

DEPARTMENT OF THE AIR FORCE HEADQUARTERS 412TH TEST WING (AFMC) EDWARDS AIR FORCE BASE CALIFORNIA

EDWARDSAFBI99-103_EDWARDSAFBGM2023-01

30 MAY 2023

MEMORANDUM FOR 412 TW

FROM: 412 TW/CC

195 E Popson Ave

Edwards AFB CA 93524-6843

SUBJECT: Edwards Air Force Base Guidance Memorandum to Edwards Air Force Base Instruction 99-103, 412 TW Technical Report Program

By Order of the Installation Commander, this Edwards Air Force Base Guidance Memorandum is issued to immediately implement changes to Edwards Air Force Base Instruction (EAFBI) 99-103. Compliance with this Memorandum is mandatory. To the extent its directions are inconsistent with other Edwards Air Force Base publications, the information herein prevails, in accordance with AFI 33-360, *Publications and Forms Management*.

This Guidance Memorandum implements a new 412 TW reporting product: the Capability Report (CR). The CR provides timely, final, decision-quality test and evaluation results and conclusions to managers in the System Program Office, the Director of Operational Test and Evaluation, the Program Executive Officer, the Deputy Assistant Secretary of Defense for Developmental Test and Evaluation, and the Defense Acquisition Board. Accordingly, the scope of the CR is intended to address broad, multi-discipline, mission-level capabilities and limitations of the weapon system. "Timely" means delivering the CR by the customer need date. This Guidance Memorandum also implements several other changes and clarifications to EAFBI 99-103, as detailed in the Attachment.

This Guidance Memorandum expires after one year has elapsed from the issue date, or upon rewrite of EAFBI 99-103, whichever is earlier.

MATTHEW W. HIGER Brigadier General, USAF Commander

Attachment: Guidance Changes

Attachment

Guidance Changes

The below changes to EDWARDSAFBI 99-103, dated 28 August 2013, are effective immediately.

- 2.1. The overriding policy at 412 TW is to provide the SPO and other stakeholders with correct, value-added technical information based on an independent evaluation as soon as practical and as economically as possible. Technical reports will be accomplished for all USAF tests for which the 412 TW is ETO, unless specifically exempted by the 412 TW Technical Director (412 TW/CT) as documented in the statement of capability or in cases where the 412 TW has no technical involvement as determined by the 412 TW Technical Director. Technical reports may also be issued when a 412 TW organization is a participating test organization (PTO) and for which the ETO or SPO requests a 412 TW analysis or evaluation. The nominal timeline for report delivery is the customer-agreed delivery date or, in the event of no customer need date, 30 working days after the last data are received. Reporting plans that deliver final reports more than 45 working days after receipt of last data must be approved by 412 TW/CT.
- 2.3.4. Preliminary report of results (PRR) is a quick-reaction report to transmit principal test and evaluation findings to the customer in management terms from a management perspective. These documents are short and do not contain large amounts of substantiating data. A PRR should not be planned as the supporting documentation for acquisition decisions. A PRR can be planned to support incremental development recommendations between major test phases of a project. PRRs must be submitted to DTIC and therefore are potentially available to qualified requesters from government and industry. All PRRs comply with the coordination processes specified in this Instruction as well as format and preparation guidelines specified in the 412TW-TIH-22-02, *Test Report Author's Guide*.
- 2.3.6. Technical report (TR) is the 412 TW's final report at the end of a test project that formally documents the 412 TW's position on a test item. The TR may also be used as an interim report when more testing and/or analysis are anticipated at a later date but the SPO wants a partial answer immediately. The TR may be any length and usually contains substantiating data. Final TRs must be submitted to DTIC and therefore are potentially available to qualified requesters from government and industry. All TRs comply with the format and coordination processes specified in this Instruction and 412TW-TIH-22-02.
- 2.3.7. Capability Report (CR) provides the comprehensive top level overall weapon system capability DT&E results to support timely programmatic decisions. It is intended to address the overall results in the context of combat capability, with the respective consequences of the results on the required capabilities. The CR highlights combat capabilities and limitations while providing final, decision-quality information to managers in the SPO, OT&E, the Program Executive Officer (PEO), the DASD (DT&E), and the Defense Acquisition Board (DAB). All conclusions and recommendations are substantiated by final data. All CRs comply with the format and coordination processes specified in this Instruction and 412TW-TIH-22-02.

- 3.2.5. Ensure guidance and best practices are updated, clearly communicated, and made available to all personnel involved in the reporting process.
- 3.3.2. Develop and maintain a training program for the technical reporting process. Provide training for personnel who are involved in the technical reporting process.
- 3.4.4.3. Mentor discipline engineers on their technical reporting roles and responsibilities.
- 3.4.4.7. Be responsible for maintaining the report production schedule and timely progress of the analysis and report.
- 3.4.4.10. Review, approve and sign the report for coordination/approval up the chain.
- 3.8.1.3. The CTF Director will sign the technical report or delegate it to the CTF Chief Engineer.
- 3.8.1.4. Ensure that CTF personnel perform their technical reporting duties.
- 3.8.2.2. Work with the RIPT co-lead, CTF project manager, CTF lead engineers, and SPO to develop a customer-agreed delivery date, reporting requirements, schedules, and resource estimates for inclusion in the SOC.
- 3.8.2.2.1. If the final report delivery date is planned to be more than 45 working days after the receipt of last data, the Chief Engineer must coordinate the date with the engineering home office (412 TENG or 412 EWG) and get final approval from the technical director (412 TW/CT).
- 3.8.2.3.3. Mentor discipline engineers on their technical reporting roles and responsibilities.
- 3.8.2.3.13. Establish and communicate notional signing date following completion of test execution in order to set team and leadership expectations early. Scheduling can occur prior to having the CTF and RIPT signatures in place.
- 3.8.5.3. Be responsible for maintaining report timelines as established in the project schedule as well as its accuracy and quality from inception through approval and distribution.
- 3.8.5.16. Prepare the senior leadership technical report questions and answers that accompany the report.
- 3.8.6.2. Review the program requirements documentation (i.e., TEMP, 412TW-TIH-22-02) and applicable test plan(s), the program security classification guide, and other appropriate TW report guidance.
- 3.8.7.9. Deleted.
- 3.8.8.5. Maintain configuration of generic TR and PRR templates. These templates are based on 412TW-TIH-22-02 and the latest guidance from 412 TW leadership.

3.8.8.7. Initially draft project specific administrative matter and framework for introduction (as defined in 412TW-TIH-22-02) using the project test plan and a generic report template when requested. Coordinate draft with the primary author and lead engineer.

3.8.8.11. Deleted.

Figure 1 Deleted.

- 4.1.1. Identifying Initial Reporting Requirements. Attachment 2 contains a listing of the types of reports published by the 412 TW. The 412th TMG will relay the requirement and scope for project reporting to the SPO during the SOC process as determined by the appropriate CTF chief engineer and respective engineering organization. The details at this point are typically fairly high level and would involve the number, type, and required distribution date for each report. Providing timely TRs to support acquisition decisions is the goal.
- 4.1.3. Finalizing Report Requirements. The primary author, in conjunction with the CTF chief engineer, will work with the SPO to reaffirm the reporting requirements during the test planning phase, prior to test plan approval. Once agreement has been reached with the SPO, the primary author will present the agreed upon format and content to the RIPT co-leads for their concurrence and update the TOC network as required. Reference 412TW-TIH-22-02 for format details.
- 4.1.4. Establishing Milestones. The event that initiates the reporting process is the test plan technical review/approval. The key milestone used to determine the required report delivery date will be established with the SPO to support program acquisition milestones and included in the TOC project schedule (or the agreed-upon project schedule for projects not using TOC). This will normally be based on the date of the last data received. The goal for all report products at the 412 TW is to meet the customer's requirements by providing a report as quickly as practical.
- 4.1.4.3. Progress of the report will be tracked from the time the schedule is approved through distribution.
- 4.2.7. Extensions to Milestones. All reasonable management efforts will be exhausted to ensure meeting the 30 working day timeline and the report distribution due date (CMS), the date promised to the customer in the TOC schedule. In the event of extenuating circumstances, milestones may be changed and a report extension would be considered when the RIPT believes it will miss the CMS. If the report CMS cannot be met, the project manager with the director of projects and RIPT co-leads will coordinate with the SPO to determine if a project rebaseline is required.
- 4.3. Report Coordination and Approval. All 412 TW report products will receive a technical and editorial review. Electronic means should be used to the maximum extent possible.

4.3.1. RIPT Coordination. The RIPT will not release the report for coordination at the coordination meeting until they feel it is a complete and 'quality' document. Maintain approval layers at the essential minimum and conduct parallel review/coordination as much as possible.

4.3.1.3. Deleted

- 4.3.2.1. After the coordination meeting, the primary author and/or technical editor/writer will revise the report and send it to the Technical Publications Office via appropriate channels dependent on report classification.
- 4.3.2.2. Once the report has been prepared for final review and the RIPT has released the coordinated version, final review and approval is accomplished primarily to ensure the report represents a valid, acceptable 412 TW position on the test issues and findings. The approval authority shall be provided the report a minimum of 3 working days prior to the scheduled wing approval meeting. See attachment 2 for the appropriate final approval of each type of report.
- 6.1.2. The TR may be any length, including very short. The format/content is described in 412TW-TIH-22-02.
- 6.2.2. There are two PRR formats, the briefing PRR and the memorandum PRR, as described in 412TW-TIH-22-02.
- 6.3. Capability Report (CR).
- 6.3.1. The CR is intended as a report of top-level weapon system capability and limitations to support timely programmatic decisions. The CR is broad-scoped, multi-discipline, and highlights overall results in the context of combat capability of the integrated system at the mission level.
- 6.3.2. The CR is followed by discipline-specific data packages or TRs as determined necessary by the team.

Attachment 2

TW REPORTING PRODUCTS

Table A2.1. 412 TW Reporting Products.

Type Report	Type Information	Format	Scope/Procedures	Coordination on Review	412 TW Approval Authority	Delivery Deadline
Capability Report (CR)	Timely, final, weapon system capability-level results and conclusions intended to support acquisition decisions	IAW 412TW- TIH-22- 02	Intended as final documentation of weapon system capabilities and limitations. Broad scope, multi-discipline, mission-level, integrated system capabilities. Followed by discipline-specific data packages or TR(s). Submitted to DTIC.	Report IPT, appropriate two-letter, 412 OG, 412 Test Wing Technical Director	412 Test Wing Technical Director*	As mutually agreed by the SPO and CTF chief engineer**
Preliminary Report of Results (PRR)	Intended to be a timely, concise distribution of preliminary results in circumstances where an SPO needs an immediate answer	IAW 412TW- TIH-22- 02	Briefing or memorandum given to decision makers with principal findings and results pertinent to critical management issues. Technical data can be attached as backup material. Not intended to take the place of a formal technical report. Submitted to DTIC.	Report IPT, appropriate two-letter, 412 OG, 412 Test Wing Technical Director (The briefing PRR will be briefed at the report approval meeting.)	412 Test Wing Technical Director*	As mutually agreed by the SPO and CTF chief engineer**

Technical	Final test and	IAW	Intended as final	Report IPT,	412 Test	As
Report	evaluation	412TW-	documentation.	appropriate	Wing	mutually
	results	TIH-22-	Submitted to	two-letter,	Technical	agreed by
		02	DTIC.	412 OG, 412	Director*	the SPO
				Test Wing		and CTF
				Technical		chief
				Director		engineer**

^{*} Or Designee

** In the event of no customer need date, the report is due 30 working days after the last data are received. Must be approved by 412 TW/CT if more than 45 working days after last data are received.

BY ORDER OF THE COMMANDER EDWARDS AIR FORCE BASE

EDWARDS AIR FORCE BASE INSTRUCTION 99-103

29 AUGUST 2013





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COMPLIANCE WITH THIS PUBLICATION IS MANDATORY

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(O. Carter Wilkinson)

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This instruction implements basic requirements for formal reporting on developmental test and evaluation identified in AFI 99103, Capabilities-Based Test and Evaluation. Also, Scientific and Technical Information Office (STINFO) processing procedures are contained in DoD 5230.25-PH, Control of Unclassified Technical Data with Military or Space Application, AFPD 61-2, Management of Scientific and Technical Information, AFI 61-201, The Local Scientific and Technical Information Process, AFI 61202, United States Air Force Technical Publications Program, and AFI 61-204, Disseminating Scientific & Technical Information. This Instruction sets forth policies, procedures, and responsibilities for the development, review, and approval of 412 Test Wing (412 TW) technical reports. This Instruction applies to all 412 TW organizations and associated detachments and units (including Air Force Reserve Command units, the Air National Guard, and the Civil Air Patrol) managing, supporting, or contributing to the 412 TW technical report program. Ensure that all records created as a result of processes prescribed in this publication are maintained in accordance with Air Force Manual (AFMAN) 33-363, Management of Records, and disposed of in accordance with the Air Force Records Information Management System (AFRIMS) Records Disposition Schedule (RDS) located at https://www.my.af.mil/gcss-af61a/afrims/afrims/. Refer recommended changes and questions about this publication to the Office of Primary Responsibility (OPR) using the AF Form 847, Recommendation for Change of Publication; route AF Form 847s from the field through the appropriate functional chain of command. This publication may be supplemented at any level, but all direct supplements must be routed to the OPR of this publication for coordination prior to certification and approval.

SUMMARY OF CHANGES

This document has been revised, including instruction number change, to reflect changes to organizations. This version reflects the changes made as a result of the AFMC 5 Center construct reorganization: the re-designation of the Air Force Flight Test Center (AFFTC), as the Air Force Test Center (AFTC) and identification of the 412 TW as the organization responsible for testing and reporting on developmental testing at Edwards AFB and associated units. Primary changes include removing AFFTC organization references and replacing with 412 TW organization and the removal of options for higher level report approval at the AFTC level. Definition for Test Complete Letters and Safety-of-Flight release letters were added to progress report section. Test Pilot School reporting requirements and responsibilities were added. Minor typographical errors were fixed.

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1. General.

- 1.1. There are three major categories of reports: 1) those intended primarily for Test Enterprise use, such as handbooks and technical information memoranda, 2) technical reports intended primarily for external customers with a secondary use by the Test Enterprise as historical documentation, and 3) Test Pilot School (TPS) Test Management Project (TMP) reports that are primarily produced in support of curriculum requirements but may also be distributed to external customers.
- 1.2. The 412 TW has established a set of standard TR products to provide the primary customer (herein referred to as the System Program Office [SPO]) as well as weapon system users and other stakeholders with value-added, decision-quality technical information as soon as practical and as economically as possible. The purpose and advantage of a standard set of products are to avoid inventing new products and new formats with every new project. These standardized products are designed to satisfy the immediate need for information of decision makers throughout the acquisition community as well as to provide final developmental test and evaluation (DT&E) documentation, as specified in chapters 3 and 7 of AFI 99-103.

1.3. In accordance with AFI 99-103, the responsible test organization (RTO) and SPO mutually establish report schedules in test and evaluation (T&E) plans based on designated milestones and decision reviews. It is not just the SPO that has an interest in 412 TW reports. Other stakeholders, such as AFOTEC, user commands (ACC, AETC, AMC), reserve units, prime contractors, other AFMC test organizations, OSD offices, the AFTC, and other testers and system users have an interest in receiving relevant, high quality technical test and evaluation results from DT&E projects in a timely manner for supporting critical acquisition decisions. The RTO is responsible for timely submission of all reports. However, the time limits specified below are considered the 412 TW's customary and expected practice when designated the RTO. The time limits below support the general reporting policy given in AFI 99-103 that "test reports must be timely, factual, concise, and tailored to the needs of decision makers." It is every 412 TW organization's responsibility to support this policy and prevent delays in report generation. This will require Combined Test Force (CTF) discussions with the SPO to properly schedule analysis and reporting efforts with the same emphasis as is placed on properly scheduling test execution.

2. Policy.

- 2.1. The overriding policy at 412 TW is to provide the SPO and other stakeholders with correct, value-added technical information based on an independent evaluation as soon as practical and as economically as possible. Technical reports will be accomplished for all USAF tests for which the 412 TW is RTO, unless specifically exempted by the 412 TW Technical Director (412 TW/CT) as documented in the statement of capability or in cases where the 412 TW has no technical involvement as determined by the 412 TW Technical Director. Technical reports may also be issued when a 412 TW organization is a participating test organization (PTO) and for which the RTO or SPO requests a 412 TW analysis or evaluation. The nominal timeline for report delivery is within 42 calendar days after final test execution (usually the final flight). Reporting plans that deliver final reports more than 60 days after final execution must be approved by the 412 TW/CT.
- 2.2. The reporting requirements, SPO need date and program milestone(s) supported will be clearly defined in statements of capability (SOC) and subsequent test planning documents. The SOCs will include estimates for resources needed to keep analysis and reporting tasks on schedule.
- 2.3. The selection of reporting products at the 412 TW is specified in this instruction (see attachment 2). Each product is designed to deliver a result to the customer for decision making and risk management. At the conclusion of a test project, a TR, which may include the test results presented in previous reports, is submitted to the customer, Defense Technical Information Center (DTIC), the AFTC History Office (AFTC/HO) and others per the customer approved distribution list. This TR documents the 412 TW's final position, conclusions, and recommendations for a given test.
 - 2.3.1. Deficiency reports (DR) are an action tool to propose enhancements to, or to drive the correction of, a specific deficiency on Air Force materiel. Details on Air Force deficiency documentation are contained in technical order (T.O.) 00-35D-54, *USAF Deficiency Reporting, Investigation, and Resolution*, as well as EAFBI 99-224, *Test Center Deficiency Reporting*.

- 2.3.2. Progress reports (PR) (e.g., quick-looks, daily flight reports, etc.) are periodic assessments of the status of the project and do not replace the requirement for a technical report at project completion. The PR may be accomplished in any format as agreed to between the CTF and the customer.
 - 2.3.2.1. Test Complete Letters (TCL) and Safety-of-Flight Letters (SOFL) both fall in the PR category and are intended to assist in meeting the customers' needs in a timely and consistent manner. Test Complete Letters contain no analysis, subjective assessments, ratings, conclusions and/or recommendations. Safety-of-Flight Letters are released external to the squadron (i.e. release recommendation for training). They are both signed by the applicable squadron commander and coordinated with the 412 OG Commander prior to being sent to the customer.
- 2.3.3. Technical information handbooks (TIH) and technical information memorandums (TIM) are intended primarily for Test Enterprise use to document processes, provide instruction, or archive important technical information for engineering reference. These documents may also be used to document the detailed data or analysis used to substantiate recommendations to system models or flight manual charts. Depending on the intended use, the distribution of these types of documents may be adjusted. These documents will be submitted to DTIC unless specifically exempted by the 412 TW Commander. These documents will also be distributed to the AFTC History Office (AFTC/HO) and 412 TW/CT.
- 2.3.4. Preliminary report of results (PRR) is a quick-reaction report to transmit principal test and evaluation findings to the customer in management terms from a management perspective. These documents are short and do not contain large amounts of substantiating data. PRRs must be submitted to DTIC and therefore are potentially available to qualified requesters from government and industry. All PRRs comply with the coordination processes specified in this Instruction as well as format and preparation guidelines specified in the AFFTC-TIH-09-01, *The Author's Guide to Writing AFFTC Technical Reports*.
- 2.3.5. Recommendation to proceed/not to proceed to Operational Test and Evaluation (OT&E) and Capability Releases are accomplished to inform the SPO of the system's readiness for OT&E or operational capability. These are accomplished in accordance with AFI 99-103 and may be in either PRR or TR format. The 412 TW does not normally unilaterally certify a test item for OT&E. The 412 TW submits these recommendations to the SPO in support of a certification by higher Air Force authority.
- 2.3.6. Technical report (TR) is the 412 TW's final report at the end of a test project that formally documents the 412 TW's position on a test item. The TR may also be used as an interim report when more testing and/or analysis are anticipated at a later date but the SPO wants a partial answer immediately. The TR may be any length and usually contains substantiating data. Final TRs must be submitted to DTIC and therefore are potentially available to qualified requesters from government and industry. All TRs comply with the format and coordination processes specified in this Instruction and AFFTC-TIH-09-01.
- 2.4. System Program Offices will not coordinate on or approve 412 TW reports.

- 2.5. Each project's data analysis, evaluation, and report production status will be briefed to 412 TW leadership at the CTF's PMR meeting and at the Engineering Council meeting as requested.
 - 2.5.1. To support the weekly Engineering Council meeting and the PMR briefing, each CTF will hold periodic internal status meetings to assess each project's progress of data analysis, evaluation, and report production. The chief engineer, all engineering leads, and a lead pilot/crewmember will attend. Report co-leads (functional flight chief or technical expert and the CTF chief engineer), authors (engineers, pilots/crewmembers, and others, as appropriate) and technical editing staff will provide input for these meetings and attend when requested. The status of data analysis, evaluation and report production for each project will be addressed, and schedules and required support will be adjusted as required.

3. Responsibilities.

- 3.1. The overall process of preparing, approving, and publishing reports requires a team effort. The following organizations thus perform an integral role in the process.
- 3.2. The 412th Test Wing (412 TW) will:
 - 3.2.1. Ensure timely coordination and approval.
 - 3.2.2. Ensure the reporting process is included as part of the USAF Test Pilot School curriculum.
 - 3.2.3. Approve reports for publication. (The approval authorities are listed in attachment 2.) For TRs the signature page will include a space for the appropriate two-letter.
 - 3.2.4. Delegate to TPS/CC the authority to establish a report review and publication process that generally follows the principles outlined in this OI for quality control, technical content, and satisfaction of customer and curriculum requirements. This process will be documented in a TPS OI and will specify the level of review and approval for test reports produced in conjunction with the TPS Test Management Project. Reports released under this authority will be designated as USAF TPS Reports and not 412 TW Technical Reports.
- 3.3. The 412th Test Engineering Group (412 TENG) will:
 - 3.3.1. Act as the vested authority to manage the overall process and ensure efficient production. This includes standardizing administrative aspects, such as format, and providing the STINFO functions related to technical reporting, including production of technical reports and tracking their status.
 - 3.3.1.1. Technical editing and report production support will be provided by the Technical Publications Office.
- 3.4. The 412th Test Engineering Group (412 TENG) and 412th Electronic Warfare Group (412 EWG) will:
 - 3.4.1. Be responsible for implementing the technical reporting process.
 - 3.4.2. Assign a functional flight chief or technical expert as co-lead on the RIPT.

- 3.4.3. When a project is being worked from the engineering home office without an established CTF, the flight chief will appoint a primary author and assign members to the RIPT. The flight chief will ensure that the responsibilities normally assigned to the CTF chief engineer and lead engineer are accomplished.
- 3.4.4. Assign technical experts to support TPS Test Management Projects for any report that will be published as a 412TW TR or 412TW TIM.
- 3.4.4.1. RIPT Co-Lead (with CTF Chief Engineer) will:
 - 3.4.4.1.1. Co-chair RIPT meetings.
 - 3.4.4.2. Assign RIPT primary author and members.
 - 3.4.4.3. Provide discipline engineers with training on their technical reporting roles and responsibilities.
 - 3.4.4.4. Ensure that the engineering team is properly staffed to execute the project through report completion.
 - 3.4.4.5. Ensure that basic reporting requirements and detailed data analysis plans are included in test plans.
 - 3.4.4.6. Ensure that appropriate attention is placed on timely data analysis, evaluation, DRs, recommended technical order change requests, and report preparation during test execution.
 - 3.4.4.7. Be responsible for maintaining the report production schedule and timely progress of the analysis and report as well as its accuracy and quality from inception through approval and distribution.
 - 3.4.4.8. Distribute latest 412 TW report production guidance.
 - 3.4.4.9. Periodically inform 412 TW management of report status.
 - 3.4.4.10. Review and approve report for coordination/approval up the chain.
 - 3.4.4.11. Participate in CTF and 412 TW report briefings and approval meetings.
- 3.4.5. The technical review board chair, with the CTF chief engineer, will ensure test plans contain relevant and detailed data analysis plans.
- 3.5. The 412th Operations Group (412 OG) will:
 - 3.5.1. Support the 412 TW/TENG/EWG in the implementation of this instruction.
 - 3.5.2. Assign an operator to the RIPT.
 - 3.5.3. Provide operational (e.g. pilot, load master, etc.) input for deficiency reports, recommended technical order (flight manual) changes, test reports, and other documents, and ensure timely coordination and approval of TRs.
- 3.6. The 412th Maintenance Group (412 MXG) will:
 - 3.6.1. Assign a maintainer/logistics test engineer to the RIPT as appropriate.
 - 3.6.2. Ensure DRs are written in a timely manner IAW T.O. 00-35D-54 and EAFBI 99-224.

- 3.6.3. Ensure timely logistics input for deficiency reports, reliability and maintainability databases, recommended technical order changes, and TRs.
- 3.7. The 412th Test Management Group (412 TMG) will:
 - 3.7.1. Support the 412 TW/TENG/EWG in implementation of this instruction and in accordance with 412 TW OI 99-3, *The Manage Projects Process*.

3.8. CTF

- 3.8.1. The CTF Director will:
 - 3.8.1.1. Be ultimately responsible for test, evaluation, and reporting accomplished by the CTF.
 - 3.8.1.2. Notify 412 TW leadership to determine if a TR is in the best interest of the 412 TW for those programs that the SPO does not request a TR or objects to committing project funds to the reporting task, and if so, obtain approval to produce the report out of 412 TW indirect/overhead funding. In those cases, a formal Theory of Constraints (TOC) network (or other schedule for non-TOC projects) will be established to ensure the deconfliction of reporting resources with other ongoing planning, analysis, evaluation, and reporting efforts, unless waived by the 412 TW/CT.
 - 3.8.1.3. Ensure the following personnel within the CTF perform the following duties:
- 3.8.2. The Chief Engineer will:
 - 3.8.2.1. Be responsible for implementing the CTF technical reporting process.
 - 3.8.2.2. Work with the RIPT co-lead, CTF project manager, the CTF lead engineers, and the SPO to develop reporting requirements, schedules and resource estimates for inclusion in the SOC.
 - 3.8.2.3. The RIPT Co-Lead (with Flight Chief or Technical Expert) will:
 - 3.8.2.3.1. Co-chair RIPT meetings.
 - 3.8.2.3.2. Assign RIPT primary author and members for 412 TENG and 412 EWG, as required.
 - 3.8.2.3.3. Provide discipline engineers with training on their technical reporting roles and responsibilities.
 - 3.8.2.3.4. Ensure that the engineering team is properly staffed to execute the project through report completion.
 - 3.8.2.3.5. Ensure that basic formal reporting requirements and detailed data analysis plans are included in test plans.
 - 3.8.2.3.6. Ensure that appropriate attention is placed on data analysis, evaluation, DRs, and report preparation during test execution.
 - 3.8.2.3.7. Ensure DRs are written in a timely manner IAW T.O. 00-35D-54 and EAFBI 99-224.
 - 3.8.2.3.8. Be responsible for maintaining the report production schedule and

- timely progress of the report as well as its accuracy and quality from inception through approval and distribution.
- 3.8.2.3.9. Distribute latest 412 TW report production guidance.
- 3.8.2.3.10. Periodically inform CTF management of report status.
- 3.8.2.3.11. Approve report for coordination/approval up the chain.
- 3.8.2.3.12. Participate in CTF and 412 TW report briefings and approval meetings.

3.8.3. The Project Manager will:

- 3.8.3.1. Coordinate with RIPT co-leads and authors (engineers, pilots, other) for TOC project schedule report input.
- 3.8.3.2. Coordinate with the CTF chief engineer and the SPO as to the number and timing of reports for a specific project when generating or revising the SOC.
- 3.8.3.3. Obtain primary customer approved report distribution list. Include AFTC/HO and 412 TW/CT on all distribution lists.
- 3.8.3.4. Keep analysis, evaluation, and reporting tasks on track for completion within TW reporting standard.
- 3.8.4. The Lead Engineer(s) will:
 - 3.8.4.1. Be a member of the RIPT.
 - 3.8.4.2. Oversee training and daily tasking of assigned engineers/authors.
 - 3.8.4.3. Recommend and coordinate with RIPT co-leads on assignment of primary and contributing authors.
 - 3.8.4.4. Support project manager for TOC project network report input.
 - 3.8.4.5. Contribute to report template development.
 - 3.8.4.6. Ensure data analyses are completed to support report timelines.
 - 3.8.4.7. Ensure DRs are prepared in a timely manner IAW T.O. 00-35D-54 and EAFBI 99-224.
 - 3.8.4.8. Work with engineering supervisors/flight chiefs and RIPT co-leads to obtain additional personnel as required for report preparation.
 - 3.8.4.9. Assist authors, including developing the outline, reviewing data, reviewing and commenting on drafts, etc.
 - 3.8.4.10. Participate in test and evaluation report meetings.
- 3.8.5. The Primary Author will:
 - 3.8.5.1. Be a member of the RIPT.
 - 3.8.5.2. Be responsible for items listed under section 3.8.6., "All Author(s)".
 - 3.8.5.3. Be responsible for maintaining report timelines as established in the project schedule.

- 3.8.5.4. Notify the lead engineer if there are resource shortfalls during report preparation.
- 3.8.5.5. Coordinate with RIPT co-leads and then schedule RIPT meetings.
- 3.8.5.6. Coordinate with technical writer/editor during preparation of report, as appropriate.
- 3.8.5.7. Distribute report tasks to contributing discipline authors.
- 3.8.5.8. Provide report task status updates for the TOC project schedule.
- 3.8.5.9. Prepare and update the report metric. (When the report is part of a TOC project schedule, the report metric is automatically produced when the author provides task status updates.)
- 3.8.5.10. Prepare the report, with assistance from technical writer/editor, to support RIPT meetings.
- 3.8.5.11. Make changes to the report as agreed upon by the RIPT.
- 3.8.5.12. Prepare the abstract on the SF 298 so that the information in the abstract will not have a limited distribution, when appropriate.
- 3.8.5.13. Brief 412 TW and CTF leadership when a PRR is required, prior to a SPO PRR briefing, along with the project pilot /lead aircrew.
- 3.8.5.14. Sign the report for CTF and 412 TW approval.
- 3.8.5.15. Oversee report publication and distribution.
- 3.8.6. All Authors (Discipline Engineer, Operators, Logistics Test Engineer, as Applicable) will:
 - 3.8.6.1. Be a member of the RIPT.
 - 3.8.6.2. Review the program requirements documentation (i.e., TEMP, AFFTC TIH-09-01) and applicable test plan(s), the program security classification guide, and other appropriate TW report guidance.
 - 3.8.6.3. Conduct data analysis, prepare DRs, and submit recommended technical order changes (using AF Form 847, AFTO Form 27 for preliminary T.O.s, or AFTO Form 22 for approved T.O. changes) in a timely manner.
 - 3.8.6.4. Prepare assigned sections of the report to meet the report timeline.
 - 3.8.6.5. Participate in all RIPT meetings as requested by RIPT co-leads.
 - 3.8.6.6. Incorporate RIPT agreed-upon changes to the assigned report sections within the timeframe allotted.
- 3.8.7. The Test Team Operator Author will:
 - 3.8.7.1. Be a member of the RIPT and be responsible for all items listed under section 3.8.6., "All Authors".
 - 3.8.7.2. Be assigned by the CTF Deputy for Operations.

- 3.8.7.3. Maintain a file of evaluation comments from all aircrew evaluators based on post-flight write-ups.
- 3.8.7.4. Prepare DRs in a timely manner IAW T.O. 00-35D-54 and EAFBI 99-224.
- 3.8.7.5. Provide military utility input.
- 3.8.7.6. Work with the RIPT to integrate military utility input into report.
- 3.8.7.7. Make RIPT agreed-upon changes to military utility paragraphs.
- 3.8.7.8. Brief 412 TW and CTF leadership when a PRR is required, prior to a SPO PRR briefing, along with the primary author.
- 3.8.7.9. Sign the report for CTF and 412 TW approval.
- 3.8.8. The Technical Editing Staff will:
 - 3.8.8.1. Be a member of the RIPT.
 - 3.8.8.2. Brief initial RIPT meeting on duties and responsibilities of the technical editing staff.
 - 3.8.8.3. Perform technical editing in accordance with latest guidance.
 - 3.8.4. Support RIPT review of edited draft.
 - 3.8.8.5. Maintain configuration of generic TR and PRR templates. These templates are based on AFFTC TIH-09-01 and the latest guidance from 412 TW leadership.
 - 3.8.8.6. Distribute the latest 412 TW report production guidance to RIPT co-leads for further distribution.
 - 3.8.8.7. Initially draft project specific administrative matter and framework for introduction (as defined in AFFTC TIH-09-01) using the project test plan and a generic report template when requested. Coordinate draft with the primary author and lead engineer.
 - 3.8.8. Maintain configuration control of report.
 - 3.8.8.9. Ensure the distribution statement is used and the report is properly marked before disseminating IAW AFI 61-204, *Disseminating Scientific and Technical Information*.
 - 3.8.8.10. Pass the report to Technical Publications Office and support that function as requested.
 - 3.8.8.11. Generate report staff summary sheet(s) and distribute copies at the coordination meeting.

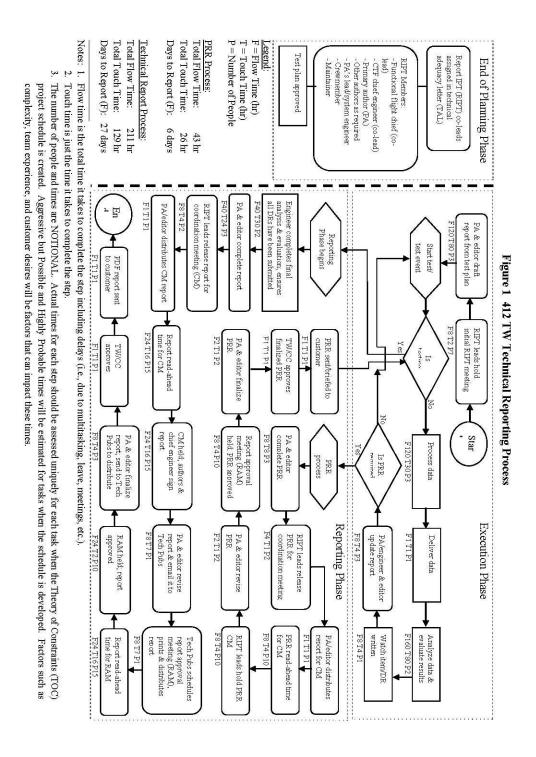
3.9. The Test Pilot School will:

3.9.1. Establish and document a process for review, approval, and publication of test reports generated from a Test Management Project. This process will emulate the CTF process (para 3.8 above) with the TPS Technical Director serving as the RIPT chairman. The normal form of the final test report for a TMP will be TIM and will be reviewed internally by a RIPT composed of TPS/CT, appropriate TPS branch chief(s), staff advisors, and the student test team. These reports will be approved for publication by the

TPS Commandant and will be distributed to a limited audience. For those TMP reports that warrant, in the determination of TPS/CT, publication as a TR, the process described in this OI will be followed and the report will be approved by 412 TW/CT or his designee. Criteria that could result in a TIM being elevated to TR-status include customer requirements and/or significant technical or operational results warranting wider spread dissemination.

- **4. Procedures.** Figure 1 presents the overall report writing process.
 - 4.1. Initiating the Reporting Process.
 - 4.1.1. Identifying Initial Reporting Requirements. Attachment 2 contains a listing of the types of reports published by the 412 TW. The 412th TMG will relay the requirement and scope for project reporting to the SPO during the SOC process as determined by the appropriate CTF chief engineer and respective engineering organization. The details at this point are typically fairly high level and would involve the number, type, and required distribution date for each report. Providing timely TRs to support acquisition decisions is the goal. A PRR should not be planned as the supporting documentation for acquisition decisions. A PRR can be planned to support incremental development recommendations between major test phases of a project.

Figure 1. 412TW Technical Reporting Process



4.1.2. Establishing the Report IPT. An RIPT will be assigned for each PRR or TR, and membership on the RIPT will be determined during the test plan technical review. The RIPT co-leads will be the CTF chief engineer and a functional flight chief or technical

- expert. Other members of the RIPT will include the primary author, other authors as required, the primary author's lead at the CTF, a test team operator (pilot, load master, etc.) and a technical editor/writer. Other personnel may be assigned to the RIPT as appropriate.
- 4.1.3. Finalizing Report Requirements. The primary author, in conjunction with the CTF chief engineer, will work with the SPO to reaffirm the reporting requirements during the test planning phase, prior to test plan approval. Once agreement has been reached with the SPO, the primary author will present the agreed upon format and content to the RIPT co-leads for their concurrence and update the TOC network as required. Reference AFFTC-TIH-09-01 for format details.
- 4.1.4. Establishing Milestones. The event that initiates the reporting process is the test plan technical review/approval. The key milestone used to determine the required report delivery date will be established with the SPO to support program acquisition milestones and included in the TOC project schedule (or the agreed-upon project schedule for projects not using TOC). This will normally be based on the date of the last test. The goal for all report products at the 412 TW is to meet the customer's requirements by providing a report as quickly as practical after the last test event. Consequently, the report completion date will be established as the SPO delivery date or 42 calendar days, whichever is earlier.
 - 4.1.4.1. The key internal milestones to be modeled in the TOC project schedule are: test plan and technical adequacy letter (TAL) approval, data analysis process validation, initial RIPT meeting, each periodic PMR, last test event, coordination meeting completion, 412 TW/CC approval, and report distribution completion.
 - 4.1.4.2. Each report will have the agreed upon delivery date modeled in the schedule as a Customer Milestone (CMS), unless waived by the Test Wing Technical Director.
 - 4.1.4.3. Progress of the report will be tracked from the time the schedule is approved using both the milestone report and the TR delivery date trend chart.
- 4.1.5. Obtaining Guidance and Support. As soon as practical, the primary author will contact the Technical Publications Office to obtain the following: a report number; a standard distribution list (which will include as a minimum DTIC, AFTC/HO and 412 TW/CT); and information related to report distribution statements. This process will generally be initiated as soon as the test plan has been completed and approved. The Technical Publications Office will provide all report numbers for TIHs and TIMs, PRRs, and TRs. The standard distribution list must be scrutinized for program applicability and modified with SPO approval as required.

4.2. Writing the Report.

- 4.2.1. Shortly after test plan approval, the RIPT co-leads and primary author will hold the initial RIPT meeting to lay out the plan, schedule, and milestones for reporting.
- 4.2.2. Prior to the start of test execution, the authors and RIPT co-leads will develop a report outline which meets the needs of the customer and that will document the results of the tests against the objectives. Test plan sections may be used to satisfy outlined

- sections of the report. The authors and technical editing staff will work to draft these report sections at this time.
- 4.2.3. Throughout test execution, project personnel will perform data analysis and evaluation, ensure DRs are written in a timely manner, as appropriate, and provide the primary author and technical editor written updates to the report for their area(s) of responsibility.
- 4.2.4. Periodically, the CTF chief engineer will brief each project's data analysis, evaluation, and report production status at the weekly Engineering Council meeting and at their CTF's PMR meeting.
- 4.2.5. Periodically during the test execution phase, the RIPT will meet to review and update the draft report.
- 4.2.6. Shortly after the last test event, or if a PRR is required prior to test completion, the primary author and technical editor/writer will complete the report in preparation for the coordination meeting.
- 4.2.7. Extensions to Milestones. All reasonable management efforts will be exhausted to ensure meeting the 42 day timeline and the report distribution due date (CMS), the date promised to the customer in the TOC schedule. In the event of extenuating circumstances, milestones may be changed and a report extension would be considered when the RIPT believes it will miss the CMS. If the report CMS cannot be met, the project manager with the director of projects and RIPT co-leads will coordinate with the SPO to determine if a project rebaseline is required.
- 4.3. Report Coordination and Approval. All 412 TW report products will receive a technical and editorial review.
 - 4.3.1. RIPT Coordination. The RIPT will not release the report for coordination at the coordination meeting until they feel it is a complete and 'quality' document.
 - 4.3.1.1. The technical editor/writer will distribute the completed report to coordination meeting members.
 - 4.3.1.2. The RIPT co-leads will chair the coordination meeting where the RIPT and other reviewers will provide their comments/changes for real-time update of the report, as appropriate.
 - 4.3.1.3. The authors and chief engineer will sign the signature page of the report at the coordination meeting or a subsequent coordination/approval will be scheduled.
 - 4.3.2. Final Review and Approval.
 - 4.3.2.1. After the coordination meeting, the primary author and technical editor/writer will revise the report and send it to the Technical Publications Office for printing.
 - 4.3.2.2. Once the report has been prepared for final review and the RIPT has released the coordinated version, final review and approval is accomplished primarily to ensure the report represents a valid, acceptable 412 TW position on the test issues and findings. As a goal, review and approval should not exceed 5 days. Staff functions

- will maintain approval layers at the essential minimum. See attachment 2 for the appropriate final approval of each type of report.
- 4.3.2.3. The Technical Publications Office will schedule the report approval meeting (RAM) per request of the RIPT on the 412 TW/CT calendar, send out the meeting announcement, and deliver the report to RAM members.
- 4.3.2.4. The 412 TW/CT (or designee) will chair the RAM, ensure report is ready for release, and sign the report.
- 4.3.2.5. The primary author and technical editor/writer will incorporate RAM changes, if any, and send the finalized report to the Technical Publications Office.
- 4.3.3. Printing. The Technical Publications Office will deliver a print-quality copy of the report or electronic media copy, along with a Defense Automated Printing Service (DAPS) CL5604/48 (Rev. 9-97), *Automated Printing Request*, to DAPS/RF in sufficient time to complete printing within 10 calendar days. Local printing either at the CTF or utilizing EAFB Graphics Office may be performed as an alternate to DAPS. The Technical Publications Office will track printing status.
- 4.3.4. Distribution. Immediately after approval of a report, either the primary author or Technical Publications Office will submit a signed copy to the SPO. The Technical Publications Office will make formal distribution of the remaining printed copies in accordance with the distribution list approved by the SPO. The report must be submitted to STINFO for distribution to DTIC.
- 4.3.5. Tracking Report Status. The Technical Publications Office will serve as the central point for compiling and tracking status of PRRs and TRs using the report metric products available. The Technical Publications Office will provide periodic summaries of report status as directed by 412 TW/CT.
- **5. Training.** The 412 TENG will be responsible for ensuring adequate training of the reporting process is provided to all appropriate personnel. This includes authors, functional and operational supervisors, and the Technical Publications Office.

6. 412TW Technical Report Products.

- 6.1. Technical Report (TR).
 - 6.1.1. The TR presents the final and official position of the 412 TW on the test item.
 - 6.1.2. The TR may be any length, including very short. The format/content is described in AFFTC TIH-09-01.
 - 6.1.3. A TR should be used to periodically report 'testing to date' when it is known a project is going to last several years.
- 6.2. Preliminary Report of Results (PRR).
 - 6.2.1. The PRR will be used in circumstances where immediate information is needed to support a major program decision.
 - 6.2.2. There are two PRR formats, the briefing PRR and the memorandum PRR, as described in AFFTC TIH0901.

- 6.2.3. A PRR presents preliminary results and analysis to decision makers and is oriented toward management issues. Important engineering information may be included in summary form if required for the understanding of the briefing.
- 6.2.4. A PRR is written with the understanding that it will be used for making a critical management decision in a time-frame that does not allow for complete analysis or the writing of a full technical report. Therefore, only that portion of the analysis that is complete should be presented, and limitations on the preliminary results, if any, must be clearly stated.
- 6.2.5. The words 'Preliminary and Results' are important and intentional. The final report on the subject matter will be published at a later date. New data or more analysis may change the preliminary results and, therefore, the conclusions and recommendations in the final report may be other than was initially expected from the 'preliminary results'.
- 6.2.6. If there is sufficient time to do a complete analysis and write a report, then a PRR is not accomplished.
- 6.2.7. A briefing, such as progress report, or status report may be given to the SPO whenever the SPO requests it. Those briefings are not a PRR.
- **7. FOIA and Distribution Statements.** Distribution statements are not in themselves authority to withhold unclassified technical data from public disclosure. Such determinations are the responsibility of the controlling DoD office and will be made in accordance with DoD Directive 5400, *The DoD Freedom of information Act Program.* Personnel must be aware the distribution statement may not apply to FOIA and must be aware of FOIA exemptions, DOD Regulation 5400.7_AFMAN 33-302. The Edwards AFB FOIA Requester Service Center processes the release of scientific and technical information requested under the FOIA in accordance with governing regulations and instructions.

MICHAEL T. BREWER, Brig Gen, USAF Commander

Attachment 1

GLOSSARY OF REFERENCES AND SUPPORTING INFORMATION

References

412 TW OI 99-3, The Manage Projects Process, 22 September 2005

AFFTCI 99-101, AFFTC Test Plans, 12 July 2012

AFFTC-TIH-09-01, The Author's Guide to Writing AFFTC Technical Reports, August 2009

EAFBI 99-224, Test Center Deficiency Reporting, 27 October 2010

T.O. 00-35D-54, USAF Deficiency Reporting, Investigation, and Resolution, 1 November 2011

AFI 61-201, The Local Scientific and Technical Information Process, 16 June 1995

AFI 61-202, United States Air Force Technical Publications Program, 25 July 1994

AFI 61-204, Disseminating Scientific & Technical Information, 30 August 2002

AFI 99-103, Capabilities-Based Test and Evaluation, 26 February 2008

AFMAN 33-363, Management of Records, 9 April 2012

AFMAN 63-119, Certification of System Readiness for Dedicated OT&E, 20 June 2008

AFPD 61-2, Management of Scientific and Technical Information, 7 April 1993

DOD Regulation_AF Manual 33-302, DoD/AF Freedom of Information Act Program, 21 October 2010

Adopted Forms

AF Form 847, Recommendation for Change of Publication

AFTO 22, Technical Manual Change Recommendation and Reply

AFTO 27, Preliminary Technical Order Publication Change Request

SF 298, Report Documentation Page

DAPS CL- 5604/48, Automated Printing Request

Abbreviations and Acronyms

ACC—- Air Combat Command

AETC—- Air Education and Training Command

AF—- Air Force

AFFTC—- Air Force Flight Test Center

AFFTCI—- Air Force Flight Test Center Instruction

AFTC—- Air Force Test Center

AFI—- Air Force Instruction

AFMAN—- Air Force Manual

AFMC—- Air Force Materiel Command

AFOTEC— Air Force Operational Test and Evaluation Center

AFPD—- Air Force Policy Directive

AFSO21—- Air Force Smart Operations for the 21st Century

AFTO --- Air Force Technical Order

AMC—- Air Mobility Command

CM—- coordination meeting

CMS—- customer milestone (in TOC project schedule)

CTF—- combined test force

DAPS—- Defense Automated Printing Service

DoD—- Department of Defense

DR—- deficiency report

DT&E—- developmental test and evaluation

DTIC— Defense Technical Information Center

F— -- flow time

FOT&E—- follow-on test and evaluation

HQ—- Headquarters

Hr— -- hour(s)

IAW—- in accordance with

IOT&E—- initial operational test and evaluation

IPT—- integrated product team

LFT&E—- life fire test and evaluation

OI—- operational instruction

OPR—- office of primary responsibility

OSD—- Office of Secretary of Defense

OT&E—- operational test and evaluation

P--- people

PA—- primary author

PDF—- Portable Document Format (a file format created by Adobe Systems)

PMR—- project management review

PR—- progress report

PRR—- preliminary report of results

PTO—- participating test organization

RAM—- report approval meeting

RIE—- rapid improvement event

RIPT—- report integrated product team

RTO—- responsible test organization

SOC—- statement of capability

SPO—- System Program Office (primary customer)

STINFO—- Scientific and Technical Information Office

T— -- touch time

TAL—- technical adequacy letter

T&E—- test and evaluation

Tech Pubs -- Technical Publications Office

TEMP—- test and evaluation master plan

TIH—- technical information handbook

TIM—- technical information memorandum

T.O.—-- technical order

TOC—- Theory of Constraints

TOC PM—- Theory of Constraints Project Management

TR—- technical report

TRB—- technical review board

USAF—- United States Air Force

412 EWG—- 412th Electronic Warfare Group

412 MXG—- 412th Maintenance Group

412 OG—- 412th Operations Group

412 TENG—- 412th Test Engineering Group

412 TMG—- 412th Test Management Group

412 TW—- 412th Test Wing

412TWI—- 412th Test Wing Instruction

412 TW/CC—- 412th TW Commander

412 TW/CT—- 412th TW Technical Director

Terms

AFSO21. AFSO21 is an improvement model customized to the unique environment of the USAF which leverages improvement methods from various sources such as; Lean, Six Sigma, Theory of Constraints, and Business Process Reengineering. AFSO21 is a transformational initiative empowering all Airmen to eliminate waste from every end—to-end process.

AFSO21 Rapid Improvement Event (RIE).—A Lean Process improvement tool consisting of a small team charted with a specific project scope requiring process improvement within a short timeframe, usually in less than one week.

Combined Test Force (CTF). A CTF is a test force made up of representatives from 412 TW, participating test organizations, AFOTEC, using and support commands, contractors, and possibly other military services. A CTF is organized for each system undergoing test and evaluation (T&E). CTFs are responsible for all aspects of planning, coordinating, managing, flight operations, safety, testing and reporting of T&E, and support of IOT&E and follow—on test and evaluation (FOT&E) test programs. Typical of the major test programs for which CTFs have been formed at the 412 TW are the Global Power Bomber, Global Power Fighters, Global Reach, F-22, Joint Strike Fighter, and Test Operations. (For IOT&E and FOT&E definitions, refer to the *Defense Acquisition University Glossary: Acronyms and Terms*).

Report Integrated Product Team (RIPT).—The RIPT consists of personnel responsible for a project's report production.

Statement of Capability (SOC).—The SOC is the 412 TW response to a customer's test support request. The SOC document, approved by 412 TW/TMG, is the 412 TW's commitment to provide the customer the necessary resources, along with the cost estimate and schedule for the requested support.

Technical Adequacy Letter (TAL). The TAL is a memorandum for record prepared by the flight chief or technical expert that chaired the technical review board (TRB) to document the results of the technical review, IAW AFFTCI 99-1, *Test Plans*. The TAL is approved by the Test Wing Technical Director (TW/CT) when they approve the test/safety package.

Test and Evaluation (**T&E**). This is the process by which a system or components are exercised and results analyzed to provide performance related information. The information has many uses including risk identification and risk mitigation and empirical data to validate models and simulations. T&E enables an assessment of the attainment of technical performance, specifications, system maturity, and military utility to determine whether systems are operationally effective, suitable and survivable for intended use, and/or lethal. There are three distinct types of T&E defined in statute or regulation: Developmental Test and Evaluation (DT&E), Operational Test and Evaluation (OT&E), and Live Fire Test and Evaluation (LFT&E). (For definitions of these T&E types, refer to the *Defense Acquisition University Glossary: Acronyms and Terms*).

Theory of Constraints Project Management (TOC PM).—TOC PM is the project planning, scheduling, and management tool used by the 412th Test Wing.

Attachment 2

412 TW REPORTING PRODUCTS

A2.1. The 412 TW reporting products are specified in Figure 1.

	Type			Coordinati	412 TW	Approva
Type	Informatio		Scope/	on	Approval	
Report	n	Format	Procedures	Review	Authority	Deadline
Deficiency Reports (DR)	Deficiency, shortcoming, or proposed enhancement	IAW T.O. 00-35D-54	Intended as an action tool for correction of hardware and software problems. Should be included in published reports IAW EAFBI 99-224.	Author's test organization	IAW T.O. 00-35D-54 and EAFBI 99-224	IAW T.O. 00-35D-54 and EAFBI 99-224
Progress Report (PR)	Test progress and/or interim test results	As mutually agreed by SPO and CTF chief engineer	Intended as a periodic document to apprise SPO. Per CTF or squadron procedures.	Per CTF or squadron procedures	CTF director/Group Commander or equivalent, or squadron commander/ equivalent, as applicable	As mutually agreed by the SPO and CTF chief engineer
Technical Information Handbook (TIH)	Instructional or guidance	As approved by 412 TENG/412 EWG. Format more relaxed than for TRs to aid in instructional value and facilitate revision	Covers subjects with broad scope and intended primarily for Test Enterprise use. Submitted to DTIC.	Author's functional organization flight chief and appropriate two-letter	412 Test Wing Technical Director*	As determined by the 412 Test Wing Technical Director
Technical Information Memorandum (TIM)	Formalized or validated studies	As approved by 412 TENG/412 EWG. Format more relaxed than for TRs	Covers subjects of narrow scope and intended primarily for in-house use. Submitted to DTIC.	Author's functional organization flight chief and appropriate two-letter	412 Test Wing Technical Director*	As determined by the 412 Test Wing Technical Director
Preliminary Report of Results (PRR)	Intended to be a timely, concise distribution of preliminary results in circumstances where an SPO needs an immediate answer	IAW AFFTC- TIH-09-01	Briefing or memorandum given to decision makers with principal findings and results pertinent to critical management issues. Technical data can be attached as backup material. Not intended to take the place of a formal technical report. Submitted to DTIC.	Report IPT, appropriate two-letter, 412 OG, 412 Test Wing Technical Director (The briefing PRR will be briefed at the report approval meeting.)	412 Test Wing Technical Director*	As mutually agreed by the SPO and CTF chief engineer**

	Type			Coordinati	412 TW	Approva
Type	Informatio		Scope/	on	Approval	1
Report	n	Format	Procedures	Review	Authority	Deadline
Recommendation for Dedicated OT&E	T&E results and recom- mendation to SPO regarding system readiness for OT&E	Tailored to fit needs of SPO.	IAW Templates for Certification for Readiness for OT&E in AFI 99-103 and AFMAN 63-119, Certification of System Readiness for Dedicated OT&E.	Report IPT, appropriate two-letter, 412 OG, 412 Test Wing Technical Director	412 Test Wing Technical Director*	As mutually agreed by the SPO and CTF chief engineer**
Technical Report (TR)	Final test and evaluation results	IAW AFFTC- TIH-09-01	Intended as final documentation. Submitted to DTIC.	Report IPT, appropriate two-letter, 412 OG, 412 Test Wing Technical Director	412 Test Wing Technical Director*	As mutually agreed by the SPO and CTF chief engineer**

^{*} Or Designee

^{**} Must be approved by 412 TW/CT if more than 42 calendar days after last test event.