeed indication systems.

**Output** Amdt. 25-109 closed this project.

**Section** 25.1323(c)

AR-99-33 Contaminated Runway (FT Task 7)

**Priority** FTA/Cat 3      **Status** 7.0 Complete  
**Engineer** Stimson      **ARACWG** FTHWG

**Background** Harmonization

**Work Statement** Harmonize requirements for operations on contaminated runways.

**Output**

**Section** 25.1583(k)

**Section** 25.1501

**Section** 25X1591





AR-99-38a Directional Stability (FT Task 7)

**Priority** FTA/Cat 3      **Status** 3.8 RPR-RMC  
**Engineer** Stimson      **ARACWG** FTHWG

**Background** Harmonization

**Work Statement** Harmonize requirements related to the steady sideslip demonstration of static lateral and directional stability.

**Output**

**Section** 25.177(c)

AR-99-46 Fuel Jettisoning System

**Priority**      **Status** TOR  
**Engineer** Stimson      **ARACWG** TAEIG-NEW

**Background** Analysis of takeoff performance on recently certified aircraft indicated that an unsafe condition may result in the event of immediate return to landing.

**Work Statement** Update performance requirements that define when a fuel jettisoning system is needed.

**Output**

**Section** 25.1001

**Branch Human Factors**

AR-99-21 Flight Crew Error/Flight Crew Performance Considerations in the Flight Deck Certification Process

**Priority** B

**Status** ARAC WG

**Engineer** Boyd **ARACWG** HFHWG

**Background** Harmonization: There is no human factors regulation at this time.

**Work Statement** Review existing regulatory materials and develop needed revisions.

**Output**

**Section**

**Branch Mechanical Systems**

AR-00-35 Oxygen Systems

**Priority** FTA/Cat 1                      **Status** 3.10 Doc-Draft Rvw  
**Engineer** Ishimaru                      **ARACWG** MSHWG

**Background** Harmonization

**Work Statement** This is a Fast Track Cat. 1 (enveloping) project.

**Output**

**Section** 25.1453

AR-00-54 Cabin Air Quality Issues

**Priority**                                      **Status** ARM  
**Engineer** Happenny                      **ARACWG** TAEIG-NEW

**Background** Harmonization

**Work Statement** Develop new requirements.

**Output**

**Section** 25.831(a) thru (d), 25.832

AR-00-56 Nose Wheel Steering

**Priority**                                      **Status** RPR 1  
**Engineer** Wahi                              **ARACWG** TAEIG-NEW

**Background** Harmonization

**Work Statement** Review current requirements and advisory material and recommend changes to harmonize FAR and JAR 25X745, and related advisory material.

**Output**

**Section** 25X745





AR-98-27                      Pressurization and Pneumatic Systems

**Priority**      FTA/Cat 1                      **Status**      5.5 Doc-TAD Coord

**Engineer**      Frey                      **ARACWG**      MSHWG

**Background**                      Harmonization

**Work Statement**                      This is a Fast Track Cat. 1 (enveloping) project.

**Output**

**Section**                      25.1438, 25X1436

AR-98-9                      Installation of Ice Detectors (IP Task 1) - Operations in Icing Conditions

**Priority**                      **Status**      5.3L Doc-Legal

**Engineer**      Ishimaru                      Hill                      **ARACWG**      IPHWG

**Background**                      See AR-98-10

**Work Statement**                      1) Develop operations rules that require detection of icing conditions such that the flight crew will know when to turn on or off the ice protection. 2) Develop certification rules to cover detection. (Limited to aircraft under 60k)

**Output**

**Section**                      121

AR-98-9a                      Define An Icing Environment (IP Task 2) - Ice Protection

**Priority**                      **Status**      4 HWG

**Engineer**      Ishimaru                      Hill                      **ARACWG**      IPHWG

**Background**                      ATR 72 accident demonstrated need for improved rules

**Work Statement**                      Develop new rules and AC for both FAR & JAR.

**Output**

**Section**                      25.1419

AR-99-40 Pilot Compartment View

**Priority** FTA/Cat 1      **Status** 5.5 Doc-TAD Coord  
**Engineer** Wahi      **ARACWG** MSHWG

**Background** Harmonization

**Work Statement** This is a Fast Track Cat. 1 (enveloping) project.

**Output**

**Section** 25.773(b)(2), (b)(4)

AR-99-61 Cargo Compartment Fire Extinguishing or Suppression Systems

**Priority** FTA/Cat 3      **Status** 3.6 RPR-TAD Coord  
**Engineer** Happenny      **ARACWG** MSHWG

**Background** Deficiencies in test method need to be addressed.

**Work Statement** Develop technically sound and consistent advisory material.

**Output**

**Section** 25.851(b), 25.855, 25.857

AR-99-62 Amdt 25-87 (high alt)/Pressurization and Humidity

**Priority**      **Status** ARAC WG  
**Engineer** Happenny      **ARACWG** MSHWG

**Background** Harmonization

**Work Statement** Develop new rule and AC.

**Output**

**Section** 25.831, 25.841

AR-99-63 PBE

**Priority** FTA/Cat 1      **Status** 5.10 Comment Period  
**Engineer** Ishimaru Frey      **ARACWG** MSHWG

**Background** Harmonization

**Work Statement** This is a Fast Track Cat. 1 (enveloping) project.

**Output**

**Section** 25.1439

AR-99-64 Trim Systems, Protective Breathing Equipment (PBE)

**Priority** FTA/Cat 1 **Status** 5.10 Comment Period

**Engineer** Frey Ishimaru **ARACWG** MSHWG

**Background** Harmonization

**Work Statement** This is a Fast Track Cat. 1 (enveloping) project.

**Output**

**Section** 25.677(b), 25.1439

AR-99-65 Landing Gear Retracting Mechanisms and Pilot Compartment View

**Priority** FTA/Cat 1 **Status** 5.7a Doc-HQ

**Engineer** Wahi **ARACWG** MSHWG

**Background** Harmonization

**Work Statement** This is a Fast Track Cat. 1 (enveloping) project.

**Output**

**Section** 25.729, 25.773



**Branch Power Plant**

AR-00-36 Thrust or power augmentation system

**Priority** FTA/Cat 1      **Status** 6.9 FR-TAD coord  
**Engineer** McRae      **ARACWG** PPIHWG

**Background** Harmonization: JAR contains requirement not found in FAR. FAA will adopt JAR.

**Work Statement** Develop regulatory material adding new 25.945(b)(5).

**Output**

**Section** 25.945(b)(5), 25.973(d), 25.1181(b),

**Section** 25.1305(a)(7), (d)(2)

AR-00-37 Fuel Filling Points

**Priority** FTA/Cat 1      **Status** 6.1 FR Framework  
**Engineer** McRae      **ARACWG** PPIHWG

**Background** Harmonization: JAR and FAR requirements differ. JAR requirement more appropriate. FAA will adopt JAR.

**Work Statement** Develop regulatory material amending 25.973(d).

**Output**

**Section** 25.973(d)

AR-00-38 Designated Fire Zones

**Priority** FTA/Cat 1      **Status** 6.1 FR Framework  
**Engineer** McRae      **ARACWG** PPIHWG

**Background** Harmonization: JAR contains cross-reference not in FAR and neither contain complete cross-references. Both FAR and JAR being amended.

**Work Statement** Develop regulatory material amending 25.1181(b).

**Output**

**Section** 25.1181(b)

AR-00-39 Powerplant Instruments

**Priority** FTA/Cat 1                      **Status** 6.1 FR Framework  
**Engineer** McRae                      **ARACWG** PPIHWG

**Background** Harmonization: JAR requirement 25.13059(a)&(d)(2) more stringent. FAA to adopt JAR.

**Work Statement** Develop regulatory material amending 25.1305.

**Output**

**Section** 25.1305(a)(7), (d)(2)(i)

AR-00-51a Fuel Vent System Fire Protection

**Priority**                                      **Status** ARAC WG  
**Engineer** Dostert                      **ARACWG** PPIHWG

**Background** Safety and Harmonization.

**Work Statement** Develop rule and advisory material (related to NPRM 84-17A).

**Output**

**Section** 25.975

AR-00-52 Fuel Vent System Fire Protection

**Priority**                                      **Status** ARAC WG  
**Engineer** Dostert                      **ARACWG** PPIHWG

**Background** NPRM issued 1996, ARAC tasked to complete rules. Related to fuel tank explosion TWA, Thai 737 ground fire.

**Work Statement** Issue rule.

**Output**

**Section** 121, 125, 135

AR-00-55 Uncontained Engine Failures

**Priority** **Status** ARM  
**Engineer** Dostert **ARACWG** TAEIG-NEW

**Background** Follow on to Phase I harmonization effort

**Work Statement** Issue revised AC.

**Output**

**Section** 25.903(d)

AR-00-87 Interfaces Airworthiness/Maintenance

**Priority** **Status** On Hold  
**Engineer** McRae **ARACWG** OnHold

**Background** Applies standards for instructions to all systems similar to structures and fuel tanks.

**Work Statement** Issue new rule and AC.

**Output**

**Section** 25.1529

AR-93-13 Thrust Reversing Systems

**Priority** FTA/Cat 3 **Status** 3.9 Doc-Draft  
**Engineer** McRae **ARACWG** PPIHWG

**Background** Resulted from accident/NTSB recommendation

**Work Statement** Provides for regulatory option to exiting rule.

**Output**

**Section** 25.933(a)(1)

AR-96-6	APU installations (PPI Task 2)				
<b>Priority</b>	FTA/Cat 1	<b>Status</b>	5.5 Doc-TAD Coord		
		<b>Engineer</b>	Kammers	McRae	<b>ARACWG</b> PPIHWG
<b>Background</b>	The APU installation requirements are scattered among the engine installation requirements. This arrangement has caused significant standardization problems for years.				
<b>Work Statement</b>	Collect APU installation requirements into one central location and harmonize with JAA.				
<b>Output</b>					
<b>Section</b>	25.901(d)/App K				
AR-98-12	Propeller Deicing and Induction System Ice Protection (IP 4), AC 25.1093				
<b>Priority</b>	FTA/Cat 1	<b>Status</b>	3.10 Doc-Draft Rvw		
		<b>Engineer</b>	McRae	<b>ARACWG</b>	PPIHWG
<b>Background</b>	Harmonization				
<b>Work Statement</b>	Harmonize policy differences.				
<b>Output</b>					
<b>Section</b>	25.1093(b)(1)(ii), 25.929				
AR-98-15	Powerplant Installation Fire Protection Requirements/Fire Mitigation Requirements				(Task 5)
<b>Priority</b>	FTA/Cat 2	<b>Status</b>	7.0 Complete		
		<b>Engineer</b>	McRae	Dostert	<b>ARACWG</b> PPIHWG
<b>Background</b>	Harmonization				
<b>Work Statement</b>	Develop harmonized component protection requirements.				
<b>Output</b>					
<b>Section</b>	25.1183(c)				

AR-98-16      Beta, Reverse Thrust and Propeller Ptch Settings Below the Flight Regime (PPI Task      6)

**Priority**      FTA/Cat 3      **Status**      5.7a Doc-HQ  
**Engineer**      McRae      **ARACWG**      PPIHWG

**Background**      Response to accident and NTSB recommendation.

**Work Statement**      Develop rule and advisory material.

**Output**

**Section**      25.1155

AR-98-25      Powerplant in-flight Restarting

**Priority**      FTA/Cat 3      **Status**      3.3 WG Report to TW  
**Engineer**      Dostert      **ARACWG**      PPIHWG

**Background**      Harmonization. Current regs require restart capability, but do not define flight envelope where it is required. FAA is using Issue Papers in certification projects to impose minimum restart requirements.

**Work Statement**      Revise FAR/JAR to reflect minimum requirements and advisory material developed by an AIA Committee (associated with AA-98-43).

**Output**

**Section**      25.903(e)

AR-98-41      Fire Protection of Engine Cowling

**Priority**      FTA/Cat 3      **Status**      3.9 Doc-Draft  
**Engineer**      McRae      **ARACWG**      PPIHWG

**Background**      Traditional compliance has been in part via equivalent safety. Both JAR and FAR being revised to reflect best practices.

**Work Statement**      Develop regulatory material amending 25.1193(e) and associated advisory material.

**Output**

**Section**      25.1193(e)



AR-99-50            Water Ingestion

**Priority**    FTA/Cat 1            **Status**    3.3 WG Report to TW

**Engineer**    Kaszycki            McRae            **ARACWG**    PPIHWG

**Background**            Harmonization

**Work Statement**        Develop regulation and advisory material.

**Output**

**Section**                25.1091

AR-99-51            Induction System Ducts

**Priority**    FTA/Cat 1            **Status**    7.0 Complete

**Engineer**    McRae                **ARACWG**    PPIHWG

**Background**            COMPLETE

**Work Statement**

**Output**                 No action necessary.

**Section**                25.1103

AR-99-52            ATTCS

**Priority**    FTA/Cat 1            **Status**    3.0 In ARAC

**Engineer**    Pinkstaff            Stimson            **ARACWG**    PPIHWG

**Background**            Harmonization and upgrade requirements to cover today's technology

**Work Statement**        Revise regulations and advisory material

**Output**

**Section**                App. I

AR-99-53            Thrust Reverser Testing

**Priority**    FTA/Cat 1            **Status**    3.3 WG Report to TW

**Engineer**    McRae                **ARACWG**    PPIHWG

**Background**            Harmonization: FAR 25 and JAR 25 identical but refer to FAR 33 and JAR-E (difference is in FAR 33 and JAR-E).

**Work Statement**        Recommend action by ANE.

**Output**

**Section** 25.934

AR-99-55 Powerplant Controls - General

**Priority** FTA/Cat 1      **Status** 6.5 FR-RPR  
**Engineer** McRae      **ARACWG** PPIHWG

**Background** Harmonization and modernization of rule

**Work Statement** Develop harmonized rule.

**Output**

**Section** 25.1141

AR-99-69 Definitions fireproof/fire resistant

**Priority**      **Status** 3.5 RPR-Team Rvw  
**Engineer** McRae      **ARACWG** PPIHWG

**Background** Harmonization and standardization of current practice

**Work Statement** Develop harmonized performance based definition instead of materials based definition.

**Output**

**Section** FAR1/JAR1





) ) )

**TAEIG**

**June 17/18  
2003**

**Renton, WA.**

**Andrew Lewis-Smith**

*Handout 10*

**PPIHWG Report**

**To**

**17/18 June, 2003 Meeting**

**Of**

**TAEIG**

## Current Activities

### PPIHWG met June 2003 in Brighton, UK

- 25.903(d)--- Engine Rotor Burst
- 25.975--- Fuel Vent System Fire Protection
- 25.1305--- Powerplant Indications  
(AIA/AECMA Activity)
  - Joint team with MSHWG to work on 25.841 and 25.903 rotor burst interactions ongoing.
  - Ad hoc team working on SLD icing to support IPHWG.

## Current activities (Cont.)

- 25.903(d)
  - Group are working on documenting the work accomplished to date.
  - Goal is to get report to TAEIG by end of August.

*As a result of only in Brighton*

*Group developed a plan/schedule for  
tech agreement + <sup>associated</sup> recommendations  
Henry Reed*

## Current Activities (Cont.)

- 25.975
- No meetings since June 2001
- SFAR 88 taking specialists time
- When SFAR 88 is complete, PPIHWG can continue if ARAC and FAA decide to do so

*Final report out to TAC by 11/14/2003*

*PPIHWG should continue*

## Current Activities (Cont.)

- 25.1305
- **Team met in Fort Lauderdale, March 25-27, 2003 and in Brighton, June 10-12, 2003.**
- **Good progress being made.**
- **As this is an AIA sanctioned task, this team will continue during the PPIHWG moratorium.**

*AIA Sanctioned Team support*

*next mtg Oct 2003*

## **Future Activities**

- **Due to the Moratorium on PPIHWG activities there are no further meetings planned.**
- **Task teams and PPIHWG will document and deliver to TAEIG the results of the work accomplished to date to enable the tasks to be restarted at a future date when the moratorium is lifted.**



**Ice Protection HWG Status**

Presentation to ARAC TAEIG  
June 17, 2003

6/14/2003/jrh

# Task 1

# IPHWG

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"As a short-term project, consider the need for a regulation that requires installation of ice detectors, aerodynamic performance monitors, or another acceptable means to warn flight crews of ice accumulation on critical surfaces requiring crew action (regardless of whether the icing conditions are inside or outside of Appendix C of 14 CFR Part 25). Also consider the need for a Technical Standard Order for design and/or minimum performance specifications for an ice detector and aerodynamic performance monitors. Develop the appropriate regulation and applicable standards and advisory material if a consensus on the need for such devices is reached."

- ⇒ Proposed Part 121 rule submitted to TAEIG with FAA legal and economic analysis, September 2002
- ⇒ Proposed Part 25 certification rule "fast tracked" in Dec 2000, no further WG actions

# Task 1 Ice Detector TSO

IPHWG

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Proposed Operational and Certification rules address Task 1, except for TSO aspect

- ⇒ "Also consider the need for a Technical Standard Order for design and/or minimum performance specifications for an ice detector and aerodynamic performance monitors. Develop the appropriate regulation and applicable standards and advisory material if a consensus on the need for such devices is reached."

IPHWG recommended working TSO after Task 2

- ⇒ An inquiry has been made to AIR-120 as to whether TSO could be drafted based on existing SAE/EUROCAE specification and submitted to IPHWG for review and comment
- ⇒ **No change**

## Task 2

## IPHWG

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"Review National Transportation Safety Board recommendations A□96□54, A□96□56, and A□96□58, and advances in ice protection state□of□the□art. In light of this review, define an icing environment that includes supercooled large droplets (SLD), and devise requirements to assess the ability of aircraft to safely operate either for the period of time to exit or to operate without restriction in SLD aloft, in SLD at or near the surface, and in mixed phase conditions if such conditions are determined to be more hazardous than the liquid phase icing environment containing supercooled water droplets. Consider the effects of icing requirement changes on 14 CFR part 25 and revise the regulations if necessary. In addition, consider the need for a regulation that requires installation of a means to discriminate between conditions within and outside the certification envelope."

⇒ Removed reference to Part 23 per FAA letter 2/12/02

## Status Task 2

IPHWG

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Concept approved at March '02 TAEIG Meeting

- ⇒ Proposed rule §25.1420 would require unrestricted operation or exit from SLD
- ⇒ Includes definition of Appendix X (SLD envelopes)

March IPHWG Meeting Highlights

- ⇒ Drafting AC Materials for proposed rule (~75%)
  - Combining with AC 25.1419-1 to reduce redundancy
- ⇒ Working Group report for preamble considerations (~40%)
- ⇒ Definitions of Appendix X (~80%)
- ⇒ Planning to incorporate SLD aspects of Task 5 into Task 2 as previously presented
- ⇒ Progress slow

## Status Task 2 (continued)

IPHWG

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Issue of devising "requirements to assess the ability of aircraft to safely operate" requires consideration of more than airframe ice protection

- Letters sent out to FTHWG, PPIHWG & EHWG via TAEIG
- Joint HWG meeting held in January to provide information on SLD
  - ⇒ Representatives/delegates from working groups attended

## Other WG Support of IPHWG Task 2

## IPHWG

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### FTHWG

- Draft SOW completed
- Proposed Deliverables - A report to IPHWG/TAEIG including recommendations for application of 25.21(g) in appendix X
- Proposed Schedule - Sept 2004 for deliverables

### EHWG

- Draft SOW completed - Proposed as sub-group of IPHWG
- Proposed Deliverables - Final report to IPHWG with recommendations that may include rulemaking and guidance development
- Proposed Schedule - June 2005 for summary report

### PPIHWG

- Draft SOW in work
- Schedule - TBD

## **Proposed Plan for Final Product**

## **IPHWG**

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IPHWG completes Task 2 systems aspects and environment definitions as much as possible with current information and moves on to other tasking

- ⇒ Maintain coordination with other HWG's as required on Task 2
- ⇒ IPHWG interim product could be submitted to TAEIG as preliminary, or delayed pending incorporation of final products

When other working group products are received, a review & coordination period to consolidate the IPHWG/other WG products will likely be required

- ⇒ Telecons and/or meeting(s) as required
- ⇒ Other working group products are incorporated in IPHWG report as separate sections or appendices

Complete package is submitted for economic and legal review of entire package (EOY 2005?)



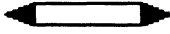
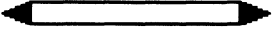

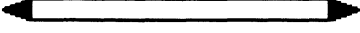
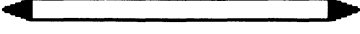
## Task 2 Major Issues

IPHWG

- Addressing large scale aircraft concern over additional certification burden versus actual safety benefit
  - ⇒ Manufacturers written position drafted
  - ⇒ Need written authorities position
- Test requirements in natural SLD
  - ⇒ Manufacturers written position drafted
  - ⇒ Need written authorities position
- Compliance methods (AC materials)
- Exposure intervals and relationship to Appendix C icing
- Certification to variable extents (boundaries)
- Use of a device or visual means for identifying exit conditions
- Need for a "means to discriminate between conditions within and outside the certification envelope"
- Preliminary economic analysis

# IPHWG Schedule

# IPHWG

Task Name	2		2003				2004			
	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4
<b>Task 1 - Warning of Ice Accumulation</b>	<b>Schedule needs review and revision</b> <b>➤ Need to integrate other HWG products</b>									
<b>Task 2 - Large Droplet Environment</b>										
Work Plan to TAEIG (3/9/98)										
TAEIG Approve Work Plan (3/9/98)										
TAEIG Approve Concept										
<b>IPHWG Technical Agreement</b>										
Joint HWG informational meeting										
Input from FTHWG/PPIHWG/EHWG	1/22   1/23 ◇ 3/1									
Complete all IPHWG sub-group activities	3/10   3/14 3/10   3/14									
Resolve scenarios for demonstrating compliance	3/14 □ 6/5 ◇ 6/5									
Working Group review and formal comment of products	6/5 □ 9/3 9/3 □ 10/3									
Final Draft (ready for prelim FAA legal and tech writing)	◇ 10/3 ◇ 11/2									
FAA Legal and Tech Writing										
Working Group reviews final draft										
Final Draft to TAEIG for vote										
TAEIG Approval										
<b>Task 1 - Ice Detector TSO (Parallel with Tasks 4-7)</b>										
<b>Task 3 - Closed, No Action Required</b>										
<b>Task 4 - Harmonize 25.1419</b>										
<b>Task 5 - Windshield, Pitot/Static requirements</b>										
<b>Task 6 - Determine need for AOA IPS requirements</b>										
<b>Task 7 - Advisory Material to be developed as required</b>										
TAEIG '03 Mtgs (Feb 4-5; Jun 17-18; Oct 15-16)	◇      ◇      ◇									
IPHWG '03 Mtgs (Mar 10-14; Jun 23-27; Sept 8-12; Nov 17-21)	◇      ◇      ◇      ◇									

# WG Task Priorities & Schedule

IRHWG

## Priorities

- Task 2
- TSO and Tasks 4-7 will not be addressed until technical agreement is reached on Task 2

## Schedule

- June. 23-27, 2003      Cleveland, OH (NASA)
- Sept. 8-12, 2003      Gatwick (CAA)
- Nov. 17-21, 2003      Spain (INTA)

# FLIGHT TEST HWG STATUS

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PRESENTATION TO ARAC TAEIG

June 17, 2003

# Discussion Topics

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- Current Status
- FTHWG Spinup on Task 2
- TAEIG Request of FTHWG
- Flight Characteristics in Icing Review
- Key Comments for IPHWG
- Updated Statement of Work
- Proposed Meeting Schedule

# Current Status

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- The FTHWG met May 6-8, 2003 in response to the TAEIG request to support IPHWG Task 2.
  - » Members were brought up to speed regarding the IPHWG Task 2 proposals and the SLD Technology Roadmap.
  - » The current FTHWG icing rule and advisory material was reviewed to determine the impact of the SLD proposals.
  - » Some comments were developed for the IPHWG and TAEIG to consider.
  - » The FTHWG Statement of Work (SOW) was updated, along with a proposed meeting schedule.
- Following discussion of the above sub-bullets the FTHWG requests TAEIG approval of the SOW.

# FTHWG Spinup on Task 2

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- Gene Hill (FAA Icing CSTA) from IPHWG gave a detailed presentation on the SLD icing environment including:
  - » Background of IPHWG Task 2
  - » Proposed rule and advisory material changes
  - » SLD meteorological data
  - » SLD technology roadmap
- Eric Duvivier (DGAC) from IPHWG provided the latest draft IPHWG Task 2 rulemaking language.
- The FTHWG Co-chairs discussed the specific TAEIG request and guidelines for the FTHWG activity.

# TAEIG Request of FTHWG

- The IPHWG through the TAEIG has requested coordination on this tasking relative to the flight test aspects of the proposed rulemaking. The specific aspects requiring coordination are the use of the proposed rules for § 25.21(g) relative to the unrestricted flight in SLD conditions. The present concept for unrestricted flight does not require identification or differentiation of the SLD environment from the current Appendix C icing environment. As such, it would appear appropriate to use the same set of airplane performance and handling characteristic standards as proposed under § 25.21(g) relative to Appendix C.
- The second part of the proposed IPHWG rulemaking would allow the optional certification in SLD conditions to be limited to the period required to identify and exit the conditions. The proposed performance and handling characteristic standard for this exit is the “safe return and landing” criterion commonly used in association with system failure conditions. This reduced handling criterion provides a standardized, widely accepted level of safety, yet provides greater certification flexibility for small-scale 14 CFR 25 aircraft.
- The specific action requested of the FTHWG is the consideration of the above-proposed performance and handling standards and to provide concurrence and/or comments.



# Flight Characteristics in Icing Review

- The FTHWG conducted a review of their Icing rule and advisory material, as represented by NPA 25B,E,F-332.
  - » Regulations reviewed included new draft 25.21(g) and FTHWG modifications to 25.103, 25.105, 25.107, 25.111, 25.119, 25.121, 25.123, 25.125, 25.143, 25.207, 25.237, 25.253, 25.1419, and Appendix C.
  - » Advisory material reviewed included new draft ACJ 25.XX (Contains 38 pages of requirements guidance, general MOC, detailed flight test MOC, plus appendices on airframe ice accretion, artificial ice shapes, and airplane design features).
- The FTHWG concluded that significant modifications will be required to much of the above to accommodate SLD.
- The FTHWG also developed additional comments for the IPHWG and TAEIG to consider.

# Comments for IPHWG and TAEIG

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- The FTHWG harmonization of FAR/JAR 25.1419 plus the creation of 25.21(g) was intended to separate the Flight (Subpart B) and Systems (Subpart F) icing requirements. Placing a new SLD Flight requirement in 25.1420 is not consistent with this philosophy. It is recommended that 25.1420 be reworded to be parallel with the FTHWG update to 25.1419, and Subpart B be modified to add a requirement to take Appendix X into account.
- Considering areas of expertise, the FTHWG proposes providing a draft set of modifications to the current Flight Characteristics in Icing rule and advisory material for the IPHWG to consider including in their Task 2 product.

# Comments, Continued

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- It may be that some Flight-related issues that the IPHWG is currently working could be offloaded to the FTHWG.
- It is proposed that a list of IPH/FTH coordination issues and their status be developed and maintained. The FTHWG has several issues and questions from the May meeting to contribute to such a list.
- An FTHWG concern is the lack of experience of authorities and industry with SLD ice shapes. The FTHWG believes work can be promptly started on the Subpart B update, with the proviso that it may be necessary to revisit some aspects based on downstream information resulting from the SLD Technology Roadmap activities.

# Updated Statement of Work

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- **Proposed Work Plan**

- A. Review:

- a. The specific IPHWG request of the FTHWG, the initial FTHWG response, and the initial FTHWG member estimate of the work statement. ✓
- b. The FTHWG Statement of Work and TAEIG instructions. ✓
- c. Relevant IPHWG tasking statement. ✓
- d. The IPHWG draft regulatory and advisory materials including any minority positions. ✓
- e. Summary of the relevant support materials presented at the January 2003 Joint HWG meeting. ✓

# Updated Statement of Work

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- f. Available manufacturers' information regarding airplane performance and handling characteristics degradations in SLD conditions.
  - g. FAA and JAA airworthiness actions taken to address SLD conditions.
- B. Propose revisions to proposed 25.21(g) to include consideration of Appendix X.
- C. Review each requirement established by proposed 25.21(g) considering the options contained in draft 25.1420 (i.e., detect and exit versus unrestricted flight in draft Appendix X). Propose revisions to the requirements and accompanying advisory material as necessary.

# Updated Statement of Work

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- D. Determine if there are any significant information needs or other requirements impacting FTHWG support of this task. If so, the FTHWG Co-chairs will identify these and inform the IPHWG or TAEIG of any information or requirements necessary to complete the task, and will request a schedule for availability.
- E. Follow the work plan and develop a consensus group position plus any alternate positions regarding providing concurrence or comments to the proposed performance and handling standards per the IPHWG/TAEIG request.

# FTHWG Meeting Schedule

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- FTHWG-23      Oct. 7-9, 2003      Seattle
- FTHWG-24      Feb. 3-5, 2004      Europe, TBD
- FTHWG-25      May 4-6, 2004      USA, TBD
- FTHWG-26      July 20-22, 2004      Europe, TBD

# **Statement of Work for the Flight Test Harmonization Working Group (FTHWG) Task to Support IPHWG Task 2**

## **Objective**

The Flight Test Harmonization Working Group (FTHWG) will respond to a request from TAEIG, in support of the following harmonization Task that the Aviation Rulemaking Advisory Committee (ARAC) has accepted from the FAA as published in the Federal Register on December 8, 1997. Primary responsibility for the task was assigned to the Ice Protection Harmonization Working Group (IPHWG). FTHWG support was called for in the Federal Register and has been specifically requested by the IPHWG:

## **Specific Task Assigned to IPHWG**

### IPHWG Task 2

Review National Transportation Safety Board recommendations A-96-54, A-96-56, and A-96-58, and advances in ice protection state-of-the-art. In light of this review, define an icing environment that includes supercooled large droplets (SLD), and devise requirements to assess the ability of aircraft to safely operate either for the period of time to exit or to operate without restriction in SLD aloft, in SLD at or near the surface, and in mixed phase conditions if such conditions are determined to be more hazardous than the liquid phase icing environment containing supercooled water droplets. Consider the effects of icing requirement changes on 14 CFR part 25 and revise the regulations if necessary. In addition, consider the need for a regulation that requires installation of a means to discriminate between conditions within and outside the certification envelope.

## **Specific Request from IPHWG/TAEIG to FTHWG**

The IPHWG through the TAEIG has requested coordination on this tasking relative to the flight test aspects of the proposed rulemaking. The specific aspects requiring coordination are the use of the proposed rules for § 25.21(g) relative to the unrestricted flight in SLD conditions. The present concept for unrestricted flight does not require identification or differentiation of the SLD environment from the current Appendix C icing environment. As such, it would appear appropriate to use the same set of airplane performance and handling characteristic standards as proposed under § 25.21(g) relative to Appendix C.

The second part of the proposed IPHWG rulemaking would allow the optional certification in SLD conditions to be limited to the period required to identify and exit the conditions. The proposed performance and handling characteristic standard for this exit is the “safe return and landing” criterion commonly used in association with system failure conditions. This reduced handling criterion provides a standardized, widely accepted level of safety, yet provides greater certification flexibility for small-scale 14 CFR 25 aircraft.

The specific action requested of the FTHWG is the consideration of the above-proposed performance and handling standards and to provide concurrence and/or comments.



## **Work Methods**

The Flight Test Harmonization Working Group will:

- A. Recommend a Work Plan for completion of the task, including the rationale supporting such a plan, for consideration at the meeting of ARAC to consider Transport Airplane and Engine Issues held following the first meeting of the FTHWG on this task.
- B. Follow the Work Plan approved by TAEIG.
- C. Coordinate with the IPHWG regarding (1) the Work Plan, (2) questions to or requests of the IPHWG, and (3) the FTHWG status and results.
- D. Provide a status report at each meeting of ARAC held to consider Transport Airplane and Engine Issues.
- E. The following items describe the FTHWG work methods:
  - 1. The FTHWG is currently a functioning Working Group under the ARAC Charter.
  - 2. The FTHWG is co-chaired by European and United States Industry members (Franck Iannarelli - Airbus and Robert Park - Boeing).
  - 3. The FTHWG Secretary for this task will be selected by the Co-chairs.
  - 4. FAA and JAA will each provide a designated representative to the FTHWG (Donald Stimson - FAA Transport Airplane Directorate and Graham Weightman - JAA)
  - 5. The FTHWG meetings shall alternate between Europe and the United States/Canada to the greatest practical extent.
  - 6. The group will utilize e-mail to the maximum extent to document and expedite communications.
  - 7. The FTHWG task team for this activity will be made up of members who have an interest and expertise in the areas of airplane performance and handling qualities, airplane aerodynamic performance in icing conditions, icing flight testing, ice protection systems, and other areas of expertise as deemed necessary by the Co-chairs. Meeting support by specialists from the IPHWG and other organizations will be requested as needed.
  - 8. The Co-chairs will rely on the industry organizations and regulatory agencies to provide appropriate specialists to support this task and to conduct the dissemination of information within their organizations. The organizations should also assume the responsibility for ensuring the development of their member's position and providing that information to the designated person.
  - 9. The United States Co-chair shall make periodic progress reports to the TAEIG.
  - 10. The FAA Designated Representative shall assist the United States Co-chair in preparing material in a form for submittal to the IPHWG.
  - 11. The JAA designated representative shall be responsible for coordination with relevant JAA Steering Groups and Committees.

## **Membership**

The members of the FTHWG working the SLD task will be drawn primarily from individuals representing the Regulatory Authorities and various Industry Associations. Individuals may request membership by contacting the Co-chairmen and indicating their qualification and rationale for participation. The initial membership is shown below.

<b>Organization</b>	<b>Representative</b>
AECMA	Franck Iannarelli, Airbus (Co-chair - Europe) Dominique Pilorget - Dassault
AIA	Robert Park, Boeing (Co-chair – US) Rick Trissell, Cessna
AIAC	Norm Ellis, Bombardier - deHavilland Hany Sadek, Bombardier - Canadair
Airbus	Christine Thibaudat
ALPA	Henry Wykoff
Boeing	Thomas Zierten
FAA	Donald Stimson (Designated FAA Rep) Eugene Hill (National Resource Specialist) Joe Brownlee (LAA ACO)
GAMA	Dana Herring, Raytheon Mike Hinson, Bombardier-Learjet
JAA	Graham Weightman, UKCAA (Designated JAA Rep.) Eric Parelou, DGAC
Transport Canada	James Martin

## **Proposed Work Plan**

### A. Review:

- a. The specific IPHWG request of the FTHWG, the initial FTHWG response, and the initial FTHWG member estimate of the work statement.
- b. The FTHWG Statement of Work and TAEIG instructions.
- c. Relevant IPHWG tasking statement.
- d. The IPHWG draft regulatory and advisory materials including any minority positions.
- e. Summary of the relevant support materials presented at the January 2003 Joint HWG meeting.
- f. Available manufacturers' information regarding airplane performance and handling characteristics degradations in SLD conditions.
- g. FAA and JAA airworthiness actions taken to address SLD conditions.

### B. Propose revisions to proposed 25.21(g) to include consideration of Appendix X.

### C. Review each requirement established by proposed 25.21(g) considering the options contained in draft 25.1420 (i.e., detect and exit versus unrestricted flight in draft Appendix X). Propose revisions to the requirements and accompanying advisory material as necessary.

### D. Determine if there are any significant information needs or other requirements impacting FTHWG support of this task. If so, the FTHWG Co-chairs will identify these and inform the IPHWG or TAEIG of any information or requirements necessary to complete the task, and will request a schedule for availability.

### E. Follow the work plan and develop a consensus group position plus any alternate positions regarding providing concurrence or comments to the proposed performance and handling standards per the IPHWG/TAEIG request.

### **Proposed Work Schedule**

The following is a work schedule for this Task to support the Work Plan.

<b>Activity</b>	<b>Date(s)</b>
Publication of Federal Register Notice (IPHWG Task 2)	September 1998
First FTHWG meeting on SLD Task	May 6-8 2003
TAEIG Approve Work Plan	June 2003
Additional WG meetings	See Meeting Schedule
Provide final response to the IPHWG request	September, 2004

### **Proposed Meeting Schedule**

<b>FTHWG MEETINGS</b>	<b>Dates</b>
FTHWG-22 @ Hoofddorp	May 6-8, 2003
FTHWG-23 @ Seattle	October 7-9, 2003
FTHWG-24 (Europe)	February 3-5, 2004
FTHWG-25 (North America)	May 4-6, 2004
FTHWG-26 (Europe)	July 20-22, 2004

# AVHWG Status

RE: Work plan for the harmonization of 25.1322 and AC/AMJ 25-11, Submitted April 2002

- **Task 1 - Review and recommend revisions to § 25.1322**
  - **Status: Revisions complete, ready for TAEIG submittal**
- **Task 2 - Review the existing Advisory Circular Joint (ACJ) 25.1322 and determine if a harmonized AC 25.1322 should be developed**
  - **Status: Draft AC/AMJ nearly complete, ready for TAEIG submittal July 2003**
- **Task 3 - Identify any rules or advisory circulars that may conflict with the revised rule to determine if changes should be developed and address the proposed changes to §§ 25.1309 and 25.1329 that pertain to alerting**
  - **Status: Tasked to FAA and JAA representatives, expect completion July 2003.**

# AVHWG Status

RE: Work plan for the harmonization of 25.1322 and  
AC/AMJ 25-11, Submitted April 2002

- **Task 4 – Recommend revisions to AC 25-11 and ACJ 25-11**
  - **Status: Started April 2003**
  - **Scope of revised 25-11**
  - **Draft outline of revised 25-11**
  - **Coordinating with HF HWG, PP HWG**

# AVHWG Status

## General Comments

- **25.1322 had significant and sometimes difficult issues**
  - **Definitions seem to be the most difficult**
  - **Cooperation and input from team members and their organizations has been exceptional and fundamental to solving these issues**
  - **Expect to see considerable industry comment**
- **Team membership has remained strong despite the economic environment**
  - **Thanks to Airbus for providing Jean-Christophe Albouy as the European Co-Chair**
- **Scope of 25-11 has received considerable enthusiasm, greater participation**
  - **Need to stay well coordinated with HF HWG**
  - **Need to break into sub-teams in order to accomplish the task quickly**
- **Next meetings**
  - **July 2003 in London**
  - **October 2003 in Washington DC**
  - **January 2004 in Phoenix**

# Human Factors HWG

Curt Graeber

Report to the TAEIG

June 17, 2003

Renton, WA



# HF HWG Progress

- Draft rule language continues to evolve
  - General Applicability Rule
  - Emphasis on flight crew error related to design attributes
  - Working with JAA to address HF Interim Policy differences
  - Assessing whether current rules (e.g., 25-771(a), 25-1301(a)) may be sufficient as regulatory basis for same principles in the draft AC/ACJ
- Now reviewing 8<sup>th</sup> draft of proposed AC/ACJ 25-HF
  - Establishing ties to existing rules
  - Working to make guidance on complex issue like automation and integration relevant in a certification context
  - Refining clarity of methods of compliance and usability by industry and regulators
- Organization feedback on Draft 7 to be reported at June meeting
- Test pilot community is engaged in providing feedback
  - FAA, JAA and manufacturers

# JAA Coordination

- Providing draft rule and draft AC/ACJ to JAA by June 30 to demonstrate progress-to-schedule to support JAA/EASA transition
- Drafts are NOT intended for distribution
- Expect further drafts of each will be required after June 30.
- Plan to continue liaison between HF HWG and JAA to support transition

# Coordination with AVHWG

- Top level agreement for partitioning material in AC 25-HF and AC 25-11 (tasked to the AVHWG)
- Negotiating details and exchanging material.

# HF HWG Issues

## Participation:

- No JAA test pilot participation
- Only one JAA representative remaining
- Funding constraints continue to impact industry participation but membership has remained stable and sufficient to accomplish the task.

## Scope:

- Ambitious schedule and scope
- Developing compliance language for certain HF issues is challenging
- Progress satisfactory but will require further drafting before report is finalized by end of 2003
- Extra meetings may be required within current timeline

# Future Meetings

## Next meeting:

- Dates: June 24-27, 2003
- Location: Ottawa, Canada (hosted by T.C.)

## Future meetings:

- Dates: October 6-10, 2003
- Location: Linköping, Sweden (hosted by Saab)

# **Design for Security HWG**

## **Summary Update**

**Transport Airplane and Engine Issues Group**

**Renton, Wa.**

**Mark Allen - Chair**  
**Boeing - Structures**

**June 17 - 18, 2003**

# **ARAC Members**

**Mark Allen - Chair**  
**Boeing - Structures**

**Joel Siqueira**  
**Embraer - Design**

**Jeff Gardlin**  
**FAA - Cabin Safety**  
**& Airframe**

**Dave Melberg**  
**Boeing - Flight Deck**

**Gale Meek**  
**Cessna - Certification**

**Steve Loukusa**  
**Boeing - ECS**

**Captain Peter Reiss**  
**IFALPA / ALPA**

**Ed Kittel**  
**TSA - Explosives**

**Michael Purwins**  
**EADS Airbus**  
**Certification**

**Brian Wall**  
**IATA**  
**Security Services**

**Rory Martin**  
**JAA / CAA**  
**Structures**

**Keith Ayre**  
**Bombardier - Systems**

**Maurizio Molinari**  
**Transport Canada**  
**Structures Engineering**

**Eric Duvivier**  
**JAA / DGAC**  
**Cabin Safety & ECS**

# **Status Summary**

## **Tasks**

## **Status**

### **Final Report**

**Systems Survivability - AC & Rule**

**Flight Deck Intrusion – AC & Rule**

**Penetration Resistance – AC & Rule**

**Cabin Smoke Evacuation - AC & Rule**

**Least Risk Bomb Location - AC & Rule**

**Flight Deck Smoke Protection - AC & Rule**

**Rules / NPRM / Preamble – Except Ease of Search**

**Cargo Compartment Fire Suppression - AC & Rule**

***Complete***

**Ease of Search – Rule & AC**

***End Task  
Or  
Continue***



# Ease of Search

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## Intent

- **Deter Concealment / Promote Discovery**

## Accomplished Through:

- **Tamper Evidence**
- **Near Net-Fit Stowage**
- **Denied Access**
  - **Locks**
  - **Specialty Fasteners**
  - **Hidden Fasteners**
- **Avoiding Hidden Areas**

# Current Situation

## *HWG Proposed 10 Specific Inspection Rules*

### **TAEIG Rejected Proposal With Conditions for Re-Submittal:**

### **HWG Reaction**

- (1) Conduct an Economic (cost/benefit) Analysis
- (2) Provide Specific Examples That Meet Each of the Requirements
- (3) Demonstrate how a Walk-Through by Different Regulatory Authorities Will Achieve Consistent Compliance Findings

- Members Unqualified
- FAA Low Priority
- Members Unqualified
- Generic and all Encompassing Would Satisfy no one
- Numerous Options
- Largely Unattainable
- Leads to Prescriptive Requirements With Limited Flexibility

# Alternative Approach Taken

*Simplified Requirements (seven rules eliminated):*

Life-Preserver Stowage. Life preservers or their storage locations must be designed in a manner such that tampering is evident.

*Accepted*

Toilet bowls. Toilet bowls should not permit the passage of solid objects greater than 2” in diameter. Vacuum waste systems typically satisfy this requirement, although a vacuum waste system with greater than 2” diameter exhaust would not be acceptable.

*Accepted*

Overhead Bins. The areas above overhead bins must be designed with closeout panels to prevent any placed objects in these areas from being hidden from view from the aisle.

*Rejected – Allow checklist and use of mirrors*

Eliminated Rules. Retain as design guidance in AC

*Rejected – Put in SAE type document*

# What Next?

## (TAEIG)

- **Accept Declaration of Impasse**

- HWG Does not View TAEIG Assignment as Workable
- Suspend Design for Security HWG Until NPRM Comment Disposition
- FAA Accepts Recommendations w/o Ease of Search ARAC Tasking

- **Redefine Ease of Search Task Assignment**

- Identify Problematic Rules and Specific Modifications Needed
- Address Operational Issues (Airlines, TSA, FAA, Others)
- Have HWG Rework Details

- **Identify Acceptable Conditions for Reduced FAA Requirements**

- Accept as Proposed
- or
- Advise Revisions Necessary

# Proposed Rules

(e) Interior design to facilitate searches. Design features must be incorporated that will deter concealment or promote discovery of weapons, explosives or other objects from a simple inspection in any area accessible within the airplane cabin. The following areas must be addressed:

- 1. Life preservers or their storage locations must be designed in a manner such that tampering is evident.**

# Proposed Rules

- 2. Toilets must be designed to prevent the passage of solid objects greater than 2.0 inches in diameter.**
- 3. Areas above the overhead bins must be designed to prevent placed objects from being hidden from view in a simple search from the aisle.**
- 4. Crew compartments must be placarded to be secured when not in use or must be designed so that objects can be readily detected, either through simple search or through tamper-evident designs.**

# Proposed Rules

5. Stowage areas, including galleys, closets, overhead bins and miscellaneous compartments must be designed so that objects can be readily detected, either through simple search or tamper-evident designs. Contents of overhead stowage compartments must be visible to a 50<sup>th</sup> percentile male, as defined by Drefus, standing in the aisle.
6. Stowage locations for removable or portable equipment must be designed to near net-fit dimensions, where practicable, or the equipment must lock in place with a specialty fastener.
7. Locks, specialty fasteners or tamper-evident designs must be provided for access doors or panels that are not intended for flight personnel or passenger use.

# Proposed Rules

8. Joints between interior panels must be designed to either preclude the introduction of objects between them or show evidence of tampering.
9. Literature pockets and magazine racks must be designed so that only one hand is needed to reveal the contents for a visual inspection.
10. Removable cushions, without tamper evidence or the need for a specialty tool must be capable of being easily removed and visually inspected.



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# General Structures Harmonization Working Group Report to TAEIG

June 18, 2003

Andrew Kasowski  
Cessna Aircraft Company

# GSHWG Meetings

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- Meetings Since Last Report
  - February 25-26, 2003 in Savannah, Georgia (Gulfstream)
- No Future Meetings Scheduled
  - Additional meetings not warranted based on progress on assigned issues and remaining work effort
  - Lack of new tasks
  - Handle remaining issues by e-mail and/or tele-conference

# General Structures Harmonization Working Group - Current Activities

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- § 25.365(d)/AC25-20 Pressurized Compartment Loads - High Altitude Flight
- § 25.571 Damage Tolerance and Fatigue Evaluation of Structure
- § 25.603 Materials
- § 25.621 Casting Factors
- § 25.631 Birdstrike Damage
- § 25.683 Operation Tests
- § 25.963(e) Fuel Access Panels

# § 25.365(d)/AC 25-20

## High Altitude Flight

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- February 2003 GSHWG Meeting :
  - Technical agreement on revisions to §25.365(d), §25.841(a), paragraph 8 of AC25-20, §25.571(b), and paragraph 7 of AC25.571
- Two Issues Not Acceptable to JAA Member Not Present at February Meeting
  - $C_d$  (Coefficient of Discharge) in AC25-20
  - Altitude above which additional requirements are imposed
- Coordinating with group members by e-mail to reach resolution on these issues
- Working Group Report in Work – Circulation to Group for Review and Approval in July 2003
- Anticipate Submittal to TAEIG by August 2003

# § 25.571 Damage Tolerance

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- February 2003 GSHWG Meeting :
  - Review of Lusaka accident White Paper by Robert Eastin
  - Review of draft Fast Track report resulted in minor revisions
- FAA management review of GSHWG proposal as a result of concerns expressed by TOGAA – FAA management supports GSHWG proposal
- Working Group Report Complete and Circulated for Group Review and Approval
- Anticipate Submittal to TAEIG by July 2003

# § 25.603 Materials

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- Technical Agreement - Adopt NPA25D-256 Changes Into AC20-107 for Composite Materials
  - JAA Advisory Material AMJ 25.603 Change of Composite Materials adopted as new Appendix 3 of AC20-107, only applicable to FAR 25.
  - JAA Advisory Material ACJ 25.603 Section 9 Change of Composite Material adopted as new Section 10 of AC20-107, only applicable to FAR 25.
- Working Group Report Complete and Circulated for Group Review and Approval
- Anticipate Submittal to TAEIG by July 2003

# § 25.621 Casting Factors

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- FAA Tech Writer to Complete NPRM with Final Rule and AC text
- Draft NPA Complete – NPA 25D-272
  - Working differences to NPRM with JAA representatives

# § 25.631 Birdstrike

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- February 2003 GSHWG Meeting :
  - Review of position papers – FAA, JAA, TC, OEM's
  - Agreed harmonization within the group could not be attained
- Working Group Report Complete and Circulated for Group Review and Approval
- Anticipate Submittal to TAEIG by July 2003



# § 25.683 Operational Tests

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- Drafts of Fast Track and Working Group Reports Reviewed and Approved at the February GSHWG Meeting
- Working Group Report Submitted for Approval 3/03
  - Envelope FAR and JAR Requirements
  - No additional Advisory Material needed based on OEM compliance experience with JAA
  - No Economic Impact

# § 25.963(e) Fuel Tank Access Panels

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- Drafts of Fast Track and Working Group Reports Reviewed and Approved at the February GSHWG Meeting
- Working Group Report Submitted for Approval 3/03
  - Harmonized rule and AC material for impact resistance
  - Remain un-harmonized on fire resistance
  - Re-tasking to another HWG for fire resistance of fuel tanks
  - FAA and PPSG background data included

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- Moratorium?

# AAWG Report to TAEIG

June 18, 2003

Airworthiness Assurance Working Group

*handout 19*

# Airworthiness Assurance Working Group

- Membership
- Meetings
- Current Tasks
- Task Reports
- Future Activities

# AAWG Membership

## AAWG Membership

Last Name	First Name	Representing	E-mail Address
Arabi	Mary	Airborne Express	Mary.arabi@airborne.com
Ayers	Andy	Lockheed Martin	andy.k.ayers@lmco.com
Bandley	Brent	FAA	brent.bandley@faa.gov
Bristow	John	JAA (CAA-UK)	john.bristow@srg.caa.co.uk
Carter	Aubrey(Co-Chair)	Delta Air Lines	aubrey.carter@delta-air.com
Cheng	Jason	Northwest Airlines	Jason.cheng@nwa.com
Coile	Mark	UPS	Amx1mac@ups.com
Collier	Don	ATA	dcollier@air-transport.org
Fenwick	Linsay	ALPA	fenwickl@alpa.org
Gaillardon	Jean-Michel	Airbus	jean_michel.gaillardon@airbus.fr
Gopinath	Kyatsandra (Co-Chair)	Boeing	kyatsandra.v.gopinath@boeing.com
Heath	David	Evergreen	david.heath@evergreenaviation.com
Knegt	Martin	Fokker Services	martin.knegt@fokkerservices.storkgroup.com
Lewis	Austin	Airbus (Bae)	austin.lewis@bae.co.uk
Lotterer	Dave	RAA	david.lotterer@dc.sba.com
Martin	Gary	America West	gary.martin@americawest.com
Moses	Joseph	Continental Airlines	jmoses@coair.com
Oberdick	Jon	USAirways	jober@usairways.com
Petrakis	John	FAA	john.petrakis@faa.gov
Demarest,	Harry	American Airlines	Harry.demarest@aa.com
Sesny	Paul	United Airlines	Paul.sesny@ual.com
Sobeck	Fred	FAA	frederick.sobeck@faa.gov
Tedford	Gareth	British Airways	gareth.1.tedford@british-airways.com
Walder	Ray	IATA	walderr@iata.org
Yerger	Mark	FedEx	mdyerger@fedex.com

# Meetings

- The most recent meeting of the AAWG was January 21, 2003
- Member Representatives from the following organizations were in attendance.

Airborne Express

Airbus

Airbus (BAe)

Boeing

British Airways

Continental

Delta

FAA

FedEx

JAA

Northwest

United

UPS

# Meetings Con't

- In addition there were some invited guests to observe the proceedings.
  - JAL
  - Southwest Airlines
  - FAA Technical Center
  - Sandia
- Next Meeting is planned for July 23, 2003, hosted by Delta Airlines in Atlanta.



# Current Tasks

- Multiple Complex Supplemental Type Certificates
  - Tasked - March 22, 2001
  - Status - Final report submitted for Review
- WFD Bridging Tasks
  - Tasked - December 15, 1999
  - Status - ECD July 23, 2003

# Multiple Complex Supplemental Type Certificates

*AAWG Report*

June 18, 2003

# MCSTC Task

- The AAWG has completed the assignment.
- A Final Report has been prepared and submitted for TAEIG Review Last February.
- Principle Conclusions and Recommendations of that report are:

# AAWG - MCSTC Findings

## Principal Conclusions

1. The AAWG found that subsequent to certification and application of an STC to the first airplane, the application of an approved structural STC to another airplane could be made without a conformal review of that airplane's configuration. Without such a review, there is no guarantee that the certified configuration of the structural STC is compatible with the airplane configuration. There may be other STCs, repairs, service bulletins installed and/or Airworthiness Directives in effect on that airplane that might adversely affect the validity of the proposed structural STC or visa versa.

# AAWG - MCSTC Findings

## Principal Conclusions Continued

2. The AAWG found that a new classification of a STC should be introduced known as a Complex Supplemental Type Certificate (CSTC). An STC is considered complex if it:
  - a. Alters the design loads (static and/or fatigue) that affect a significant portion of the airplane structure, and/or
  - b. Causes a change to the approved instructions for continued airworthiness, the Airplane Flight Manual and/or the Weight and Balance Manual.
    - *NOTE: A CSTC may or may not physically modify the airplane structure.*

# AAWG - MCSTC Findings

## Principal Conclusions Continued

3. While the AAWG found that current procedures for certification of an STC are sufficient and do not require modification, there are procedural changes required for STCs classified as CSTCs.
4. The AAWG found that the guidance material defining the responsibility of the STC applicant is lacking in that it did not define the applicant's responsibility for continued airworthiness issues.
5. The AAWG found that the responsibility for configuration control of the airplane is vague and misleading and needs to be strengthened.

# AAWG - MCSTC Findings

## Principal Conclusions Continued

6. Considering the findings, the AAWG concluded that additional Special Certification Reviews should be conducted for situations where multiple CSTCs may have been installed to validate that the continued airworthiness programs have been properly updated.
7. The AAWG found differences in the means JAA and FAA administrate the granting and transferring of STCs. While the differences are cultural in nature, it is deemed that the processes are equivalent in intent.

# AAWG - MCSTC Findings

## Principal Recommendations

- A. The existing STC Limitations and Conditions template should be revised. The current wording implies that it is the installer's responsibility to ensure that the incorporated STC does not introduce any adverse effects on the airplane. It is the recommendation of the AAWG that this responsibility be placed with the Operator/STC holder/Installer. This includes configuration control, STC compatibility with actual airplane, and continued airworthiness in regard to the STC design and application. This will require a new 14 CFR 21 rule with a revision to AC 21-40, new operating rules with an advisory circular (AC), and a change to Order 8110.4b.



# AAWG - MCSTC Findings

## Principal Recommendations Continued

B. Require a special identification of complex STCs, where the installation may result in interaction effects with other STCs. The recommendation would require the determination of a complex STC by applicants for new STCs. This will require a new 14 CFR 21 rule, revision to Order 8110.4b and AC 21-40.

# AAWG - MCSTC Findings

## Principal Recommendations Continued

- C. Establish a set of criteria to consider in evaluating interaction effects amongst complex STCs. This recommendation would require the development of an FAA Order and possibly some advisory material.
- D. Require all STC applicants to provide information within the Instructions for Continued Airworthiness of the regions and areas affected by the proposed STC. This will require a new part 21 rule, possible revision to § 25.1529, Appendix H, revision to AC 21-40 and Order 8110.4b.

# AAWG - MCSTC Findings

## Principal Recommendations Continued

- E. The AAWG further recommends that the FAA conduct a Special Certification Review of those items (listed below) categorically classified as CSTCs to determine any additional maintenance actions required as a result of interactions not considered when the CSTC was installed:
- a. Hush kits,
  - b. Winglets,
  - c. Auxiliary fuel tanks,
  - d. Re-engine,
  - e. Weight increases,
  - f. PAX cargo conversions,
  - g. Reinforced Flight Deck Doors
- F. The AAWG recommends that the FAA and JAA regulations specific to certification and continued airworthiness of STCs and CSTCs be harmonized to the extent possible.

# AAWG MCSTC

- The AAWG-MCSTC is pleased to present the Final Report to the TAEIG For Approval.
- The Report is submitted as a consensus position of the AAWG.

# AAWG MCSTC

- TAEIG Discussion
- TAEIG Acceptance Vote/WG Redirection

**AAWG-RWG  
WFD Bridging Tasks**

**Report to TAEIG**

**June 18, 2003**

# Status Summary

- Work has been completed on all bridging tasks.
- Three final reports are in the process of being reviewed by the AAWG
- It is expected that those reports will be approved at the July 23, 2003 Meeting.
- Following Approval, those reports will be submitted to the TAEIG for review and approval.

# Future Activities

- With the completion of the WFD Bridging Tasks, There will be no active tasks for the AAWG to work.
- The AAWG does expect that the FAA and EASA will provide a tasking in the near future to provide guidance material for industry to fulfill and harmonize the requirements of the Aging Airplane Safety Interim Final Rule, Specifically §121.370a.



Questions?

# L&D HWG Status Report

Larry Hanson, Chairman

**17-18 June 2003 TAEIG Meeting**

# Discussion Items

- Progress since February TAEIG Meeting
  - 25.503 Pivoting
  - FAA Tech Center Testing for 25.865 Fire Protection draft AC
- L&D HWG Status

# L&D HWG Progress Since February 2003 TAEIG Meeting

## 25.503 - Pivoting

- The L&D HWG had an action from the February TAEIG meeting to address a concern raised by Airbus regarding draft material for 25.503 - Pivoting
- Airbus was concerned that pivoting analysis for aircraft with more than two main landing gear struts would be required with the torque links disconnected even if that was not allowed on Airbus aircraft
- The Airbus concern was addressed and accepted by the L&DHWG including all of the Airbus members
- The next two slides present the revised portion of the 25.503 draft rule with the most significant changes in red font.

# L&D HWG Progress Since February 2003 TAEIG Meeting

## **Sec. 25.503 Pivoting.**

(b) For airplanes with more than two main landing gear units, the following rational pivoting maneuvers must be considered:

- (1) Application of symmetrical or unsymmetrical forward thrust to aid pivoting and with or without braking by pilot action on the pedals, and separately,
- (2) Towing at the nose gear at the critical towing angles, no brakes applied. The critical towing angles that must be considered are -
  - (i) Within the physical limitations imposed by hard stops; and
  - (ii) Beyond these physical limitations when the removal of these stops is authorised by the applicant and taking into account the associated operating limitations, if any.

# L&D HWG Progress Since February 2003 TAEIG Meeting

## **Sec. 25.503 Pivoting (continued)**

Added new paragraph (c) containing what was (b)(2) and (3):

(c) For the conditions specified in paragraph (b) of this section, the following assumptions apply:

- (1) The airplane is assumed to be in static equilibrium, with the loads being applied at the ground contact points.
- (2) The limit vertical load factor must be 1.0, and
  - (i) For wheels with brakes applied, the coefficient of friction must be 0.8.
  - (ii) For wheels with brakes not applied, the ground tire reactions must be based on reliable tire data.

# L&D HWG Progress Since February 2003 TAEIG Meeting

## 25.503 - Pivoting (Continued)

- The revised file <GroundLoads-Final-R4.doc> was sent to Craig Bolt on 27 March
- The revised file was submitted to the FAA by Craig Bolt via letter dated 30 May along with the ground loads WG report and the other reports for Landing Descent Velocity and Towing that were approved at the February 2003 TAEIG meeting

# L&D HWG Progress Since February 2003 TAEIG Meeting

## **FAA Tech Center Testing for 25.865 Fire Protection Draft AC**

- The fire protection task group is monitoring the test set up and progress
- Several testing issues regarding materials, thermocouple installation, and calibration of the oil burner have been resolved
- Testing of the reference steel bar was recently completed
  - The results show that the either larger diameter bars must be used or the heat application time must be reduced in order to avoid excessive material temperatures
  - The task group is evaluating the best way forward



# L&D HWG Status

- All currently assigned tasks have been submitted to TAEIG
- The HWG has no additional meetings planned
- The HWG will continue to monitor and contribute to the progress of our tasks through the NPA and NPRM process via email and telecons as needed
- The HWG will continue to monitor and contribute to the FAA Tech Center fire test of materials in support of the draft AC for 25.865 that was previously submitted to TAEIG

227-1570, Passcode: 5555. Details are also available on the ARAC calendar at <http://www1.faa.gov/avr/arm/arac/aracalendar.cfm>.

To ensure that sufficient telephone lines are available, please notify the person listed in the **FOR FURTHER INFORMATION CONTACT** section of your intent by June 12. Callers outside the Renton, Washington area will be responsible for paying long distance charges.

The public must make arrangements by June 12 to present oral statements at the meeting. Written statements may be presented to the committee at any time by providing 25 copies to the Assistant Executive Director for Transport Airplane and Engine issues or by providing copies at the meeting. Copies of the documents to be presented to ARAC for decision or as recommendations to the FAA may be made available by contacting the person listed under the heading **FOR FURTHER INFORMATION CONTACT**.

If you are in need of assistance or require a reasonable accommodation for the meeting or meeting documents, please contact the person listed under the heading **FOR FURTHER INFORMATION CONTACT**. Sign and oral interpretation, as well as a listening device, can be made available if requested 10 calendar days before the meeting.

Issued in Washington, DC on May 28, 2003.

**Florence L. Hamn,**

*Acting Director, Office of Rulemaking.*

[FR Doc. 03-13901 Filed 6-2-03; 8:45 am]

**BILLING CODE 4910-13-P**

## DEPARTMENT OF TRANSPORTATION

### Federal Highway Administration

#### Draft Environmental Impact Statement Draft Section 4(f) Evaluation: Montgomery & Prince George's Counties, MD

**AGENCY:** Federal Highway Administration (FHWA), DOT.

**ACTION:** Notice of intent.

**SUMMARY:** The FHWA is issuing this notice to advise the public that a Draft Environmental Impact Statement (EIS)/Draft Section 4(f) Evaluation will be prepared for a proposed transportation project in Montgomery and Prince George's Counties, Maryland.

**FOR FURTHER INFORMATION CONTACT:** Nelson J. Castellanos, Division Administrator, Federal Highway Administration, The Rotunda—Suite 220, 711 West 40th Street, Baltimore,

Maryland 21211, Telephone: (410) 962-4440.

**SUPPLEMENTARY INFORMATION:** The FHWA, in cooperation with the Maryland Department of Transportation and the Maryland State Highway Administration is preparing a Draft EIS/Draft Section 4(f) Evaluation for the proposed Intercounty Connector (ICC) transportation improvement project. The U.S. Army Corps of Engineers and the U.S. Environmental Protection Agency will be invited to participate as cooperating agencies. The proposed ICC project is intended to provide a multi-modal highway between I-270 in Montgomery County and I-95/US 1 in Prince George's County, Maryland, a distance of about 18 miles. The project has been designated a high priority project for expedited agency reviews under Executive Order 13274, Environmental Stewardship and Transportation Infrastructure Project Reviews.

Project studies pursuant to the National Environmental Policy Act (NEPA) concerning the ICC project were most recently conducted in the early to late-1990s resulting in the completion of a Draft EIS/Draft Section 4(f) Evaluation in 1997. Study alternatives were presented at four Location/Design Public Hearings in May and June 1997. The State of Maryland put the ICC project on hold shortly after the hearings.

The ICC project will involve the consideration of a reasonable range of alternatives that address the project goals. Consistent with NEPA, a full range of multi-modal highway alternatives will be considered, ranging from a No-Action Alternative to a limited access roadway on new location.

Letters describing the proposed action and soliciting comments will be sent to appropriate Federal, State and local agencies, private organizations and citizens who have previously expressed or are known to have an interest in this project. Public information Meetings are tentatively scheduled for Summer 2003 with a Location/Design Public Hearing tentatively scheduled for late Fall/early Winter 2004. Public notice will be given of the time and place for the Public Information Meetings, Location/Design Public Hearing and other public meetings as they occur.

The Draft EIS/Draft Section 4(f) Evaluation will be available for public and agency review and comment prior to the public hearing. Several scoping meetings for the public, agencies, and Metropolitan Washington Council of Governments will be conducted prior to publication of the Draft EIS/Draft

Section 4(f) Evaluation. Informational meetings and public outreach will be conducted throughout the project.

Comments and suggestions are invited from all interested parties to ensure that the full range of issues related to this proposed action are identified and addressed. Comments or questions concerning these proposed actions and the proposed Draft EIS/Draft Section 4(f) Evaluation should be directed to the FHWA at the address provided previously.

(Catalog of Federal Domestic Assistance Program Number 20.205, Highway Research, Planning and Construction. The regulations implementing Executive Order 12372 regarding intergovernmental consultation of Federal Programs and activities apply to this program)

Issued on: May 27, 2003.

**Nelson J. Castellanos,**

*Division Administrator, Baltimore, Maryland.*

[FR Doc. 03-13794 Filed 6-2-03; 8:45 am]

**BILLING CODE 4910-22-M**

## DEPARTMENT OF TRANSPORTATION

### National Highway Traffic Safety Administration

#### Child Passenger Protection Education Grants

**AGENCY:** National Highway Traffic Safety Administration, DOT.

**ACTION:** Announcement of grants for child passenger protection education.

**SUMMARY:** The National Highway Traffic Safety Administration (NHTSA) announces a grant program under Section 2003(b) of the Transportation Equity Act for the 21st Century (TEA-21) to implement child passenger protection programs that are designed to prevent deaths and injuries to children, educate the public concerning the proper installation of child restraints, and train child passenger safety personnel concerning child restraint use. This notice solicits applications from the States, the District of Columbia, Puerto Rico, the U.S. Territories and the Indian Tribes through the Secretary of the Interior. **DATES:** Applications must be received by the office designated below on or before July 9, 2003.

**ADDRESSES:** Applications must be submitted to the appropriate National Highway Traffic Safety Administration Regional Administrator.

**FOR FURTHER INFORMATION CONTACT:** For program issues contact Ms. Judy A. Hammond, Office of Injury Control Operations and Resources, NTI-200, NHTSA, 400 Seventh Street, SW.,