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**KC-135 AIRCREW TRAINING**

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This volume implements AFI 11-200, *Aircrew Training, Standardization/Evaluation, and General Operations Structure* and AFPD 11-4, *Aviation Service*. It covers USAF KC-135 aircrew training policy to safely and successfully accomplish worldwide mobility missions. This instruction applies to Air Mobility Command (AMC)-gained Air Force Reserve Command (AFRC) and Air National Guard (ANG) KC-135 units unless specifically exempted (Pacific Air Force (PACAF)-gained ANG units). Each MAF MAJCOM may set training requirements lower than specified in this instruction when the statement “or as specified in MAJCOM supplement” is indicated as applicable to that item or event. MAJCOM supplements must be coordinated and approved by AMC/A3T and AF/A3O-AI IAW AFI 11-200 and AFI 11-202 Volume 1, *Aircrew Training*, before publication; units will send one copy to the parent MAJCOM OPR for processing. The use of the name or mark of any specific manufacturer, commercial product, commodity, or service in this publication does not imply endorsement by the Air Force.

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**(MILDENHALL) AFI 11-2KC-135 Volume 1, 4 June 2012, is supplemented as follows:** This supplement applies to all United States (U.S.) Air Force flying personnel in the United States European Command (USEUCOM), except those under the management of another major command (MAJCOM). It also applies to all U.S. Air Force flying personnel of other MAJCOMs who have been placed under the operational control (OPCON) of either USEUCOM or United States Air Forces in Europe (USAFE). In addition, this supplement applies to all non-U.S. Air Force crewmembers assigned or attached to USAFE units. It does not apply to Air National Guard (ANG) or Air Force Reserve Command (AFRC) units. Operations and Training Division (HQ USAFE/A3T), Unit 3050 Box 15, APO AE 09094-5015, must approve any supplement to this publication. This supplement has been coordinated and approved through HQ USAFE/A3T and HQ AMC/A3T. Waivers to the procedures will be requested through 100 OSS/OSOS and approved by 100 OG/CC. The Privacy Act of 1974 applies to this supplement; Privacy Act System Number F011 AF AMC A, Air Force Operations Resource Management Systems (AFORMS) covers required information. Authority for maintenance of AFORMS is 37 U.S.C. 301a, Public Laws 92-204, 93-570, and 93-294, Department of Defense Instruction (DoDI) 7730.57, *Aviation Career Incentive Act of 1974 and Required Annual Report* and Executive Order 9497 applies. 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 Air Force Records Information Management System (AFRIMS) Records Disposition Schedule (RDS) located at [https://www.my.af.mil/afirms/afirms/afirms/rds/rds\\_series.cfm](https://www.my.af.mil/afirms/afirms/afirms/rds/rds_series.cfm) Refer recommended changes and questions about this publication to the Office of Primary Responsibility (OPR) using Air Force (AF) Form 847, *Recommendation for Change of Publication*; route AF Forms 847 from the field through the appropriate functional chain of command. See **Attachment 1** for Glossary of References and Supporting Information.

**SUMMARY OF CHANGES**

This document is substantially revised and must be completely reviewed. It standardizes format, paragraphs, and information with other AMC MDS specific Volume 1's by relocating and renumbering throughout. This revision adds Squadron Training Review Panel (STRP) requirements in **paragraph 1.4.6**; updates waiver processing requirements in **Table 1.1**; adds training events in **Tables 3.1, 4.1, 4.2, 4.3, 4.4, and 4.6**; changes currency and training event volumes and frequencies in **Tables 4.1, 4.2, 4.3, 4.4, 4.5, and 4.6**; removes ARMS events Information Protection (E112), Human Relations (E113), Force Protection (E114), CBRNE Defense Training (G010), Self Aid Buddy Care (G281), and CBRNE Defense Awareness Course (G284) from **Tables 2.1, 4.2, and Chapter 7**; clarifies requalification training guidelines in **paragraph 2.9**; removes Flight Instructor Requalification Matrix in **Table 2.3**; renumbers **Tables 2.3, 5.3, 5.4, 5.5, 5.6, 5.7, 5.8 and 5.9**; clarifies special mission certification during MCT in **paragraph 3.1**; changes 8010 commitment requirements in **paragraph 3.2.3.1 and paragraph 7.15.5**; replaces A005 MPRS Training with A006 MPRS Familiarization Training in **Chapters 5, 7, and Table 3.1**; adjusts training requirements in **Table 3.2**; Flight Surgeon continuation flying requirements expanded in **paragraph 4.6, paragraph 7.9, and Table 4.3**; replaces aircrew simulator ARMS identifiers G276 and G271-274 with **G250 and G261-264** in **Tables 4.4, 4.5, 4.6 and Chapter 7**; introduces Boom Operator Weapons System Trainer (BOWST) training requirements and simulator credit in **Tables 3.2, 4.6, 5.5, as well as paragraph 5.6.5 and paragraph 7.10.59**; clarifies actions taken if crewmember fails to meet training requirements in **paragraph 4.9**; updates MPD program in **Chapter 5**; updates to Pilot Designation Codes in **Table 5.2**; removes Aircraft Commander (AC) (Traditional Copilot Only) upgrade and GATM (Block 40.X) Difference Training (Q040/Q041) guidance from **Chapters 5 and 7**; changes prerequisite requirements for Pre-Instructor Course Training in **paragraph 5.4.2 and paragraph 5.4.2.1.2**; moves **Q021-Q029** restrictions to **paragraph 5.6.4.1**; clarifies Multi-Point Refueling System (MPRS) Certification Training (**Q033**) in **paragraph 5.6.4.3, paragraph 7.15.11.6, and Table 5.7**; implements (**Q340**) Briefing and Control of Passengers Certification in **paragraph 5.6.10, paragraph 7.15.23, and Table 3.1**; redefined dedicated training time in **Table 6.1**; revised ARMS (LL) event identifiers in **paragraph 7.11**; revised (**M010**) Proficiency Sortie, (**M030**) Oceanic Sortie, and (**M050**) Tactics Sortie in **paragraph 7.12.4, paragraph 7.12.6, and 7.12.7**; revised (**P062**) Tactical Departure and (**P063**) Tactical Arrival guidance in **paragraph 7.14.35 and paragraph 7.14.36**; removes (R160) Radio Silent Breakaway requirement in **Tables 3.2, 4.6, and Chapter 7**; refines Training Folder and Training Guide (TG) requirements in **Attachment 2**; Updates Glossary, Abbreviations and Acronyms.

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## Chapter 1

### GENERAL

**1.1. Training Objective.** This instruction prescribes basic policy and guidance for training United States Air Force KC-135 crewmembers according to AFI 11-202 Volume 1.

1.1.1. The overall objective of the aircrew training program is to develop and maintain a high state of mission readiness for the immediate and effective employment in exercises, peacekeeping operations, contingencies, and war. Mission readiness and effective employment are achieved through the development and mastery of core competencies for KC-135 crewmembers. These core competencies include the ability to conduct Air to Air Refueling (AAR), tactical ingress/egress, and tanker operations during all phases of flight, instrument procedures, mission planning, ground operations, crew management, and C4/Air Operations Center (AOC) integration.

1.1.2. Link AFTTP 3-3.KC-135, *Combat Aircraft Fundamentals—KC-135*, requirements into mission and continuation training tables while retaining a combat culture, leading edge technologies, pushing capabilities while anticipating warfighter needs.

1.1.3. The secondary objective is to standardize KC-135 training requirements into a single document to meet requirements for a basic document in AFI 11-200.

### 1.2. Key Words Explained.

1.2.1. “Will” and “shall,” indicate a mandatory requirement.

1.2.2. “Should” is normally used to indicate a preferred, but not mandatory, method of accomplishment.

1.2.3. “May” indicates an acceptable or suggested means of accomplishment.

1.2.4. “Note,” indicates operating procedures, techniques, etc., which are considered essential to emphasize.

### 1.3. Administration.

1.3.1. Recommendation for Change. Submit suggested improvements to this instruction on AF Form 847, *Recommendation for Change of Publication*, through MAJCOM channels to OPR, AMC/A3T according to AFI 11-215, *Flight Manual Program (FMP)*. Send proposals for amending existing course prerequisites or recommendations to change or delete obsolete courseware through the appropriate MAJCOM training staff to the OPR. The OPR physical address is AMC/A3T, 402 Scott Drive, Unit 3A1, Scott AFB, IL, 62225-5302; the email address is [AMC.A3TK@us.af.mil](mailto:AMC.A3TK@us.af.mil).

1.3.2. Supplements. This AFI is a basic directive. Each MAJCOM or operational theater may supplement this AFI. MAJCOM supplements may be more, but not less restrictive than this instruction.

1.3.3. Local Training Guidance or Operations Group Instruction (OGI). Units may supplement this instruction through local training guidance, OGI, or with an official AFI Supplement. Submit official AFI Supplements to the parent MAJCOM OPR for approval.

Air National Guard (ANG) is considered a MAJCOM for purposes of this instruction per AFI 11-202 Volume 1.

1.3.4. If a conflict is identified for a training requirement, comply with source document that establishes the training requirement.

**1.4. Responsibilities.** AFI 11-202 Volume 1 outlines responsibilities for aircrew training.

1.4.1. Lead Command. Air Mobility Command (AMC) is designated lead command for the KC-135 Mission Design Series (MDS) air refueling tanker aircraft according to AFPD 10-9, *Lead Operating Command Weapon Systems Management*, and air refueling procedures training according to AFPD 10-21, *Air Mobility Lead Command Roles and Responsibilities*. Lead command is responsible for establishing and standardizing aircrew flying training requirements in coordination with user commands. AMC/A3 delegates to AMC/A3T the authority to manage all training course requirements, training tasks and Aircrew Training System (ATS) in **Chapter 6**. AMC/A3T is OPR for this instruction.

1.4.1.1. Courses. AMC/A3T, in coordination with user commands, approves continuation training requirements or adjustments, and fields short-notice specialized or in-unit upgrade courses.

1.4.1.2. Realistic Training Review Board (RTRB). AMC/A3T will host a RTRB biennially or more frequently, as required. The RTRB will review the appropriate training programs for currency, applicability, compliance, and effectiveness. Attendees should include training representatives from the KC-135 community including: AMC/A3T/A3V, USAF Expeditionary Center (USAFEC), AETC, AFRC, ANG, PACAF, USAFE, formal schools, selected unit representatives, and ATS instructors or staff, as applicable.

1.4.1.3. Detachment 2, Air Mobility Command Air Operations Squadron (AMCAOS) personnel will:

1.4.1.3.1. Conduct an annual Simulator Certification (SIMCERT) according to AFI 36-2251, *Management of Air Force Training Systems*, on each Aircrew Training Device (ATD) in the KC-135 ATS (semi-annual for Level C+ certified simulators), or when necessary (e.g. ATD modification, configuration change, etc.). The program is designed to ensure training devices are maintained to their design configuration and provide accurate and credible training. SIMCERT will include objective and subjective testing, inventory inspection, and Quality Assurance Issues (QAI).

1.4.1.3.1.1. Provide host unit 45-day advance notice of a SIMCERT. AMC/A3T may direct a short-notice SIMCERT with verbal coordination between host unit, Det 2 AMCAOS, ATS contractor, and the ATS contract management team. Report SIMCERT results to AMC/A3T and the ATS contract management team.

1.4.1.3.1.2. Monitor training device utilization, availability, and ensure equipment malfunctions are corrected through coordination with the ATS contractor, when required.

1.4.1.3.1.3. For ATD modified with unique configurations (Receiver Air Refueling). A SIMCERT is not required for cockpit configuration conversion unless deficiencies are identified effecting the ATD status of Level C+

performance.

1.4.1.3.2. Schedule Subject Matter Experts (SME) for Technical Interchange Meetings (TIM) with the ATS contractor. DET 2, AMCAOS will review all continuation training courses and mission scenarios and recommend changes as necessary when aircraft systems, operating procedures, or mission and command training requirements are modified or changed.

1.4.1.3.3. Conduct an annual Training System Support Center (TSSC) audit of courseware and simulation devices.

1.4.1.3.4. Oversee monthly KC-135 ATS Training System Configuration Working Group (TSCWG) in coordination with AETC 97 TRS Quality Assurance Agency. The TSCWG reviews the status of the tasks requested and courseware and hardware configuration of the KC-135 ATS. Change requests are reviewed and prioritized for incorporation into the KC-135 ATS.

1.4.2. Training Command. AETC/A2/A3 is responsible for formal school (Altus AFB) syllabi and is the approval authority for changes in coordination with lead and user commands according to AFI 11-202 Volume 1. AETC/A2/A3/A10 designates AETC/A3Z to oversee formal school courses and syllabi management in coordination with the ATS Contractor and AMC/A3TK. Formal course information is available via Education and Training Course Announcements (ETCA) and approved formal course syllabi are available via the AETC Bookstore (see [paragraph 1.15.7](#)). AETC/A3R manages the PFT process with link to quotas (see [paragraph 1.14.1](#)). AETC/A3Z determines the formal school flying capacity in coordination with lead command (ATS alignment).

1.4.2.1. Progress Review (PR). See AFI 11-202 Volume 1. AETC will notify the student's gaining unit of any PR action delaying the student's scheduled graduation date. If the PR recommends a Flying Evaluation Board, AETC will notify the student's gaining MAJCOM.

1.4.2.2. 97 TRS, Altus AFB quality assurance agency monitors ATS performance alongside Detachment 2 AMCAOS.

1.4.2.3. 97 TRS may conduct ATS Contract Compliance Evaluations (CCE) for KC-135 ATS-supported sites according to AMC/AETC Memorandum Of Understanding (MOU). Report results to AETC/A3ZM, AMC/A3TK, and ATS contract management team. Evaluation personnel assess ATS contractor performance of aircrew ground training programs to include Computer-Based Training (CBT), simulator training, VTRAT, and training support facilities.

1.4.2.3.1. The host unit will receive 45-day advance notice of the CCE (non-interference basis) via notification memo or Email to the unit POC. Unit support may include the use of an inbrief/outbrief facility, approximately 4 hours CBT time, and access to available crewmembers and staff for the purpose of conducting surveys and/or soliciting comments.

1.4.2.3.2. Units should consider the CCE a unit-level feedback tool to monitor quality of ATS ground training.

1.4.2.4. Maintain all AETC-managed KC-135 formal courses on ETCA.

1.4.2.5. AMC/A3T is responsible for BNQ ATS formal training at McConnell AFB and interim KC-135 training programs.

#### 1.4.3. User Commands.

1.4.3.1. Student Management. MAJCOM training staff will manage their student training requirements according to **paragraph 1.14.1.2**.

1.4.3.2. Recall Procedures. Formal notifications to recall students from a formal school must be sent from the student's Sq/CC to OG/CC to MAJCOM/A3T (or equivalent) (email format is acceptable). MAJCOM/A3T (or equivalent) will submit approved recall letter (email or Fax) to AETC/A3R for follow on coordination with AETC/A3Z and the Formal Training Unit (FTU) Registrar. Emergency recall during non-duty hours may be coordinated directly with applicable FTU Registrar, with follow up coordination with AETC/A3R & AETC/A3Z on the next duty day. **Exception:** Recalling students from KC-135 WIC will occur IAW AFI 11-415 and ACC/A3TW.

1.4.4. Wing Commander. Wg/CC will ensure unit/local level agencies and facilities support aircrew ground training programs. Host and/or collocated units will develop local agreements to consolidate aircrew training support base-wide.

1.4.5. Operations Group. OG/CC (or equivalent) will:

1.4.5.1. Convene a Training Review Panel (TRP) to be chaired by the OG/CC or a designated representative. Panel members should include representatives from Squadron training, tactics, operations, safety and other areas as determined by the commander, i.e., ATS contractors, Host Aviation Resource Management (HARM), and Squadron Aviation Resource Management (SARM).

1.4.5.1.1. TRP Requirements. Convene the TRP semi-annually and maintain minutes for a period of two years (commanders may increase this frequency as required). Squadrons and detachments not collocated with their OG may conduct their own panel or provide representation to the unit's TRP. Panel minutes from non-collocated squadron and detachment TRPs will be forwarded to the unit for inclusion in the unit's TRP.

1.4.5.1.1.1. **(Added-MILDENHALL)** 100 OG/OGT will conduct the TRP typically in January and July. Additional TRPs may be convened at the discretion of the 100 OG/CC, and may be held in concurrence with the 100 OG/OGV Standardization/Evaluation Board (SEB). Suggested attendees are: OG/CC, Deputy OG/CC, Squadron Commanders, Directors of Operations, OGT, OGV, DOT, SARM, PO/QAR, ATS contractors, OSK/Tactics, and available instructors.

1.4.5.1.2. TRP Format. The TRP should review staff and crewmember management actions necessary to complete squadron flight and ground training programs. Suggested TRP topics include, but are not limited to, current and forecast Flight Training Levels (FTL), upgrade and Continuation Training (CT) status, semi-annual requirement completion rates, crew position gains/losses, Aircraft Commander (AC), Instructor and Evaluator upgrades. OG/CCs will review all unit-defined training "X" events for relevancy to the unit's mission during the semi-annual TRP. This review will be documented in the TRP minutes.

1.4.5.2. Develop and maintain procedures with local servicing Military Personnel Element (MPE) for individual crewmember counseling and personnel system updates affecting active duty service commitment incurred from training described in this AFI. See AFI 11-202 Volume 1, AFI 36-2107, *Active Duty Service Commitments (ADSC)*, and course listing in ETCA for more information.

1.4.5.3. OG/CC may develop additional training requirements and/or programs as necessary to meet unit mission requirements. Units may include such requirements in a local supplement or OGI to this AFI.

1.4.5.4. OG/CC is responsible for establishing and maintaining academic training programs including non-ATS courses (may be delegated to squadron level). The OG (or squadron) OPR will:

1.4.5.4.1. Appoint a primary and alternate instructor for each non-ATS course to be taught.

1.4.5.4.1.1. **(Added-MILDENHALL)** 100 OG/CC Delegates responsibility for establishing and maintaining academic training programs including non-ATS courses to the squadron level.

1.4.5.4.2. Publish a ground training schedule (ARC, as required) to include date, time, location, instructor and designated crewmembers for each course (both ATS and non-ATS). Units may include such details in a local supplement or OGI to this AFI.

1.4.5.4.3. Use MAJCOM, ATS, or unit-developed training products and/or syllabus for all courses, as applicable. Units will reproduce courseware, as applicable. Units will manage and administer the KC-135 ATS CBT programs according to ATS guides and instructions.

1.4.5.4.4. Develop a process to monitor the academic training program for course content, currency of materials, instructor availability, and status of training aids. Squadron should recommend to the commander changes to existing courses or additional academic training courses required, based on crewmember feedback.

1.4.5.4.5. Units will develop local procedures for scheduling ATS courses. The unit training manager is responsible for procedures that minimize schedule changes and maximize training in the available time. Advise ATS contractor for scheduling changes and special training requirements.

1.4.5.4.6. Units will develop procedures for scheduling host or aircrew QUEEN BEE ATD continuation training. May include such details in a local supplement or OGI to this AFI.

1.4.5.4.7. Send recommendations for changes, additions, and deletions of courses through appropriate channels to appropriate MAJCOM with an information copy to AMC/A3T.

1.4.5.5. Instructor Selection and Training. OG/CC (or as delegated/specified in local supplement or OGI) will select course instructors (for non-ATS courses) on the basis of professional qualification and aptitude to instruct aircrew/students. Local academic instructor program will follow AFMAN 36-2236, *Guidebook for Air Force Instructors*. An individual instructor may receive course credit if instructing the class.

1.4.6. Squadrons. Sq/CC or designated representative will:

1.4.6.1. Select DOT Chiefs from the most highly qualified and experienced instructors. ARC units may use OST Chief for this purpose, provided all unique squadron requirements in this section are complied with (i.e., Quarterly STRP). Previous Evaluator or FTU experience is highly desired.

1.4.6.2. Ensure Sq/DOT is manned with a minimum of one instructor for each crew position. Instructors should be selected based on experience, availability, and time on station (to ensure continuity of operations for each crew position in DOT). ARC units may use OST instructors for this purpose, provided all unique squadron requirements in this section are complied with (i.e., Quarterly STRP).

1.4.6.3. Convene a Squadron Training Review Panel (STRP) chaired by the Sq/CC and/or Sq/DO. At a minimum, panel members should include representatives from Sq/DOT, Squadron Stan/Eval, ADOs, and the chief (senior representative) from each crew position. ARC units may use OST & OGV representatives. Sq/CCs should use the STRP to focus training objectives, ensure standards are being met, select upgrade candidates, and ensure completion of required continuation training.

1.4.6.3.1. STRP Requirements. Squadrons will convene a STRP monthly (Quarterly for ARC) and maintain minutes for a minimum of two years. STRP minutes will be approved by the Sq/CC or Sq/DO and may be produced, distributed, and/or stored electronically by Sq/DOTs (or ARC OST, as applicable).

1.4.6.3.2. STRP Format. The STRP should review staff and crewmember management actions necessary to complete squadron flight and ground training programs. The STRP will review the current status of aircrew training to ensure that current training objectives are being met and that those individuals selected for upgrade training are the best candidates after reviewing their experience, proficiency level, and retainability. To accomplish these goals, suggested STRP topics include but are not limited to: crew position gains/losses, current upgrade/requalification training (i.e., crewmembers in an active training status), recently completed training (including performance during training and current certification status), future training (individuals already approved via STRP), upgrade candidates, current waivers, projected waivers, and continuation training status.

1.4.6.4. Ensure crewmembers complete in-unit mission, ground, and continuation training programs. Failure to reasonably progress may require action for removal.

1.4.6.5. Before each semi-annual training period, assign Flying Training Levels (FTL) and levels of qualifications (instructor, evaluator, etc.) to assigned (and attached) crewmembers (see [Chapter 4](#)).

1.4.6.6. May delegate responsibility to supervisors for completion of formal school post-graduate questionnaires via AETC web-based survey system. See <https://www.my.af.mil/agepiftprod/>. Complete the questionnaire NLT 120-days after completion of Mission Certification Training (MCT).

1.4.6.7. Ensure adequate training continuity and supervision of assigned and attached crewmember. Unit commanders may assign additional requirements based on individual crewmember's experience and proficiency.

1.4.6.8. Through the training staff, will review training and evaluation records of a newly assigned or attached crewmember and those crewmembers completing formal training, to determine the necessary training required to complete/certify the individual as Basic Aircraft Qualified (BAQ), Basic Mission Capable (BMC), or Mission Ready (MR) status. Make the appropriate training entry on and sign AF Form 4023, *Aircrew Training Progress Report* or MAJCOM approved substitute (see [paragraph A2.1](#) and [paragraph A2.3](#)).

1.4.6.9. Review qualifications and monitor training requirements for unit-assigned Flight Surgeons.

1.4.6.10. Execute unit-level aircrew certifications described in this instruction.

1.4.6.11. Ensure Flight Commanders (Flt/CCs) or Squadron Training Flight (Sq/DOT) representatives monitor/check the quality of training being accomplished and identify any training deficiencies. Advise the Sq/CC of additional training needs.

1.4.7. ATS Contractor. The KC-135 ATS contractor is responsible for academic and ATD instruction at KC-135 the R-model formal school at Altus AFB or specialized training at all KC-135 training sites. This responsibility is defined exclusively in the KC-135 ATS contract Performance Work Statement (PWS) and includes developing, updating and publishing courseware, formal school syllabi for AETC, maintain ATS facilities, maintenance and operation of all assigned ATD, etc. according to the KC-135 ATS contract (see [Chapter 6](#)).

1.4.8. Formal School, Non-ATS. See requirements in AFI 11-202 Volume 1.

1.4.9. SIMCERT Status. KC-135 Operational Flight Trainers (OFTs) receive periodic SIMCERTs to gain/maintain Level C+ Certification. KC-135 Boom Operator Weapons Systems Trainer (BOWST) gain/maintain ARASQ Level 1 Certification. Each simulator has unique conditions and maintenance actions that require the device to gain/lose/regain certification by Det 2 AMCAOS. These actions have a direct impact on flight events creditable in the ATD ([Table 4.4](#), [Table 4.5](#), and [Table 4.6](#)).

1.4.9.1. Units who require currency updates should check with their host ATD site manager for latest status.

1.4.9.2. ATD Motion Requirements. For crewmembers to log flying training events motion systems must be used unless otherwise specified (see [Chapter 4](#) tables for simulator creditable events). KC-135 OFTs modified with motion systems are capable of dramatic change in pitch and roll sufficient to cause occupants to be injured (if not secured). When training or conducting tours aboard the ATD equipped with motion systems, if motion is applied, all parties aboard will occupy a seat and wear the seatbelt; the Instructor Operator Station (IOS) will have a certified operator (see [paragraph 5.6.5](#)). If the amount of people in the ATD exceeds the amount of seats or a certified operator is not aboard, do not use motion.

## 1.5. Waiver Authority.

1.5.1. Do not deviate from the policies and requirements in this instruction. Report deviations or exceptions without waiver through channels to MAJCOM/A3T (or equivalent) who, in turn, should notify the OPR (lead command) for follow-on action if necessary. Units reporting deviations and exceptions will maintain copies of reported deviations/exceptions for two years. Waiver requests will include supporting rationale, the training start date, a summary of the unit's training plan, and estimated completion date.

1.5.2. Unless specified in this instruction, MAJCOM/A3T (or equivalent level) is the designated waiver authority for specific aircrew training requirements in this instruction that are not governed by AFI 11-202 Volume 1 or other AFIs.

1.5.3. OG/CC is designated waiver authority for minimum flying-hour prerequisites for entry into formal upgrade courses (see [Table 5.1](#) and [Table 5.3](#)). **Exception:** Waivers for students attending KC-135 WIC must follow AFI 11-415 and ACC/A3TW.

1.5.4. Formal School Training and Prerequisites. Any planned exception to a formal course syllabus requires a syllabus waiver. See the appropriate formal course syllabus for waiver authority. If required for units' designated mission, events waived or not accomplished at the formal school will be accomplished in-unit before assigning mission-ready (MR) status. For formal school course prerequisite waiver requests, see the appropriate formal course training syllabus. MAJCOM/A3T (or equivalent) is the designated waiver authority, in coordination with AMC/A3TK, for McConnell AFB FTU training.

1.5.5. In-unit Training Waiver. If using ATS Instructor support for in-unit training, MAJCOM/A3T (or equivalent) is approval/waiver authority in coordination with AMC/A3TK. Before approval, review the appropriate syllabus and consider availability of ATS formal instruction and ATD requirements. (See [paragraph 5.4.5](#) for previously certified instructors).

1.5.6. Senior Officer Course (SOC) Waiver. See the appropriate formal course syllabus. Refer to AFI 11-202 Volume 1 for SOC policy and eligibility requirements.

1.5.7. Continuation Training Waiver. The OG/CC (or equivalent) is the designated waiver authority for semi-annual and currency ground training events as specified in [Table 4.1](#), [Table 4.2](#), and [Table 4.3](#) and flying continuation training requirements in [Table 4.4](#), [Table 4.5](#) and [Table 4.6](#) for assigned or attached crewmembers on a case-by-case basis (see [paragraph 4.9](#)). Waivers for training events missed in consecutive training periods will require MAJCOM approval.

1.5.8. MAJCOM Waiver Format. For AMC unit waiver requests, use on-line waiver website accessed through AMC/A3T Community of Practice (CoP) (see [paragraph 1.15.1](#)). AFRC waiver request may use AFRC website (see [paragraph 1.15.6](#)). Ensure the Volume 1 reference paragraph to be waived is included in the waiver request. If necessary, submit a written request through OG/CC or equivalent in the format at [Figure 1.1](#) to the appropriate MAJCOM OPR. Asterisk (\*) items are required for processing. Units will submit waiver requests according to [Table 1.1](#). Place a copy of all flying and ground training waivers/training time extensions in the individual's training folder. For waivers not requiring a training folder, OG/CC (or designated unit) will retain unit file copies of approved

waiver(s) through the appropriate ASEV cycle according to AFI 11-202, Volume 2, *Aircrew Standardization/Evaluation Program*.

**Figure 1.1. Sample MAJCOM Waiver Request Format.**

<p>MEMORANDUM FOR (<i>Waiver Authority</i>)</p> <p>FROM: (<i>Requester</i>)</p> <p>SUBJECT: Waiver Request – (<i>Individual</i>), (<i>Type of Waiver</i>)</p> <ol style="list-style-type: none"> <li>1. <i>*Name and grade.</i></li> <li>2. <i>*Flying organization (assigned or attached).</i></li> <li>3. <i>*Present qualification (include special qualifications/certifications, if appropriate).</i></li> <li>4. <i>*Total flying time; primary aircraft inventory (PAI) time (include instructor or evaluator time, if applicable).</i></li> <li>5. <i>*Waiver request specifics e.g., cite requirement and requested deviation.</i></li> <li>6. <i>*Rationale or justification for waiver request.</i></li> <li>7. <i>Crew qualification to which person is qualifying or upgrading.</i></li> <li>8. <i>Previous attendance at any formal instructor course (include course identifier and graduation date).</i></li> <li>9. <i>Training start date.</i></li> <li>10. <i>If waiver request for time limit, specify mandatory upgrade or qualification date.</i></li> <li>11. <i>Date event last accomplished and normal eligibility period.</i></li> <li>12. <i>Remarks (include formal school courseware required if the waiver request is approved. (e.g. CBT lessons, workbooks, guides, ATS simulator time, etc.)</i></li> <li>13. <i>*Unit point-of-contact (includes name, rank, telephone number, and functional address symbol, and Email address).</i></li> <li>14. <i>Unit address (if requesting formal school courseware)</i></li> </ol> <p style="text-align: center;"><i>(Signature of Requester)</i></p> <p style="text-align: center;"><i>(Title)</i></p>
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**Table 1.1. Processing Waivers to AFI 11-2KC-135V1.**

<b>Waiver Initiated By:</b>	<b>Send waiver request to:</b>	<b>Waiver Reply Will be Sent to:</b>	<b>With Information Copy To:</b>
<b>Active Duty AMC Wing or Group</b>	AMC/A3TK	OG/CC	AETC/A3ZM, if formal training Altus AFB
<b>AETC</b>	Unit training office through AETC/A3V to AETC/A3Z	OG/CC	AMC/A3TK

<b>PACAF</b>	OG/CC to PACAF/A3T	OG/CC	AMC/A3TK
<b>USAFE</b>	OG/CC to USAFE/A3T	OG/CC	AMC/A3TK
<b>AFRC Unit</b>	AFRC/A3TA	AFRC Unit	AMC/A3TK
<b>ANG Unit</b>	NGB/A3O	ANG Unit	AMC/A3TK
<b>Assoc Unit</b>	Host OG/CC (info copy Parent OG/CC) to AMC/A3TK	Host OG/CC	Parent OG/CC
<b>509 WPS WIC</b>	USAFWS/CO to ACC/A3T	USAFWS/CO	AMC/A3TK
<b>NOTE:</b> For formal training waiver requests, units will submit requests through MAJCOM channels. MAJCOMs will in turn submit requests to AETC/A3Z for approval. Associate Units will keep Host OG/CC advised on the status of waivers initiated.			

## 1.6. Use of Flying Hours.

1.6.1. Structure unit flying training missions to achieve optimum training. Any by-product airlift opportunity resulting from training must not degrade the intended training and will comply with applicable Department of Defense Regulation, DoD 4515.13-R, *Air Transportation Eligibility*, AFI 11-401, *Aviation Management*, and AFI 11-202, Volume 1.

1.6.1.1. It is essential that all personnel at every level prevent the misuse of air mobility resources as well as the perception of misuse when planning and executing local or off-station training missions.

1.6.1.2. See AFI 11-2KC-135 Volume 3, *C/KC-135 Operations Procedures*, for off-station training flight requirements.

1.6.2. Training on Operational Missions. Unless specifically prohibited or restricted by weapon system operating procedures or specific theater operations order (OPORD), the OG/CC exercising operational control may approve upgrade, qualification or special qualification training on operational missions. In order to maximize efficient utilization of training resources, 618 AOC Tanker Airlift Control Center (TACC) and tasked units will jointly identify and take maximum advantage of opportunities to conduct appropriate continuation training items which may be conveniently suited to concurrent operational mission segments. Commanders will ensure the training will not impact mission effectiveness and the crewmember receiving training is under the supervision of an instructor of like specialty. See passenger-carrying restrictions in AFI 11-401 and AFI 11-2KC-135 Volume 3.

1.6.2.1. (Added-MILDENHALL) 100 OG/CC approves accomplishment of upgrade, qualification and special qualification training on operational missions.

**1.7. In-Unit Training Time Limitations.** Comply with the time limitations in **Table 1.2**. Crewmembers entered in an in-unit training program for all formal training courses leading to qualification (or re-qualification) should be dedicated to that training program on a full-time basis. In-unit training will begin no later than 45-days (90-days for ARC) after reporting or being attached to a new duty station or unit. When conducting in-unit training, the commander should relieve students of duties not directly related to training.

1.7.1. Training time start date is the date when the first significant training event (training event directly contributing to qualification and upgrade) has begun or 45-days (90-days

ARC) after being attached or assigned to the unit upon completion of the formal school course, whichever occurs first (or as specified in MAJCOM supplement). Examples of significant training events include: Computer-Based Training (CBT), Part Task Trainer (PTT), ATD event, ground training, flight, etc. MPD pilot upgrade to Aircraft Commander time limit begins upon Sq/CC direction to begin completion of the events in [paragraph 5.3.5](#) which leads to AC qualification and certification. Training time ends with the successful syllabus completion.

1.7.2. Sq/CC may extend training time up to 60-days (120-days ARC) through a Memorandum For Record (MFR) or waiver website documentation in training folder; no notification to MAJCOM/A3T (or equivalent) is required. Extensions exceeding 60-days (120-days ARC) require MAJCOM/A3T (or equivalent) approval (AMC AD use AMC/A3T waiver website) and will be requested before the crewmember exceeds upgrade training time limits in [Table 1.2](#)

1.7.2.1. Use the waiver request format specified in [paragraph 1.5.8](#). Include training difficulty, unit corrective action to resolve and prevent recurrence, and estimated completion date.

**Table 1.2. In-Unit Training Time Limitations.**

<b>Training Type</b>	<b>Time Limit</b>	<b>Notes</b>
<b>Initial Qualification</b>	90-days	2
<b>Difference Qualification/Certification</b>	90-days	2
<b>Requalification/Transition Course</b>	90-days	2
<b>Mission Certification Training (MCT)-Conventional</b> Includes in-unit training leading to MR status following initial, difference, or requalification training.	90-days	1,2,4
<b>Mission Certification Training (MCT)-OPLAN-8010</b> Includes in-unit training leading to OPLAN-8010 MR status.	90-days	2,3
<b>Upgrade Qualification or Certification Training (i.e., SOAR, AAR certification).</b>	90-days	2
<b>Upgrade Qualification MPD Pilot to AC</b>	180-days	
<b>Instructor Upgrade</b>	60-days	2
<p><b>NOTES:</b></p> <ol style="list-style-type: none"> <li>1. FAIP/OSA (crossflow, etc.) use 120-days.</li> <li>2. 180-days for ARC.</li> <li>3. Upon completion of initial, difference, or requalification training program and obtaining the appropriate security clearance. Sq/CCs may delay MCT-OPLAN-8010 for operational reasons or lack of security clearance.</li> <li>4. Special Operations Air Refueling (SOAR) certification use 120-days.</li> </ol>		

**1.8. Training Documentation.** KC-135 units will use ARMS to document training. Units will use the AF Form 4324, *Aircraft Assignment/Aircrew Qualification Worksheet*, or AF Forms

1522, *ARMS Additional Training Accomplishment Input*, to update aircrew certifications. See [Chapter 7](#) for specific “Q” codes. Retain hardcopy until individual’s departure. Return the documents to the crewmember upon departure. See [Attachment 2](#) for additional information.

**1.9. Flight Evaluator Usage.** Use Flight Evaluators as Instructors for any phase of training to capitalize on their expertise and experience. If an evaluator is the primary instructor to train an individual, the same evaluator should not administer the associated evaluation.

**1.10. Instructor Training and Supervision Requirements.**

1.10.1. All Instructors should be MR (wing level and below). Instructors must be current and qualified in any event that they instruct. FTU Instructors, including USAF Weapons School (USAFWS) Instructors, are only required to maintain BMC.

1.10.2. Faculty Training Course (FTC). Program developed by FTU for instructors who will be conducting training at the FTU. Only graduates of FTC will be allowed to instruct students at the FTU.

1.10.3. When performing crewmember duties, the following personnel will be under direct supervision of an Instructor of like specialty:

1.10.3.1. All non-current crewmembers. Direct instructor supervision is required while performing the non-current event (see [paragraph 4.9.1.1](#)).

1.10.3.2. All crewmembers in initial qualification flying training unless syllabus states that direct supervision is not required.

1.10.3.3. All crewmembers in upgrade training accomplishing upgrade training events during critical phases of flight, unless the syllabus states that direct supervision is not required.

1.10.3.4. All crewmembers in requalification flying training during critical phases of flight, unless the syllabus states that direct supervision is not required.

1.10.3.5. See [paragraph 5.3.5.1](#) for MPD requirements.

1.10.3.6. All crewmembers designated by the Wg/CC, OG/CC, or Sq/CC.

1.10.4. All unqualified or Flying Training Level (FTL)-E crewmembers require direct instructor supervision during all critical-phases-of-flight.

1.10.5. Only designated ATS contractors or Sq/CC certified USAF crewmembers may operate an OFT or BOWST, as appropriate (see [paragraph 5.6.5](#)).

1.10.5.1. Aircrew members regaining currency in an OFT or BOWST, as appropriate, must be under the supervision of an USAF Instructor or an ATS contract Instructor of like specialty, unless specified in [Chapter 4](#).

1.10.5.2. Aircrew members will not log events for which they are non-current until currency is regained.

**1.11. Distribution.** Units will establish distribution requirements of this AFI.

**1.12. Transfer of Aircrews.** Before a crewmember will interfly from one unit to another, the gaining unit will review and assess their qualification and currency. See also AFI 11-401.

1.12.1. A crewmember qualified in the same Mission-Design Series (MDS) according to AFI 11-202 Volume 2 (e.g., KC-135R/T) will be considered qualified throughout the USAF KC-135 force with the same MDS-model and mission. Certified/qualified MR crewmember transferring between units, accomplish only unit specific training and any applicable events in which they have lost currency. See AFI 11-2KC-135 Volume 3, Chapter 3, Interfly, for additional information.

1.12.2. For Foreign Military Sales (FMS) training and/or exchange officers, see training requirements in AFI 11-401. Initial and/or continuation training requirements are specified in the appropriate MOU, OPLAN, agreements and International Program Directives (IPD) and should mirror training requirements of this AFI to maximum extent possible.

**1.13. Aircrew Training While DNIF.** Crewmembers whose status is designated, “duty not involving flying (DNIF),” may log ground training events, including simulator training, if the member’s physical condition allows it. Consult the Flight Surgeon initiating AF Form 1042, *Medical Recommendation for Flying or Special Operational Duty*, if the DNIF status includes ground training limitations IAW AFI 48-123, *Medical Examinations and Standards*.

**1.14. Aircrew Rated Management Overview.**

1.14.1. Programmed Flying Training (PFT). AETC/A3 designates AETC/A3R to manage the KC-135 PFT process in coordination with KC-135 lead and user commands. The PFT balances available formal training quotas, ATS throughput, schoolhouse capacities and course requirements on a Fiscal Year basis. Annually, units will send projected PFT requirements to their respective MAJCOM training staff. When requested, MAJCOM training staff will forward projections to AF/A3O for inclusion into the Graduate Program Requirements Document (GPRD). AETC/A3R will determine training capacity and report shortfall in the GPRD to AF/A3O.

1.14.1.1. AF/A3O sponsors an annual PFT conference for attendees to consider training capacity, MAJCOM training requests, and pipeline aircrew training students from which AF/A3O will produce the Graduate Program Guidance Letter (GPGL). AETC/A3R publishes the annual PFT based on the GPGL.

1.14.1.2. Throughout the training year, MAJCOM training staff and AETC PFT managers use assigned/allocated training quotas to assign individual crewmembers into the KC-135 formal schools. Daily student quota adjustments to the annual PFT are made on quota management documents. AETC/A3R will publish the quota management documents on AETC PFT/Flying Hours/Metrics Programs CoP.

**1.15. Information Management.** Related mobility aircrew training information, including the HQ AMC Orientation Tour / Global Ready Aircraft Commander Course (GRACC), KC-135 ATS courseware, and simulator status, is available on a series of commercial and military-only websites. CoPs are available through the AF Portal: <https://www.my.af.mil/>, “Communities” link.

1.15.1. AMC/A3T CoP contains valuable training information.

1.15.2. AMC/A3TF CoP contains specific information covering manpower, waivers, and GRACC.

1.15.3. AMC/A3TK CoP contains specific information, links, and other features covering tanker and KC-135 specific training programs.

1.15.4. AMC/A3V maintains a site containing SAV/ASEV inspection guides and schedules, FCIFs, and other features covering the overall MAF and KC-135 standardization/evaluation program. Use site address: <https://private.amc.af.mil/a3/a3v/>.

1.15.5. The ATS Contractor maintains a website containing KC-135 training information, photos, courseware listing, web-based training courseware and testing, etc. Use site address: <https://www.kc135ats.net/>.

1.15.6. AFRC/A3T CoP contains specific information, links, waiver, and other features.

1.15.7. AETC/A3Z website contains USAF formal course information via ETCA at <https://etca.randolph.af.mil>. Training representatives may download approved formal course syllabi via the AETC Bookstore at <https://trss3.randolph.af.mil/bookstore/home/homePage.aspx>.

1.15.8. NGB/A3TM CoP contains specific information, links, waiver, and other features.

**1.16. Failure to Progress or Complete Training.** If a student fails to progress according to syllabus or training requirements, the command accomplishing the training will conduct a Progress Review (PR) IAW AFI 11-202 Volume 1.

**1.17. Career Enlisted Aviator Skill Levels.** CEAs are not tied to AFI 36-2101, *Classifying Military Personnel (Officer and Enlisted)*, skill level upgrade. All enlisted aircrew qualifications are separate and distinct from skill level qualification. Flight evaluations result in an AF Form 8, *Certificate of Aircrew Qualification* IAW AFI 11-202 Volume 2. After an AF Form 8 is completed for the applicable flight evaluation, the crewmember is qualified to perform all duties assigned to that crew qualification regardless of skill level. Aircrew instructor and flight examiner qualifications are also separate and distinct from OJT trainer or certifier designation and are reflected in AFSC by use of “K” prefix (aircrew instructor) and “Q” prefix (standardization and evaluation flight examiner).

**1.18. Aircrew Training Quota Management.** The following information describes AMC's policy and procedures for quota management. This policy was developed from requirements in AFI 36-2201 Volume 1, *Air Force Training Program*, AFI 36-2107, *Active Duty Service Commitments (ADSC)*, and AFI 11-412, *Aircrew Management*. This policy is mandatory for all AMC units. All other units follow MAJCOM/A3T (or equivalent) guidance.

1.18.1. AMC Units: Formal Aircrew Training requirements (except for Simulator Refresher requirements) will be submitted to the appropriate AMC/A3TF quota manager NLT 30 Sep for the following fiscal year. AMC/A3TF will consolidate and crosscheck requests with the Pilot Absorption Management System (PAMS) and submit to Air Staff via the annual Graduate Program Requirements Document (GPRD) Data Call and finalized at the annual Programmed Flying Training (PFT) conference.

1.18.1.1. Other MAJCOMS: Submit Formal Aircrew Training requirements to appropriate MAJCOM Functional Managers NLT 30 SEP for the following fiscal year. The Formal Aircrew Training requirements (except for Simulator Refresher requirements) will be internally coordinated by MAJCOM Functional managers and submitted to Air Staff via the annual Graduate Program Requirements Document

(GPRD) Data Call and finalized at the annual Programmed Flying Training (PFT) conference.

1.18.1.2. **(Added-MILDENHALL)** Quota management and formal training allocations will be coordinated by 100 OG/OGT to USAFE/A3T. Changes to quotas will be coordinated through USAFE/A3T.

1.18.2. OSS training offices will submit the rank, full name, SSAN, course, and class number to AMC/A3TF NLT 45 days prior to class start date (CSD). Please ensure that any internal processes are adjusted to meet this timeline. Training quotas not filled 30 days prior to CSD will be offered to the next unit on the AMC/A3TF standby list. OSS training offices should reconfirm all scheduled training with their units at least 10 days prior to CSD to ensure training notification, ADSC acknowledgement statement, and orders were properly issued. Please submit all candidates for training quotas using email only to: [A3TF.quotamanagement@scott.af.mil](mailto:A3TF.quotamanagement@scott.af.mil).

1.18.2.1. All course prerequisites should be completed NLT 30 days prior to CSD to allow for remedial training or substitution. Units will internally identify an alternate candidate for each allocated quota. If the primary candidate becomes unavailable 30 - 45 days prior to CSD, notify AMC/A3TF with the alternate's information. If the primary becomes unavailable within 30 days of CSD, contact your host MPF formal training section to locally substitute the alternate IAW AMCI 36-2204 - provide a copy of the local substitution letter to AMC/A3TF.

1.18.2.2. Foreign exchange officers cannot be locally substituted (they must also be identified when submitted to load against an allocation), send the replacement's full data to AMC/A3TF.

1.18.3. When submitting local upgrade requests, use the AMC/A3TF waiver website: <https://private.AMC.af.mil/a3/a37t/dot/waivers/userlogin.cfm>.

1.18.3.1. Forward the following information to the appropriate quota manager: rank, name, upgrade, course, projected start, projected completion, and a point of contact. Inform via e-mail when training is complete. If the training being conducted normally incurs an ADSC, insure required counseling and AF Form 63 is completed prior to start of training. Contact your local MPF Formal Training office for additional guidance. MILPDS training RIPs will automatically generate ADSC requirements.

1.18.4. When a training allocation cannot be filled, the OSS training office will notify AMC/A3TF so the quota may be reallocated. If circumstances prevent an identified candidate from attending the training (e.g., DNIF, unable to complete prerequisite training, etc.), inform AMC/A3TF immediately. Return all unused quotas to AMC/A3TF NLT 45 days prior to CSD.

1.18.5. All no-shows and late cancellations within 7 days of CSD must be explained. Forward an initial report of circumstances to AMC/A3TF quota management office within 24 hours of CSD. This initial notification will be followed by a memorandum of explanation from the OG/CC to AMC/A3T within one week. E-mail is the preferred method. Send to: [AMC.A3T@us.af.mil](mailto:AMC.A3T@us.af.mil) and courtesy copy [A3T.QuotaManagement@amc.af.mil](mailto:A3T.QuotaManagement@amc.af.mil).

1.18.6. HQ AMC Orientation Tour / GRACC. Active duty units will be given priority over ARC units due to mandatory upgrade requirements for AMC crews established in **paragraph 5.3.4.3**. Do not submit more than two candidates per wing per class without the GRACC scheduler's approval. Submit names NET 45 days and NLT 30 days prior to CSD. AMC/A3TF will release the class roster 30 days prior to CSD for units to confirm the names and make any necessary corrections. Unfilled quotas will be available 14 days prior to CSD and units will be notified. Cancellations must be received NLT four duty days prior to CSD to avoid a no-show. AMC/A3TF will not accept any additions 72 hours/3 days prior to CSD. Units can still cancel 24 hours prior to CSD to avoid a no-show being charged to the unit. No-shows will be handled IAW this paragraph. Questions regarding GRACC scheduling can be referred to AMC/A3TF, DSN 779-7881.

1.18.7. AMC/A3TF will maintain a standby list for each course offered. Send requests for additional quotas to AMC/A3TF for placement on the standby list. If unit capability is in jeopardy, AMC/A3TF will coordinate with Air Staff and AETC to add or reallocate additional quotas. AMC/A3TF quota managers will coordinate with the OSS training offices exclusively. Squadrons or individuals will be referred to their OSS training office. This policy is to ensure that all offices responsible for quota management are in-synch with each other and prevents lost seats. Please submit the name/phone number/e-mail for the primary and alternate point of contact for quota management in the OSS.

1.18.8. AMC units are prohibited from coordinating quota exchanges with other commands. OSS/OST training offices will forward all requests to the AMC quota manager for coordination with other commands. Please allow for extended coordination time when considering this option.

1.18.9. Senior Officer Training coordination. All Senior Officer training is directed by AF/DPO, AF/DPG offices in coordination with MAJCOM Senior Leaders Management office, AMC/A3TF, and AETC/A3R. Questions regarding Senior Officer training Course, availability and prerequisites can be forwarded to AMC/A3TF at DSN 779-3577. No formal actions to schedule training will be taken until directed by AF/DPO or AF/DPG in conjunction with MAJCOM Senior Leaders Management offices.

## Chapter 2

### INITIAL QUALIFICATION TRAINING

**2.1. General Requirements.** AFI 11-202 Volume 1 defines initial qualification training. This chapter specifies the minimum training requirements for initial qualification, re-qualification, conversion/difference qualification, and senior officer courses. The primary method for initial qualification is to attend and complete the appropriate formal training course listed in the ETCA. When a formal training course (quota) is not available, units may request a waiver to their MAJCOM to conduct a secondary method of training. Secondary method includes the completion of the appropriate formal training course--academic only with follow-on flying training conducted in-unit. As a last resort, request a waiver to complete a formal training course in-unit using the appropriate syllabus, formal school courseware, and simulator training. In the waiver request ([Figure 1.1](#)) the unit must describe the proposed alternative training solution and training schedule (see [paragraph 1.5.5](#)).

**2.2. Initial Qualification Training (IQT) Prerequisites.** Complete initial qualification prerequisites IAW AFI 11-202 Volume 1 and the course syllabus. See [Chapter 6](#) for formal IQT course listing and prerequisites in [Table 5.1](#).

**2.3. Ground Training Requirements.** Complete ground training requirements for initial qualification IAW AFI 11-202 Volume 1 and this instruction. During formal training, aircrews may complete (and receive credit) for Mobility Training and Ancillary Training events in [Table 4.2](#). See the appropriate formal training course syllabus.

2.3.1. If events in [Table 2.1](#) are not accomplished at the FTU, they must be completed at the gaining unit. The FTU will provide the gaining unit with documentation indicating completion of items in [Table 2.1](#) using standard ARMS Event Identifiers. If in-unit training is accomplished in lieu of formal school attendance, unit is responsible for ensuring all requirements are completed.

2.3.2. Completion of initial SERE schools, combat (SS20) or ECAC (SS19) and water (SS32) IAW AFI 16-1301, *Survival, Evasion, Resistance, and Escape (SERE) Operations*, and initial aircrew flight equipment training (during formal school) will establish the follow-on due dates of training (based on the date first completing the course) for recurring survival and aircrew flight equipment training requirements.

**Table 2.1. Initial Qualification Ground Training Requirements.**

Code	Event	Crew Position	Notes
E030	Official Passport-Primary (No-fee/maroon)	All	2,6
	Flight Physical	All	3,6
	Physiological Refresher	All	3,6
G060	Tactics Training	All	2
G070	Aircrew Intelligence Training (AIT)	All	2,6
G090	Anti-Hijacking	All	2,6
G100	Law of Armed Conflict (LOAC)	All	6

G130	Instrument Refresher Course		P, N		
G150	Approach Plate Familiarization Training		B	2	
G182	Hazardous Cargo		P, B	2	
G185	Cargo Loading Training		B	2	
G190	Aircraft Servicing		All	2	
G231	Initial Crew Resource Management (CRM)		All	6	
LL03	Emergency Egress Training - Non Ejection		All	6	
LL06	Aircrew Flight Equipment Training (AFET)		All	6	
SS32	Water Survival Training (Initial)		All	4,6	
SS19	Evasion Conduct After Capture (Initial)		FS	4,6	
SS20	Combat SERE Training (Initial)		P, N, B	4,6	
VT01	Visual Threat Recognition and Avoidance Trainer (Initial)		All	2,7	
<i>All=All crew positions</i>	<i>P=All Pilots</i>	<i>MPD=All MPD Pilots</i>	<i>N=All Navigators</i>	<i>B=All Boom Operators</i>	<i>FS=All Flight Surgeons</i>

**NOTES:**

1. If not accomplished during formal training.
2. Not required for BMC, BAQ crewmembers or SOC graduates not on aircrew mobility status (includes senior officers and staff officers maintaining BAQ).
3. Mandatory grounding item; individual will not fly until required event is accomplished. Flight physicals become due the 366th day after the previous physical and expire after the 455th day or as indicated on the AF Form 1042, whichever occurs first. The required frequency may vary to address waivers and/or individual physical limitations (as determined by the Flight Surgeon), but in no case will exceed 455 days.
4. Initial training is called S-V80-A (CST), S-V88-AL (ECAC) or S-V90-A (WST) IAW AFI 16-1301 (see **paragraph 2.3.2.**). This training is not accomplished at the FTU, but should be completed before member arrives at the gaining unit. If the member arrives at the gaining unit without this training, it should be scheduled as soon as practical. If assigned Flight Surgeon has completed S-V80-A, log SS20 and not SS19.
5. G002 is required with each Permanent Change of Station (PCS) IAW AFI 11-218, *Aircraft Operations and Movement on the Ground*.
6. IAW AFI 11-202 Volume 1, refer to reference publications which provide guidance for accomplishment of ancillary training requirements.
7. All crewmembers will complete VT01; however, this only affects mission ready status for units collocated with a VTRAT device. Non-collocated units must accomplish within 6 months of being declared MR.

**2.4. Flying Training Requirements.** Complete flying training requirements for initial qualification IAW AFI 11-202 Volume 1 and this instruction.

**2.5. Conversion/Differences Qualification Training Requirements.** When possible, qualified instructor aircrew members will provide the training to create an initial cadre. In some instances, it will be necessary for units to form an initial cadre of crewmember personnel for whom specific training qualification requirements may be waived upon request. The following conditions will apply to the management of initial cadre crewmember qualification:

- 2.5.1. Tasked MAJCOM, in-coordination with lead and training command, will develop a training plan for unit conversions.

2.5.1.1. The training plan should include provisions to form a nucleus of crewmembers to include instructor and flight examiners (initial cadre).

2.5.1.2. Initial cadre will not be designated in a crew position higher than currently held, e.g. C-17 Mission Pilot (MP) to KC-135 Evaluator Pilot (EP), unless previously qualified in the conversion aircraft.

2.5.2. Units with unique aircraft modification (e.g., KC-135RT, etc.) or missions (e.g., SOAR, Receiver Air Refueling, etc.) will develop and maintain in-unit difference training programs for assigned/attached crewmembers, if not available, as described in **paragraph 5.6**. Units will submit these training programs to the appropriate MAJCOM/A3T (or equivalent) for approval. Use the appropriate ARMS events in **Table 2.2** and include details in local supplement or OGI.

2.5.2.1. Difference Certification. Sq/CC will complete crewmember certification when difference training is complete and an evaluation is not required. When applicable, annotate “Q0XX Difference Certification” (see **paragraph 1.8** and applicable events in **Chapter 7**). Away from home station, the assigned unit will complete an AF Form 4324 and the individual will hand-carry to their host unit.

2.5.3. In-unit Difference Training. Difference training assumes the student is qualified in the ‘X’C-135 (e.g., OC-135, RC-135, etc.). A formal course may be appropriate (e.g., TX3) or units may develop a Difference Qualification Training (DQT) program based on available training resources (e.g., simulator, CBT, workbooks) and guide in Table 2.2. MAJCOM/A3X staff is approval authority for DQT on case-by-case only.

**Table 2.2. KC-135‘X’ Difference Qualification Training (DQT) Requirements Guide.**

Code	Event	AC	MPD	N	BO	Notes
AA01	Qualification Evaluation	1	1		1	2
A006	MPRS Familiarization Training	1	1		1	4,6
A032	Difference Course (KC-135T-model)	1	1		1	7
G025	Aircraft Field Trip	1	1	1	1	
G251	ATD Difference Training Profiles	3	3			1
LL03	Emergency Egress Training-Non-Ejection	P	P	P	P	4
N010	Tanker RV	P	P			4
N016	Tanker RV, Overrun Procedures	P	P			4
N030	Tanker RV Delta (Point Parallel)	P	P			4
N130	Receiver Rendezvous/Air Refueling	P	P			3,4
N132	Receiver RV Delta	P	F			3,4
N136	Receiver RV Overrun Procedures	P	F			3,4
P007	Stall Recognition and Recovery	P	1			1
P018	PNF Takeoff and Climb Duties	P	P			
P020	Takeoff	P	P			

P026	Takeoff and Climb Procedures	P	P			
P035	PMC Off Takeoff	1	F			1
P040	Sim. Engine Failure, Takeoff Continued	P	P			1
P061	VFR Overhead	P	P			4
P066	Maneuver-Steep Turns	P	P			4
P170	Approach and Go-Around, Sim. Engine Out	P	P			1
P171	Approach and Go-Around, Simulated Engine Out, Rudder Power Off	P	F			1
P180	Approach and Landing, Sim. Engine-Out	P	P			1
P190	Landing	P	P			
P194	Partial Flaps Landing	P	1			
P200	Touch-and-Go Landing	P	F			
P240	Landing Gear Alternate Extension	F	F		P	
P250	Main Flap Manual Operation	F	F		P	
P366	Checklist Procedures and Use	P	P	P	P	
P367	Crew Coordination	P	P	P	P	
Q001	Open-Book Examination (If Required)	1	1	1	1	
Q002	Close-Book Examination (If Required)	1	1	1	1	
Q014	Difference Certification	1	1	1	1	
R011	Receiver AAR, Indoctrination	P	F		1	3,4
R013	Aircraft Receiver AAR	P	F			3,4
R020	Receiver AAR (Night)	P	F			3,4
R035	Receiver AAR (Heavy Onload)	P	F			3,4
R040	Receiver AAR Breakaway & Emergency	P	P	AR	AR	3,4
R050	Receiver AAR, Tanker Autopilot Off	P	F			3,4
R060	Tanker AAR	P	P			4
R061	Tanker AAR Indoctrination	P	P			4
R070	Tanker Breakaway and Emergency	P	P			4
R080	Tanker AAR, Autopilot Off	P	P			4
R180	Radio Silent Visual Signals	P	F		1	3,4,5

AR – As Required; P – Proficient; 1 – One Time Accomplishment

**NOTES:**

1. For collocated units, accomplished in ATD only
2. Pilots in DQT with different power plants will complete AA01 according to AFI 11-2KC-135 Volume 2.
3. For receiver pilots only (BO, as required).
4. Accomplish if not already qualified/certified.
5. Required for SOAR-certified BO only.
6. Reference **paragraph 5.6.4.3.** for event requirements.
7. If equipped.

**2.6. Multiple Qualification.** Crewmembers will attend a formal initial qualification course for dual qualification in different MDS aircraft. Crewmembers maintaining dual qualification in different model aircraft will, as a minimum, maintain FTL-A currency requirements in each aircraft (N/A for senior officers; see **paragraph 2.7**).

2.6.1. KC-135R and T-model aircraft are considered the same MDS and do not meet multiple qualification criteria in AFI 11-202 Volume 1.

**2.7. Senior Officer Qualification Requirements.** AFI 11-202, Volume 1 identifies senior officer qualification requirements. SOC graduates will be assigned FTL-E for continuation training purposes and will not fly unsupervised in a primary crew position (see **paragraph 4.3.2.5**). KC-135 R-model SOC is available on ETCA.

2.7.1. After qualification IAW AFI 11-202 Volume 1 and with OG/CC approval, senior officers (assigned or attached) may seek training which leads to a higher FTL and/or qualification. The unit OSS/OST is responsible for determining training requirements based on the senior officer's flying experience and familiarity with the weapons system. AMC/A3T or appropriate MAJCOM A3T (or equivalent) will approve the proposed training plan prior to execution.

2.7.2. Senior Officers that complete full qualification training requirements will maintain FTL-A continuation training requirements.

**2.8. Flight Surgeons.** Flight Surgeons are allowed to fly locally as defined by OG/CC and log time in their primary MDS while in training for initial (mission) qualification. See **paragraph 3.5** for training requirements.

2.8.1. Flight surgeons assigned to unit will complete all items in **Table 4.3** for initial qualification. Complete flight surgeon testing on AFDL web based training.

2.8.2. **(Added-MILDENHALL)** Local flights include those missions launched from either RAF Mildenhall or RAF Lakenheath with the intent of recovering the aircraft at either RAF Mildenhall or RAF Lakenheath.

**2.9. Requalification Training (RQT).** An aircrew member is unqualified upon expiration of the qualification evaluation, loss of currency exceeding 6 months (for currency items specified in **Chapter 4**), or completion of a qualification evaluation in a different MDS (unless multiple qualification has been approved prior to the evaluation), whichever occurs first. The duration of unqualified time is from the date the aircrew member became unqualified until the specific retraining start date. For ADSCs related to aircrew training, see AFI 36-2107. For additional

requalification training limits and requirements, see AFI 11-202 Volume 1. RQT accomplished at the FTU will follow the appropriate ATS course syllabus (see [Table 6.1](#)).

2.9.1. KC-135 Instructor Requalification. Former KC-135 Instructors who are:

2.9.1.1. Current and qualified in the KC-135, see [paragraph 5.4](#).

2.9.1.2. Unqualified for up to 39 months at the end of a non-flying assignment, or up to 51 months at the end of any active flying assignment may accomplish an in-unit training program (see [paragraph 5.4](#)) or TX3 course. A flight evaluation is required IAW AFI 11-202 Volume 2 and AFI 11-2KC-135 Volume 2, *KC-135 Aircrew Evaluation Criteria*. Crewmembers may simultaneously requalify as an Instructor during in-unit training or while attending TX3 course with approved waiver.

2.9.1.3. Unqualified 39 or more months at the end of a non-flying assignment, or 51 or more months at the end of any active flying assignment, up to 8 Years, will complete TX2 course and a flight evaluation IAW AFI 11-202 Volume 2 and AFI 11-2KC-135 Volume 2. Crewmembers may simultaneously requalify as an Instructor while attending TX2 course with approved waiver.

2.9.1.4. Unqualified for over 8 Years will complete TX1 course and a flight evaluation IAW AFI 11-202 Volume 2 and AFI 11-2KC-135 Volume 2. Crewmembers may not simultaneously requalify as Instructor.

2.9.2. Requalification and Instructor training may be conducted simultaneously. Units conducting simultaneous requalification and instructor training must compare the formal requalification course syllabus, instructor course syllabus, and [Table 2.3](#) to develop an individual training plan. The plan must include all phases of training and an appropriate (suitable) substitute (e.g. CBT, IBT, simulators, number of flights, etc.).

2.9.2.1. For simultaneous requalification at the FTU, the gaining unit's Sq/CC will submit requests to the 97 TRS prior to the training start date. The FTU may decide not to qualify the individual to instructor status based on performance or resources.

2.9.2.2. See AFI 11-2KC-135 Volume 2 for simultaneous Instructor re-qualification training and evaluation requirements.

**Table 2.3. Instructor Requalification Training Guide.**

Code	Event	AC	N	BO	Notes
AA01	Instructor Flight Evaluation	1	1	1	
A018	Aircraft Commander Responsibilities	1			
A006	MPRS Familiarization Training	AR		AR	4,5
A009	Instructor Pre-Attendance Academics Training	1	1	1	7
A032	Difference Course (KC-135R to T-model)	1		1	
A044	Instructor Pre-Attendance Workbook	1	1	1	1
N010	Tanker RV	P			7
P007	Stall Recognition and Recovery	P		F	2

P012	Takeoff-Gyro Mode	P			
P015	Instrument Departure	P			
P020	Takeoff	P			
P040	Simulated Engine Failure, Takeoff Continued	P			
P061	VFR Overhead	P			
P066	Maneuver-Steep Turns	P			
P071	Holding	P			
P072	Penetration (Published or STAR)	P			
P073	En Route Descent	P			
P101	ILS Approach	P			
P102	ILS (Gyro Mode)	P			
P103	PAR Approach (if available)	P			
P110	Non-Precision Approach	P			
P111	VOR/TACAN/FMS Procedures	P			
P112	VOR/TACAN/Localizer/FMS Approach	P			
P117	GPS Approach	P			
P130	Circling Approach	P			
P140	Visual Traffic Pattern	P			
P160	Missed Approach	P			
P170	Appr & Go Around (Simulated Engine Out)	P			2
P171	Appr & Go-Arnd, (Sim Eng Out), Rudder Pwr Off	P			2
P180	Approach and Landing, Simulated Engine Out	P			2
P190	Landing	P			
P194	Partial Flaps Landing	P			
P195	Landing, Simulated Engine Out, 4-Engine T/O	P			2
P200	Touch-and-Go Landing	P			
P215	Landing Attitude Demonstration	P			
P240	Landing Gear Alternate Extension			P	
P250	Main Flap Manual Operation			P	
P355	Troubleshooting AAR Equipment Malfunctions			F	
P360	Mission Planning and Briefing	P		P	7
P366	Checklist Procedures and Use	P	P	P	
P369	Aircraft Equipment Operation	P	P	P	
Q001	Open-Book Qualification Examination	1	1	1	
Q002	Closed-Book Qualification Examination	1	1	1	
Q033	MPRS Certification Training	1		1	4,5

Q043	ATD-OFT/WST Simulator Operator Training	1			
Q044	Tactics Maneuvers Certification	1	1	1	
Q340	Briefing and Control of Passengers	AR	AR	P	
R013	Aircraft Receiver AAR	P			3,6
R040	Receiver AAR Breakaway & Emergency	P		F	3,6
R050	Receiver AAR, Tanker Autopilot Off	P			3,6
R060	Tanker AAR	P		P	
R070	Tanker AAR Breakaway & Emergency Separation	P		P	
R080	Tanker AAR Autopilot OFF	P			
R120	Contacts			P	
R135	Preparation for Contact Procedures			P	
R140	Tanker Manual Contact			P	
	Radio Silent Visual Signals	P		P	3
<i>AR – As Required; P – Proficient; 1 – One Time Accomplishment</i>					
<p><b>NOTES:</b></p> <ol style="list-style-type: none"> <li>1. Student will complete the most recent web-based pre-attendance instructor course if the individual has been unqualified or removed from KC-135 instructor status over 39-months. Complete the course, including testing, before the flight evaluation.</li> <li>2. For collocated units, accomplish in the ATD only.</li> <li>3. Receiver qualified pilots only.</li> <li>4. If not already qualified/certified.</li> <li>5. Reference <b>paragraph 5.6.4.3.</b> for event requirements.</li> <li>6. If equipped.</li> <li>7. Assumes Basic Navigator requalification. SOAR-assigned units will develop/maintain a SOAR training program (see <b>paragraph 2.10.2.</b>).</li> </ol>					

**2.10. Navigator Training.** Navigator training includes three training phases:

2.10.1. Basic Navigator. KC-135 unit level staff navigator who may perform in-flight duties not including rendezvous (RDVZ). These basic Navigator duties are limited to system operation, communication, and crew coordination. Units may also maintain a local training program for initial and requalification training that focus on FMS-3 (B-Kit) operations, Checklist procedures, CRM and communication training. The maximum level of qualification is BMC (FTL-C or FTL-E). See ground and continuation training requirements in [Chapter 4](#).

2.10.1.1. Basic Navigators may fly any sortie with an FMS-3 suite installed. The BMC basic navigator may fly without an instructor of same specialty, once qualified. A BMC navigator may deploy and fly as a staff navigator (mission planning cell, scheduler, etc.). When used, basic navigator will complete requirements in [Table 3.1](#) and [Table 3.2](#). BMC basic navigator will comply with Theater Deployment Requirements (e.g., CONOPS, etc.).

2.10.1.2. Basic Navigators non-current (FTL-E) may fly with an IN or IP to regain their currency (M010) with a FMS-3 Navigator Suite installed.

2.10.2. SOAR Navigator. KC-135 Navigators complement designated SOAR units as additional crewmember. SOAR navigator training is conducted in-unit by 22 ARW, McConnell AFB. SOAR Navigators will be basic-qualified and will maintain MR status for the SOAR mission (USAFWS SOAR Navigators are not required to maintain MR status). See ground and continuation training requirements in **Chapter 4**.

2.10.2.1. SOAR Navigators may fly any sortie with an FMS-3 suite installed.

2.10.2.2. SOAR Navigators non-current in SOAR RV (S036) must fly with a current SOAR IN to regain currency. Non-SOAR sorties may still be accomplished while non-current in only S036.

2.10.3. Instructor Navigator. See **Table 5.3** for minimum flying time requirements. When selected for upgrade, complete course prerequisites (see **paragraph 5.4.2.2**). The CBT or web-based lessons (and testing) are a baseline program followed by completion of the appropriate in-unit developed instructor training and evaluation. Units will develop additional training requirements to meet requirements in **paragraph 5.4**.

## Chapter 3

### MISSION QUALIFICATION AND CERTIFICATION TRAINING

**3.1. Description.** This chapter establishes minimum criteria and training requirements for conventional and/or OPLAN-8010 mission certification training (MCT). All crewmembers will complete initial/re-qualification training prior to becoming mission ready (MR). Except where specifically stated, units conducting initial/requalification training and MCT may arrange mission sequence or sequence training events as necessary to use flying training hours effectively. Crewmembers will be mission ready (MR) before entry in special mission certification or upgrade training unless noted in **Tables 3.1, 3.2, and 3.3** or unless the mission training is specifically directed as pre-MCT (i.e., SOAR and AAR certification). Special mission certifications run concurrent with MCT will not delay MCT completion. Crewmembers in MCT may participate in exercises.

3.1.1. Conventional certification must be completed prior to crewmembers deploying. If operational requirements exist, conventional certification and OPLAN-8010 certification may be conducted separately. If OPLAN-8010 certification is not conducted in conjunction with conventional certification, the crewmember will complete OPLAN-8010 certification as soon as conditions permit (return from TDY, obtain appropriate clearance, etc.)

**3.2. Time Periods for Mission Qualification and Certification Training.** See [paragraph 1.7](#) and [Table 1.2](#) for In-Unit Training Time Limitations. A crewmember will be MR after completion of all ground training and flying training requirements, review and certification by Sq/CC or Review and Certification (R&C) Board IAW AFI 11-202 Volume 2 and appropriate supplement. Completion of ground training requirements in [Table 3.1](#). and flying training requirements in [Table 3.2](#). will result in a crewmember being declared MR – Conventional. Aircraft Commander conventional certification requires Sq/CC approval through the R&C Board according to AFI 11-2KC-135 Volume 2.

3.2.1. MR – Conventional certified AC Initial Qualification (TX1 or TX2) graduates will be counted as a MR pilot for SORTS and TRP purposes and may fly as an FPL, on any crew, including operational missions, upon completion of MCT. TX1 or TX2 graduates are not considered a MR AC and may not fly as the A-code (Pilot-In-Command) until formally certified by the Sq/CC, see [paragraph 5.3](#) for AC upgrade requirements.

3.2.2. Crewmembers in MCT (who are current and qualified), may fly without an Instructor of like specialty on CONUS only training sorties. OCONUS units may allow NMR crewmembers to fly local, routine, and non-contingency overseas sorties in their respective theater. NMR ACs may perform AC duties under supervision of an IP.

3.2.3. For units with an OPLAN-8010 commitment, complete the appropriate training events in [Table 3.3](#) and IAW AMCI 10-450, *Support of Nuclear Planning and Operations*. Completion will result in a crewmember being declared MR – OPLAN-8010. Certification will include a mission briefing to the Wg/CC or designated representative.

3.2.3.1. Units with an OPLAN-8010 commitment will have 100 percent of crewmembers OPLAN-8010 certified (not required for basic or SOAR navigators). Complete events in [Table 3.3](#) before Q010, OPLAN-8010 certification (see [paragraph 3.1.1](#) for exceptions).

3.2.3.2. OPLAN-8010 certification is not required for crewmembers attached for the purposes of maintaining flying currency and expertise (i.e., MAJCOM HQ and NAF assigned crewmembers).

3.2.3.3. Q010 is not required for formal school instructors unless specified in MAJCOM supplement.

3.2.3.4. (**Added-MILDENHALL**) Training for A037, G031, G033, G034, G035, and G036 will be provided as just in time training if the 100 OG is tasked with a mission requiring aircrew accomplishment of these events. IAW paragraph 3.3, the aforementioned training events are not applicable and G030, G040, and G041B will comprise the Q010 certification.

**3.3. Ground Training Requirements.** All crewmembers will complete applicable events in **Table 3.1**, as well as any events not accomplished at the FTU in **Table 2.1**. For units with OPLAN-8010, complete all applicable ground events in **Table 3.3**. MCT is not applicable for senior officers or staff officers who maintain BAQ (except basic Navigator) and may be accomplished concurrently with other training programs or courses.

3.3.1. Local training and CONUS missions may be flown before completing all events except as noted in **Table 3.1**.

3.3.2. If required, complete FTU proficiency (P) events (not accomplished at formal school course) before MR.

3.3.3. MR crewmembers transferring between units (or BMC crewmembers transferring to a BMC unit) will require unit-specific MR or syllabus training events (and events in which they may have lost currency during the change-of-station).

3.3.4. Ground training events accomplished during MCT establishes the crewmember's due dates for subsequent continuation training. Completion of S-V80-A, S-V88-AL, S-V90-A according to AFI 16-1301 and initial aircrew flight equipment training (during formal school) will establish the follow-on due dates of training (based on the date first completing the course) for recurring SS02, SS03, SS05, and G100 requirements.

**Table 3.1. Mission Certification Ground Training Requirements (Conventional).**

Code	Event	Crew Position	Notes
A006	MPRS Familiarization Training	P, B	1,2,9
A032	Difference Course (KC-135T-model)	All	17
E030	Official Passport-Primary (No-fee/maroon)	All	1,4,10,18
E035	Official Passport-Secondary (No-fee/maroon)	All	1,4,10,18,20
G002	Aircraft Marshalling Training and Exam	All	1,2,7,13,16
G003	Flight Line Security Training/Exam	All	1,2,7,12
G041A	Unit Mission Briefing (Conventional)	All	2,6,8, 21
G065	Special Departure Procedures	P	1,2,4
G080	Communication Procedures	P, B	1,7
G081	L-Band SATCOM	N	6,8
G100	Law of Armed Conflict (LOAC)	All	1,4
G120	ISOPREP Review	All	1,2,13

G160	Overwater Navigation Procedures			P, N	2,4
G190	Aircraft Servicing			P, B	1,2,4,5,6
G210	Ground Alert Start Procedures			P, B	1,2,4,6
G280	Small Arms Training			All	7
G989-G992	WST Profile 2 (A-D)			B	2,9
LL01	Aircrew Flight Equipment Familiarization Training			All	1,2,7,14,16
LL03	Egress Training			All	1,2,4,16
LL04	Aircrew Chemical Defense Training (ACDT)			All	1,2,4,7,14
LL05	Egress Training With ACDT			All	1,2,4,7,14
Q016	Conventional Certification			All	2,3,6,8
Q017	ILS PRM			P	1,2,4
Q060/Q070	EMCON 3/4			All	1,2,4,6
Q340	Briefing and Control of Passengers			All	1,2,4,6,13,19
SS01	Local Area Survival Training			All	1,2,7,13,15,16
SS19	Evasion Conduct After Capture (Initial)			FS	4,6
SS20	Combat SERE Training (Initial)			P, N, B	1,4,16
SS32	Water Survival Training (Initial)			All	1,4,16
VT01	Visual Threat Recognition and Avoidance Trainer (Initial)			All	1,2,4,18
XTIN	Theater Indoctrination Training			All	16,22
X170	Annual FCIF Review			All	16
XTAC	Quarterly Tactics Read File Review			All	16
XPAS	PPAS Training			P,N,B	18,23
<i>All=All crew positions</i>	<i>P=All Pilots</i>	<i>MPD=All MPD Pilots</i>	<i>N=All Navigators</i>	<i>B=All Boom Operators</i>	<i>FS=All Flight Surgeons</i>

**NOTES:**

1. Aircraft Commander candidates must be current in this event but are not required to re-accomplish if previously accomplished as a MPD Pilot.
2. Mission-ready crewmembers transferring between flying units only need unit-specific training in these events plus events in which they lost currency.
3. Q016 may be accomplished before aircraft qualification/re-qualification; however, an individual cannot be signed off as MR until all training is complete. Individuals who are at their unit and awaiting start of a formal school may begin MCT ground training and establish reference dates. In-unit training time begins on return from formal school (see **paragraph 1.7.**).
4. Credit may be awarded if the event was accomplished at the formal school or during in-unit upgrade.
5. Not required MAJCOM HQ or NAF assigned crewmembers.
6. Not required for formal school instructors unless specified in MAJCOM Supplement.
7. AFI 11-2KC-135 Volume 1 is not the reference publication governing completion of this event. Refer to reference publications which provide guidance for accomplishment of ancillary training requirements.
8. SOAR Navigator only.
9. Reference **paragraph 5.6.4.** for event requirements.
10. Every effort will be made to ensure Primary and Secondary passports do not expire within 6 months of each other.
11. For units with a primary (or secondary) OPLAN-8010 mission only. MAF MAJCOM with unique requirements may specify exceptions in the appropriate MAJCOM supplement.
12. Only for individuals who are required to drive on the flight line (as determined by the Sq/CC; see **paragraph 7.10.5.**).
13. Accomplish upon arrival after each permanent change of station (see **paragraph 3.3.1.** and **paragraph 3.4.2.**).
14. Reference AFI 11-301 Volume 1 for details.
15. Reference AFI 16-1301 for details.
16. Must be accomplished prior to the first flight.
17. If equipped.
18. Not required for BMC, BAQ crewmembers or SOC graduates not on aircrew mobility status (includes senior officers and staff officers maintaining BAQ).
19. Initial credit may be awarded if previous passenger monitor training was accomplished at current duty station.
20. As long as the application for the Secondary Passport has been submitted, do not delay awarding MR status for E035 Secondary Passport.
21. (Added-MILDENHALL) G041A will be taught on an annual basis by 100th Air Refueling Wing, Plans and Programs (100 ARW/XP).
22. (Added-MILDENHALL) Applies to in-unit requalification trainees as well.
23. (Added-MILDENHALL) One-time event. Not required for RAF Mildenhall mission certification if previously accomplished.

### 3.4. Flying Training Requirements.

3.4.1. BAQ crewmembers pursuing MR status will be assigned a Flight Training Level and accomplish continuation training requirements IAW **Chapter 4**. Continuation training requirements will be prorated based on the training time start date as defined in **paragraph 1.7.1**. Crewmembers will credit events accomplished during MCT IAW **paragraph 4.4.1**. Crewmembers pursuing MR status who fail to accomplish minimum aircrew requirements (currency and semi-annual) must fly in a supervised status IAW **paragraph 4.9.1.1** and **paragraph 4.9.2**.

3.4.2. After arrival at duty station, all crewmembers will receive a local area briefing and supervised local orientation. AC/IPs should accomplish a supervised takeoff, approach and landing. MPDs require a supervised takeoff, approach and landing. Boom operators should accomplish a supervised air refueling.

**3.5. Flight Surgeon Mission Qualification Requirements.** Before deploying or acting as aircrew in any aircraft other than their primary, flight surgeons must fly at least two sorties in their primary aircraft, complete all required ground training events listed in **Table 4.3** (for the primary aircraft), and accomplish flight surgeon testing on the AFDL website.

**Table 3.2. Mission Certification Flying Training Requirements (Conventional).**

Code	Event	AC	MPD	N	BO	Notes
P260	HAVE QUICK Radio Procedures	1P	1P	1P		1,9,12,13
P270	Secure Radio Operation	1P	1P	1P	1P	1,9,12,13
P280	ACDTQT	1P	1P	1P	1P	1,9,12,13
P290	Aircraft Alert Start Procedures	1P	1P		1P	3,9,11
M001	Sortie	1P	1P	1P	1P	
M030	Oceanic Sortie	1P				9,12,13
M050	Tactical Sortie	1P	1P	1P	1P	9,12,13
Q011	Formation Lead Certification	1				12,13
Q021	BRAVO Probe Equipped Receivers				1	4,7,10,13
Q022	CHARLIE Receptacle Equipped Fighters, Day				1	4,5,7,12,13
Q023	CHARLIE Receptacle Equipped Fighters, Night				1	4,5,7,12,13,14
Q028	GOLF Day Heavy Receiver	AR	1		1	2,4,5,6,7,8,12,13
Q029	GOLF Night Heavy Receiver				1	2,4,5,7,12,13
Q033	MPRS Certification Training	AR	AR		AR	1,2,7,10,12,13, 15
Q044	Tactics Maneuvers Certification	1	1	1	1	1,9,12,13
Q579	RNAV/GPS Operations Certification	1	1	1		1,12,13
R165	Radio Silent AAR	1P	1P		1P	1,10,12,13
<i>AR – As Required; P – Proficient; 1 – One Time Accomplishment</i>						

**NOTES:**

1. Aircraft Commander candidates must be current in this event but are not required to re-accomplish if previously accomplished as a MPD Pilot.
2. Pilots may be declared MR when certified in category of receivers required by unit mission.
3. Initial training must be accomplished in the aircraft, all others are creditable in OFT.
4. BO may be declared certified in a specific air refueling category with approval by Sq/CC.
5. SQ/CC may declare a BO MR when certified in category receivers required by unit mission or after accomplishing events Q022, Q023, and Q028. Complete remaining events with an instructor.
6. (MPD & AC only) If Q028 certification is accomplished in unit, Pilot must show proficiency in R080, Tanker AAR Autopilot Off.
7. Reference **paragraph 5.6.4.3.** for event requirements.
8. Day or Night for pilots.
9. Not required for BMC aircrew unless specified in MAJCOM Supplement.
10. Credit may be awarded for Boom Operators if the event was accomplished in the BOWST.
11. Prerequisite for initial P290 is G210 (see **Chapter 7** for more detail).
12. Credit may be awarded if the event was accomplished at the formal school or during in-unit upgrade.
13. Mission-ready crewmembers transferring between flying units only need unit-specific training in these events (plus events in which they lost currency).
14. USAFE or PACAF may elect to postpone Q023 certification for 90 days (in addition to **Table 1.2** timeline) during long-daylight periods in summer.
15. (**Added-MILDENHALL**) IAW 5.6.4.3.2: If accomplishing during MCT do not delay awarding MR status for Q033, MPRS certification. Every effort will be made to accomplish MPRS certification at the first available opportunity; however MPRS Familiarization Training (A006) will still be accomplished during MCT. If accomplishing Q033 after receiving MR status, the requirements of 5.6.4.3.2 must still be complied with and uncertified crewmembers will fly on a MPRS-required sortie under instructor supervision.

**Table 3.3. Mission Certification Training OPLAN-8010 Requirements.**

<b>(OPLAN-8010 committed units only).</b>			
<b>Code</b>	<b>Event</b>	<b>Crew Position</b>	<b>Notes</b>
A037	OPLAN-8010 Performance Training	P	1
G031	Initial Command & Control Procedures	All	1
G033	Unit Alert Procedures	All	1,4
G034	MITO Procedures	All	4
G035	PLZT Goggle (or MIL-G) Training	All	1,3,4
G036	Flash Blindness and Thermal Protection	All	1,4
G040	OPLAN-8010 Study	All	5
G041B	Unit Mission Briefing (8010)	All	5
G190	Aircraft Servicing	All	1, 2
Q010	OPLAN-8010 Certification	All	

<i>All=All crew positions</i>	<i>P=All Pilots</i>	<i>AC=Acft/CCs, IPs &amp; EPs</i>	<i>MPD =All MPD Pilots</i>	<i>N=All Navigators</i>	<i>B= All Boom Operators</i>
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**NOTES:**

1. Aircraft Commander candidates must be current in this event but are not required to re-accomplish if previously accomplished as a MPD Pilot.
2. Credit may be awarded if the event was accomplished at the formal school.
3. G035 must be completed within 60-days of helmet modification; crewmember may be declared MR before completing G035.
4. Mission-ready crewmembers transferring between flying units only need unit specific training in these events (plus events in which they lost currency).
5. (Added-MILDENHALL) G040 and G041B will be taught on an annual basis by 100th Air Refueling Wing, Plans and Programs (100 ARW/XP).

## Chapter 4

### CONTINUATION TRAINING

**4.1. Description.** This chapter establishes the minimum flying and related ground training requirements to maintain currency. The unit commander will ensure each crewmember receives sufficient continuation training to maintain individual proficiency.

**4.2. Aircrew Status.** KC-135 crewmembers are assigned to the following status:

4.2.1. Mission Ready (MR). For Status of Resources and Training System (SORTS), operational tasking, and deployments a MR crewmember is defined as one who is available and qualified in the squadron's mission (will have completed qualification and mission certification training for the applicable crew position in this AFI).

4.2.2. Non-Mission Ready (NMR). A crewmember that is unqualified, non-current or incomplete in required continuation training, or not certified to perform the unit mission. See [paragraph 4.9](#) for specific guidance on crewmembers who are non-current or incomplete in continuation training. NMR crewmembers cannot deploy.

4.2.3. Basic Mission Capable (BMC). A non-mission ready (NMR) crewmember assigned to MAJCOM headquarters, NAF, 618 AOC (TACC), USAFEC, Contingency Response Wing (CRW), Contingency Response Group (CRG), formal school, or Direct Reporting Unit (DRU), who has satisfactorily completed mission certification training, does not maintain MR status, but maintains familiarization in the command's or unit's operational mission. Basic (non-SOAR) Navigators should be assigned BMC.

4.2.3.1. The crewmember may maintain qualification in some aspects of the unit mission and is able to attain full qualification in the unit mission within 45 days.

4.2.3.2. Formal School (AETC) and USAFWS BMC crewmembers are qualified to conduct all aspects of their respective training mission in accordance to their training syllabi. AETC instructors must be qualified in the training/unit mission before performing instructor duties. Current and qualified formal school instructors maintain MR status if they complete the appropriate events in [Chapter 4](#) (events exempted by note).

4.2.3.3. BMC crewmembers may log instructor or evaluator time for the portion of the mission for which they are current and qualified and performing instructor or evaluator duties.

4.2.4. Basic Aircraft Qualification (BAQ). A crewmember that has satisfactorily completed initial qualification training and is qualified to perform aircrew duties in the unit aircraft.

4.2.5. MR, BMC, and BAQ crewmembers must accomplish and/or maintain the requirements in AFI 11-202 Volume 1 (for their respective status) and the appropriate events in the ground and semi-annual flying continuation tables in [Chapter 4](#).

### 4.3. Training Levels.

4.3.1. Sq/CC will assign FTLs to assigned (and attached) crewmembers (see [paragraph 1.4.6](#)). Establish FTL assignments on experience and aircraft proficiency.

4.3.1.1. NMR crewmembers assigned to MAJCOM staff, NAF, 618 AOC (TACC), USAFEC, CRW, CRG, formal school, USAFWS, or direct reporting unit (DRU), are normally categorized as BMC and assigned FTL-A or -E. Basic (non-SOAR) navigators are assigned FTL-C or -E.

4.3.1.2. MAJCOM staff and/or NAF instructor/flight evaluators may fly unsupervised when maintaining FTL-A and applicable ground training in [Table 4.1](#). BMC MAJCOM instructors or evaluators assigned overseas or in the CONUS may fly unsupervised on routine, non-contingency sorties in their respective theaters. Lead Command evaluators may fly unsupervised in any theater when maintaining FTL-A and applicable training in [Table 4.1](#) and [4.2](#).

4.3.1.3. Formal school and USAFWS instructors are exempt from a series of training events (e.g., G182, G190, LL04, P280, Q016, SS02, and SS03) unless specified in MAJCOM supplement.

4.3.2. Flying Training Levels (FTLs).

4.3.2.1. FTL-A Highly Experienced Crewmembers. (As a guide, crewmembers having 10 or more years of operational flying experience) This may include MR or NMR MAJCOM headquarters staff and 618 AOC (TACC) personnel; formal schoolhouse instructors; NAF personnel; USAFEC instructors, Wg/CC, OG/CC, and Sq/CC, Operations Officers, crewmembers assigned to OG evaluation positions, and Instructors assigned primarily to staff duties. Sq/CC may assign highly experienced MR line crewmembers to FTL-A.

4.3.2.2. FTL-B Experienced, MR Crewmember. (As a guide, crewmembers having between 5-10 years of operational flying experience).

4.3.2.3. FTL-C MR Crewmember or BAQ Crewmember pursuing MR status after initial qualification training. (As a guide, crewmembers having less than 5 years of operational flying experience) Initially assign inexperienced MR crewmembers to FTL-C.

4.3.2.4. FTL-D No longer used.

4.3.2.5. FTL-E — BAQ or BMC non-instructor staff. May include senior officers, MAJCOM, NAF, 618 AOC (TACC) staff, and attached flyers who are not maintaining MR or instructor status. FTL-E requirements are insufficient for MR status and crewmembers assigned to FTL-E will fly with an Instructor of like specialty at all times (see [paragraph 1.10.4](#)). BMC Basic Navigators see [paragraph 2.10.1](#). FTL-E aircrew are encouraged to complete all available continuation training events.

4.3.2.6. Change of FTL. Once the semi-annual period begins, do not move a crewmember to a level requiring fewer events. *Exception:* Units associating FTLs with crew positions may change FTLs after upgrade is complete (i.e., Instructor upgrade). BAQ crewmembers may be placed into a different FTL any time after attaining MR status. Prorate events upon changing training levels.

4.3.3. Ground Training Levels (GTL). Operational flying includes all MAF aircraft flight training where the aviator receives periodic continuation training. Separate levels are no longer used. All crewmembers will follow the frequency listed for their crew position in **Table 4.1** (see notes for applicable exceptions).

**4.4. Training Events/Tables.** ARMS training event identifiers and event descriptions are listed in **Chapter 7**. The unit may designate Unit Defined Events (UDE) as a “X” event (i.e., X020) and will include local “X” event identifiers in OG/CC level guidance (see **paragraph 7.22**).

4.4.1. Crediting Event Accomplishment. Credit required events accomplished on training missions (i.e., MCT, local requalification training, and local training sorties), operational missions and satisfactory qualification evaluations toward the crewmembers currency and continuation training requirements. Event completion establishes a subsequent due date. Use date of last satisfactory evaluation as the date of accomplishment for all flying training currency events that were trained during an ATS formal course. Pilots may credit G261, G262, G263, and G264 upon satisfactory completion of the formal course evaluation (use the evaluation date as the date of accomplishment). ATS courses are listed in **Table 6.1** (see **paragraph 4.8** for proration).

4.4.1.1. Credit all AC Upgrade and Instructor course training event accomplishments toward continuation training requirements for the crew position in which the individual is currently qualifying, including upgrade training done in the left seat and pre- (or post) Instructor course pilot training done in the right seat.

4.4.2. For an unsatisfactory flight evaluation, do not log continuation training events items graded Q-3 (according to AFI 11-2KC-135 Volume 2) until re-qualified.

4.4.3. Make-up training (ground or flying) is creditable towards the new training period.

4.4.4. Instructor training requirements and responsibilities. Instructors and Flight Examiners may credit 50 percent of their total continuation training requirements per event while instructing or evaluating when the events requirement is 2 or more. **Exception:** Instructor and Flight Examiner Pilots may not credit takeoff or landings flown by another pilot. Instructor and Flight Examiner Boom Operators may not credit R070, R073, R100, R120, R125, R130, R140, R150, R155, R165 accomplished by another Boom Operator. Boom Operators may credit P270, P271, and P300 accomplished by another Boom Operator while observing, instructing, or evaluating.

4.4.5. ARMS. Record all training events in ARMS (with the appropriate exemptions, notes, and adjustment in the course descriptions).

4.4.5.1. Training events conducted during block training or phase training may be consolidated under one ARMS entry.

4.4.5.2. Use one ARMS entry for combined training events.

4.4.5.3. Input all one-time events and events required for Permanent Change-of-Station (PCS) in the ARMS database.

4.4.5.4. Flying events accomplished in the simulator as allowed in **Tables 4.4, 4.5, and 4.6** will be coded with an “S” prefix in ARMS. All simulator accomplishments must be documented and tracked in ARMS.

#### 4.5. Continuation Training Requirements.

4.5.1. Completion and tracking of continuation training is the responsibility of the individual crewmember. Crewmembers shall actively work with unit schedulers and training offices to ensure their continuation training is accomplished as described in this chapter.

4.5.2. Ground Training Events. Crewmembers will comply with requirements of **Table 4.1**, **Table 4.2**, and **Table 4.3**.

4.5.2.1. For Pilots, Navigators, and Boom Operators, failure to accomplish events in **Table 4.1** leads to non-mission ready status. See **paragraph 4.9** for exceptions and for regaining mission ready status.

4.5.2.2. For Pilots, Navigators and Boom Operators, failure to complete mobility training in **Table 4.2** does not lead to non-mission ready status, but may restrict member from certain missions. Mobility training items for attached personnel (i.e., MAJCOM, NAF, USAFEC, etc.) are not required to be tracked at unit of attachment unless deploying with attached unit. These individuals mobility requirements will be determined and tracked by assigned unit's Unit Deployment Manager (UDM).

4.5.2.3. Crewmembers attached to units (i.e., NAF, MAJCOM, USAFEC, etc.) may accomplish ground training events at locations other than their unit of attachment. The crewmember is responsible for reporting accomplished training events to their unit of attachment (ARMS office).

4.5.2.4. Crewmembers performing alert duty may accomplish ground training that does not degrade required response time or mission accomplishment. Specify requirements and or restriction in MAJCOM supplement and local supplement or OGI.

4.5.2.5. Flight Surgeons use requirements in **Table 4.3**. Note 2 indicates mobility events; failure to accomplish these events does not lead to non-mission ready status, but may restrict member from certain missions. Failure to complete all other events leads to non-mission ready status. See **paragraph 4.9** for exceptions and for regaining mission ready status.

**Table 4.1. Aircrew Ground Continuation Tng Requirements.**

<b>(Failure to Accomplish = NMR).</b>					
<b>Code</b>	<b>Event</b>	<b>Crew Position</b>	<b>Freq</b>	<b>Reference Directive</b>	<b>Notes</b>
	Flight Physical	All	455D	<i>AFI 44-170, AFI 48-123</i>	1,4,11,14,15
	Physiological Refresher	All	60M	<i>AFI 11-403</i>	1,4,11,15
G030	OPLAN-8010 Command & Control Procedures.	P, B	Q	<i>AMCI 10-450</i>	2,3,10,13
G040	OPLAN-8010 Study	P, B	Q	<i>AMCI 10-450</i>	2,3,10,13
G041A	Unit Mission Briefing (Conventional)	All	AR		2,13, 21
G041B	Unit Mission Briefing (8010)	P, B	A	<i>AMCI 10-450</i>	2,3,13
G060	Tactics Training	All	SA		2,8,13,17

G070	Aircrew Intelligence	All	A	<i>AFI 14-105 w/supp AFI 14-202V1 AFI 14-MDSV1</i>	2,8,15
G080	Communications Procedures	All	365D	<i>AFI 33-201V2</i>	2,4,8,13,15, 16
G090	Anti-hijacking	All	T	<i>AFI 13-207</i>	2,15
G130	Instrument Refresher Course	P, N	4Q	<i>AFMAN 11-210</i>	1,4,7,15
G145	MPRS Refresher Training	P	A		8,9,12
G150	Approach Plate Familiarization	B	A		
G182	Hazardous Cargo Training	P	T		2
G182A	Hazardous Cargo Training	B	24M	<i>AFMAN 24-204</i>	2
G185	Cargo Loading Training	B	A		2,8
G190	Aircraft Servicing	P, B	T		2,3,13
G210	Ground Alert Start Procedure	P, B	A		2,3,8,13
G215	EADI Multifunction Display	B	B		2,13
G220	Aircraft Systems-CBT/GST	P	A		1,6
	Aircraft Systems-CBT/GST	N	AR		1,6
G221	Datalink Refresher—CBT	P	A		9,18
	Datalink Refresher—CBT	N	A		2,18
G227	APU—CBT	B	B		1
G228	Electrics and Fuel Systems	B	A		1
G229	AAR Systems	B	A		1
G230	CRM Refresher Training	All	A	<i>AFI 11-290</i>	1,6,15,19
G755	ROBE Training	All	AR		4
G802	SOAR Ground Training	All	A		2,5
LL03	Emergency Egress Training - Non-Ejection Seat	All	T	<i>AFPD 11-3 AFI 11-301V1</i>	1,4,15
LL06	Aircrew Flight Equipment Training (AFET)	All	T	<i>AFI 11-301</i>	1
NV03	NVG Ground Refresher	P, B	20M	<i>AFI 11-202V1</i>	5,15
SS02	Combat SERE Training	All	36M	<i>AFI 16-1301</i>	2,4,15
SS05	Water Survival Training	All	36M	<i>AFI 16-1301</i>	2,15
Q010	OPLAN-8010 Certification	P, B	A		2,3,4,13
VT05	Threat Recognition Refresher	All	A		20,21
X170 (Added-Mildenhall)	Annual FCIF Review	All	A	<i>AFI 11-202v1 USAFESUP</i>	
XTAC (Added-Mildenhall)	Quarterly Tactics Read File Review	All	Q	<i>AMCI 11-207</i>	

*A-Annual, B-Biennial, D-Days, M-Months; Q-Quarterly, SA-Semi-Annual, T-Triennial*

<i>All=All crew positions</i>	<i>P=All Pilots</i>	<i>AC=Acft/CCs, IPs &amp; EPs</i>	<i>MPD =All MPD Pilots</i>	<i>N=All Navigators</i>	<i>B= All Boom Operators</i>
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**NOTES:**

1. Failure to accomplish recurring ground events will result in “do not fly status” until the training is accomplished. See the appropriate event descriptions.
2. Not required for BMC or BAQ aircrew unless specified in this AFI (e.g. Basic Navigator see **paragraph 2.10.**).
3. Only required for units with OPLAN-8010 requirements or as directed by MAJCOM. For USAFE/PACAF, currency is (As Required) for G030 and G040.
4. The OG/CC is not the waiver authority for this event. Consult the reference directive for this event to determine the appropriate waiver authority.
5. Special Operations Air Refueling (SOAR)-certified crewmembers only.
6. Credit during initial, upgrade, and re-qualification training to establish a reference date.
7. Crewmembers on active flying status must complete IRC every fourth quarter after completion IAW AFMAN 11-210. This course is not linked with the IRC examination which is to be completed in the check cycle.
8. Local sorties not requiring this event may be accomplished while non-current for this event (see **paragraph 4.9.3.1.**). Crewmembers are not NMR for local sorties not requiring this event.
9. As Required for BMC crewmembers.
10. OPLAN 8010 only. Crewmembers that go NMR for this event must receive training for the current quarter as well as training from the previous quarter. Crewmembers that are delinquent in this event for consecutive quarters will be decertified from the OPLAN 8010 mission and must receive initial OPLAN 8010 certification training, as described in **Table 3.3.** and **paragraph 3.2.3.**
11. Flight Physical and Physiological Training are tracked on the top of each crewmember’s Individual Training Summary (ITS). Therefore, there is no longer a need to assign and track these training events in the training module of ARMS.
12. Required after one-time Q033 MPRS Certification.
13. Not required MAJCOM HQ or NAF assigned crewmembers.
14. Individual will not fly until required event is accomplished. Flight physicals become due 366 days after the previous physical, and expire after the 455th day or as indicated on the AF Form 1042, whichever occurs first. The required frequency may vary to address waivers and/or individual physical limitations (as determined by the Flight Surgeon), but in no case will exceed 455 days.
15. AFI 11-2(MDS) Volume 1 is not the governing directive for completion of this event. Refer to reference publications for current ancillary training frequencies.
16. OG/CC may approve an extension of six months.
17. OG/CC may specify an alternate frequency for Tactics training, but not more than annual.
18. If overdue, may not fly sorties in a datalink environment.
19. Dual log with G240.
20. Initial VTRAT (VT01) is a prerequisite to VT05.
21. If collocated, VT05 must be accomplished in the VTRAT device. If not collocated with a VTRAT device, complete the VTRAT VT05 CBT.

**Table 4.2. Aircrew Specific Mobility Training Requirements.**

<b>(Failure to Accomplish = Restrictions May Apply*).</b>				
<b>Code</b>	<b>Event</b>	<b>Freq</b>	<b>Reference Directive</b>	<b>Notes</b>
C040	Mobility Folder Review	AR	<i>AFMAN 10-401V2 AFI 36-507</i>	1,3,4
E030	Official Passport-Primary (No-fee/maroon)	AR	<i>Foreign Clearance Guide</i>	3,4,5,7
E035	Official Passport-Secondary (No-fee/maroon)	AR	<i>Foreign Clearance Guide</i>	3,4,5,7
G120	ISOPREP Review	180D	<i>JP 3-50</i>	3,4,6
G280	Small Arms Training	24M	<i>AFI 36-2226 AFI 31-207</i>	3,4
LL04	Aircrew Chemical Defense Training	B	<i>AFI 11-301v1</i>	
SS03	Conduct After Capture	36M	<i>AFI 16-1301</i>	4
SS07	Contingency SERE (HRI)	AR	<i>AFI 16-1301COCOM Directive</i>	2,3,4
<i>A-Annual, AR-As Required, B-Biennial, M-Months</i>				
<b>NOTES:</b>				
1. See UDM for Mobility Folder Review frequency and additional USAF Ancillary and Mobility requirements.				
2. Units may use suffix “(E)” for Enduring Freedom AOR, “(I)” for Iraqi Freedom and “(H)” for Horn of Africa.				
3. The OG/CC is not the waiver authority for this event. Consult the reference directive for this event to determine the appropriate waiver authority. <i>*Failure to accomplish events may restrict a crewmembers ability to participate in missions that require the event. (i.e., contingency missions)</i>				
4. AFI 11-2KC-135 Volume 1 is not the governing directive for completion of this event. Refer to reference publications for current ancillary training frequencies.				
5. Every effort will be made to ensure Primary and Secondary passports do not expire within 6 months of each other. See event description in <b>Chapter 7</b> for additional information.				
6. Frequency in cited reference is annual while MAF aircrews standardize at 180 days.				
7. Passport due date in ARMS should be 3 months before passport expiration to prevent passport from expiring.				

4.5.3. Flying Continuation Training Requirements. Use **Table 4.4**, **Table 4.5**, and **Table 4.6**. See **Chapter 7** for event descriptions.

4.5.3.1. ATD Credit for Training Requirements. Flight events creditable in the ATD are listed in **Table 4.4**, **Table 4.5** and **Table 4.6** (see **paragraph 4.4.5.4** for ARMS tracking). Both continuation training events and other events are listed.

4.5.3.1.1. ATS contract instructor’s supervision meets the requirements for continuation training events requiring instructor or direct instructor supervision.

4.5.3.2. As a minimum, senior officer and all other crewmembers maintaining BMC or BAQ status in the KC-135 will maintain FTL-E. Senior officers on MR status will

comply with **Table 4.4, Table 4.5**. This requirement also applies to additional aircraft in which a senior officer may be qualified (see multiple qualification). Attached aviators may conduct flight training at other locations; however, interfly agreements and other documentation (ie...ITS, AF Form 1042, and other Go/No-Go documentation) may be required. See AFI 11-401 and AFI 11-2KC-135 Volume 3 for passenger carrying restrictions.

4.5.3.3. Each MAJCOM provides flying-hours to each wing as training, test, and ferry hours or organizational and maintenance (O & M) hours. Allocated flying hours are based on FTL-C, and are designed to provide all crew positions with sufficient hours to accomplish all continuation flying training requirements with percentage of completion aboard flight simulators.

4.5.3.4. Mission Oriented, Proficiency, and Phase simulator profiles (G240, G250, and G261-G264) will be flown in the same manner as the aircraft, to include the wear and use of professional gear (headsets, gloves, etc.).

4.5.3.4.1. Simulator profiles will be scheduled as ground events in the primary scheduling program (GDSS II, GTIMS, PEX, etc.) and event cancellation authority will reside with the OG/CC (or designated representative).

4.5.3.4.2. Simulator training pre-requisites (i.e., CBT, profile courseware/workbook, etc.) must be completed prior to the simulator start time or the training will be cancelled. **Exception:** ARC members should accomplish pre-requisites prior to Phase simulators, but the event will not be cancelled if a required CBT is not accomplished.

**4.6. Flight Surgeon Continuation Flying Requirements.** Flight Surgeons will comply with the requirements of this volume and AFI 11-202, Volume 1. Flight Surgeons require one sortie in any qualified MDS every 60 days (see [paragraph 4.9.1.1.5](#) for regaining mission ready status). Reference [Table 4.3](#) for Flight Surgeon ground and flight continuation training requirements.

4.6.1. Any Flight Surgeon logging time in this MDS as a secondary airframe, or any AMC-assigned Flight Surgeon logging time in any DoD or foreign military aircraft in which they are granted authorization to fly by the local unit, must be on Aeronautical Orders assigning ASC 8A status and be current in their periodic flight physical and physiological training. The AC or their designated crewmember must also give the FS a briefing on oxygen equipment and egress procedures prior to flight. Note: Initial Qualification requirements (in **Chapters 2 and 3**) only apply to a Flight Surgeon's primary aircraft.

4.6.1.1. For contingency/AOR missions, Flight Surgeons must also be current in the following events (in their primary aircraft): SS02, SS03, SS19 (S-V88-AL) or SS20 (S-V80-A), and G120.

4.6.1.2. Notify the MAJCOM/SG when Flight Surgeons fail to meet semi-annual or annual requirements. MAJCOMs establish procedures to assess continued active flying authorization. Place a copy of the MAJCOM/SG notification in the member's flight training folder.

Table 4.3. Flight Surgeon Continuation Training and Mobility Requirements.

<b>(Failure to Accomplish = Restrictions May Apply; see paragraph 4.5.2.5).</b>				
<b>Code</b>	<b>Event</b>	<b>Freq</b>	<b>Reference Directive</b>	<b>Notes</b>
	Flight Physical	455D	<i>AFI 44-170</i>	1,3,5,6
	Physiological Training	60M	<i>AFI 11-403</i>	1,3,6
C040	Mobility Folder Review	AR	<i>AFMAN 10-401V2</i> <i>AFI 36-507</i>	2,3,4,6
E030	Official Passport-Primary (No-fee/maroon)	AR	<i>Foreign Clearance Guide</i>	2,3,6
E035	Official Passport-Secondary (No-fee/maroon)	AR	<i>Foreign Clearance Guide</i>	2,3,6
FF00	Flight Surgeon Sortie	60D 6 per SA	<i>AFI 11-202V1</i>	3,8,9,11
FF01	Total Day Flight Surgeon Sortie	AR	<i>AFI 11-202V1</i>	3,10
FF02	Total Night Flight Surgeon Sortie	SA	<i>AFI 11-202V1</i>	3
FF11	Primary Day Flight Surgeon Sortie	AR	<i>AFI 11-202V1</i>	3,8,9
FF12	Primary Night Flight Surgeon Sortie	AR	<i>AFI 11-202V1</i>	3,8,9,10
FF21	Non-Primary Day Flight Surgeon Sortie	AR	<i>AFI 11-202V1</i>	3
FF22	Non-Primary Night Flight Surgeon Sortie	AR	<i>AFI 11-202V1</i>	3,10
G090	Anti-Hijack Training	T		6
G120	ISOPREP Review	180D	<i>JP 3-50</i>	2,3,6,12
G230	CRM, refresher	A		4,6
LL01	Aircrew Flight Equipment Familiarization	OT	<i>AFI 11-301V1</i>	3,4
LL03	Emergency Egress Training, Non-Ejection Seat	B	<i>AFI 11-301V1</i>	1,3,6
LL04	Aircrew Chemical Defense Training (ACDT)	OT	<i>AFI 11-301V1</i>	2,4,6
LL05	Egress Training with ACDE	OT	<i>AFI 11-301V1</i>	2,3,4,6
LL06	Aircrew Flight Equipment Training (AFET)	T	<i>AFI 11-301</i>	1
Q001	AFDL FS Test	17M	<i>AFI 11-2MDSV2</i>	3
SS01	Local Area Survival	AR	<i>AFI 16-1301</i>	2,3,4,6
SS02	Combat SERE Training (CST)	36M	<i>AFI 16-1301</i>	2,6,7
SS03	Conduct After Capture (CAC)	36M	<i>AFI 16-1301</i>	2,6,7
SS05	Water Survival Training (WST)	36M	<i>AFI 16-1301</i>	6
SS07	Contingency SERE Indoctrination (CSI)	AR	<i>AFI 16-1301,</i> <i>COCOM Directive</i>	2,3,6
<i>A-Annual, AR-As Required, B-Biennial, D-Days, M-Months, OT-One Time</i>				
<b>NOTES:</b>				
1. Mandatory grounding item.				
2. Flight Surgeons without an aviation unit mobility requirement (e.g. non-operational staff or				

- leadership role in Aerospace Medicine, and Flight Surgeons undergoing training in the USAF Residency in Aerospace Medicine) do not need to accomplish this training.
3. The OG/CC is not the waiver authority for this event. Consult the reference directive for this event to determine the appropriate waiver authority.
  4. Accomplish upon arrival after each permanent change of station or change in MDS.
  5. Flight physicals become due 366 days after the previous physical, and expire after the 455th day or as indicated on the AF IMT 1042, whichever occurs first. The required frequency may vary to address waivers and/or individual physical limitations (as determined by the Flight Surgeon), but in no case will exceed 455 days.
  6. AFI 11-2MDS Volume 1 is not the governing directive for completion of this event. Refer to reference publications for current ancillary training frequencies. Every effort will be made to ensure Primary and Secondary passports do not expire within 6 months of each other. See event description in Chapter 7 for additional information.
  7. S-V80-A establishes an initial training completion date for SS02, SS03, and SS20. S-V88-AL establishes an initial training completion date for SS02, SS03, and SS19.
  8. Flight surgeons must fly at least 50 percent of their annual minimum requirements in primary unit aircraft unless deployed away from their primary unit for more than 90 days.
  9. Flight surgeons may log more than one sortie per day; however, no more than one sortie per single calendar day will be credited towards semi-annual and annual sortie requirements.  
**Exception:** Credit ARC Flight Surgeons with a maximum of two sorties for separate flights performed in a single calendar day, provided the interval between flights does not exceed 60 days and a minimum of 6 missions are flown each 6 months (see AFI 11-202 Volume 1 Table 1).
  10. A night sortie is one on which either takeoff or landing and at least 50 percent of flight duration or one hour, whichever is less, occurs during night time, as defined in AFI 11-401.
  11. To maintain currency, time between flights must not be more than 60 days. Notify the MAJCOM/SG when time between flights exceeds 60 days. MAJCOMs establish procedures for flight surgeons to regain flying currency.
  12. Frequency in cited reference is annual while MAF aircrews standardize at 180 days.

**Table 4.4. KC-135 Pilot Semi-Annual Continuation Flying Requirements.**

Code	Event	Aircraft Commander					MPD				Credit in OFT			Notes
		A	B	C	E	CUR	A	B	C	CUR	%	Maintain	Regain	
F020	Formation	1	1	2			1	1	1		100			1,2,6,18,20
F030	Large Formation	A	A	A			A	A	A		100			1,2,6,20
F060	AAR Formation	1	1	2			1	1	2		100			1,2,6,18,20
G240	CRM MOST Sim					SA				SA				23,24,29
G250	Proficiency Sim	1	1	2		SA	1	1	2	SA	100			17,23,29,31
G261-264	Refresher Sim, Phase 1-4					Q				Q	100			23,29,32

M007	CNS/ATM Data Link	A	A	A			A	A	A		100			1,6,12,20,22
M010	Proficiency Sortie	2	2	2			2	2	2		100			
M020	Unit Specific Tng Sortie	4	4	4			4	4	4					1
M030	Oceanic Sortie	A	A	A			A	A	A					1,2,5,6,13,20
M050	Tactical Sortie	A	A	A			A	A	A		100			1,2,6,20,26,27
N010	Tanker RV	4	5	6		Q	4	5	6	Q	100	Y	Y	6,20
N020	Tanker RV Golf	1	1	2			1	1	2		100			1,6,20
N030	Tanker RV Delta	1	1	2			1	1	2		100			1,6,12,20
N040	Tanker RV Alpha	1	1	1			1	1	1		100			1,2,6,20
N110	Communication Procd.	1	1	2			1	1	2					1,2,6,7,16
P010	Takeoff-Initial	2	4	6	2	Q	2	4	6	Q	100	Y	Y	
P020	Takeoff	8	10	12	6	M	8	10	12	M	100	Y	Y	9
P028	Right Seat Takeoff										100			25
P029	Left Seat Takeoff						2	3	3	Q	100			25,29,30
P030	Max Mode T/O—30 Flap	1	1	1			1	1	1		100			
P040	Sim Eng Fail, T/O Cont	2	2	2		Q	2	2	2	Q	100	Y	Y	8, 9,29
P061	VFR Overhead	A	A	A			A	A	A		100			1,2,6,26,27
P062	Tactical Departure	A	A	A			A	A	A		100			1,2,6,20,26,27,28
P063	Tactical Arrival	1	1	1			1	1	1		100			1,2,6,20,26,27,28
P064	Slide Exercise	1	1	1			1	1	1		100			1,2,6,12,20,26, 27
P065	Scram Exercise	1	1	1			1	1	1		100			1,2,6,20,26,27
P066	Maneuver-Steep Turns	1	1	1			1	1	1		100			1,2,6,26, 27
P067	Mid Mission Join-up	A	A	A			A	A	A		100			1,2,6,20,26,27
P068	Combat Descent	A	A	A			A	A	A		100			1,2,6,20,26,27
P069	Defending Climb	A	A	A			A	A	A		100			1,2,6,20,26,27
P070	Instrument Approach	6	8	12	6	M	6	8	12	M	100	Y	Y	9
P100	Precision Approach	3	4	6	2		3	4	6		100			
P110	Non-Precision Approach	3	4	6	1		3	4	6		100			
P117	GPS Approach	2	2	2			2	2	2		100			22
P130	Circling Approach	1	2	2			1	2	2		100			

P140	Visual Traffic Pattern	2	2	2			2	2	2		100			
P160	Missed Approach	2	3	3			2	2	2		100			
P170	Appr & Go Around (Sim Engine Out)	2	3	3		Q	2	3	3	Q	100	Y	Y	8,29
P180	Appr & Landing (Sim Engine Out)	2	2	2		Q	2	2	2	Q	100	Y	Y	8,29
P190	Landing	8	10	12	6	M	10	14	18	M	50	Y	Y	14
P192	Landing, Night (Unaided)	2	2	2	2	Q	2	2	2	Q	50	Y	Y	10,14
P194	Landing, Partial Flaps	2	2	2			2	2	2		100			
P198	Landing, Right Seat										100			25
P199	Landing, Left Seat						2	3	3	Q	100			25,29,30
P200	Touch and Go Landing					M					100	Y	Y	1,6,9,15,30
P260	HAVE QUICK Procedures	1	1	1			1	1	1					1,2,6,11
P270	Secure Radio Operations	1	1	1			1	1	1					1,2,6,11
P271	Authentication Procedures	1	1	1			1	1	1					1,2,6
P280	ACDTQT	T	B	A			T	B	A		100			1,2,6
P290	Aircraft Alert Start Procedures	A	A	A			A	A	A		100			1,2,6,12, 20,21
R010	Receiver AAR	4	5	6		Q					100	Y	N	6,When Available
R013	Receiver AAR, Aircraft	2	2	3		Q						N	N	4,6,19
R020	Receiver AAR (Night)	1	2	3							100	Y	N	4,6
R035	Receiver AAR (Heavy Onload)	A	A	A										4,6
R040	Receiver AAR Bkwy & Emer. Sep.	1	1	1			1	1	1		100	Y	N	4,6
R050	Receiver AAR Tanker Autopilot OFF	1	2	2										4,6
R060	Tanker AAR	4	5	6		Q	4	5	6			N	N	6,20
R070	Tanker AAR Bkwy Procedures	2	2	2			2	2	2					20
R080	Tanker AAR Autopilot OFF	2	3	3			2	3	3					
R100	Tanker AAR Heavy Receiver	1	1	2			1	1	2					20
S036	SOAR RV	1	1	1			1	1	1					3,6
S200	NVG Operations	1	1	1			1	1	1					3,6

A-Annual, B-Biennial, M-Monthly, Q-Quarterly, SA-SemiAnnual, T-Triennial, Y-Yes, N-No

**NOTES:**

1. Not required for BMC aircrew unless specified in MAJCOM Supplement.

2. Not required for formal school or USAFWS instructors unless specified in MAJCOM supplement.
3. SOAR-certified pilots only.
4. Receiver qualified pilots only. Loss of currency (R010, R013) or failure to complete semi-annual volume requirement (R010, R013, R020, R035, R040, and R050) does not result in a loss of mission ready status. Crewmembers may continue to participate unsupervised in all missions not requiring receiver AAR; they may not deploy as a receiver-SOAR crewmember (i.e., filling a receiver-SOAR requirement) until the event is accomplished or currency is regained.
5. OG/CC may substitute CONUS operational sorties for overseas sorties when tanker/airlift requirements or crewmember availability is insufficient for accomplishing the overseas sortie requirement. Consecutive CONUS sortie substitutions are not permitted.
6. Crewmembers are not NMR for local sorties not requiring this event. Local sorties may be accomplished while non-current or for failure to complete semi-annual training for this event (see **paragraph 4.9.3.1**).
7. Required for OPLAN-8010 MR crewmembers only (may be combined with P271).
8. Collocated units must accomplish event in the simulator. Non-collocated units will accomplish P040, P170, and P180 requirements semi-annually and will attempt to accomplish as many simulated engine out training requirements as possible in the simulator, unless specified by MAJCOM/A3.
9. Multiple aircraft qualified pilots, will accomplish one event quarterly in each aircraft model qualified (qualified/maintaining currency in two MDS model aircraft, e.g., KC-135R and RC-135W). KC-135 R and -T model aircraft are considered the same MDS (see **paragraph 1.12.1**).
10. OG/CC may authorize 90-Day currency extension for night events to compensate for climatic adjustments (long-daylight periods in summer). OG/CC may authorize pro-ration of night events for the period 1 April through 30 September.
11. Typically accomplished with F020.
12. Motion not required to receive credit using simulator.
13. Initial M030 must be accomplished 180 days after completion of MCT.
14. Event 100% creditable in visual system replacement OFTs that are certified by AMC.
15. Currency requirement for touch and go certified AC only (not applicable to IP or EP).
16. N/A for units permanently based overseas.
17. FTL-C MPDs should conduct this event quarterly.
18. ATD link to another ATD required for credit if not accomplished in aircraft. Do not dual log F030 with an F020 if accomplished in the ATD (since linked ATD is not needed for F030).
19. Dual log R010 when accomplishing R013.
20. Pilots may log event complete if accomplishing PF or PNF duties.
21. May be accomplished in an OFT after initial training in aircraft.
22. Required upon completion of certification/qualification (Block 40, RNAV/GPS).
23. Must be accomplished with at least one qualified AC on the crew; may only be logged as PF or PNF. **Exception:** ARC may substitute an FTL-A FPQ for an AC, if needed.
24. Dual log G230.
25. All pilots (i.e., EP, IP, MP, FP) will log left and right seat takeoffs and landings to ensure balanced exposure of the entire pilot crew force.
26. Not required for pilots assigned to MAJCOM HQ, NAF, 618 AOC (TACC), and USAFEC
27. Units collocated with a simulator should perform this event in the simulator but may accomplish in the aircraft during operational or continuation training missions on a non-

interference basis.

28. For training, LAHSD and LAHSA may only be accomplished in the simulator (*Exception: 509 WPS / KC-135 Weapons Instructor Course*).

29. Individuals who have been deployed for an entire quarter or more (i.e., 1 Jan thru 31 Mar) are considered current for this event until 45 days after return to home station.

30. Loss of currency does not result in a loss of mission ready status.

31. N/A for AETC and non-collocated units.

32. Event currency is Semi-Annual for non-collocated units.

**Table 4.5. Navigator Semi-Annual Continuation Flying Requirements.**

Code	Event	Navigator FTL				Credit in OFT			Notes
		A	C	E	CUR	%	Maintain	Regain	
G240	CRM MOST Sim				A	100			3
G261-264	Refresher Sim, Phase 1-4				A	100			10
M010	Proficiency Sortie	1	1	1	60D	100	Y	Y	2,4,7
M020	Unit-Specific Training Sortie	AR	AR						7
M050	Tactical Sortie	A	A			100			6,7,9,11
P270	Secure Radio Operation	1	1						1,2,7,11
P271	Authentication Procedures	1	1						1,2,7,11
P280	ACDTQT	T	T			100			1,8,11
S036	SOAR Rendezvous	1	1						5,7,11
S101	ARC-210 DAMA SATCOM Tng.	A	A						5,7,11

*AR-As Required, A-Annual, B-Biennial, M-Monthly, Q-Quarterly, SA-Semi-Annual, T-Triennial, Y-Yes*

**NOTES:**

1. Not required for basic navigators who have not completed the requirement for deployment in Chapter 3.
2. Instructors may receive credit when observing, instructing, or performing evaluator duties.
3. Dual log G230.
4. Navigators can regain/maintain currency with IP monitoring sortie.
5. Required for SOAR qualified navigator only.
6. Basic Navigator complete M050 if required in MAJCOM or local supplement, or OGI.
7. Aircraft equipped with FMS-3 station.
8. Complete in the aircraft if simulator is not available.
9. Units collocated with simulator should perform this event in the simulator but may be accomplished in the aircraft during operational or continuation training missions on a non-interference basis.
10. Requirement is for FTL-A, B, and C Navigators to attend one of the G261-264 Phase simulators Annually. FTL-E aircrew are not required to complete Phase Simulators, but are allowed and encouraged to.
11. Crewmembers are not NMR for local sorties not requiring this event. Local sorties may be accomplished while non-current or for failure to complete semi-annual training for this event (see **paragraph 4.9.3.1**).

**Table 4.6. Boom Operator Semi-Annual Continuation Flying Requirements.**

Code	Event	Boom Operator FTL					Credit in OFT/BOWS T			Notes
		A	B	C	E	CUR	%	Maintain	Regain	
G240	CRM MOST Sim					A	100			10, OFT Only
G261-264	Refresher Sim, Phase 1-4					A	100			2, OFT Only
G983-G988	WST Profile 1	1	1	1			100			14,15,16
M010	Proficiency Sortie	1	1	1			100			
M020	Unit-Specific Training Sortie	AR	AR	AR						12
M020 (Mildenhall)	Event	1	2	3						
M050	Tactical Sortie	A	A	A			100			3,12,13,17
M051	MPRS Sortie					A	100	Y	Y	8,17
N110	Communications Procedures	1	1	2						4,12,17
P270	Secure Radio Operation	1	1	2						1,12,17
P271	Authentication Procedures	1	1	1						1,12,17
P280	ACDTQT	T	B	A			100			3,7,12,17
P300	Cargo Loading	A	A	A						1,3,17
R070	AAR Breakaway & Emer. Sep.	1	1	2	1		100			
R100	AAR, Heavy Receiver	1	2	2			50			

R120	Contacts	15	18	24	12	2M	50	Y	N	11
R130	Night Contacts	5	6	8	3	6M	50	Y	N	6
R140	Tanker Manual Contact	2	3	4	2		100			11
R150	Fighter Contact	2	2	2		6M	50	Y	N	9
S036	SOAR Rendezvous	1	1	1						5,17
S200	NVG Operations	1	1	1						5,17

*A-Annual, B-Biennial, M-Monthly, Q-Quarterly, SA-Semi-Annual, T-Triennial, Y-Yes, N-No*

**NOTES:**

1. Instructors may receive credit when observing, instructing, or performing evaluator duties.
2. Requirement is for FTL-A, B, and C Boom Operators to attend one of the G261-264 series simulators Annually. FTL-E aircrew are not required to complete Phase Simulators, but are allowed and encouraged to.
3. Not required for formal schoolhouse or USAFWS instructors unless specified in MAJCOM supplement.
4. Required for OPLAN-8010 MR crewmembers only (may be combined with P271).
5. Required for SOAR-certified Boom Operators only.
6. OG/CC may authorize 90-day currency extension for night events for climatic adjustments (long-daylight periods in summer). OG/CC may prorate night events for the period 1 Apr through 30 Sep.
7. Complete in the aircraft if simulator is not available.
8. MPRS certified Boom Operators only. A Boom Operator non-current in M051 MPRS Sortie will not be considered NMR for this event. Crewmembers may continue to participate unsupervised in all missions not requiring MPRS operations. Crewmembers may deploy, but not as a MPRS certified crewmember until currency is regained with a MPRS certified Instructor Boom Operator (IBO).
9. Boom Operators assigned to MAJCOM, NAF, USAFEC, CRW, CRG, or formal schoolhouse R150 currency is 1 per 365-days with no frequency requirements.
10. Dual log G230.
11. Only 3 R120 (Contact) and 2 R140 (Tanker Manual Contact) may be credited per BOWST session.
12. Not required for BMC aircrew unless specified in MAJCOM Supplement.
13. Should be performed in the simulator but may be accomplished in the aircraft during operational or continuation training missions on a non-interference basis.
14. Event currency is Annual for non-located ARC Boom Operators.
15. Not required for formal schoolhouse instructors.
16. Every effort will be made to ensure G983-G988 are each accomplished triennially.
17. Crewmembers are not NMR for local sorties not requiring this event. Local sorties may be accomplished while non-current or for failure to complete semi-annual training for this event (see **paragraph 4.9.3.1**).

**4.7. Ancillary Training.**

4.7.1. Definition. Ancillary Training is guidance or instruction that contributes to mission accomplishment, but is separate from an Air Force Specialty or occupational series. AFI 11-2KC-135 Volume 1 is not the governing directive for completion of ancillary training events. IAW AFI 11-202 Volume 1 and AFI 36-2201 Air Force Training Program, the source AFIs, provide training frequency for these events unless an approved waiver has been authorized.

See UDM representative to ensure compliance with additional USAF personnel training requirements. Some USAF ancillary training requirements may be accessed and tracked via the Advanced Distributed Learning Service (ADLS). UDMs have access to ADLS training records.

**4.8. Proration of Training.** AFI 11-202 Volume 1 describes proration of training requirements for crewmembers not available for flying duties. In addition, prorate training for non-availability due to contingency alerts and contingency flying TDYs when contingency precludes training for certain mission events (PACAF and USAFE: also contingency operations from home station). This authority must be used judiciously, especially when prorating the same crewmember for consecutive semi-annual training periods.

4.8.1. Use this formula to determine training requirements: Number of Months Available times the Event Volume divided by Number of Months in the Training Period. Round down to nearest whole number (e.g. 5.6 rounds to 5), but not less than 1 unless the individual was available for less than 15 days during the SA period.

4.8.1.1. Use **Table 4.7** to determine the number of months available. Prorate only if absence is at least 15-cumulative days. Combining non-consecutive periods of contingency alert is allowed for proration purposes.

4.8.1.2. When an individual permanently changes station (PCS) during the training cycle to a unit flying the same model aircraft and enters the same FTL or lower, credit training accomplished at the previous base. Prorate training requirements based on the time available (e.g., time at former base, plus time at new base, minus number of days not available) during the training period. Time available starts 45 days after sign-in or on the date of actual accomplishment of the first training event, whichever occurs first. Subtract previous accomplishments from the prorated total to determine remaining requirements.

4.8.1.3. OG/OGT, OSS/OST or Sq/DOT (as applicable) will maintain training proration letter for a period of two years (commanders may increase this frequency as required). Non-located squadrons and detachments will forward proration letter to the unit for inclusion in the unit's records.

4.8.2. Units may also prorate requirements for individuals changing training levels.

**Table 4.7. Individual Availability.**

Days Available	Months Available
0-15	0
16-45	1
46-75	2
76-105	3
106-135	4
136-165	5
≥166	6

**4.9. Failure to Complete Training Requirements.** Place individuals on supervised status and declare them NMR if they fail to maintain flying currencies, fail to complete semi-annual flying

continuation training requirements or ground continuation training requirements. See AFI 11-2KC-135V3 [paragraph 2.3](#) for flight authorization PIC codes. The following guidance applies:

4.9.1. **Flight Training Currency.** Flight currency is associated with those events denoted in the flying continuation training tables by a specific period of time (monthly, quarterly, semi-annual, or annually) within which an event must be accomplished. A currency event must be accomplished at least once within that specified time in order to maintain the currency.

4.9.1.1. **Loss of Currency.** Place individuals in one or more currency events in supervised training status for that event and declare them NMR in those unit missions requiring that event. Crewmembers are “non-current” the day after event currency expires (i.e., a crewmember who accomplished a *monthly* currency event on 5 September, becomes non-current on 1 November).

4.9.1.1.1. A Pilot non-current in Takeoff (P010, P020, P040), Landings (P170, P180, P190), Approaches (P070), or Landing, Night (unaided) (P192) will not fly unsupervised on any sortie.

4.9.1.1.2. Pilots non-current in N010 Tanker RV do not require direct IP supervision.

4.9.1.1.3. A Navigator who is non-current may be supervised by an IP and may regain currency by the same IP (Except SOAR RV).

4.9.1.1.4. A Boom Operator non-current in M051 MPRS Sortie will not be considered NMR for this event. Boom Operators may continue to participate unsupervised in all missions not requiring MPRS operations. Boom Operators may deploy, but not as a MPRS certified crewmember until currency is regained with a MPRS certified IBO.

4.9.1.1.5. Flight Surgeon loss of flying currency. Units will notify the MAJCOM Command Surgeon of Flight Surgeons exceeding 60-days between sorties (AMC units send notification to AMC/SGP and local MDG/CC). Flight Surgeons that exceed 60 days between sorties require a review of aircraft exits and oxygen systems conducted by a member of the flight crew designated by the AC prior to the flight to regain flying currency.

4.9.1.1.5.1. The egress review will be signed off by the AC on a copy of the AMC/SGP memo or other approved form (e.g., AF Form 1522, locally generated form/memo/etc.). **Note:** Documentation on AFTO 781 is not acceptable. The Flight Surgeon must submit this documentation to the local Squadron/Host Aviation Resource Manager (SARM/HARM) office after the flight or upon return to home station if the flight is in conjunction with a TDY. The HARM or SARM will place the documentation in the Flight Surgeon’s training folder.

4.9.1.1.5.2. Failure to complete and document required training before the flight will result in the loss of ability to log primary Flight Surgeon time.

4.9.1.1.6. For all other non-current events, place individuals in supervised training status for that event and declare them NMR in unit missions requiring the event. The crewmember cannot deploy until currency is regained (see [paragraph 1.10.3.1](#)). **Example:** If the individual is non-current for tanker air refueling, the individual may fly unsupervised on CONUS sorties which are not scheduled for and do not

accomplish tanker air refueling. OCONUS MAJCOM may allow individuals to fly local, routine, and non-contingency mission in their respective theater as specified in local supplement, OGI or MAJCOM supplement.

#### 4.9.1.2. **Regaining Currency.**

4.9.1.2.1. Loss of Currency up to 6-Months. Crewmembers maintain their current training level and no training folder is required. Crewmember must demonstrate proficiency in the aircraft or simulator (as appropriate) in all delinquent items while under supervision of an Air Force or ATS instructor for simulator creditable events (see [paragraph 1.10.3.1](#) and [paragraph 1.10.5.1](#)).

4.9.1.2.2. Loss of Currency exceeding 6-Months. Crewmember is declared Unqualified for a loss of currency for events in [Table 4.3](#), [Table 4.4](#), [Table 4.5](#), and [Table 4.6](#). Unqualified crewmembers cannot log flight training events. The crewmember will complete Sq/CC directed requalification training for the overdue events. Subsequent evaluations and ARMS documentation requirements will be IAW AFI 11-2KC-135 Volume 2 and AFI 11-421, *Aviation Resource Management*.

4.9.1.2.2.1. Boom Operators non-current in M051 MPRS Sortie in excess of 6 months will not be considered unqualified and require re-accomplishment of A006 MPRS Ground Training prior to attempting flight requirements that re-establish currency.

4.9.1.2.2.2. Flight Surgeons that exceed 6-months between sorties require completion of LL03, Emergency Egress Training, Non-Ejection Seat, with a certified aircrew instructor prior to the next flight.

#### 4.9.2. **Failure to Complete Semi-Annual Flying Training Events.**

4.9.2.1. The Sq/CC will review ARMS products at the end of each semi-annual training period. For individuals who fail to accomplish training requirements, the Sq/CC will either declare them NMR for that event or request an OG/CC Waiver for the requirement ([paragraph 1.5.7](#)).

4.9.2.1.1. If the OG/CC issues a waiver and the waiver is not complied with, then declare the individual NMR for failure to complete semi-annual flying training events. Supervised status is required for that event (crewmember flies with an instructor of like specialty) until Sq/CC directed re-training is accomplished, and the crewmember cannot deploy until Sq/CC directed re-training is accomplished. An AF Form 4022 is not required; training may be documented on the NMR letter.

4.9.2.1.2. If individual placed on NMR status, the individual must complete all delinquent training events under instructor supervision to regain MR status for those delinquent events. An AF Form 4022 is not required (see [paragraph 4.4.3](#)).

4.9.2.2. Pilots non-current in Data Link (M007) still maintain MR status, may fly in a non-Data Link mode, and may still deploy OCONUS.

4.9.2.2.1. If a Pilot or Navigator is delinquent in M007, the crewmember will accomplish refresher data link CBTs, review aircraft normal/abnormal data link operations/procedures, and review appropriate data link courseware.

4.9.2.3. Notify the MAJCOM/SG when Flight Surgeons fail to meet semi-annual or annual sortie requirements. MAJCOMs establish procedures to assess continued active flying authorization. Place a copy of the MAJCOM/SG notification in the members flight training folder.

4.9.2.4. Waivers for Flight Training Events. The Sq/CC will send waiver requests for Failure-to-Complete training to the OG/CC for endorsement, per **paragraph 1.5.7**.

#### 4.9.3. Ground Training Events.

4.9.3.1. Failure to Complete. Individuals who fail to complete ground training requirements are declared NMR. The crewmember cannot deploy until training is accomplished (**Exception:** Noncurrent crewmembers may fly unsupervised on local, routine, and CONUS missions according to **Table 4.1** on sorties not requiring the ground training event). Crewmembers NMR in OPLAN-8010 ground training events (G030, G040, G041B or Q010) remain MR-conventional. Units will attempt to return NMR OPLAN-8010 crewmembers to MR status as soon as practical.

4.9.3.1.1. An individual NMR for failure to complete Hazardous Cargo Training (G182) may fly unsupervised on local training missions only with Sq/CC approval until training is completed.

4.9.3.2. Waivers for Ground Training Events. The OG/CC or equivalent may waive ground continuation training events identified in **Table 4.1**, **Table 4.2**, and **Table 4.3** according to **paragraph 1.5.7**. The decision to grant a waiver will be based on the individual crewmember's experience and proficiency level; waivers will not be based on a crewmember's availability. The OG/CC will determine the allowable time period of the waiver. The make-up training should be accomplished at the earliest opportunity. This waiver is for unforeseen circumstances only and only for events that will not degrade mission accomplishment.

4.9.4. With OG/CC concurrence, make-up training (ground or flying) is creditable towards the new training period.

4.9.5. OG/OGT, OSS/OST or Sq/DOT (as applicable) will maintain NMR and Waiver records for a minimum of two years. Non-collocated squadrons and detachments will forward NMR and Waiver records to the parent unit for inclusion in the parent units records.

**4.10. Requirements Before PCS Or TDY By Members On Active Flying Status.** AFI 11-202 Volume 1 specifies requirements before PCS or TDY.

**4.11. Requirements Before Removal From Active Flying Status.** AFI 11-202 Volume 1 specifies requirements before removal from active flying.

**4.12. Requirements While In Inactive Flying Status.** AFI 11-202 Volume 1 specifies requirements while in inactive flying status.

**4.13. Retraining.** AFI 11-202 Volume 1 specifies retraining restriction before separation, retirement, or mandatory inactive flying status.

**4.14. Aircrews Flying in Non-US Air Force Aircraft and with Non-US Air Force Units.** AFI 11-202 Volume 1 addresses individuals flying in this status.

**4.15. Training Period.** The tables are based on semi-annual flying continuation training event requirements with the first cycle beginning on 1 January and ending on 30 June and second cycle beginning 1 July and ending on 31 December.

## Chapter 5

### UPGRADE TRAINING

**5.1. Description.** This chapter identifies general prerequisites and training requirements for upgrade.

5.1.1. OG/CC is designated waiver authority for minimum prerequisites for entry into upgrade programs (this includes all **Table 5.1** flying hour requirements).

**Table 5.1. Pilot Prerequisites for Upgrade--Selection Matrix.**

From	To	Prerequisite for Course Entry	Prerequisite Before R&C Board Certification	Notes
UP (Various MDS)	MP (via TX1 or TX2)	Previous AC in USAF MDS and/or 1000 hours TFT	100 KC-135 hours (PAA) & MPD Phase II guide, if required	1,2,3
FP	MP (via ACU or PCO)	1000 hours TFT and MPD Phase I & II	400 KC-135 hours (PAA) & MPD Phase I, II, & III	1,2
MP (AC)	IP	200 hours in KC-135 (PAA) after R&C to AC		1
IP	EP	Sq/CC recommendation		

**NOTES:**

1. Total Flying Time (TFT) represents all flying time logged aboard a fixed wing aircraft as a military pilot including SUPT “student” and “other” time (but does not include time in another aircrew specialty). Simulator time is creditable to meet TFT requirement.
2. 100 KC-135 hours PAA required before R&C to perform AC duties.
3. For MAF crossflow with similar skill set (i.e., C-17, C-5, etc.), use TX2; MPD Phase II guide is not required. Pilots with dissimilar background (i.e., OSA/FAIP, F-16, etc.), use TX1; accomplish MPD Phase II guide in-unit.

**5.2. Mobility Pilot Development (MPD).** Mobility Pilot Development is the development program leading to Aircraft Commander certification. The MPD program flows from Pilot Initial Qualification (PIQ) or Aircraft Commander Initial Qualification (TX1 or TX2) formal training courses through continuation training to upgrade selection and culminates in certification as an Aircraft Commander. MPD continuation training is divided into three phases: MPD Phase I (V280), MPD Phase II (V281), and MPD Phase III. All MPD pilots will be dual-seat qualified and maintain qualification requirements according to AFI 11-2KC-135 Volume 2. MPD pilots are not Aircraft Commanders. See minimum flying hour requirements in **Table 5.1**.

5.2.1. The success of this program depends on MPD pilots being mentored and provided with development opportunities. The upgrade training timeline to Aircraft Commander is based on performance and at the discretion of the Sq/CC, should be tailored to match an individual’s capabilities and experience level.

### 5.3. MPD Continuation Training thru Aircraft Commander Upgrade.

5.3.1. **Documentation.** Completion of MPD Phase I and II is documented in ARMS as V280 and V281 respectively; GRACC is documented in ARMS as V282. Document the completion of the entire course via AF Form 4324 and Sq/CC certification.

5.3.2. **Training Guides.** MPD Phase I & II guides are available for download on the AMC/A3T CoP. Guides should be carried on all sorties to maximize training opportunities.

5.3.3. **MPD Phase I (V280).** After completion of the PIQ course, pilots enter Phase I of continuation training. This first phase consists of completing the MPD Phase I guide, which focuses on core aircraft abilities including communication, checklist discipline, systems knowledge, and basic mission planning. A Phase I MPD should not have additional squadron duties nor be expected to act as an Aircraft Commander, yet they should observe and learn from their aircrew leadership.

5.3.3.1. During this stage of pilot development, a Phase I MPD pilot is restricted to the right seat and may only occupy the aircraft left seat with an IP. Phase I MPD pilots will train in the right seat during MOST and Phase sims and may occupy the left or right seats for Proficiency sims (and available proficiency time at the end of a MOST or Phase sim). Phase I MPD pilots will complete the MPD Phase I guide NLT 180 days (365 days for ARC) after becoming mission ready.

5.3.3.2. In order to advance beyond Phase I, the Phase I MPD pilot must be at least 6 months from the training start date (as defined in [paragraph 1.7.1](#)), have a minimum of 200 PAA (aircraft) hours, and have completed the MPD Phase I guide. Once these requirements are met, the Phase I MPD pilot may be approved for Phase II via the STRP. (*Note:* MPD pilots who were Mission Ready prior to the release of this AFI may continue under the previous GRACC workbook for up to 6 months beyond the release date of this AFI at Sq/CC discretion, but will comply with all other requirements in this paragraph). For FAIP/OSA or non-mobility weapon system pilots transitioning to MAF aircraft, completion of V280 is not required; however, V281 and V282 are required.

5.3.4. **MPD Phase II (V281).** This phase consists of completing the MPD Phase II guide, which focuses on the core tasks of flying skills, mission situational awareness, and crew management required for Aircraft Commander certification.

5.3.4.1. Training in this stage will ensure a balanced exposure to both left and right seats in the aircraft with an AC or above. Good judgment and Operational Risk Management (ORM) will dictate with whom they fly and what seat they occupy. As Phase II MPD pilots advance in knowledge, they are encouraged to practice actual mission management skills and decision making under the guidance of their AC or IP.

5.3.4.1.1. (**Added-MILDENHALL**) Left seat training may only be accomplished if an IP is sitting in the right seat.

5.3.4.2. **MPD Selection for Aircraft Commander Upgrade/Certification.** Phase II MPD pilots must meet pre-requisites defined in [Table 5.1](#) as well as complete the MPD Phase II guide. Based upon performance, experience, and requisite flight hours, Phase II MPD pilots will be identified for upgrade by squadron leadership via the STRP. MPD pilots require a minimum of one AF Form 8 evaluation after FP mission ready

certification and prior to entry into Aircraft Commander upgrade (N/A for MAF crossflow, FAIP/OSA, or non- mobility weapon system pilots).

**5.3.4.3. HQ AMC Orientation Tour / GRACC (V282).** This event provides an in-depth look at selected AMC and 618 AOC (TACC) operations as well as an opportunity to interact with command senior staff. Ideally, this course should be completed by Aircraft Commander candidates after completing V281, but before beginning formal Aircraft Commander upgrade training (ACU or PCO). GRACC is mandatory for AMC pilots and highly encouraged for PACAF, USAFE, and ARC mobility forces pilots upgrading to Aircraft Commander. GRACC is transferable between all mobility weapon systems. For AMC pilots, V282 will be completed prior to Aircraft Commander certification. If unable to complete V282 prior to certification, units may schedule attendance up to 90 days after certification; beyond 90 days requires OG/CC approval (see [paragraph 1.18.6](#) for scheduling details). Additional information is available via ETCA (see [paragraph 1.15.7](#)).

**5.3.4.3.1. (Added-MILDENHALL)** Due to logistical concerns, either an in house mission familiarization tour or a visit to 603 Air Operation Center/Air Mobility Division (603 AOC/AMD) will be conducted in lieu of the AMC visit. Neither tour is required prior to mission certification. If not previously accomplished, one of these tours will be accomplished at the first available opportunity. Requirements for the in house tour can be found in the 100 OG/OGT Aircraft Commander Upgrade Guide. The 603 AOC/AMD tour is coordinated through 86 OSS/OST (DSN 480-4414/5470, [86oss.ost2@ramstein.af.mil](mailto:86oss.ost2@ramstein.af.mil)).

**5.3.5. MPD Phase III.** Aircraft Commander Upgrade (ACU) or Pilot Checkout (PCO). After the Sq/CC determines (via the STRP) an upgrade training start date, training time begins and the upgrade candidate will begin applicable ACU or PCO training events, as required (see [Table 1.2](#) for in-unit training time limitations). Prior to starting training, the training office will open and maintain an AF Form 4022 until the upgrade candidate is certified as an Aircraft Commander. Units using multiple folders to document a pilots training progress may combine those into a single training folder at the unit's discretion. MAJCOM approved training guides are authorized.

**5.3.5.1.** Current and qualified Aircraft Commander candidates accomplishing MPD Phase III training events require IP supervision during non-critical phases of flight and direct IP supervision during critical phases of flight. Two Aircraft Commander candidates may sit in the left and right seats under IP supervision in the simulator, as required.

**5.3.5.2.** The Aircraft Commander candidate will accomplish the following requirements prior to the Aircraft Commander Review and Certification (R&C) Board:

**5.3.5.2.1.** Formation Lead Certification (Q011). Proficiency as formation lead must be demonstrated (see [paragraph 5.6.1](#)). If simulator is used for Lead Certification, reference [5.6.1.2.2](#) for DMO requirements.

**5.3.5.2.2.** Golf Day (Q028), Heavy Receivers (KC-10, C-5, C-17, E-4, or B-2). Demonstrate proficiency, as applicable. Units may credit this event if previously accomplished to proficiency during MCT or during Phase II if accomplished with an

IP and documented on an AF Form 4023 or approved TG equivalent; ensure documentation is included in ACU training folder.

5.3.5.2.3. Hazardous cargo (G182). Accomplish CBT.

5.3.5.2.4. Oceanic Training (M030). Oceanic mission will place emphasis on AC duties, oceanic crossing procedures, as well as enroute and mission management training objectives. For USAFE, an overnight mission must be accomplished. IP led G160 will be completed in preparation for M030. IP supervised current and qualified MPD pilots will not be considered NMR for this event and may fly OCONUS for the purposes of oceanic training. Units may credit this event during MPD Phase II if accomplished with an IP and documented on an AF Form 4023 or approved TG equivalent; ensure documentation is included in ACU training folder.

5.3.5.2.5. Demonstrate proficiency in Simulated Engine Failure events, Pattern work, Touch & Go's, Tactics, and CRM.

5.3.5.2.6. Aircraft Commander candidates must accomplish Mission Certification Training events listed in **Tables 3.1, 3.2, and 3.3** prior to certification unless identified by note.

**5.3.6. Evaluation and Certification.** Accomplish an Operational Mission Evaluation (OME) according to AFI 11-2KC-135 Volume 2, if required. ACU or PCO culminates with a Sq/CC's R&C Board recommendation.

**5.3.7. Mobility Pilot Designation Codes.** AFI 11-401, *Aviation Management*, defines pilot aviation codes. For standardization, use the codes from **Table 5.2** (3rd letter designator distinguishes the status for a MPD pilot who completed formal training with evaluation (graduate)).

**Table 5.2. Mobility Pilot Designation Codes.**

If first two are "FP"	Qualified Pilot. Then 3rd character is:	
	"N"	Qualified Non-Mission Ready (NMR). This is used for the following: <ol style="list-style-type: none"> <li>1. Pilot currently in TX1, TX2, ACQ, ACU or PCO course and has not completed qualification checkride.</li> <li>2. Pilot Initial Qualification (PIQ) course graduate currently in local mission ready training.</li> <li>4. Senior Officer Course (SOC) graduate. AFI 11-2MDS Volume 1 guidance applies to level of supervision/mission capability.</li> <li>5. Pilots designated "E" level for continuation training.</li> </ol>
	"K"	Qualified Non-Mission Ready (NMR). This is used for the following: <ol style="list-style-type: none"> <li>1. Graduate of AC or re-qualification course (TX1, TX2, ACQ, PCO, PRQ, IPRQ), in local mission ready training.</li> </ol>
	"L"	Qualified Mission Ready (MR). This is used for the following: <ol style="list-style-type: none"> <li>1. Graduates of AC course (FPLs) who have not acquired</li> </ol>

		enough PAA hours for AC certification, but have completed all local mission ready training requirements.
	”C”	Qualified Mission Ready (MR): 1. Qualified Mission Ready Phase I MPD Pilot
	”Q”	Qualified Mission Ready (MR). This code is used for the following: 1. Qualified Mission Ready Phase II MPD Pilot
	”R”	Qualified Mission Ready Traditional First Pilot (Non-MPD). This code replaces previous First Pilot Code (MCF). <b>Note:</b> This code (FPR) will be eliminated after all the traditional first pilots have upgraded to AC.
If “MP”	Fully Certified/Qualified Aircraft Commander. Then 3rd character may be:	
	”N”	Non-Mission Ready (NMR) AC. This code is used: 1. If this MP will be NMR for an EXTENDED period of time (greater than a month). 2. Not used for short duration NMR status due to DNIF or short term currency deficiencies.
If “IP”	Fully Certified/Qualified Instructor Pilot who is performing instruction on the mission.	
If “EP”	Fully Certified/Qualified Evaluator Pilot who is performing evaluator duties on the mission.	

**5.4. Aircrew Instructor Program.** After the Sq/CC determines (via the STRP) an upgrade training start date, the training office will open an AF Form 4022 prior to beginning training. Instructor candidates will be selected based on experience, judgment, potential ability to instruct, flying skills, and technical knowledge. Use instructor upgrade flying time prerequisites in [Table 5.1](#) for Pilots and [Table 5.3](#) for Navigators and Boom Operators. These series of courses are designed to teach pre-selected Pilots and Boom Operators the fundamentals and concepts of instructing an aircrew member. The courses will lead to qualification as KC-135 IP or IBO and includes ground, ATD, and flight instruction in the KC-135 aircraft and its aircrew training programs. See the appropriate crewmember instructor course syllabus for details.

**Table 5.3. Navigator and Boom Operator Upgrade Prerequisites.**

Aircrew Position	Total Flying Time	Total -135 Time
Navigator	500-hours	350-hours
Boom Operator	1500-hours	300-hours
Option 1	700-hours	500-hours
Option 2		

5.4.1. Units should identify and send the names of candidates to fill allocated instructor course quotas to AMC/A3TF, or MAJCOM equivalent training quota managers no later than 45 days before class start date. See the appropriate syllabus for in-unit course training events.

5.4.2. **Pre-Instructor Course Training.** Units will provide pre-attendance simulator or flying training to instructor course candidates before school attendance. The purpose of the additional flight or simulator training is to help prepare instructor candidates to instruct while

performing the maneuvers. These events will be completed by the Instructor candidate demonstrating to their instructor on how to perform the procedure and/or techniques that would assist other crew members. When applicable, the Instructor candidate should provide instruction throughout the pre-course training. Complete the appropriate pre-attendance workbook (A044), lessons, and examination available on ATS contractor website (see [paragraph 1.15.5](#)). Candidates must successfully complete the lessons and on-line examination (85%) before proceeding to formal school outlined in the syllabus. This pre-attendance courseware must be accomplished no earlier than 60 days prior to the class start date. Pre-Instructor flying training will include, but is not limited to the following (list additional requirements are in the appropriate MAJCOM supplement):

5.4.2.1. **Pilot** — Complete events in **Table 5.4**. Emphasis should be placed on performing events within prescribed tolerances using appropriate instructor techniques. Individuals who have not accomplished the ground and certification training (“G” and “Q” events) listed in **Table 5.4**, must complete the events NLT Pilot Pre-Instructor Training Completion. Units non-located with an OFT may require additional flight training.

5.4.2.1.1. P215, Landing Attitude Demo must be accomplished in the aircraft.

5.4.2.1.2. Instructor Aircraft Commander (IAC) candidates must be certified as Touch and Go Phase I (Q050) and Phase II (Q051) ACs for a minimum of 60 days prior to IAC class start date.

**Table 5.4. Pilot Pre-Instructor Training.**

Code	Event	Number	Code	Event	Number
A017	Instructions/Directives Knowledge/Use	1P	P215	Landing Attitude Demonstration	2P
A009	Instructor Pre-Attendance Academics Training	1P	P360	Mission Planning and Briefing	1P
M001	Sortie	1P	G065	Special Departure Procedures	1P
P012	Takeoff-Gyro Mode	1P	Q050	AC Touch and Go Landings Certification	1
P040	Simulated Engine Failure, Takeoff Continued	1P	Q051	Supervision of Touch and Go Landings Certification	1
P180	Approach and Landing, Simulated Engine-Out	2P	Q579	RNAV/GPS Operations Certification	1
<i>1- One Time Accomplishment, P-Proficient</i>					

5.4.2.2. **Navigator** — Instructor training will be conducted “in-unit training only.” Candidates must complete the Instructor Navigator web-based training lessons and examination (85%) followed by the appropriate events/items as required by the local unit. As a minimum, each unit program will include one flight with the candidate in the role of instructor. Instructor Navigator training will provide the skills necessary to instruct a Basic Navigator to SOAR Navigator qualification.

5.4.2.3. **Boom Operator** — Minimum of three flights with IBO candidate acting in role of instructor on all flights. Ample time will be allowed for sortie pre-briefs and critiques.

One sortie should concentrate on instructor positioning, instructor techniques, and note taking/communication skills. In addition, the instructor should discuss supervision, situational awareness, task management, and intervention during air refueling, and personal limitations with the candidate. Every opportunity should be used for the candidate to practice teaching different systems or procedures. Examples include Amplified Checklists, Landing Gear/Flaps systems, MBL/EBL, Reverse AAR, AAR systems/malfunctions, Emergency Boom Hoist, Hydraulics, Electrics, Pneumatics, Fuels, or APU. Emphasis should be placed on proper format, lesson planning, and delivery as described in AFMAN 36-2236, *Guidebook for Air Force Instructors*. Briefings should be accomplished until proficient. Preferably the final sortie should be flown with operations superintendent or training manager. Candidates must successfully complete the lessons and on-line examination (85%) before proceeding to formal school outlined in the syllabus. Complete the events in **Table 5.5**.

**Table 5.5. Boom Operator Pre-Instructor Training.**

Code	Event	Number	Code	Event	Number
A017	Publication/Directive Knowledge/Use	3P	P250	Main Flap Manual Operation (Instructional Briefing)	3P
A009	Instructor Pre-Attendance Academics Training	1P	G995 & G996	WST Profile 3 (A-B), if collocated with the BOWST	2P
P240	Landing Gear Alternate Extension (Instructional Briefing)	3P	P360	Mission Planning and Briefing	3P
R140	Tanker Manual Contact	3P	P360C	Manual Moment Computations	3P
P366	Checklist Procedures and Use	3P	G180	Cargo and Passenger Handling Procedures	1P
R060	Tanker AAR	3P	P367	Crew Coordination	3P
R180	Radio Silent Visual Signals	1P	R220	Manual Boom Latching (If available, briefing item if not available). May be accomplished in the BOWST	1P
R070	Tanker AR Breakaway and Emergency Separation	2P	M001	Sortie	3P
<i>1- One Time Accomplishment, P-Proficient, F-Familiarization</i>					

5.4.3. The instructor candidate's Sq/CC will ensure the latest pre-attendance lessons, workbook (A044), testing and initial training flights are complete before departing for the formal school. The Sq/CC or designated representative will sign the pre-attendance workbook (certifying completion of the prerequisites). Use only the most recent version of the workbook (old/outdated versions will not be accepted). Failure to complete instructor course pre-attendance workbook, flight training, and examination (if used) will result in the candidate being returned to home unit.

5.4.4. Instructor candidates will arrive for instructor training course both current and qualified in their unit assigned aircraft.

5.4.4.1. Instructor candidates are responsible to bring the necessary personal flying equipment, publications (see [paragraph 5.4.7.4](#)), and complete the most current version of their pre-attendance workbook (A044) and/or testing in the course syllabus. Hand-carry copies to Instructor training course of pre-attendance training reports, aircrew training folder, medical records, individual data summary, flight history, and applicable waivers at in-processing. The candidates' FEF is not required. Due to the addition of tactics training that require a secret clearance, candidates should have a security clearance that will not expire while attending the course.

5.4.5. **In-Unit Instructor Course.** Current and qualified KC-135 Instructor candidates who previously attended a formal Instructor school for Instructor qualification and were qualified instructors in any US Air Force aircraft and meet the minimum flying hour requirements of [Table 5.1](#) may upgrade in-unit with OG/CC approval. Sq/CC will follow pre-Instructor course training and determine training required to complete the instructor upgrade in-unit based on the approved (formal school) ATS courseware in [Table 6.1](#). The syllabus will list all ground, ATD, and flying training events. Evaluation will be according to AFI 11-2KC-135, Volume 2 for initial instruction evaluations. Previously qualified KC-135 Instructors will accomplish the appropriate training found in [Table 2.3](#). Sq/CC will determine and OG/CC will approve training required to complete the Instructor upgrade in-unit (including evaluation according AFI 11-2KC-135 Volume 2). Sq/CCs may require prior Instructors to attend the ATS Instructor qualification course. If using ATS Instructor support for in-unit training, units must coordinate with AMC/A3T ATS Manager for simulator profile considerations; using FTU syllabus profiles are not permitted.

5.4.6. Instructor Course Documentation for ARC or AD personnel who do not complete an instructor training course and formal school-administered evaluation (Academics-Only Course):

5.4.6.1. Closeout Instructor Course AF Form 4025 will contain remarks by the Sq/CC or Sq/DO recommending the candidate for an instructor evaluation, removal, or reconsideration for instructor training at a later date. The closeout report will include results of academic tests, in-flight progress report, course/class number, start and course completion date.

5.4.6.2. After an instructor candidate successfully completes the instructor evaluation, the unit will send a copy of AF Form 8 to 97 TRS, Altus AFB who in turn will return a Certificate of Completion in memo format to the individual's squadron.

#### 5.4.7. **Instructor Course Training.**

5.4.7.1. During the formal course, candidates may expect multiple simulated emergencies during simulator training. The maneuvers are in the instructor course syllabus and help broaden the experience base of the candidate.

5.4.7.2. Each IAC, IN, and IBO candidate will receive an initial instructor evaluation at the formal school according to AFI 11-2KC-135 Volume 2. Successful completion of an initial instructor evaluation and certification by the unit R&C Board are the final actions of the instructor training course.

5.4.7.3. Instructor course candidates demonstrating unsatisfactory progress during the academic phase may be removed from training and returned to home station (see [paragraph 1.16](#)).

5.4.7.4. Instructor Training Course Required Publications. Reference **Table 5.6**. Approved training representatives may go to the AETC Bookstore to find current syllabi, which list required publications (see [paragraph 1.15.7](#)).

**Table 5.6. Instructor Training Course Required Publications.**

AFI 11-202 Volumes 1, Volume 2, and Volume 3	P, B
AFI 11-218, <i>Aircraft Operation and Movement on the Ground</i>	P
AFI 11-401, <i>Aviation Management</i>	P, B
AFI 11-2KC-135 Volume 2, <i>C/KC-135 Aircrew Evaluation Criteria</i>	P, B
AFMAN 11-217 Volume 1, <i>Instrument Flight Procedures</i>	P
AFI 11-2KC-135 Volume 1, <i>KC-135 Aircrew Training</i>	P, B
AFI 11-2KC-135 Volume 3, <i>C/KC-135 Operations Procedures</i>	P, B
AFI 11-2KC-135 Volume 3, Addenda A, <i>Configuration</i>	P, B
AFI 11-301 Volume 1, <i>Aircrew Flight Equipment (AFE) Program</i>	P, B
AFTTP 3-3.KC135, <i>Combat Aircraft Fundamentals-KC-135</i>	P, B, SOAR N

## 5.5. Flight Examiner Program.

5.5.1. Sq/CC will recommend instructors for Flight Examiner certification. Instructors identified for certification as Flight Examiners must possess satisfactory knowledge of training and evaluation policies and procedures and the ability to administer evaluations according to applicable publications. An AF Form 4022 is not required.

5.5.2. Flight Examiner (FE) Certification. See AFI 11-202 Volume 2. New examiner candidates will complete the A060 series CBT courseware before certification. Sq/CC may elect not to use A060 course if the candidate was previously certified and demonstrates satisfactory evaluation skills.

**5.6. Special Qualifications and Certifications.** Document all additional certifications in ARMS (see [paragraph 1.8](#)). Use appropriate event identifiers listed in **Chapter 7** of this instruction. Qualifications and Certifications are one-time events, unless otherwise stated. For requalification, Sq/CC should evaluate if any training is required on a case-by-case basis.

### 5.6.1. Formation Lead Certification Training (Q011).

5.6.1.1. Sq/CC will certify AC in formation lead responsibilities. Certify Aircraft Commander candidates who complete the minimum MPD training requirements (see [paragraph 5.3](#)) and who possess experience in all facets of their unit's formation missions. Document certification as "Formation Lead—Certified. ARMS event identifier is Q011 (see [paragraph 1.8](#)).

5.6.1.2. Training Program. Unit Sq/CC will determine training requirements. As a minimum, formation lead training program should include:

5.6.1.2.1. Study of formation procedures in AFI 11-2KC-135 Volume 3, Chapter 18, *KC-135 Flight Crew Air Refueling Procedures*; ATP-56(B), *Air-to-Air Refueling*; AFTTP 3-3.KC-135, *Combat Aircraft Fundamentals-KC-135*, and study guides.

Units with ATD/Level C+ capability may use one OFT profile (simulator mission) of a large cell formation under day visual conditions. During the simulator mission, emphasize formation planning, flight discipline, climb-out procedures, position change, tactically maneuvering the formation, formation threat reaction, and ETCAS formation station keeping/management.

5.6.1.2.2. A minimum of three full mission profile formation flights (minimum of two sorties as lead) under the supervision of an IP; if an OFT profile is used, accomplish two full aircraft profiles with one as lead. **Exception:** When two or more simulators have a DMO link, all three formation training sorties may be completed in the OFT. To the maximum extent possible, flights should include AAR operations with multiple receivers, both heavy and fighter-type aircraft. At least one formation flight/OFT profile should be flown as part of a large formation (see [paragraph 7.8.2](#)).

#### 5.6.2. Special Operations Air Refueling (SOAR) Certification Training (Q015).

5.6.2.1. Training and Sq/CC certification for designated crewmembers flying AAR missions in support of special operations forces. Document certification as “SOAR—Certified.” Include a separate entry as “KC-135 NVG-Certified,” Document in ARMS using event identifier Q015 (see [paragraph 1.8](#)).

5.6.2.2. Training Program. Emphasize procedures in AFI 11-2KC-135 Volume 3 Addenda C, *KC-135 Special Operations*, versus standard tanker AAR procedures in ATP-56(B).

5.6.2.2.1. Initial ground training events:

5.6.2.2.1.1. G801--Initial SOAR Training

5.6.2.2.1.2. VV01--NVG Training and Qualification

5.6.2.2.2. Initial flight events:

5.6.2.2.2.1. N013--Rendezvous--Emission Option 3 (radio silent)

5.6.2.2.2.2. S036--SOAR Rendezvous (1 total)

5.6.2.2.2.3. S101--In-flight ARC-210 DAMA SATCOM Training

5.6.2.2.2.4. S200--NVG Operation

5.6.2.2.2.5. NV03 --NVG Refresher (if required)

#### 5.6.3. ILS PRM Certification Training (Q017).

5.6.3.1. AFI 11-202 Volume 3, *General Flight Rules*, requires aircrews operating aircraft equipped with TCAS to receive training for operations at airports with ILS Precision Runway Monitoring (PRM) Approaches. The Sq/CC or designated representative will certify pilots upon completion of one-time training. Document certification as “ILS PRM—Certified”. ARMS event identifier is Q017, ILS PRM (see [paragraph 1.8](#)). Before operations at an airport with ILS PRM approaches capabilities, pilots will complete the following training and certification. A separate AF Form 4022 is not required. Document in AF Form 4022 only if a part of another training program (i.e., MCT).

5.6.3.2. Training Program. Review ILS PRM requirements according to the Airman's Information Manual (AIM), Part 5-4-15. Complete appropriate training including viewing of the video. The most current information can be downloaded at the FAA website: [http://www.faa.gov/education\\_research/training/prm](http://www.faa.gov/education_research/training/prm).

5.6.3.3. View FAA video, "ILS PRM Approach Information for Air Carrier Pilots. The large-file video is also available on the AMC/A3T CoP (see [paragraph 1.15.1](#)).

5.6.4. **Air Refueling (AAR) Certification/Qualifications (Q021-Q033).** Document additional AAR certification in ARMS using events Q021 through Q033 (see [paragraph 1.8](#)).

5.6.4.1. **Q021, Q022, Q023, Q028 and Q029 Certifications.** Each event requires a one-time certification. A like-specialty instructor will supervise pilots or Boom Operators by observing equipment and AAR operations. The following restriction apply to AR certifications:

5.6.4.1.1. The squadron will review FTU records to determine category certifications obtained at FTU and ensure entry in ARMS.

5.6.4.1.2. If day and night certifications are required, day training must be accomplished and certification recommended prior to commencing night training (i.e., Q022 prior to Q023 & Q028 prior to Q029).

5.6.4.1.3. G989 (if collocated with BOWST) or Video #1919 is a prerequisite to Q022. G990 is a prerequisite to Q028 (accomplish prior to Q029 if certified off of FTU recommendation; see [paragraph 7.10.59.2](#) for more details)

5.6.4.1.4. Accomplish video program #1918 prior to attempting Q021 certification (see [paragraph 7.15.11.1](#)). Accomplish video program #1919 (or G989 if collocated with BOWST) prior to attempting Q022 certification.

5.6.4.1.5. All category certification training requires supervision by an instructor certified in that category.

5.6.4.1.6. Before attempting initial contact, the trainee must monitor radio communication procedures and observe an instructor demonstrated contact with the applicable category receiver.

5.6.4.2. **Receiver AAR.**

5.6.4.2.1. 1 Unit-level training certifies a crewmember in receiver rendezvous and AAR procedures specified in ATP-56(B) and flight manual including evaluation according to AFI 11-2KC-135 Volume 2. For pilots, document receiver AAR qualification in the individual's FEF according to AFI 11-2KC-135 Volume 2.

5.6.4.2.2. Training consists of rendezvous and AAR to include closure, contact and breakaway procedures. Instructor will demonstrate all limits and manual boom latching procedures. The student must be able to establish contact under simulated conditions of radio silence, pilot-director lights out, and tanker autopilot off. Unless already current and qualified as a receiver AC, Instructor will declare the receiver pilot proficient in "day" contact before advancing to night activity. During the hours of darkness according to AFI 11-401, conduct practice in rendezvous, closure, and

contacts until able to maintain contact for 10 minutes toggle-engaged time (see [Chapter 7](#) for ARMS “Q” event identifiers for Pilots and Boom Operators).

#### 5.6.4.3. Multi-Point Refueling System (MPRS) Certification Training (Q033).

5.6.4.3.1. If MPRS equipped or Boom Operator collocated with a BOWST, accomplish Q033, MPRS Certification Training program in [Table 5.7](#) If not MPRS equipped or if Boom Operator is not collocated with a BOWST, complete MPRS Familiarization Training (A006) as defined in [paragraph 7.2.4](#). Basic knowledge of MPRS system and associated equipment is imperative for standardization (in the event crewmembers are tasked to perform MPRS air refueling pod operations in MPRS equipped aircraft). A006 does not include certification to operate the MPRS equipment, but does allow crewmembers to fly MPRS aircraft with pods installed. **Training Aids:** PowerPoint slides, see AMC/A3TK CoP.

5.6.4.3.2. Flight Training. Pilots and Boom Operators require a one-time only certification flight under supervision of a like-specialty MPRS Instructor. A like-specialty MPRS Instructor will supervise Pilots or Boom Operators by observing equipment and AAR Pod refueling operations. The IP may supervise training activities from either the jump seat or either pilot seat. The IBO will observe training activities from the instructor position in the Boom Operator compartment. Boom Operators may accomplish Q033 in the BOWST in lieu of the flight requirement. This training requires a MPRS certified Air Force Instructor to accomplish and document the minimum requirements. Units may complete certification training at home station or in COCOM AOR, as applicable. If accomplishing during MCT, do not delay awarding MR status for Q033.

5.6.4.3.3. Document training closeout on AF Form 4025 and place in the individual’s training folder. Document certification as “MPRS—Certified”. ARMS event identifier is Q033 (see [paragraph 1.8](#)). Away from home station, the assigned unit will complete an AF Form 4324 and the individual will hand-carry to their host unit.

**Table 5.7. MPRS Certification Training Requirements.**

Code	Event	Pilot	BO	Note
A006	MPRS Familiarization Training	F	F	3
A006A	MPRS System Description (IBT)	F	F	
A006B	MPRS Specifications and Limitations (IBT)	F	F	
A006C	MPRS Normal Procedures (IBT)	F	F	
A006D	MPRS Performance (IBT)	F	F	
A006E	MPRS Abnormal Procedures (IBT)	F	F	
A006F	MPRS Cautions and Warnings (IBT)	F	F	
G025	Aircraft Field Trip	F		
M001	Sortie	1P	1P	1,2
P360	Mission Planning and Briefing	1P	1P	2
P361	Preflight	1P	1P	2

P366	Checklist Procedures and Use	1P	1P	2
P367	Crew Coordination	1P	1P	2
P369	Aircraft Equipment Operation	1P	1P	2
Q033	MPRS Certification	1	1	1,2
R073	AAR Pod Breakaway and Emerg. Separation	1P	1P	2
R135	Preparation for Contact Procedures	1P	1P	2
R155	Probe and Drogue Contact		2P	2
R195	Tanker Wing Pod AAR	1P	1P	2

*I- One Time Accomplishment, P-Proficient, F-Familiarization*

**NOTES:**

1. Pilots and Boom Operators require a one-time only certification flight under supervision of a like-specialty MPRS instructor. MPRS certification is required before unsupervised use of equipment and AAR Pod refueling operations in-flight.
2. Boom Operators may be Q033 certified in the BOWST, however, A006 must be accomplished prior to G991 profile.
3. If accomplishing Q033 MPRS Certification, A006 MPRS Training must be accomplished within the 90 days prior to the certification flight.

**5.6.5. KC-135 OFT/WST Simulator Operator Certification Training (Q043).**

5.6.5.1. Description. Applies to USAF crewmembers with access to Level C+ OFT simulator or BOWST. Units will include training details in local supplement or OGI. Sq/CC will designate and certify crewmembers for OFT or BOWST operations using ATS contractors. Document certification as “ATD-IOS—Certified.” Document in ARMS using event identifier Q043 (see [paragraph 1.8](#)). A separate AF Form 4022 is not required. Document in AF Form 4022 only if a part of another training program (i.e., MCT).

5.6.5.2. Training Program. Schedule training with local ATS contractor/instructors. Emphasize training on safety precautions, shut-down, and evacuation procedures when the device is on motion. Include procedures to initiate data link message notification and responses. Use the ATS Contractor Operating Guide for limits and restrictions.

5.6.5.3. **(Added-MILDENHALL)** All instructor pilots should become checked-out as simulator operators. This training is normally accomplished at Altus AFB during IAC. This event will be logged in ARMS as Q043 for tracking purposes. For those who accomplish IAC through a local upgrade program or do not receive the training at Altus during IAC, the local ATS can offer the training to check-out instructor pilots as Simulator Operators. DOT will identify the need for individuals to take the course and coordinate with scheduling.

**5.6.6. Tactics Certification Training (Q044).**

5.6.6.1. Aircrew will accomplish the following tactics maneuvers: P061, VFR Overhead; P062, Tactical Departure; P063, Tactical Arrival; P064, Slide Exercise; P065, Scram Exercise; P066, Maneuver—Steep Turns; P067, Mid-Mission Join-Up; P068, Combat Descent; and P069, Defending Climb (see [Table 5.8](#)). Pilots must be certified in all

P062 and P063 variants as per AFTTP 3-3.KC-135. Aircraft flight is not required; certification may be accomplished with OFT or flight training. Sq/CC may accept formal school ATD certification in lieu of local flying training. An “AFTTP 3-3.KC-135 Tactics Maneuvers—Certified” or “AFTTP 3-3.KC-135 Tactics Maneuvers—Certified Recommend” from formal school indicates all requirements for certification have been met.

5.6.6.2. Document training closeout on AF Form 4025 and place in training folder. Document certification as “AFTTP 3-3.KC-135 Tactics Maneuvers—Certified” (see [Table 5.8](#)). An AF Form 4022 is not required. ARMS event identifier is Q044 (see [paragraph 1.8](#)). Once certified, crewmembers should practice maneuvers as part of M050, Tactical Sortie.

5.6.6.2.1. (**Added-MILDENHALL**) A memorandum for record (MFR) listing navigators and boom operators who were trained under the tactics syllabus (prior to 8 Nov 06), signed by the squadron commander and placed in the individuals Flight Evaluation Folder (FEF) will suffice as the Q044 certification.

5.6.6.3. Before flying tactics maneuvers (P062, Tactical Departure and P063, Tactical Arrival), pilots will review items below and reference additional event considerations listed in [Chapter 7](#). Aircrews will CHUM, study, and carry in-flight a chart (minimum TPC scale) covering the VFR route of flight. Review/study civilian sectional or host nation equivalent chart before accomplishing VFR training. **Training Aids:** “VFR Guidance Review” PowerPoint slides, see AMC/A3TK CoP.

5.6.6.3.1. VFR weather requirements.

5.6.6.3.2. Airspace and VFR pattern entry requirements.

5.6.6.3.3. Class B, C, and D airspace ATC services.

5.6.6.3.4. VFR cruising and minimum altitudes and flight following.

5.6.6.3.5. MAJCOM-Directed guidance.

**Table 5.8. Tactics Certification Requirements.**

Code	Training Event	Pilot	N	B	Notes
P061	VFR Overhead	1P	F	F	1,2,3,4,5
P062	Tactical Departure	1P	F	F	1,2,3,4,5,6
P063	Tactical Arrival	1P	F	F	1,2,3,4,5,6
P064	Slide Exercise	1P	F	F	1,2,3
P065	Scram Exercise	1P	F	F	1,2,3
P066	Maneuver –Steep Turns	1P	F	F	1,2,3
P067	Mid-Mission Join Up	1P	F	F	1,2,3
P068	Combat Descent	1P	F	F	1,2,3,4,5,7
P069	Defending Climb	1P	F	F	1,2,3
G009	Tactics Test	1P	1P	1P	
Q044	Tactics Maneuvers Certification	1	1	1	

*1- One Time Accomplishment, P-Proficient, F-Familiarization*

**NOTES:**

1. MPD pilots will accomplish pilot-flying duties. For definition and set up of events, see AFTTP 3-3.KC-135.
2. Navigator/Boom Operator must accomplish crew resource management (CRM) duties.
3. Aircraft flight not required.
4. Navigator/Boom Operator need only see either a day or night procedure.
5. Pilots must accomplish the event(s) during the day before accomplishing at night. Both day and night proficiency are required prior to certification. See definition of event in **Chapter 7**.
6. LAHSD and LAHSA may only be trained in the simulator.
7. Proficiency must be attained in both Turning and Straight ahead.

#### **5.6.7. Aircraft Commander Touch and Go Landings (Q050) and Supervision of Touch and Go Landings (Q051); Receiver Air Refueling (Q052) Certification Training.**

5.6.7.1. Sq/CC will certify an AC to perform touch and go landings (Q050) and supervise unit touch and go landings (Q051), and if applicable, supervise receiver air refueling (Q052). Before certification, the AC should have accumulated a minimum of 50 hours PAA since AC qualification. Document certification as “AC Touch and Go Landing—Certified,” “Supervise Touch and Go Landing—Certified” or “Supervise Receiver AAR—Certified.” ARMS event identifiers are Q050, Q051 and Q052 (see [paragraph 1.8](#)).

5.6.7.2. Training Program. Complete the following items before the AC performs a solo touch and go landing (Phase I) or supervise a unit MPD pilot/CP touch and go landings (Phase II).

5.6.7.2.1. Sq/CC directed ground and in-flight certification training in touch and go procedures.

5.6.7.2.2. Sq/CC certification allowing an AC to supervise a MPD pilot touch and go landing (Phase II). Phase II should normally occur after completion of Phase I; however, both phases may be completed simultaneously if approved by Sq/CC.

5.6.7.2.3. Touch and go training may be accomplished concurrently with an in-unit upgrade or qualification program.

5.6.7.3. See AFI 11-2KC-135 Volume 3 for conditions under which a certified AC is authorized to conduct/supervise touch and go landings.

#### **5.6.8. EMCON Options 3 and 4 Certification Training (Q060/Q070).**

5.6.8.1. Sq/CC will certify crewmembers to accomplish EMCON 3 or 4 procedures during formation, rendezvous, and AAR on both operational and training sorties. All members of the crew must be certified or training under the supervision of a like specialty instructor. Thorough coordination with the receiver aircrew is required for units to practice EMCON 3 or 4 on non-operational training missions. Coordination should be accomplished during mission planning phase. In no case will a crew launch under EMCON 3 or 4 without prior coordination with the receiver crew. Document certification as “EMCON 3 and 4—Certified.” ARMS event identifiers are Q060 and Q070 (see [paragraph 1.8](#)).

5.6.8.2. Training Program. Unit Sq/CC will determine training requirements based on the crewmember's experience and the unit's mission. BOs with less than 200-flying hours must receive a minimum of one flight with an instructor stressing radio silent procedures before certification. Units will include details of the EMCON Option 3 and 4 programs in local supplement or OGI.

5.6.9. **RNAV/GPS Operations Certification (Q579).** Before flying RNAV/GPS LNAV approaches or flight within RNAV 1 or RNAV 2 airspace, pilots will receive a onetime training certification. Instruction will contain Ground and Flight based training. Flight training should be accomplished in a Level C+ OFT. For units not collocated with an OFT, initial cadre must be certified using an OFT to learn the flight maneuvers. These Instructors may return to the unit and use an aircraft acting as the certified safety pilot instructing from the jump seat. Training will cover RNAV/GPS/RNP airspace and how it relates to enroute, terminal, and approach navigation. Navigators will receive certification using Ground Training only. Navigators may attend an OFT session. Sq/CC may accept formal school ATD certification in lieu of local training.

5.6.9.1. Ground Training. Completion of RNAV/GPS CBT and a minimum of one hour of IBT are required to educate crewmembers on RNAV/GPS/RNP airspace and RNAV (GPS) LNAV approaches. All relevant directives and publications should be covered in sufficient detail to provide the crewmember the ability to operate safely in this airspace. Operations of KC-135 systems related directly to flying RNAV (GPS) LNAV approaches must also be covered. **Training Aids:** PowerPoint slides, see AMC/A3TK CoP.

5.6.9.2. Flight Training. Flight training requires Pilots to be at a set of controls. Training may be logged as PF or PNF. **Table 5.9** lists the minimum requirements for certification.

5.6.9.3. Documentation. Document certification as "RNAV/GPS Appr—Certified." Document in ARMS using event identifier Q579 (see **paragraph 1.8**).

**Table 5.9. RNAV/GPS Operations Certification Requirements.**

Code	Training EVENT	Pilot	Notes
	RNAV (GPS) LNAV Procedures	1P	
	RNAV 1 DP and STAR	1P	
P117	RNAV (GPS) Approach via IAF (No-PT) (Missed Approach)	1P	
P117	RNAV (GPS) Approach via IAF/FAF (Course Reversal)	1P	
P117	RNAV (GPS) Approach via IAF/FAF (No-PT) (Remove Course Reversal)	1P	
	("or GPS") Overlay (Vectors to Final) (RAIM Failure)	F	OFT only
<i>1- One Time Accomplishment, P-Proficient, F-Familiarization</i>			

5.6.10. **Q340–Briefing and Control of Passengers Certification Training.** An Instructor led review of AFI 11-2KC-135 Volume 3 and applicable T.O.'s covering passenger handling and briefing requirements. This training will occur prior to the completion of MCT or after reporting for duty following a permanent change of station (N/A if tested at a formal school within previous 6 months). Event ensures aircrew members are trained to properly load and

care for passengers in-flight, ensure passengers are properly documented, and ensure passenger monitors are:

5.6.10.1. Able to brief, assist, and safely evacuate passengers

5.6.10.2. Able to handle in-flight emergencies and problems concerning passengers (rapid decompression, airsickness, heart attack, etc.)

5.6.10.3. Familiar with the operation of aircraft emergency equipment to include:

5.6.10.3.1. Fire extinguishers

5.6.10.3.2. Fire protection equipment

5.6.10.3.3. Normal and emergency oxygen equipment

5.6.10.3.4. Signaling devices

5.6.10.3.5. Overwater emergency equipment

5.6.10.3.6. Emergency egress equipment (ropes, slide, and rafts) (Areas must include applicable flight manual and directive restrictions.)

5.6.10.4. Documentation/ Document certification as “Passenger Monitor—Certified.” Document in ARMS using event identifier Q340 (see [paragraph 1.8](#)).

**5.6.11. AETC Faculty Training Course (FTC).** FTC is a one-time AETC course to better prepare newly-assigned instructors for FTU-instruction at Altus AFB.

5.6.11.1. All instructors conducting initial qualification flying training will be graduates of FTC.

5.6.11.2. With MAJCOM/A3 approval, ARC instructors may conduct in unit initial qualification training on a case-by-case basis without FTC (see [paragraph 1.10.2](#)). Before approval, consider previous experience and high instructor demands during initial qualification training.

## Chapter 6

### AIRCREW TRAINING SYSTEM (ATS)

**6.1. Description.** The KC-135 ATS is contractor-provided aircrew training system. The ATS contractor provides qualification and continuation training courseware, academic instruction, ATD operation/instruction and training facility management. The USAF provides all flight instruction.

6.1.1. The ATS contract guarantees trained students meet government standards. USAF personnel validate training, conduct all flight training aboard the KC-135, and administer all evaluations according to AFI 11-202 Volume 2.

6.1.2. Reports. For initial qualification training, the KC-135 ATS includes a post-training feedback system that elicits information and comments in critique format from students, supervisors, and evaluators. The program seeks to collect data to monitor the training while seeking to continually improve, update, and refine the ATS.

**6.2. Applicability.** As defined in AFI 11-202 Volume 1.

6.2.1. Purpose. The KC-135 ATS is a system of academics, ATD sessions, ground and flight training phases. The system provides qualification, upgrade, and continuation training to attain and maintain the appropriate qualification for KC-135 pilots, navigators, and Boom Operators.

6.2.2. Goal. The ATS program goal is to optimize aircrew training through the integrated use of academics, ATD, and flight-line KC-135 aircraft instruction. The KC-135 ATS has performance requirements in a Performance Work Statement (PWS) and system specification. The ATS follows the AF-sponsored ISD process according to AFI 36-2201, Air Force Training Program; developing (and maintaining) a Master Task Listing (MTL), Evaluation Standards of Document (ESD), Objective Media Analysis Report (OMAR), and Media Selection Syllabus Report (MSSR) products (approved by AMC/A3T). These products help define each course content, standards, and training media selected for each task and objective.

6.2.3. Responsibilities.

6.2.3.1. ATS Contractor (see [paragraph 1.4.7](#)) will co-host a quarterly KC-135 ATS System Review Board (SRB) to outline the ATS program including currency, applicability, and effectiveness. Publish meeting minutes and monitor suspense's (specified in the ATS contract).

6.2.3.1.1. ATS contractor maintains the OFT, WST, BOPTT, BOWST, CPT, CLT, GIPTT, NPT and other devices or training aids, to enhance flight training programs. Schedule lessons and ATD profile as well as a conduct mission overview and debrief (by the ATS instructor) for each lesson. Provide all necessary data to complete the ATD profile or assigned task.

6.2.3.1.2. The ATS contractor ensures instructors provide an environment for simulator training that is as realistic, as possible. Attention will be directed to crew coordination throughout all phases of flight. Crews will use equipment in the trainer

- the same as in the aircraft. This shall include communications, personal, and emergency equipment. Correct communications phraseology; techniques; checklist usage and regimentation; and instrument, flight, and AAR procedures will be stressed at all times. Realistic aircraft systems and NAVAID failures and malfunctions will be included in a logical and timely manner.
- 6.2.3.1.3. Conduct a post lesson critique to reinforce the desired learning outcomes.
- 6.2.3.1.4. Provide comments on the recurring training documentation. The intent of these comments is to provide meaningful feedback to the appropriate levels of supervision (Air Force and contractor) on the student's continuation training. In those rare cases where the student requires more training than the time available, exhibits less than required preparation, or displays an attitude problem, the Instructor must provide immediate documentation/feedback to the student's unit through appropriate channels.
- 6.2.3.1.5. Provide all students with a training critique.
- 6.2.3.2. AMC/A3T (see [paragraph 1.4.1](#)). AMC/A3TK ATS Manager provides overall management authority for KC-135 ATS contract training through the AF Training Systems Product Group (AFMC ASC/WNSPA).
- 6.2.3.2.1. Ensure the ATS Contractor-provided academic and ATD training complies with policies and directives in this instruction and the ATS contract.
- 6.2.3.2.2. Ensure training performance objectives are met.
- 6.2.3.2.3. Act as AMC focal point for review of all recommendations, changes or initiatives affecting the KC-135 ATS program.
- 6.2.3.2.4. Co-host the ATS Contractor quarterly KC-135 ATS System Review Board (SRB).
- 6.2.3.2.5. Determine Fiscal Year training requirements (ATS throughput range).
- 6.2.3.3. AETC/A3Z (see [paragraph 1.4.2](#)). In addition, AETC/A3ZM will monitor all actions associated with the KC-135 training program through close coordination with Detachment 2/AMCAOS, 97 TRS, and AMC/A3TK.
- 6.2.3.3.1. Monitors KC-135 ATS formal school aircrew training performance objectives. May submit quality assurance report (QAR), if required.
- 6.2.3.3.2. Act as AETC focal point for review of all recommendations/initiatives directed toward the KC-135 ATS contract in coordination with AMC/A3TK.
- 6.2.3.3.3. Reviews crewmember feedback tools including critiques, evaluator feedback, and course feedback.
- 6.2.3.3.4. Reviews and evaluates ATS contractor training analysis, objective hierarchy, courses and training materials for accuracy, currency, and effectiveness.
- 6.2.3.3.5. 97 TRS (AETC). Ensures instruction is of the highest quality through the review of crewmember critiques, evaluator feedback, course feedback, and course monitoring/evaluation. Reviews and evaluates the task analysis, objective hierarchy, and contractor courses and training materials for accuracy, currency, and

effectiveness. Act as the focal point for proposed formal school syllabus changes at Altus AFB.

6.2.3.4. Det 2/AMCAOS (see [paragraph 1.4.1.3](#)).

6.2.3.5. Air Force-Appointed ATS Project Officer (PO) and Quality Assurance Representative (QAR). PO/QAR is the primary focal point and liaison between the Air Force and ATS contractors at each ATS training site. PO/QAR is the sole point of contact for their respective ATS. The PO/QAR may direct the contractor to perform or stop work only on safety related issues. The Administrative Contracting Officer and Procurement Contracting Officer have the overall authority to direct contractor start/stops on the ATS.

6.2.3.6. Wings and Groups will:

6.2.3.6.1. Provide constructive reports and inputs concerning the ATS program in [Chapter 1](#).

6.2.3.6.2. Provide assistance and support with subject matter expertise (SME) upon request by AMC/A3T or Det 2 AMCAOS.

6.2.3.6.3. Review ETCA course description and requirements for requesting, allocating, scheduling, and confirming attendance for formal training courses. Close coordination with the MAJCOM formal school quota managers (for AMC AD use AMC/A3TF) is imperative to ensure effective utilization of training slots and contractor resources.

6.2.3.7. KC-135 ATS Syllabi.

6.2.3.7.1. The ATS contractor develops and maintains the appropriate course syllabi with approval by Training Command ([paragraph 1.4.2](#)) or AMC/A3T. Each syllabus is the blueprint for each KC-135 ATS course in a format standardized by AETC. The format is also adopted for AMC managed courses (e.g., BNQ at McConnell AFB).

6.2.3.7.2. ATS contractor will produce each course syllabus and is therefore responsible for curriculum development described in the KC-135 ATS Contract Performance Work Statement (PWS) and System Specification (SPEC). The ATS Contractor will review syllabi annually and update, as required in coordination with AETC/A3ZM. AETC reviews each course syllabus every two years.

**6.3. Dedicated Training Time.** As defined in AFI 11-202, Volume 1.

6.3.1. Applies to formal school and continuation training. It is imperative that students complete training in a timely and uninterrupted manner. Students will enroll on a full-time basis. Relieve students of duties not directly related to training. **Exception:** Senior Officer Course (SOC) students may continue their normal duties as time permits.

**6.4. ATS Course Prerequisites.** Course prerequisites in [Tables 5.1 and 5.4](#), include a minimum number of flying hours, commander recommendation, and completion of applicable training guides or workbooks. Each ATS course is designed and based on certain prerequisites being met by the trainee before course entry. All prerequisites must be complete, with exception

by approved waiver by the appropriate agency (see [Chapter 1](#)), before entering a formal course listed in [Table 6.1](#).

**Table 6.1. KC-135R-model ATS Courses.**

Course ID	Title	Syllabus Duration (Training Days)	Notes
KC135PIQ	Pilot Initial Qualification Course	99 Days	1
KC135PTX1	Pilot Transition Course 1	78 Days	1,3
KC135PTX2	Pilot Transition Course 2	70 Days	1,2,3
KC135PTX3	Pilot Transition Course 3	60 Days	1,2,3
KC135IAC	Instructor Aircraft Commander Course	28 Days	1,4
KC135NBQ	Basic Navigator Initial/Requalification/SOC	~28 Days	1,5
KC135IN	Instructor Navigator (In-Unit only)	~14 Days	1,5
KC135BIQ	BO Initial Qualification	69 Days	1
KC135BTX2	BO Transition Course 2	38 Days	1,3,4
KC135IB	Instructor Boom Operator	24 Days	1
KC135SOC	Senior Officer Course (SOC)	(Track A) 2 Days (Track B) 7 days	1,4,6

**NOTES:**

1. Course duration/content is subject to change, see course syllabus for details.
2. AC requalification includes pilots previously qualified in the KC-135.
3. These courses have proficiency advancement option that allows for accelerated completion of the flying portion of the training.
4. Pilot course for senior officers (O-6 selectees and above) who will fly under instructor supervision.
5. Instructor upgrade is available in-unit only (see [paragraph 5.4.2.2](#))

**6.5. Lesson Objectives.** Use lesson objectives as a reference to establish training and evaluation standards. The KC-135 ATS use the Master Task List (MTL) and the Evaluation Standards Document (MTL/ESD) available on the ATS Contractor website (see [paragraph 1.15.5](#)).

6.5.1. MTL and ESD Purpose. MTL and ESD provide the basis for ATS courseware development, and are a principle source for evaluation criteria (validate MDS crewmember performance).

6.5.1.1. Courseware development and instructors training KC-135 crewmembers may use criteria from the MTL and ESD to help determine the ability of an individual to meet performance levels required to be mission-qualified. For evaluation, use AFI 11-2KC-135 Volume 2 criteria.

6.5.1.2. Conduct the Air Force evaluation to ESD standards, in a timely manner subsequent to the trainee's completion of the ground-based or flight training (to guarantee standards).

6.5.2. Crew resource management (CRM) training. The KC-135 ATS incorporates CRM principles during all phases of training including initial and continuation training to meet requirements of AFI 11-290, *Cockpit/Crew Resource Management Training Program*. A

CRM facilitator course is also available, upon request. Instructors use AF Form 4031, *CRM Skills Criteria Training/Evaluation*, for CRM skills training IAW AFI 11-290.

**6.6. Unsatisfactory Student Progress.** (See [paragraph 1.16](#)). Any time during a trainee's ATS ground instruction for formal school or unit-level continuation training, the ATS instructor considers training progress is unsatisfactory, lack of preparation or participation, etc., the ATS contractor will notify the unit training manager.

6.6.1. Failure to Progress. If a student fails to progress according to syllabus requirements, the command accomplishing the training will conduct a Progress Review (PR). The PR can recommend continuation in training or AFI 11-402, *Aviation and Parachutist Service, Aeronautical Ratings and Aviation Badges*, action, e.g., a Flying Evaluation Board (FEB) to the individual's unit commander. The ATS contractor will identify students who fail to progress according to the ATS contract (see [Chapter 6](#).)

6.6.1.1. Failure to Complete Training. If crewmember fails to complete a formal course, the formal school (ATS contractor will notify AMC/A3TK for training deficiencies at McConnell AFB) will send a recommendation of action to the individual's unit. The recommendation will specify if the student should complete training in-unit, return to the formal school to complete training, or be referred to the AF personnel system for reassignment.

**6.7. Courseware Changes.** (See [paragraph 1.3.1](#)). While completing CBT, the user may also submit a comment or proposed change at the point of instruction using a "Control C" input. See CBT on-screen instructions on the opening to each CBT lesson. The inputs are consolidated as part of the CBT centralized reporting function. ATS contractor, in coordination with 97 TRS/TRK (if applicable) will monitor "Control C" inputs for consideration of future courseware updates.

## **6.8. Scheduling.**

6.8.1. AMC/A3TK ATS Manager, through KC-135 ATS Contracting office and training group (AFMC ASC/WNSPA), will determine FY ATS formal school and continuation training requirements (throughput) for all ATS courses. PFT reflects the planned annual formal school throughput based on Air Force requirements, formal school and ATD capacities, and contract authorizations. ATD simulator scheduling at formal school is managed by 97 TRS, Altus AFB in coordination with the ATS Contractor, Training Management System (TMS) scheduling office.

6.8.2. Units with collocated ATS facility schedule directly with the local ATS site. Units without an ATS facility have been designated (by AMC/A3TK ATS Manager) to "QUEEN BEE" ATS facilities. While an ATD undergoes conversions or hardware modifications the ATS management team or ATS contractor may request the host or QUEEN BEE unit aircrews divert to sites with available training capacity. The ATS contractors' TMS office at Altus AFB and AMC/A3TK orchestrate the annual scheduling of KC-135 pilots and QUEEN BEE sites in coordination with 507 ASSC/GFLC.

6.8.3. Cancellation of ATS Formal School Course Quota. Units will notify their MAJCOM/A3T (or equivalent) staff (AMC AD call AMC/A3TF) within 45 days before class start date if a quota cancellation or no-fill is pending. All formal school quota cancellations must be made no later than 30 days prior to class start date to enable the quota to be

reallocated (see ETCA, **paragraph 1.15.7**, for additional information). For cancellations at McConnell AFB, notify MAJCOM/A3T (or equivalent) staff immediately and site scheduler as early as possible to permit reallocation/rescheduling. Short notice cancellation of one student may result in the delay/cancellation of the paired pilot.

## **6.9. Administration.**

6.9.1. General. Recurring academic and ATD training ensures required subject training materials are presented in a realistic manner on a programmed/phased basis.

6.9.2. Objective. Ensure all crewmembers maintain the proficiency to safely operate the KC-135 aircraft and effectively perform the assigned mission. Crewmembers will use the ATD to enhance the training areas (e.g., windshear/microburst training, low visibility approaches, systems knowledge, emergency/abnormal procedures, and degraded navigation systems).

## **6.10. Training Implementation/Student Expectations.**

6.10.1. Self-Study. Each crewmember is responsible for their adequate preparation before reporting for each ATD profile. Review the mission profile, pre-course study material, associated normal, abnormal, and emergency procedures, and applicable aircraft systems. Each pilot must review the applicable portions of the flight publications and answer review exercises questions located in the OFT or BOWST profile.

6.10.2. Pre-mission. The ATS instructor will conduct a pre-mission briefing before each OFT or BOWST profile and cover the mission overview, academic session overview (if applicable), systems, aircraft loading, performance data, route-of-flight, communications, takeoff weather, simulator discrepancies, and ATD emergency egress. Also include mission objectives, special procedures specific (required) training items, scheduled systems and performance training, CRM, and any additional area of emphasis. Prior to executing the scheduled training event, the designated crewmember should conduct a mission briefing covering AFI 11-2KC-135 Volume 3 required briefing items.

6.10.3. Mission. The crew and ATS instructor will fly the ATD profile to maximum extent possible. For proper pacing, it is imperative the pilot team cope with simulated emergencies while continuing to fly the aircraft. Limit “freezing the ATD” to meet training objectives.

6.10.4. Post-mission. The ATS instructor will critique the crew’s performance during each phase of the mission. Several ATDs are equipped with TDAPPS, a dual-screen simulator mission playback system. Complete post-mission documentation IAW Technical Order 00-20-1, *Aerospace Equipment Maintenance Inspection, Documentation, Policy and Procedures*, to include AFTO Form 781A, *Maintenance Discrepancy and Work Documentation*, AFTO Form 781H, *Aerospace Vehicle Flight Status and Maintenance* and ARMS products. Send requests or recommendations for additional training to the unit training manager. Accomplish additional training as soon as practical, schedule permitting.

**6.11. Browsing Training Products.** KC-135 crewmembers are encouraged to browse any and all lessons existing within the ATS. This is particularly applicable to those personnel preparing to enter upgrade courses, subject to the following restrictions:

6.11.1. Browser time is on a space-available basis.

6.11.2. All browser requests will be coordinated with the ATS training supervisor.

6.11.3. Trainees are not to be scheduled to browse lessons for remediation. Remediation will be scheduled by coordinating with the ATS contractor. Browsing a lesson does not enable the trainee to take the end-of-lesson test. Trainees in remediation will be enrolled in lessons for review in order to take the end-of-lesson test and keep a permanent record of the remediation.

#### **6.12. Aircraft Flights for ATS Training Instructors.**

6.12.1. ATS contractor provides opportunities for Air Force flight instructor to observe trainee progress in ATD. Likewise, KC-135 ATS simulator instructors may observe students during flight training according to AFI 11-401 and the terms and conditions of the current KC-135 ATS contract.

#### **6.13. KC-135 ATS Facility Tours.**

6.13.1. Wing training offices will coordinate all requests for KC-135 ATS facility tours with the contractor as soon as possible, but in no case later than 24 hours before the planned event. This may require close coordination with public affairs and protocol. Air Force option time may be used at the discretion of the OG/CC. Tours will be on an as-available basis and will not displace scheduled training events.

6.13.2. OG/CC will ensure an Air Force representative meets, greets, accompanies, and conducts all tours. The contractor is not manned for or on contract to perform these duties. The contractor shall be responsible for providing an aircrew training device operator only.

#### **6.14. Aircrew Evaluation.**

6.14.1. General. The Air Force examiner's decision as to the ability of the aircrew member's ability to meet qualification levels as set forth in AFI 11-202, Volume 2 and AFI 11-2KC-135 Volume 2 shall be final and will not be subject to question by the contractor. An AF Form 8 will be completed for all evaluations IAW AFI 11-2KC-135 Volume 2.

## Chapter 7

### ARMS EVENT IDENTIFIERS AND COURSE DESCRIPTIONS

**7.1. Description.** ARMS event identifiers are standardized for mobility crewmembers.

**Table 7.1. ARMS Identifiers.**

<b>Identifier</b>	<b>Group</b>	<b>Paragraph</b>
A	Academic training	7.2.
AA	USAF-Specified	7.3.
AD	Airdrop	7.4. (N/A KC-135)
AS	Airland	7.5. (N/A KC-135)
B	Navigation & Individual Proficiency	7.6. (N/A KC-135)
C	Miscellaneous	7.7.1.
E	Miscellaneous	7.7.7.
FE	Miscellaneous	N/A
FR	Formation Departure & Recovery	N/A
F	Formation Training	7.8.
FF	Flight Surgeon Flight Training	7.9.
G	Ground Training	7.10.
H	Miscellaneous (Health)	7.7.18.
LL	Aircrew Flight Equipment	7.11.
M	Mission Specific	7.12.
NV	NVG	7.13.
N	Crew Proficiency	7.14.
P	Individual Proficiency	7.14.18.
Q	Qualification and Certification	7.15.
R	Air Refueling	7.16.
RS	Tactical Approaches / Departures	N/A
S	Special Operations (SOAR)	7.17.
SK	SKE	N/A
SS	SERE	7.18.
V	MPD	7.19.
VL	Visual Low Level	N/A

VT	Visual Threat Recognition & Avoidance	7.20.
VV	NVG	7.21.
X	Unit Defined	7.22.

## 7.2. Academic (A) Training Events.

### 7.2.1. A001—Initial Qualification Academic Course.

7.2.2. **A003—Senior Staff Orientation Course.** Two-day orientation for senior officers. Does not meet the requirements for A004, Senior Staff Course, and does not result in a qualification in the KC-135.

7.2.3. **A004—Senior Staff Qualification Course (KC135SOC).** This course is taught at the FTU, Altus AFB.

7.2.4. **A006—MPRS Familiarization Training.** See [paragraph 5.6.4.3](#) and [Table 5.7](#) for course details. **Description:** Training for MPRS including system overview, normal procedures, performance considerations, abnormal procedures, cautions, and warnings. Training does not include certification to operate the MPRS equipment, but does allow crewmembers to fly MPRS aircraft with pods installed. **OPR:** MAJCOM: AMC/A3T. **Unit:** OSS/OST. **Training Aids:** PowerPoint slides, see AMC/A3TK CoP. Training is taught in-unit by IBO or IP. Training will include the following:

7.2.4.1. A006A—MPRS System Description (IBT).

7.2.4.2. A006B—MPRS Specifications and Limitations (IBT).

7.2.4.3. A006C—MPRS Normal Procedures (IBT).

7.2.4.4. A006D—MPRS Performance (IBT).

7.2.4.5. A006E—Abnormal Procedures (IBT).

7.2.4.6. A006F—Cautions and Warnings (IBT).

7.2.5. **A009—Instructor Pre-Attendance Academics Training.** Will complete the appropriate lessons in KC-135 IAC or KC-135 IB syllabi. See related workbook as ARMS event identifier A044.

7.2.6. **A017—Instructions/Directives/Knowledge/Use.** Review assigned publications, including AFI 11-2KC-135 Volume 3, applicable T.O.s, and AFTTP 3-3.KC-135 with emphasis on amplified checklists systems knowledge and procedures.

### 7.2.7. A018—Aircraft Commander Responsibilities.

7.2.8. **A032—Difference Course (KC-135T-model).** Must be accomplished by all Pilots, Navigators, and Boom Operators during MCT, if equipped. See AMC/A3TK CoP for presentation (see [paragraph 2.5.2](#) for certification requirements). A closed book difference test of 20 Questions will be derived by OGV & Sq/DOVs from current publications and T.O.s, administered upon completion of the training course, with a required passing score of 85%.

7.2.9. **A034—Requalification Course.** See the appropriate crewmembers syllabus for course details.

7.2.10. **A037—OPLAN-8010 Performance Training.** Review performance data (manual and automated).

7.2.11. **A044—Instructor Training Course Workbook.** Reference **Chapter 5** for additional information. Complete before attending formal course (i.e., IAC) or conducting in-unit upgrade. A sub-part to the overall Instructor course. See related ARMS event description, A009.

7.2.12. **A051-Difference Course (KC-135RT-model).** Pilots must be qualified in the KC-135R-model before completing this course. Training does not include certification to operate the RT equipment, but does allow crewmembers to operate RT equipped aircraft in the tanker role. Unit with receiver mission will develop the course and coordinate with AMC/A3TK for distribution; see AMC/A3TK CoP for baseline lesson plan and presentation.

7.2.13. **A052—Receiver AAR Indoctrination.** Initial/Familiarization in-flight training.

7.2.14. **A053—Receiver AAR (Initial) Course.** Unit with receiver mission will develop the course and include details in local supplement or OGI.

7.2.15. **A060—Flight Examiner Course.** Complete before certification IAW AFI 11-2KC-135 Volume 2 (one-time event; see [paragraph 5.6.2](#)).

### 7.3. USAF-Specified (AA) Events.

7.3.1. **AA01—Qualification Evaluation.** See AFI 11-2KC-135 Volume 2.

7.3.2. **AA02—Qualification Evaluation, Simulator.**

7.3.3. **AA11—Instrument Evaluation.** See AFI 11-2KC-135 Volume 2.

7.3.4. **AA12—Instrument Evaluation, Simulator.**

7.3.5. **AA21—Combined Qualification and Instrument Evaluation.**

7.3.6. **AA22—Combined Qualification and Instrument Evaluation, Simulator.**

7.3.6.1. AA22A INSTR/QUAL Sim Profile 1.

7.3.6.2. AA22B INSTR/QUAL Sim Profile 2.

7.3.6.3. AA22C INSTR/QUAL Sim Profile 3.

7.3.6.4. AA22D INSTR/QUAL Sim Profile 4.

7.3.6.5. AA22E INSTR/QUAL Sim Profile 5.

7.3.6.6. AA22F INSTR/QUAL Sim Profile 6. FTU Instrument/Qualification Evaluation.

**7.4. Airdrop (AD) Events.** (N/A KC-135).

**7.5. Airland (AS) Events.** (N/A KC-135).

**7.6. Navigation & Individual Proficiency (B) Events.** (N/A KC-135).

**7.7. Miscellaneous (C, E, H, FE) Events.**

7.7.1. **C010—CWD Driver Operations.**

7.7.2. **C020—Mass Casualty Exercise.**

7.7.3. **C030—Mobility Briefing.**

7.7.4. **C040—Mobility Folder Review. Purpose:** Ensure Air Force Personnel are prepared to for deployment to locations specified by tasking order. **Description:** The unit Commander ensures unit personnel prepare for deployment IAW this AFI, AFMAN 10-401 Volume 2, *Planning Formats and Guidance*, and AFI 36-507, *Mobilization of the Civilian Work Force*. In addition to the aircrew specific training items contained in this AFI, Air Force members have Air Force specific and theater specific requirements that must be met prior to deployment. The unit UDM is responsible to ensure all personnel meet these additional ancillary and mobility training requirements. **OPR:** Unit Commander, Unit Deployment Manager, and individual crewmembers. **Additional Information:** See AFI 10-403, *Deployment Planning and Execution*. Frequency of this event will be determined by the Installation Deployment Plan (IDP).

7.7.5. **C050—Unit Disaster Preparedness Training.**

7.7.6. **C200—AFMSS Portable Flight Planning Software.** Mission planning lesson conducted during initial qualification training. Includes two lessons and workshop (with hand-on training).

7.7.7. **E011—Standards of Conduct Briefing.**

7.7.8. **E020—AMC Escort Training.**

7.7.9. **E030—Official Passport-Primary (No-fee/maroon). Purpose:** Track passport expiration dates for crewmembers. **Description:** It is AMC policy for all crewmembers to have a current official US passport in order to comply with country entry requirements specified in the Foreign Clearance Guide. Every effort will be made to ensure Primary and Secondary passports do not expire within 6 months of each other.

7.7.10. **E035—Official Passport-Secondary (No-fee/maroon). Purpose:** Track passport expiration dates for crewmembers. **Description:** Use is for visa applications required for unit missions (i.e., START, FMS, etc.). It is AMC policy for all crewmembers to have a current second official US passport in order to comply with long lead visa requirements for country entry as specified in the Foreign Clearance Guide. Every effort will be made to ensure Primary and Secondary passports do not expire within 6 months of each other.

7.7.11. **E040 – Base Populace Briefing.**

7.7.12. **E050—Newcomer Substance Abuse Awareness Briefing.**

7.7.13. **E060—Newcomers Social Actions Briefing.**

**7.8. Formation Training (F) Events. Note:** Pilot Not Flying (PNF) may log events when performing PNF duties.

7.8.1. **F020—Formation.** Two or more aircraft with the same intended route of flight, maintaining station-keeping operations by either or both visual and electronic means. The formation will be flown with successive tankers in line astern and stepped up or down behind the leader. Use procedures in applicable AFIs and T.O.s. Intent is to gain proficiency to include preflight and operating ETCAS during KC-135 formations (station keeping). Must be flown through completion of level-off or join-up (whichever occurs first) and a minimum

30 minutes in formation. Includes buddy departure for credit. AC must brief the portion of the mission that they will be lead. Recommend use of EMCON 2 procedures (not applicable for formal schoolhouse). Plan HAVE QUICK and SECURE RADIO Operation during each formation flight (N/A when accomplished in ATD). For continuation training, any formation position is creditable. Log only one F020 per sortie.

7.8.2. **F030—Large Formation.** Three or more aircraft with the same intended route of flight, maintaining station-keeping operations by either or both visual and electronic means (KC-135s or a mix with KC-10s). Any formation position is creditable. Must be flown through completion of level-off or join-up (whichever occurs first) and minimum 30 minutes of formation. Recommend use of EMCON 2 (or EMCON 3) the entire flight to include preflight, formation departure, and join-up. Do not preclude ATC reporting (non-contingency training missions) or other communication for safety of flight. This event should be accomplished using the virtual formation syllabi in the simulator

7.8.3. **F060—AAR Formation.** Two or more aircraft with the same intended route of flight, maintaining station-keeping operations by either or both visual and electronic means (KC-135s or a mix with KC-10s). Minimum 15 minutes of AAR formation time required. Includes rendezvous and AAR procedures in ATP-56(B), AFTTP 3-3.KC-135 and AFI 11-2KC-135 Volume 3. Credit may be taken if receiver aborts provided a sampling of AAR formation positions are accomplished. Not creditable in lead position if receiver aborts. Attempt to balance lead and number two positions (wing) during training period.

## 7.9. Flight Surgeon (FF) Events.

7.9.1. **FF00—Total Flight Surgeon Sortie. Purpose:** Ensure that Flight Surgeons maintain minimum currency requirements. **Description:** Flight surgeons may log more than one sortie per day; however, no more than one sortie per single calendar day will be credited towards semi-annual and annual sortie requirements. **Exception:** Credit ARC flight surgeons with a maximum of two sorties for separate flights performed in a single calendar day, provided the interval between flights does not exceed 60 days and a minimum of six missions are flown each six months (see AFI 11-202 Volume 1, Table 1). To maintain currency, time between flights must not be more than 60 days. Dual log with FF01 or FF02 (whichever is applicable).

7.9.2. **FF01—Total Day Flight Surgeon Sorties. Purpose:** Used to track all Flight Surgeon Day sorties, in both primary and non-primary aircraft. Dual log with FF11 or FF21 (whichever is applicable).

7.9.3. **FF02 —Total Night Flight Surgeon Sorties. Purpose:** Used to track all Flight Surgeon Night sorties, in both primary and non-primary aircraft. **Description:** A night sortie is one on which either takeoff or landing and at least 50 percent of flight duration or one hour, whichever is less, occurs during night time, as defined in AFI 11-401. Dual log with FF12 or FF22 (whichever is applicable).

7.9.4. **FF11—Primary Day Flight Surgeon Sortie. Purpose:** Ensure that Flight Surgeons accomplish day requirements in primary assigned aircraft. **Description:** Flight Surgeons must fly at least 50 percent of their annual minimum requirements in primary unit aircraft unless assigned or attached to operational units equipped only with single place aircraft or deployed away from their primary unit for more than 90 days. Dual log with FF00 and FF01.

7.9.5. **FF12—Primary Night Flight Surgeon Sortie. Purpose:** Ensure that Flight Surgeons accomplish night requirements in primary assigned aircraft. **Description:** Flight Surgeons must fly at least 50 percent of their annual minimum requirements in primary unit aircraft unless assigned or attached to operational units equipped only with single place aircraft or deployed away from their primary unit for more than 90 days. A night sortie is one on which either takeoff or landing and at least 50 percent of flight duration or one hour, whichever is less, occurs during night time, as defined in AFI 11-401. Dual log with FF00 and FF02.

7.9.6. **FF21—Non-Primary Aircraft Day Flight Surgeon Sortie. Purpose:** Used when Flight Surgeon accomplishes a day sortie in other than primary assigned aircraft. Dual log with FF00 and FF01.

7.9.7. **FF22—Non-Primary Aircraft Night Flight Surgeon Sortie. Purpose:** Used when Flight Surgeon accomplishes a night sortie in other than primary assigned aircraft. **Description:** A night sortie is one on which either takeoff or landing and at least 50 percent of flight duration or one hour, whichever is less, occurs during night time, as defined in AFI 11-401. Dual log with FF00 and FF02.

## 7.10. Ground Training (G) Events.

### 7.10.1. General.

7.10.1.1. A crewmember that instructs (a class) may receive credit for the academic training requirement.

7.10.1.2. Records and Documentation. Units will use AF Form 1522, reports/certificates generated from Air Force approved automated systems or other locally developed forms IAW AFI 11-202 Volume 1. Record G280, Small Arms Training on AF Form 522, *USAF Ground Weapons Training Data*, IAW AFI 36-2226, *Combat Arms Program*. The course instructor will deliver the completed forms to the appropriate scheduling and training documentation sections within one duty day after the class is taught.

7.10.2. **Flight Physical. Purpose:** Ensure that aircrew members are physically fit to perform aircrew duties. **Description:** IAW AFI 44-170, flight physicals become due 366 days after the previous physical, and expire after the 455th day or as indicated on the AF Form 1042, whichever occurs first. The required frequency may vary to address waivers and/or individual physical limitations (as determined by the Flight Surgeon), but in no case will exceed 455 days. **OPR:** AMC/SG

7.10.3. **Physiological Refresher.** See requirement in AFI 11-401. See course details in AFI 11-403, *Aerospace Physiological Training Program*. Flying restrictions are required after expiration date.

7.10.4. **G002—Aircraft Marshaling Training and Examination. Purpose:** Ensure designated crewmembers understand the proper marshaling procedures and signals to help prevent aircraft taxi incidents. Use AF Visual Aid (AFVA) 11-224, *Aircraft Marshaling Signals*, for reference. **Description.** Review of AFI 11-218, *Aircraft Operation and Movement on the Ground*, AMC Taxi Training slides, and AFI 11-2KC-135 Volume 3 taxi restrictions/limitations followed by a 20-question examination or as directed in MAJCOM supplement. All ground and aircrew personnel who are or could be directly involved with

aircraft movement will be tested on their knowledge of marshalling signals, airport markings, lights and signs. This test will occur within 30 days after reporting for duty following a permanent change of station (N/A if tested at a formal school within previous 6 months). Aircraft Marshalling Signal questions may be incorporated into the crewmembers open book examination according to AFI 11-202 Volume 2. A self-contained CBT software program is available, see ETCA course description for information to request a copy. **OPR:** MAJCOM: AMC/A3T. **Unit:** Squadron. **Training Aids:** PowerPoint slides, see AMC/A3TK CoP.

**7.10.5. G003—Flightline Security and Drivers Examination. Purpose:** Ensure crewmembers understand proper flightline driving and security procedures. Crewmembers who are required to drive on the flightline must receive this course. Individual must possess valid state drivers license or international equivalent prior to driving on the flight line. **Description:** Training, examination, and certification to drive vehicles on the flightline according to local procedures. Also, includes a briefing by the flightline Constable covering the physical layout of restricted areas and owner or user responsibility for security reporting and detection. Sq/CC directed training for crewmembers that will drive on an USAF flightline. **OPR:** MAJCOM: AMC/A7F/SFO. **Unit:** Chief, Airfield Management and Flightline Constable.

**7.10.6. G009—Tactics Open-Book Examination. Purpose:** To test aircrew tactics knowledge. An open book 25 question tactics test using AMC/A3D test bank. **OPR:** AMC/A3D.

**7.10.7. G025—Aircraft Field Trip. Purpose:** Familiarize students with the aircraft, model, or aircraft system to include all crew stations and perhaps functions of other crewmembers to facilitate proper crew coordination. **Description:** Instructors determine field trip content based on the training objective (e.g., MPRS), student experience, and training status of the student. If necessary, the instructor will discuss or demonstrate the student's responsibilities during emergency conditions. Accomplish before initial flight. May be accomplished in conjunction with LL03, Emergency Egress Training-Non-Ejection. Initial qualification Boom Operator must install nose gear down lock pin from lower nose compartment through observation window. **OPR:** MAJCOM: AMC/A3TK. **Unit:** Squadron.

**7.10.8. G030—OPLAN-8010 Command and Control Procedures. Purpose:** To ensure positive control crewmembers understand command and control procedures as they relate to the OPLAN-8010 mission. For units with OPLAN-8010 mission requirement only. Units based OCONUS, MAJCOM will define requirements in MAJCOM Supplement. **Description:** Practice in OPLAN-8010 message decoding and operational reporting procedures as outlined in EAP-STRAT, Volume 5, AFI 10-207 AMC SUP 1, and the AMC 8010 Command and Control Procedures (CCP) Annual Training Plan (ATP). The ATP outlines the minimum refresher training requirements. These include self-study items, emergency action message (EAM) processing exercises and evaluations. Evaluations are conducted with a tape scenario and an open-book written test on concepts from EAP-STRAT, Volume 5. Crew members must be able to proficiently demonstrate knowledge and required actions upon receipt of EAMs. **Instructor:** Command post personnel designated (in writing) as a Command and Control Procedures instructor. **OPR:** MAJCOM: AMC/A3NC. **Unit:** Command post. **Training Aids and Media:** AMC OPLAN-8010 Unit Training Plan, CCP Instructor, unit developed tests and training/ evaluation tape scenario's; PC training material, as required.

7.10.9. **G031—Initial OPLAN-8010 Command and Control Procedures. Purpose:** To ensure positive control crewmembers understand command and control procedures as they relate to the OPLAN-8010 mission. For units with OPLAN-8010 mission requirement only. Units based OCONUS, MAJCOM will define requirements in MAJCOM Supplement. **Description:** Practice in OPLAN-8010 message decoding and operational reporting procedures as outlined in EAP-STRAT, Volume 5, AFI 10-207 AMC SUP 1, and the AMC 8010 Command and Control Procedures (CCP) Annual Training Plan (ATP). The ATP outlines the minimum refresher training requirements. These include self-study items, emergency action message (EAM) processing exercises and evaluations. Evaluations are conducted with a tape scenario and an open-book written test on concepts from EAP-STRAT, Volume 5. Crew members must be able to proficiently demonstrate knowledge and required actions upon receipt of EAMs. **Instructor:** Command post personnel designated (in writing) as a Command and Control Procedures instructor. **OPR:** MAJCOM: AMC/A3NC. **Unit:** Command post. **Training Aids and Media:** AMC 8010 Unit Training Plan, CCP Instructor, unit developed tests and training/ evaluation tape scenario's; PC training material, as required.

7.10.10. **G033—Unit Alert Procedures. Purpose:** For units whose mission include alert response as specified in local supplement or OGI. Units based OCONUS, MAJCOM will define requirements the appropriate MAJCOM Supplement. To ensure newly assigned crewmembers understand local procedures, policies, and requirements associated with Alpha and Bravo Standby Force, and Modified and Hard Alert, as applicable. **Description:** Course includes required professional gear, crew rest requirements, alerting procedures, alert area entry and exit procedures, standard maintenance procedures, alert response routing, specialized briefing requirements, aircraft acceptance and cocking, uncocking and recocking, scramble procedures, daily alert preflight, and alert postures. Scramble and alert start procedures require a tour of the physical layout of local alert taxi routes for launch, increased posture, and exercise recoveries. Emphasis to hazards of taxi obstacles, sharp turns, excessive taxi speed, adverse weather, and darkness. Covers all local base and wing directives concerning local and satellite alert operations. Initial accomplishment of G210 may be done in conjunction with G033, Unit Alert Procedures. **OPR:** MAJCOM: AMC/A3TK. **Unit:** Squadron.

7.10.11. **G034—Minimum Interval Take-Off (MITO) Procedures. Purpose:** For units with OPLAN-8010 mission requirement only. Units based OCONUS, MAJCOM will define requirements in MAJCOM Supplement. Review procedures and techniques used to launch the maximum number of aircraft in a minimum time interval (improve survivability of KC-135 force in an emergency war order situation). **Description:** Instructor-lead discussion on the aerodynamic differences between a 12- to 15-second MITO and a 30-second formation takeoff, to include local area procedures. **OPR:** MAJCOM: AMC/A3TK. **Unit:** ATS contractor and squadron. Curriculum Development: ATS contractor and squadron. **Training Aids and Media:** CBT (when available) and MITO instructor guide.

7.10.12. **G035—PLZT Goggle Training. Purpose:** For units with OPLAN-8010 mission requirement only. Units based OCONUS, MAJCOM will define requirements in MAJCOM Supplement. Familiarize crews with proper handling, donning, testing and storage of EEU-series PLZT goggles. If unit is not equipped, training will be for MIL-G goggles. **Description:** On modification of their helmet, and with the assistance of a Aircrew Flight

Equipment technician, each crewmember will demonstrate how to properly handle, don, test and store the PLZT goggles to include locating and installing the power cables. In addition, crews will be familiar with all contents of the flash blindness kits. **OPR:** AMC/A3TF. **Unit:** Squadron aircrew flight equipment. **Training Aids and Media:** PLZT goggles, modified helmet. **Instructor:** Aircrew Flight Equipment Technician.

7.10.13. **G036—Flash Blindness and Thermal Protection. Purpose:** Familiarize crews with proper handling and installation of thermal curtains and donning the eye patch or MIL-G goggles, if available. Units based OCONUS, MAJCOM will define requirements in MAJCOM Supplement. **Description:** Each crewmember will demonstrate where to locate and how to properly handle and install the thermal curtains and don the eye patch or MIL-G goggles, if available. **OPR:** AMC/A3T. **Unit:** Squadron. **Training Aids and Media:** CBT and instructor led demonstration in the aircraft. **Instructor:** Squadron Instructor.

7.10.14. **G040—OPLAN-8010 Study. Purpose:** All crewmembers in units with a primary or secondary OPLAN-8010 mission will receive this training. Units based OCONUS, MAJCOM will define requirements in MAJCOM Supplement. Provides crewmembers the information necessary for the effective and successful completion of the unit's OPLAN-8010 mission. **Description:** This course will review USSTRATCOM and AMC OPLAN-8010 procedures. The lesson should be based on any procedural changes that have been implemented. Crews should be given a period of crew-study to assist in strengthening weak areas. Staff specialists should be available to answer crewmember questions. The unit's OPLAN-8010 study should cover the overall OPLAN operational details with emphasis on the unit's OPLAN-8010 mission. **OPR:** AMC/A3TK. **Unit:** XP. **Instructors:** XP and applicable wing staff agencies, as required.

7.10.15. **G041—Unit Mission Briefing. Description:** Briefing by unit operations plans on sortie requirements and operations procedures applicable to the unit's mission(s).

7.10.15.1. **G041A—Unit Mission Briefing (Conventional). Purpose:** Briefing by unit operations plans on sortie requirements, operations procedures for conventional missions in the unit DOC. May be accomplished in conjunction with G041B.

7.10.15.2. **G041B—Unit Mission Briefing (OPLAN-8010). Purpose:** Briefing by unit operations plans on sortie requirements, operations procedures, and changes applicable to the unit's OPLAN-8010 mission. **Description:** Initial and Annual briefing covering updated procedures and changes to unit's OPLAN-8010 mission.

7.10.16. **G060—Aircrew Tactics Training. Purpose:** To provide the crewmember with information necessary for effective and successful execution of the unit's assigned employment mission. **Description:** G060 will be administered semi-annually using courseware developed by AMC/A3D and completing the G009 Tactics Open-Book Examination. OG/CC may specify an alternate frequency for Tactics training, but not more than "annual." The courseware is posted on the AMC Combat Operations SIPRNET site [http://www.amc.scott.af.smil.mil/hosted\\_orgs/dok/](http://www.amc.scott.af.smil.mil/hosted_orgs/dok/). The course is based on information found in Air Force Tactics, Techniques, and Procedures (AFTTP) 3-1.General Planning, 3-1.Threat Guide, 3-1.KC-135, and 3-3.KC-135, this document, as well as any other documents pertaining to the execution of the unit's mission. May be accomplished in conjunction with VT05. Additional information may be added to the course by the unit tactician, weapons officer (if applicable) or by the direction of the OG/CC. CATS attendance (St. Joseph, MO)

meets semi-annual requirement. May be conducted in conjunction with G070 as determined by agreement between local Intel and Tactics offices. **OPR:** AMC/A3D **Course Development:** AMC A3D. **Instructor:** Rated Instructor Required. Graduate of the USAFWS, the AFEC Tactics School, or the AATTC Aircrew Course. **Training Media:** Interactive lecture. Secret Power Point capable computer and projector. **Additional Information:** WIC instructors, cadre and students may credit G060 with completion of formal weapons syllabus.

7.10.16.1. (Added-MILDENHALL) 100 OG aircrews will accomplish G060 on an annual basis.

7.10.17. **G065—Special Departure Procedure Training (SDP).** **Purpose:** Provide pilots the knowledge required to effectively use SDPs. SDPs will provide engine-out escape routing when loss of an engine occurs at or after S1. One-time training event. **Description:** Course will provide pilots with details on Jeppesen website usage, how data is developed, and how to incorporate SDPs into mission planning and execution. **OPR:** AMC/A3TK. **Course Development:** AMC/A3TK. **Instructors:** Qualified IPs. **Training Aids:** PowerPoint slides, see AMC/A3TK CoP. Slides must be presented via IBT.

7.10.18. **G070—Aircrew Intelligence Training (AIT).** **Purpose:** Provide crews fundamentals of threat knowledge, visual recognition, and collection and reporting requirements. Enhance crewmember understanding of threats to unit assets with a direct impact on mission success and aircrew survival. **Description:** Course will provide aircrew with details concerning how, when and what to include in Mission Reports (MISREP), Ops-Intel interface. Request for Information(RFI), Escape and Evasion procedures and the development and coordination of Evasion Plans of Action(EPA). See AMCI 14-105, *Unit Intelligence Mission and Responsibilities*, and AFI 14-105\_AMC Sup1 (see AFI 12-2KC-135 Volume 3 when published) for further guidance. The unit intelligence officer will administer an AIT-related test to determine if training objectives are being met. May be conducted in conjunction with G060 as determined by agreement between local Intel and Tactics offices. **OPR:** AMC/A2. **Course Development:** AMC/A2. **Instructor:** Qualified Intelligence Instructor. **Training Media:** Lecture.

7.10.19. **G080—Communications Procedures.** **Purpose:** Ensure crewmembers possess a thorough knowledge of all communication and COMSEC requirements applicable to their unit's mission. **Description:** This course includes detailed discussion of equipment operation, procedures, and training requirements applicable to peacetime and wartime communications operations. Training should cover: Authentication procedures, OPLAN-8010 (if applicable), IFF/SIF codes, code loading devices (e.g., SKL), equipment operation, AFSIR, HAVE QUICK, Flight Information Handbook (FIH), KY-58, SECURE VOICE Radio, AMCH 33-1, *AMC Tanker Airlift Communications Handbook*, L-Band SATCOM (if applicable), COMSEC user requirements, (including other communications information pertinent to the unit. **Reference:** AFI 33-201, Volume 2 *Communication Security (COMSEC) User Requirements*. **Unit:** Combat Crew Communications, COMSEC responsible officer (CRO), and wing, operations group, and squadron training personnel. **Training Aids:** AF Form 4168, COMSEC Responsible Officer and User Training Checklist. **Instructor:** Wing, Operations Group, and Squadron training personnel, and Combat Crew Communications. **OPR:** MAJCOM: AMC/A3T/A3A/CPSS/STSP.

7.10.20. **G081—L-Band SATCOM.** If equipped and if required in the unit's DOC statement only. Unit developed.

7.10.21. **G082—KY58 Radio--Academics.** See [paragraph 7.10.19](#) G080, Communications Procedures.

7.10.22. **G090—Anti-Hijacking. Purpose:** Provide crewmembers with training on USAF policy that includes war and peacetime requirements for arming USAF personnel and the use of deadly force. Training includes the process to identify and train aircrews armed to protect resources, use of force model, and preventing/resisting acts of aircraft piracy (hijacking). **Description:** This training will meet requirements in AFD 16-8, *Arming Of Aircrew, Mobility, And Oversea Personnel*, and AFI 36-2226, *Combat Arms Program*, to include procedures in AFI 31-207, *Arming And Use Of Force By Air Force Personnel*. This course will supplement training in G280, Small Arms Training. **OPR:** MAJCOM: AMC/A3T AMC/A7S. **Unit:** ATS contractor. **Training Aids:** CBT fulfills requirement. The unit may supplement CBT training with instructor led discussions based on the Use of Force Model in AFI 13-207 and locally developed criterion test.

7.10.23. **G100—Law of Armed Conflict (LOAC). Purpose:** Ensure Air Force personnel understand the LOAC. **Description:** See requirements in AFD 51-4, *Compliance With the Law of Armed Conflict (LOAC)* and AFI 51-401, *Training And Reporting To Ensure Compliance With The Law Of Armed Conflict*. "Annually, all commanders will ensure that assigned personnel are trained in the principles and rules of LOAC. At a minimum, training will include subjects required by the 1949 Geneva Conventions for the Protection of War Victims and the Hague Convention IV respecting the Laws and Customs of War on Land of 1907." **OPR:** MAJCOM: JA Staff. **Unit:** Commanders may supplement AF, MAJCOM LOAC training programs. **Training aids:** LOAC training is available in several formats including web-based training at: <https://golearn.csd.disa.mil/> or via AF Portal link , MAJCOM/JA staff websites. LOAC may be taught during G070, Aircrew Intelligence Training. Completion of any LOAC training course fulfills the requirement of this AFI. **Additional Information:** Due to different mission requirements, units may increase emphasis on those areas in the course of particular interest to them. During wartime or contingency operations, commanders may direct staff to conduct LOAC training in coordination between JA.

7.10.24. **G120—ISOPREP Review. Purpose:** May be completed during an aircrew's G070, Evasion and Recovery (E&R) Training. All crewmembers will have two current, accurate and identical hard copy ISOPREP cards on file IAW Joint Personnel Recovery Agency (JRPA) guidance. Once completed, the ISOPREP card is classified CONFIDENTIAL and must be safeguarded accordingly. Individuals with an ISOPREP card will review the card at least every six months. During employment operations, personnel will review ISOPREP upon deployment, prior to the first mission of the day and as often as necessary thereafter. **Description:** Complete review on DD Form 1833 or electronic version. See Joint Pub 3-50.2, *Doctrine for Joint Combat Search and Rescue*, and Joint Pub 3-50.3, *Joint Doctrine for Evasion and Recovery (JPRA)* for process and examples. **OPR:** MAJCOM: AMC/A2. **Unit:** Intelligence officer. Frequency in cited references is annual while MAF aircrews standardize at 180 days. AFI 11-2KC-135 Volume 1 is not the governing directive for completion of this event. IAW AFI 11-202 Volume 1 paragraph 6, refer to USAF/A30-AT reference publications for current ancillary training frequencies.

7.10.25. **G130—Instrument Refresher Course. Purpose:** Ensure pilots possess a sufficient knowledge of all applicable directives, procedures, and techniques to assure safe and professional instrument flying. **Description:** Guidance for development of unit IRC programs, including topics and subject outlines, course length, instructor prerequisites, and methods of instruction are contained in AFMAN 11-210, *Instrument Refresher Program*. IRC is accomplished according to AFI 11-2KC-135 Volume 2 and applicable MAJCOM Supplement. If using CBT, complete KC-135 IRC web-based program: <https://amc.csd.disa.mil/kc/login/login.asp>. Use CaC Login (tied to ADLS gateway) or register to receive a login ID and a password. After log-in, select “course list,” then the “Instrument Refresher” dropdown, then select “KC-135 Instrument Refresher Course.” The CBT must be complemented by a 2-hour instructor based training (IBT) prior to signing off G130. This course is no longer linked with the IRC examination. This course (G130) must be completed every fourth quarter after completion IAW AFMAN 11-210. Complete IRC examination within the evaluation eligibility period according to AFI 11-202 Volume 2. See AFMAN 11-210, *Instrument Refresher Course (IRC) Program*. **OPR:** MAJCOM: AMC/A3T. **Unit:** OG/CC. **Curriculum Development:** Air Force Flight Standards Agency (AFFSA). **Training Aids:** Course is available from web based program with a follow-on two-hour IBT. The IBT may source from the core IRC including “hot topics”; IRC testing software and questions are available from AFFSA CoP.

7.10.25.1. **(Added-MILDENHALL)** The AMC-approved Instrument Refresher Course (IRC) computer Based Training (CBT) program designed for the KC-135 is an approved CBT for USAFE KC-135 aircrews. In accordance with AFMAN 11-210, *Instrument Refresher Program (IRP)*, paragraph 1.3.3.2., CBT Credit, completion of the approved CBT may fulfill up to four hours of the IRC classroom requirement. Any CBT program will be supplemented with a minimum of two hours of Instructor Based Training (IBT). Aircrew who complete a CBT program will provide a completion certificate to the IRC instructor. IBT will remain the preferred method of IRC training; however, CBT programs may be used when an individual risks non-currency due to extenuating circumstances. The approved IRC CBT is located at: <https://amc.csd.disa.mil/kc/login/login.asp>.

7.10.26. **G145—MPRS Ground Training. Purpose:** Review MPRS limitations and procedures. **Description:** Instructor based review of MPRS system including limitations and procedures. **OPR:** MAJCOM: AMC/A3T. **Training Aids:** PowerPoint slides, see AMC/A3TK CoP.

7.10.27. **G150—Approach Plate Familiarization Training. Purpose:** Provide Boom Operators with the knowledge and skills necessary to monitor the briefed departure and approach and advise the pilots of any deviations that would compromise safety. **OPR:** MAJCOM: AMC/A3T. **Unit:** ATS contractor. **Training Aids:** G150 CBT.

7.10.28. **G160—Overwater Navigation Procedures.** To provide instruction and review of procedures and restrictions for Atlantic and Pacific oceanic crossing and international airspace. The training will cover oceanic crossing requirements, contingencies, ACFP review, ETP, and RNP/RNAV. **OPR:** MAJCOM/AMC/A3T. **Training Aids:** PowerPoint slides, see AMC/A3TK CoP. **Instructor:** Instructor led G160 presentation/discussion required for mission certification ground training for all initial qualifications and AC upgrades.

7.10.29. **G180 – Cargo and Passenger Handling Procedures. Purpose:** Ensures KC-135 Boom Operators are knowledgeable in cargo planning and loading procedures and are able to properly handle passengers when they are transported on KC-135 aircraft. Teaches proper and effective interaction with passengers, and defines acceptable and unacceptable behaviors while teaching communication skills and problem solving when dealing with passengers. This course is a pre-requisite to IBO training at the FTU. **OPR:** AMC/A3TK. **Unit:** Squadron training.

7.10.30. **G182—Hazardous Cargo Training. Purpose:** To familiarize Pilots with procedures and restrictions when carrying hazardous materials. **Description:** Provides instruction reviewing mobility aircrew hazardous materials procedures and AFMAN 24-204(I), *Preparing Hazardous Materials for Military Air Shipments*; and AFJI 11-204, *Operational Procedures for Aircraft Carrying Hazardous Materials*. The syllabus includes: Hazardous Classification, Aircraft Loading and Passenger Movement, Packaging, Tactical and Contingency Airlift, Marking and Labeling, Aircrew Responsibilities, and Certification. **OPR:** MAJCOM: AMC/A3T. **Unit:** ATS contractor. **Training Aids:** CBT.

7.10.30.1. **G182A—Hazardous Cargo Training. Purpose:** To familiarize Boom Operators with procedures and restrictions when carrying hazardous materials. **Description:** Provides instruction reviewing mobility aircrew hazardous materials procedures and AFMAN 24-204(I), *Preparing Hazardous Materials for Military Air Shipments*; and AFJI 11-204, *Operational Procedures for Aircraft Carrying Hazardous Materials*. The syllabus includes: Hazardous Classification, Aircraft Loading and Passenger Movement, Packaging, Tactical and Contingency Airlift, Marking and Labeling, Aircrew Responsibilities, and Certification. **OPR:** MAJCOM: AMC/A3T. **Unit:** ATS contractor. **Training Aids:** CBT.

7.10.31. **G183—Floor Loading. Purpose:** To provide instruction in floor loading cargo on the KC-135 aircraft. **OPR:** MAJCOM: AMC/A3TK. **Unit:** ATS contractor. **Training Aids:** CBT.

7.10.32. **G184—Palletized Cargo Loading. Purpose:** To provide instruction on loading palletized cargo on the KC-135 aircraft. **OPR:** MAJCOM: AMC/A3T. **Unit:** ATS contractor. **Training Aids:** CBT.

7.10.33. **G185—Cargo Loading Training. Purpose:** To provide instruction in loading cargo on the KC-135 aircraft. **Description.** Training consists of two CBTs: G183—Floor Loading, and G184—Palletized Cargo Loading, a cargo loading exercise, manual DD Form 365-4, *Weight and Balance Clearance Form F—Tactical* computation, and emergency procedures review. Planned cargo load plans will be loaded on the aircraft and critiqued by the instructor and can be either floor loaded or palletized loads. Emphasis will be focused on proper checklist procedures, computation of restraint, hazardous cargo, and weight and balance. The OG/CC is the waiver authority for this event and may exempt highly experienced Boom Operators from the cargo loading exercise (i.e., FTL-A). **OPR:** MAJCOM: AMC/A3TK. **Unit:** ATS contractor and squadron. **Training Aids and Media:** CBT.

7.10.34. **G190—Aircraft Servicing. Purpose:** To ensure all crewmembers are familiar with the procedures necessary to service their aircraft when qualified maintenance support is not available. Completion of this course does NOT qualify crews to perform maintenance

tasks, but does allow them to assist qualified maintenance personnel in ground refueling operations. **Description:** CBT and a field trip covering servicing requirements of the aircraft, safety, approved fuels, lubricants and fluids, frequency of servicing, and aircraft servicing locations and requirements; field trip for hands-on demonstration by qualified maintenance personnel or a unit IBO who has completed the Maintenance Qualification Training Program (MQTP) for servicing. **OPR:** MAJCOM: AMC/A3TK. **Unit:** ATS contractor and squadron. **Training Aids and Media:** CBT. **Instructor:** Qualified maintenance personnel/unit IBO who has completed MQTP.

7.10.35. **G210—Ground Alert Start Procedures. Purpose:** To ensure pilots and Boom Operators are able to perform the procedures required to quick start an aircraft cocked on alert status. **Description:** Course covers the physical characteristics, operating procedures, checklists, and cockpit indications of normal and abnormal APU alert starts. Use ground training course to review aircraft hazardous areas and limits during alert starts. **OPR:** MAJCOM: AMC/A3TK. **Unit:** ATS contractor. **Training Aids:** CBT fulfills requirement. **Additional Information:** Complete G210 before accomplishing initial P290, Aircraft Alert Start Procedures.

7.10.36. **G215—EADI Multifunction Display for Boom Operators (CBT). Purpose:** To provide an annual review of the EADI symbols and displays. **Description:** Lesson provides a review of the EADI symbols and displays, including warning flags, and a series of problems and questions to answer. This CBT is intended for Boom Operators only. **OPR:** MAJCOM: AMC/A3TK. **Unit:** ATS Contractor. **Training Aids:** CBT fulfills requirement.

7.10.37. **G220—Aircraft Systems Refresher Training (CBT/GST). Purpose:** Annual review of critical aircraft systems. **Description:** Computer-based scenario that introduces the Pilot or Boom Operator to a series of randomly generated aircraft system training modules with progressive advancement based on criterion testing and aircraft system knowledge. Complete the training event and log as a single ARMS entry. After completing GST lessons, log G220. GST lessons cover hydraulic system, flight controls, fuel system, electrical system, environmental system, and engines, propulsion system, and APU. Boom operators use G229-Air Refueling Systems, G227BR-APU, and G228R-Electrics and Fuels CBTs. **OPR:** MAJCOM: AMC/A3TK. **Unit:** ATS contractor. **Training Aids and Media:** CBT.

7.10.38. **G221—CNS/ATM Refresher. Purpose:** Annual CBT review exercise of the Block 40.x (GATM) system updates.

7.10.39. **G227—APU Systems. Purpose:** Annual review of aircraft systems for Boom Operators. BO covers APU portion of G220 via the G227BR CBT. **OPR:** MAJCOM: AMC/A3TK. **Unit:** ATS contractor. **Training Aids and Media:** CBT.

7.10.40. **G228—Electrics and Fuels Systems. Purpose:** Annual review of aircraft systems for Boom Operators. BO covers Electrics and Fuels portion of G220 via the G228R CBT. **OPR:** MAJCOM: AMC/A3TK. **Unit:** ATS contractor. **Training Aids and Media:** CBT.

7.10.41. **G229—Air Refueling Systems. Purpose:** Annual review of aircraft systems for Boom Operators. BO covers Air Refueling portion of G220 via the G229 CBT. **OPR:** MAJCOM: AMC/A3TK. **Unit:** ATS contractor. **Training Aids and Media:** CBT.

7.10.42. **G230—Crew Resource Management (CRM) Refresher--Academics. Purpose:** Mission-specific continuation CRM training conducted according to AFI 11-290,

*Cockpit/Crew Resource Management Training Program.* **Description:** Reinforces initial CRM training through an academic review of the common core subjects (according to AFI 11-290) with specific emphasis on an annual refresher topic. Training should be conducted within G240 simulator profiles. **OPR:** MAJCOM: AMC/A3T. **Unit:** ATS contractor. **Additional Information:** CRM pre-briefing should be accomplished before conducting G240 CRM simulator profile; completion of CRM pre-work is required before attending CRM refresher training. Pre-work will be distributed to organizations in sufficient time and supply to allow completion. Crewmembers may also receive credit for attending formal CRM training (by ATS contractor).

7.10.43. **G231—Initial Crew Resource Management (CRM).** **Purpose:** Aircraft and crew-specific CRM training conducted according to AFI 11-290, *Cockpit/Crew Resource Management Program.* **Description:** Introduces common core subjects (according to AFI 11-290). If initial CRM is not accomplished at the formal school, it must be accomplished within 1-year of reporting to home station. Units may use G230 courseware if G231 is not taught locally. Dual log with G230. **OPR:** MAJCOM: AMC/A3T. **Unit:** ATS contractor. **Additional Information:** Completion of any CRM pre-work, if applicable, is required prior to attending CRM training. Pre-work will be distributed to organizations in sufficient time and supply to allow completion. **Note:** Initial CRM MOST Simulator may be accomplished in a Tactics Profile DMO (Linked) Simulator.

7.10.44. **G232—Instructor and Evaluator CRM.** One-time requirement taught during instructor upgrade.

7.10.45. **G240—Crew Resource Management (CRM) Mission Oriented Simulator Training (MOST) Simulator.** **Purpose:** To provide hands-on application of classroom-presented CRM refresher concepts during a mission oriented OFT profile. Highlights human factor issues in a realistic mission scenario as a crew. **Description:** CRM concepts conducted according to AFI 11-290. Simulator pre-brief, OFT period, and debrief will highlight particular CRM topics; emphasis should include the CRM Topic-of-the-Year. **OPR:** MAJCOM: AMC/A3T. **Unit:** ATS contractor. **Additional Information:** Should be accomplished in conjunction with G230, CRM Refresher. Optimal scheduling of CRM simulator is not later than 5 days following completion of G230. Continue to complete this event in conjunction with G261-G264 and implement upon delivery of ATS contractor profiles and courseware.

7.10.46. **G244—Crew Coordination.** **Purpose:** To improve non-pilot crewmembers knowledge of standard indications and settings for the pilot's instruments and flight controls for takeoff, approach and landing. **Description:** Course details the proper settings for trim, spoilers, flaps, brakes, etc., and proper indications for altimeters, starter switches, fuel panel, etc., for takeoff, approach, and landing phases. Available for units as a unit directed event (UDE). **OPR:** MAJCOM: AMC/A3TK. **Unit:** ATS contractor. **Training Aids:** CBT.

7.10.47. **G250—Quarterly Proficiency Simulator.** Training profile may include CRM, formation, M010 Proficiency Sortie, flight procedures listed in AFMAN 11-217, corrective action training, etc. Units may develop processes to use this profile to satisfy pre-deployment training or flying training in [Table 4.4](#) Cannot be dual logged with CRM MOST Simulator (G240), Quarterly Refresher Simulators, Phase 1-4 training (G261-264) or an

instrument/qualification evaluation. **Description:** ATS contractor-administered simulator courses for Pilots. **OPR:** AMC/A3TK **Unit:** ATS contractor.

7.10.48. **G261—Quarterly Refresher Simulator, Phase 1 (Jan-Mar).** **Purpose:** Quarterly simulator continuation training for KC-135 crewmembers. Event will consist of a pre/post-briefing and mission profile with review of hydraulic systems. Profiles are subject to periodic change/adjustments to meet evolving requirements. **Description:** ATS contractor-administered simulator courses for pilots. **OPR:** MAJCOM: AMC/A3TK. **Unit:** ATS contractor. **Additional Information:** Completion of PIQ or Instructor training course FTU OFT profile is creditable towards continuation training. This event will be tracked in ARMS as Annual. Event currency is Semi-Annual for non-collocated units; however, both Phase 1 & 2 sims must be accomplished during each respective Semi-Annual period. Continue to complete former ATD Training Profile until delivery of updated ATS contractor profiles and courseware.

7.10.49. **G262— Quarterly Refresher Simulator, Phase 2 (Apr-Jun).** **Purpose:** Quarterly simulator continuation training for KC-135 crewmembers. Event will consist of a pre/post-briefing and mission profile with review of engine and fuel systems. Profiles are subject to periodic change/adjustments to meet evolving requirements. **Description:** ATS contractor-administered simulator courses for pilots. **OPR:** MAJCOM: AMC/A3TK. **Unit:** ATS contractor. **Additional Information:** Completion of PIQ or Instructor training course FTU OFT profile is creditable towards continuation training. This event will be tracked in ARMS as Annual. Event currency is Semi-Annual for non-collocated units; however, both Phase 1 & 2 sims must be accomplished during each respective Semi-Annual period. Continue to complete former ATD Training Profile until delivery of updated ATS contractor profiles and courseware.

7.10.50. **G263—Quarterly Refresher Simulator, Phase 3 (Jul-Sep).** **Purpose:** Quarterly simulator continuation training for KC-135 crewmembers. Event will consist of a pre/post-briefing and mission profile with review of electric systems as well as stabilizer trim, FMS, MFD, and collision avoidance system operations. Profiles are subject to periodic change/adjustments to meet evolving requirements. **Description:** ATS contractor-administered simulator courses for pilots. **OPR:** MAJCOM: AMC/A3TK. **Unit:** ATS contractor. **Additional Information:** Completion of PIQ or Instructor training course FTU OFT profile is creditable towards continuation training. This event will be tracked in ARMS as Annual. Event currency is Semi-Annual for non-collocated units; however, both Phase 3 & 4 sims must be accomplished during each respective Semi-Annual period. Continue to complete former ATD Training Profile until delivery of updated ATS contractor profiles and courseware.

7.10.51. **G264—Quarterly Refresher Simulator, Phase 4 (Oct-Dec).** **Purpose:** Quarterly simulator continuation training for KC-135 crewmembers. Event will consist of a pre/post-briefing and mission profile with review of pneumatic systems, flight controls, and aircraft aerodynamic characteristics. Profiles are subject to periodic change/adjustments to meet evolving requirements. **Description:** ATS contractor-administered simulator courses for pilots. **OPR:** MAJCOM: AMC/A3TK. **Unit:** ATS contractor. **Additional Information:** Completion of PIQ or Instructor training course FTU OFT profile is creditable towards continuation training. This event will be tracked in ARMS as Annual. Event currency is Semi-Annual for non-collocated units; however, both Phase 3 & 4 sims must be

accomplished during each respective Semi-Annual period. Continue to complete former ATD Training Profile until delivery of updated ATS contractor profiles and courseware.

7.10.52. **G280—Small Arms Training. Purpose:** To train crewmembers in successful engagement of enemy targets within the range and capabilities of their assigned weapon. **Description:** Academics and firing range exercise; includes use of force, live fire, or firearms simulator training; simulator training may not be used for initial training. Include Rules of Engagement (ROE), and Arming and the Use of Force (UOF) ancillary training event according to AFI 36-2226, *Combat Arms Program* and AFI 31-207, *Arming and Use of Force by Air Force Personnel*. Aircrew are categorized as “Arming Group A” for anti-hijacking/protecting resources purposes. **OPR:** MAJCOM: AMC/A7F. **Unit:** Security Forces (SF). **Instructor:** Qualified SF combat arms instructor. **Additional Information:** AD aircrews follow frequency in **Table 4.2**. IAW AFI 36-2226, “MAJCOMs may link “Group A” aircrew firearms training to an aircrew ground training cycle program.” All aircrew will follow requirement of Table 4.2. ARC see AFI 36-2226 for guidance.

7.10.53. **G281—Self Aid/Buddy Care (SABC) Training. Purpose:** Provide basic life and limb-saving techniques to help wounded or injured personnel survive in medical emergencies until medical help is available. Mobility aircrews are required, for global operations, to be able to provide Self Aid. See AFI 36-2238, *Self Aid and Buddy Care Training*. **Description:** Complete initial then refresher training that includes completion of an ADLS CBT and Hands on Training. See unit UETM for additional guidance.

7.10.54. **G300—Hydroplaning. Purpose:** To teach pilots how to react to hydroplaning situations on wet runways. **Description:** Course describes how to recognize hydroplaning on wet runway surfaces and what actions to take for braking. **OPR:** MAJCOM (AMC/A3T). **Unit:** ATS contractor. **Training Aids and Media:** CBT. **Additional Information:** Course is available on CBT and is available for units as a unit directed training event if desired.

7.10.55. **G310—Weather Avoidance Radar. Purpose:** Instruct pilots and navigators how to tune radar for weather detection and avoidance. **Description:** In-depth review on procedures and techniques for optimum tuning of the radar indicator for thunderstorm detection. **OPR:** MAJCOM (AMC/A3T). **Unit:** ATS contractor. **Training Aids and Media:** CBT. Unit directed training event (UDE) only.

7.10.56. **G755—Roll-On Beyond-Line-of-Sight Communications Equipment (ROBE) Training. Purpose:** To train aircrew members on the proper loading, restraint, and use of installed ROBE communications equipment. **Description:** This just-in-time training to be conducted either at home station or at deployed location prior to operation of ROBE equipment. **OPR:** Air Force Command and Control Integration Center (AFC2IC). **Curriculum Development:** AFC2IC. **Training Media:** Lecture, CBT, and/or PowerPoint presentation. **Instructor:** CBT and/or ROBE qualified instructor. **Additional Information:** Annual refresher training required prior to handling or flying with ROBE equipment.

7.10.57. **G801—Initial SOAR Training.** In-depth discussion of AFI 11-2KC-135 Volume 3, Addenda C (S), *Special Operations AR Procedures*. See 22 ARW-Specific Training Program.

7.10.58. **G802—Recurring SOAR Ground Training.** Recurring special operations training to include a review of AFI 11-2KC-135 Volume 3, Addenda C (S), *Special*

*Operations AR Procedures*, communications, and operations security procedures. See 22 ARW-Specific Training program.

#### 7.10.59. **BOWST Training Profiles.**

7.10.59.1. **G983-G988—WST Profile 1 (BOWST Continuation profiles). Purpose:** Course is administered semi-annually and consists of 6 profiles. Each profile will consist of a mixture of emergency procedures, normal and TMO AAR, and malfunctions. BOWST profiles are subject to period change/adjustments to meet evolving requirements. **Description:** ATS contractor-administered BOWST courses for Boom Operators. **OPR:** MAJCOM: AMC/A3TK. **Unit:** ATS contractor. **Additional Information:** Collocated Boom Operators will complete the following profiles triennially. Non-collocated Boom Operator continuation training requirement is Annual. Implement upon initial delivery of ATS contractor profiles and courseware.

7.10.59.1.1. **G983—AMC/A3TK Profile 1.**

7.10.59.1.2. **G984—AMC/A3TK Profile 2.**

7.10.59.1.3. **G985—AMC/A3TK Profile 3.**

7.10.59.1.4. **G986—AMC/A3TK Profile 4.**

7.10.59.1.5. **G987—AMC/A3TK Profile 5.**

7.10.59.1.6. **G988—AMC/A3TK Profile 6.**

7.10.59.2. **G989-G992—WST Profile 2 (BOWST MCT profiles). Purpose:** Course is administered during Mission Certification Training to assist with Qualification/Certification events. Each profile will consist of specialties consistent with MCT flying requirements. BOWST profiles are subject to period change/adjustments to meet evolving requirements. **Description:** ATS contractor-administered BOWST courses for Boom Operators. **OPR:** MAJCOM: AMC/A3TK. **Unit:** ATS contractor. **Additional Information:** Collocated Boom Operators should complete each profile during MCT. Implement upon initial delivery of ATS contractor profiles and courseware.

7.10.59.2.1. **G989—Day/Night Fighters.** This profile will be completed prior to attempting Q022 qualification.

7.10.59.2.2. **G990—Night B-2 Familiarization.** This profile will be completed prior to attempting Q028 (prior to Q029 if candidate will be Q028 qualified off of FTU recommendation).

7.10.59.2.3. **G991—MPRS & Probe and Drogue Refueling.** This profile will be completed for MPRS & Probe and Drogue certifications. Accomplish A006 within the 90 days prior to G991.

7.10.59.2.4. **G992—Pre-Deployment.** Profile will assist in preparing MCT candidates for AOR specific air refueling conditions.

7.10.59.3. **G995-G996—WST Profile 3 (BOWST IBO-Upgrade Profiles). Purpose:** Course is administered to assist candidates completing Boom Operator Pre-Instructor Training. BOWST profiles are subject to period change/adjustments to meet evolving

requirements. **Description:** ATS contractor-administered BOWST courses for Boom Operators. **OPR:** MAJCOM: AMC/A3TK. **Unit:** ATS contractor. **Additional Information:** Collocated Boom Operators will completed the following profiles during Pre-Instructor Training. Implement upon initial delivery of ATS contractor profiles and courseware.

7.10.59.3.1. **G995—Instructor Intervention Profile 1.**

7.10.59.3.2. **G996— Instructor Intervention Profile 1.**

7.10.59.4. **G997—WST Profile 4 (BOWST profiles). Purpose: A La Carte.** Profiles consist of training modules to include CRM, Boom Operator proficiency, fighter AAR, heavy AAR, Emergency Procedures, malfunctions, and corrective action training. **Description:** ATS contractor-administered simulator courses for Boom Operators. **OPR:** MAJCOM: AMC/A3TK. **Unit:** ATS contractor. **Additional Information:** Event will be logged in ARMS as G997. Implement upon initial delivery of ATS contractor profiles and courseware.

7.10.59.4.1. G997A—Boom Operator Proficiency.

7.10.59.4.2. G997B—Fighter AAR

7.10.59.4.3. G997C—Heavy AAR

7.10.59.4.4. G997D—Emergency Procedures

7.10.59.4.5. G997E—Malfunctions Refresher

**7.11. Aircrew Flight Equipment (AFE) Training (LL) Events.** MAJCOMs may combine and/or supplement courses to fulfill their needs. Refer to AFI 11-301 Volume 1, *Aircrew Flight Equipment (AFE) Program*, for course descriptions.

7.11.1. **LL01—Aircrew Flight Equipment Familiarization. Purpose:** To ensure all crewmembers are familiar with aircrew flight equipment and are able to identify, locate and utilize appropriate emergency equipment. **Description:** One time event, per base assignment, conducted prior to the first flight at home station to familiarize aircrew members with local AFE availability, issue, use, pre-flight, and post-flight procedures. This training will be provided for subsequent re-assignments to the same base. Units may combine with Local Area Survival (SS01). **OPR:** AMC/A3T. **Unit:** Squadron Aircrew Flight Equipment. **Curriculum Development:** Each unit is responsible for tailoring training to meet unit needs. **Instructor:** Qualified Aircrew Flight Equipment instructor. **Training Aids:** IBT with AFE training aids. **Additional Information:** See AFI 11-301 Volume 1 and applicable MAJCOM guidance.

7.11.2. **LL03—Emergency Egress Training, Non-Ejection Seat. Purpose:** Understand aircraft egress procedures. **Description:** Trains aircrew in ground emergency egress procedures for aircrew and passengers. Stress the importance of aircrew coordination, aircrew and passenger responsibilities and use of appropriate emergency egress equipment. Ensure aircrews are aware of their responsibilities for conducting safety and passenger briefings IAW AFI 11-202 Volume 3. Non-instructor Boom Operators may teach non-ejection emergency egress training, (ARMS task identification code, LL03), for AECM prior to flight, provided that the training is “hands-on,” covers all requirements of LL03 as outlined in AFI 11-301 Vol 1, paragraph 5.3.3., and is documented on AF Form 1522. **OPR:**

AMC/A3T. **Unit:** Squadron Aircrew Flight Equipment. **Curriculum Development:** Each unit is responsible for tailoring training to meet unit needs. **Instructor:** Qualified Instructor Aircrew. **Training Aids:** Aircraft and IBT with AFE training aids. **Additional Information:** See AFI 11-301 Volume 1 and applicable MAJCOM guidance.

7.11.3. **LL04—Aircrew Chemical Defense Training (ACDT).** **Purpose:** Understand Aircrew Chemical Defense procedures. **Description:** An academic and equipment training session in which the aircrew member demonstrates and performs donning, doffing, and buddy dressing procedures using either the first or second generation ACDE or Aircrew Eye/Respiratory Protection (AERP) equipment. This training also includes information on hazards and limitations of wearing the equipment properly and improperly, preflight procedures, aircraft integration, and parachute descent emergency procedures. Each aircrew will demonstrate procedures during their initial class; subsequent classes require a minimum of 10% of aircrew participants to dress out and demonstrate ACCA decontamination processing procedures. Crewmembers who accomplish initial ACDT at a Technical Training Unit (TTU), Replacement Training Unit (RTU), or FTU will receive credit for initial training on arrival at their permanent duty station. Units will not combine this training with CBRNE Defense Training. **OPR:** AMC/A3T. **Unit:** Squadron Aircrew Flight Equipment. **Curriculum Development:** Each unit is responsible for tailoring training to meet unit needs. **Instructor:** Aircrew Flight Equipment Instructor. **Training Aids:** IBT with AFE training aids. **Additional Information:** See AFI 11-301 Volume 1 and applicable MAJCOM guidance.

7.11.4. **LL05—Egress Training with ACDE.** **Purpose:** Understand Egress Training with ACDE. **Description:** Evaluates the aircrew's ability to demonstrate proficiency in the use of primary as well as secondary ground egress procedures while wearing ACDE. Training will stress the unique changes in procedures to include added difficulties aircrew would and could experience as a result of wearing ACDE. Accomplishing this training also satisfies the requirements in LL03 if all LL03 objectives are met. **OPR:** AMC/A3T. **Unit:** Squadron Aircrew Flight Equipment. **Curriculum Development:** Each unit is responsible for tailoring training to meet unit needs. **Instructor:** Qualified Instructor Aircrew. **Training Aids:** Aircraft and IBT with AFE training aids. **Additional Information:** See AFI 11-301 Volume 1 and applicable MAJCOM guidance.

7.11.5. **LL06—Aircrew Flight Equipment Training (AFET).** **Purpose:** To familiarize aircrew with aircrew flight equipment. **Description:** An academic and equipment training event, in which aircrew members demonstrate their ability to locate, preflight, and use all aircrew and passenger AFE carried aboard unit aircraft or issued to aircrew members. This training includes the limitations and safety issues related to AFE. Additionally, include aircrew clothing items and information on hazards associated with improper wear and failure to use only authorized clothing and equipment items. **OPR:** AMC/A3T. **Unit:** Squadron Aircrew Flight Equipment. **Curriculum Development:** Each unit is responsible for tailoring training to meet unit needs. **Instructor:** Aircrew Flight Equipment Instructor. **Training Aids:** IBT with AFE training aids. **Additional Information:** See AFI 11-301 Volume 1 and applicable MAJCOM guidance.

## 7.12. Mission Specific Training (M) Events.

7.12.1. **M001—Sortie.** Log one M001 for each aircraft sortie.

7.12.2. **M005—Dual Qualification Sortie.** Multiple aircraft qualified pilots, will accomplish one event quarterly in each aircraft model qualified (qualified/maintaining currency in two MDS model aircraft, e.g., KC-135R and RC-135W). This requirement does not include KC-135 R and T model aircraft.

7.12.3. **M007—CNS/ATM Data Link Proficiency Sortie.** Accomplish CPDLC and/or ADS operations. Dual log when completing G240 or G261-G264 if data link is included in simulator profile. Pilots may log event complete if accomplishing PF or PNF duties.

7.12.4. **M010—Proficiency Sortie.** The following requirements are listed by crew position:

7.12.4.1. **Pilots**—Must be accomplished under the supervision of an IP. IPs must accomplish at least one M010 under the supervision of another IP (N/A for FTU instructors). As a minimum, a pilot proficiency sortie or OFT profile will consist of:

7.12.4.1.1. Review the following no later than crew debrief: boldface emergency procedures, three instrument approaches, missed approach, and VFR traffic pattern (weather permitting). In addition, the following events should be accomplished when available: holding pattern or procedure turn (to include entry), precision and non-precision approach, circling approach, and partial flap landing. The following will be accomplished in the simulator: simulated engine-out landing, simulated engine-out go-around or missed approach, and simulated engine failure take-off continued. **Exception:** Units with approval may conduct simulated engine-out training in the aircraft (weather permitting). **Note:** If circumstances prevent completion on one sortie or OFT profile, credit may be taken after a second IP-supervised sortie or OFT profile, provided the combined activity fulfills the intent of this event. Instructors should tailor each M010 to the individual pilot's needs. Particular emphasis should be placed on simulated systems malfunctions, simulated-engine out operations, and instrument procedures.

7.12.4.2. **Basic Navigator**—Complete in-flight duties to include management of FMS and MFD operations. The sortie will include CRM skills for 4-person operation. SOAR Navigator, include the items above plus flight planning/data loading, loading/operating communication systems, and rendezvous (S036, SOAR Rendezvous, if available).

7.12.4.3. **Boom Operator**—Must be accomplished under IBO supervision (N/A for FTU instructors) on a flight or in BOWST. If accomplished on the aircraft, complete all primary ground and in-flight duties to include air refueling. If accomplished in BOWST, complete all applicable primary ground and in-flight duties to include air refueling and verbal instruction for all other checklists. Emphasis should be placed on CRM and air refueling procedures, including normal and TMO contacts and practice emergency separation. A review of cargo loading procedures and passenger handling procedures with an IBO will be accomplished during pre-briefings. (The intent of this event is to review and reinforce all boom operator responsibilities while under instructor supervision). **Note:** If circumstances prevent completion on one sortie/BOWST profile, credit may be taken after a second IB supervised sortie/BOWST profile, provided the combined activity fulfills the intent of this event.

7.12.5. **M020—Unit Specific Training Sortie.** Unit defined sortie to accomplish mission specific training events. The following is a suggested listing of events that can be used on a

M020: Any individual training event (approaches, landings, AAR); Exercise training (i.e., RED FLAG, MAPLE FLAG); US Navy or Marine Corps drogue training; practice mobility training; night formations; large formations; Night receivers and refueling; special mission tasking; special operations tasking; and composite exercises.

7.12.5.1. **(Added-MILDENHALL)** Pilots may log an M020 when completing one of the following events:

7.12.5.1.1. **(Added-MILDENHALL)** “Practice Pan” emphasizing the assisted recovery to a Military Emergency Diversion Airfield (MEDA).

7.12.5.1.2. **(Added-MILDENHALL)** Practice diversion or off-station transition at an airfield other than Mildenhall.

7.12.5.1.3. **(Added-MILDENHALL)** Passenger or Cargo Mission

7.12.5.1.4. **(Added-MILDENHALL)** Off-station mission (full-stop landing accomplished at location other than home station) emphasizing enroute procedures with AMD/TACC.

7.12.5.1.5. **(Added-MILDENHALL)** Large Force Exercise or Contingency Operation.

7.12.5.2. **(Added-MILDENHALL)** Booms may log an M020 by accomplishing either floor loading or palletized cargo loading during a deployment, exercise operational/training mission. A locally accomplished static load may be used to log an M020. A MB must accomplish the M020 with an IB. An IB may dual-log the M020 with a MB. Additionally, boom operators may log an M020 after accomplishing any off-station trainer or completing both manual gear and flap extension (flap extension may be accomplished on the ground).

7.12.5.3. **(Added-MILDENHALL)** Only one M020 may be logged per sortie. There is no M020 currency required for navigators at this time.

7.12.6. **M030—Oceanic Sortie.** To ensure crews are proficient in oceanic procedures and to familiarize crewmembers with evolving ATC and 618 AOC (TACC) procedures necessary for worldwide mobility taskings. Sortie includes primary aircrew logging a take-off or landing (as PF or PNF) outside the 48 contiguous states of the CONUS associated with a procedural oceanic crossing as well as a review of oceanic procedures and overseas (non-FAA) airspace regulations. Airspace considerations (MNPS, RNAV/RNP, AP1/2/3/4, etc.) for the intended route of flight will also be covered as well as a review of associated documents (to include but not limited to the MNPSA Manual, a sample NAT Track Message, North American Routes, PACOT, and the North Atlantic European Routing System). Crewmembers must also review oceanic re-routing procedures. Discussions must emphasize critical CRM activities associated with a re-route, with a focus on updating the master oceanic log, the oceanic plotting chart and the FMS. Crewmembers performing Instructor or Evaluator duties may log M030 provided appropriate airspace and oceanic procedures are instructed/evaluated during the sortie. **OPR:** MAJCOM: AMC/A3T. **Training Aids:** G160 Overwater Navigation Procedures PowerPoint slides, see AMC/A3TK CoP.

7.12.6.1. OG/CC may elect to substitute a CONUS sortie, coupled with an extensive review of oceanic airspace, navigation, and crossing procedures, for the procedural

oceanic obligation when aircraft requirements or crewmember availability is insufficient for accomplishing the oceanic sortie requirement. Consecutive CONUS sortie substitutions are not permitted.

7.12.6.2. OG/CC at OCONUS units may allow accomplishment of an off station sortie which includes a takeoff or landing (as PF or PNF) at a location other than home station. In all cases aircrew members are still required to review airspace and oceanic crossing procedures.

7.12.6.2.1. **(Added-MILDENHALL)** 100 OG/CC approves off station credit for this event if an oceanic sortie is unavailable and waiting would delay the qualification, certification, or cause the individual to go NMR at the end of an annual period.

7.12.7. **M050—Tactical Sortie.** Units will develop a tactical sortie. Mission must be flown using a tactical scenario (i.e., Intel, ATO/SPINS, Threats, Bulls Eye, etc.) and may be logged during a large force exercise, AOR or local sortie/simulator. For credit, should include a minimum of three of the following events: P062, Tactical Departure; P063, Tactical Arrival; P064, Slide Exercise; P065, Scram Exercise; P067, Mid-Mission Join Up; P068, Combat Descent, or P069 Defending Climb; See AFTTP 3-3.KC-135 for event descriptions. Pilots may log event if accomplishing PF or PNF duties in the seat to maximize CRM reactions during the tactical scenario. Actively integrate Navigators and Boom Operators in all phases of the mission to the max extent possible (lookout doctrine, command and control, etc). Use and engage extra crew members (N or BO) as CRM resources to monitor operational parameters necessary for safe maneuver/mission accomplishment (pitch, bank, altitude, airspeed, AOA, etc). *Note:* For ARC, if circumstances prevent completion on one sortie, credit may be taken after a second sortie, provided the combined activity fulfills the intent of this event.

7.12.7.1. **(Added-MILDENHALL)** 100 OG aircrews are strongly encouraged to use the 100 OSS/OSK tactics continuation training simulator guide (primary) or tactics continuation training flight guide (secondary) located on the 100 OSS/OSK SharePoint site. Crews should receive a pre-mission briefing from 100 OG/OGI prior to sortie accomplishment to include the current geo-political situation and threat assessment.

7.12.8. **M051—MPRS Sortie.** This event is creditable in the BOWST. The principle goal is to review MPRS procedures for certified crewmembers. Must include the extension and retraction of at least one drogue.

### 7.13. Night Vision Goggles (NV) Events.

7.13.1. **NV01—NVG Training and Qualification.** Instruction and qualification on the operation, care, and use of night vision goggles.

7.13.2. **NV02—NVG Event.** For SOAR qualified aircrew. Includes in-flight operation of NVG, including preflight check and visual acquisition of the receiver/wingman (SOAR qualified aircrew and USAFWS only).

7.13.3. **NV03—NVG Refresher. Purpose:** Continuation training for SOAR qualified aircrew and USAFWS crews using Night Vision Goggles. See SOAR local training, USAFWS directives, and AFI 11-202 Volume 1 requirements.

## 7.14. Crew and Individual Proficiency Events “N & P”.

7.14.1. **N010—Tanker RV.** Any rendezvous and air refueling accomplished using the procedures in ATP-56(B), Allied Tactical Publication. Credit when receiver joins the tanker at “pre-contact.” Includes RV Golf, RV Delta, RV Alpha and AWACS directed methods. Dual log with N0xx RV procedure. Instructors and evaluators may take credit for any rendezvous they instruct or evaluate (see [paragraph 4.4.4](#)).

7.14.2. **N011—Rendezvous—Emission Option 1.** Procedures primarily used for FTU-level training. Any and all emitters are authorized, see ATP-56(B). Dual log with N010.

7.14.3. **N012—Rendezvous—Emission Option 2.** Normal procedure for rendezvous and AAR. Radio silent formation except for RV and AAR which is conducted with limited radio exchange. All other emitters are authorized. Essential radio transmissions for flight safety may be made, see ATP-56(B). Dual log with N010.

7.14.4. **N013—Rendezvous—Emission Option 3.** Radio silent operations including formation, RV and AAR. The use of other emitters is authorized unless specifically prohibited, see ATP-56(B). Dual log with N010.

7.14.5. **N014—Rendezvous—Emission Option 4.** No emitters will be used unless specifically authorized by the plan which the AAR is supporting (ATO, Rules of Engagement (ROE)), Operations plan, Safe Passage procedures, or other mission directive). Includes radio(s), aircraft Data LINK (if applicable), radio navigation transmitters, radar, radio altimeters, IFF, exterior lighting. Do not practice during operations unless specifically tasked due to FAA and ICAO identification requirements, see ATP-56(B). Dual log with N010.

7.14.6. **N015—Tanker Alternate Rendezvous.** Any tanker rendezvous not using the FMS as the primary means. May include timing, ATC directed, etc. Dual-log with N010.

7.14.7. **N016—Tanker RV Overrun Procedures.**

7.14.8. **N020—Tanker RV Golf.** See ATP 56(B), formerly called enroute rendezvous. Pilots Dual-log with N010.

7.14.9. **N030—Tanker RV Delta.** See ATP 56(B), formerly called point parallel rendezvous. Pilots Dual-log with N010.

7.14.10. **N040—Tanker RV Alpha.** See ATP-56(B), formerly called anchor rendezvous. Includes any rendezvous in an anchor area tanker, receiver, or GCI and AWACS-directed. Pilots dual-log with N010.

7.14.11. **N100—INS Airborne Alignment (PC).** Completing an airborne alignment of either INU-1 or INU-2 while in-flight.

7.14.12. **N110—Communication Procedures.** Crewmembers will copy at least one emergency action message using both HF and UHF radios (only the first six elements of a UHF message, are necessary). Crewmembers will verify message currency with radio not used to obtain original message. Contact a global command and control station using HF radio. Crewmembers will accomplish launch and authentication check and maintain a log of all communications.

7.14.13. **N130—Receiver RV Rendezvous.** Pilots accomplish IAW the ATP-56(B).

- 7.14.14. **N131—Receiver RV Golf.** See ATP 56(B), formerly called enroute rendezvous. Dual-log with N130.
- 7.14.15. **N132—Receiver RV Delta.** See ATP-56(B), formerly called point parallel rendezvous. Dual-log with N130.
- 7.14.16. **N135—Receiver RV Echo.** See ATP-56(B), formerly called alternate rendezvous. Dual-log with N130.
- 7.14.17. **N136—Receiver RV Overrun Procedures.** See ATP-56(B). Log an overrun when the receiver's closure rate prevents stabilizing in the pre-contact position, or when forward movement of the receiver is considered excessive during contact or approach to contact.
- 7.14.18. **P006—Airwork.** Block of time scheduled and devoted to learning and maintaining basic flying skills. Objective of this event is to demonstrate or reinforce understanding of aircraft flight characteristics. Recommend accomplishment in an airwork area with reserved altitude blocks. The following events may be accomplished: Steep Turns--Target bank angle should not exceed 45-degrees of bank; Lateral Control Demonstration; Trim Demonstration; Approved in-flight tactics events; and Additional items such as vertical "S."
- 7.14.19. **P007—Stall Recognition and Recovery.** ATD Only.
- 7.14.20. **P010—Takeoff—Initial.** Includes all activity from initiation of the takeoff checklist up to and including establishment of climb configuration and airspeed. The takeoff following a touch-and-go is not creditable. *Exception:* SOC pilots (Colonels and above) who require in-flight supervision and IPs may log a P010 after accomplishing (pilot flying) an initial takeoff or touch-and-go. Dual log with P020.
- 7.14.21. **P011—Takeoff—Night.**
- 7.14.22. **P012—Takeoff—Gyro Mode.** Takeoff using max mode climb procedures without assistance of RGA command bars.
- 7.14.23. **P015—Instrument Departure.** That portion of flight after establishing climb configuration and airspeed through SID routing or first en route point on the radar departure.
- 7.14.24. **P018—PNF Takeoff and Climb Duties.** Practice PNF takeoff duties, to include setting takeoff power and monitoring aircraft performance and acceleration through cleanup altitude.
- 7.14.25. **P020—Takeoff.** Initial takeoff or takeoff following touch and go landing. Dual log with P028 or P029 as applicable.
- 7.14.26. **P026—Takeoff and Climb Procedures.**
- 7.14.27. **P027—EWO Departure.** 330 KIAS climb airspeed will be established after flap retraction and maintained until level off or climb Mach is attained. Pilots may receive credit as PF or PNF. This event is for OPLAN-8010 units only.
- 7.14.28. **P028—Right Seat Takeoff.** Dual log with P020. All pilots will track right seat takeoffs completed on each sortie

7.14.29. **P029—Left Seat Takeoff.** Dual log with P020. All pilots will track left seat takeoffs completed on each sortie. Loss of currency does not result in a loss of mission ready status.

7.14.30. **P030—Max Mode Takeoff, 30 Flap.** Dual log with P020.

7.14.31. **P035—PMC-Off.** Takeoff with simulated outboard engine PMC inoperative. Set the PMC switch for the engine to OFF and accomplish takeoff (TO) PMC-off procedures. Restricted to ATD only, do not practice this maneuver in the aircraft.

7.14.32. **P040—Simulated Engine Failure, Takeoff Continued.** Authorized for IP, AC, and MPD pilots. Practice procedure for simulated failure after takeoff or touch and go. If accomplished in the aircraft, direct IP supervision is required. Dual log with P020. Accomplish in the simulator only for units collocated with an OFT. Non-collocated units should perform this event in the OFT but may accomplish in the aircraft during operational or continuation training missions on a non-interference basis.

7.14.33. **P045—Simulated Engine Failure on the Runway.** Restricted to OFT only, do not practice this maneuver in the aircraft.

7.14.34. **P061—VFR Overhead.** The overhead approach is designed to allow the maximum number of aircraft to recover at an airfield in the minimum amount of time. See AFTTP 3-3.KC-135 for techniques on the set-up and execution of this event and the common errors associated with the VFR Overhead.

7.14.35. **P062—Tactical Departure.** Event will be flown using a tactical scenario developed by local unit. If departing VFR, comply with all VFR guidance in AFI 11-202 Volume 3, *General Flight Rules*, FLIP GP and AP, FARs, and applicable host nation guidance. Units collocated with simulator should perform this event in the simulator but may accomplish in the aircraft during training, operational or continuation training missions on a non-interference basis. Any AFTTP 3-3.KC-135 Tactical Departure maneuver may be accomplished for P062 credit; however, low altitude high speed departures (LAHSD) will only be trained in the simulator. See AFTTP 3-3.KC-135 for maneuver options, techniques, and procedures. (**Exception:** 509 WPS / KC-135 Weapons Instructor Course). See event M050, Tactical Sortie. Pilots may log event complete if accomplishing PF or PNF duties.

7.14.36. **P063—Tactical Arrival.** Event will be flown using a tactical scenario developed by local unit. If departing VFR, comply with all VFR guidance in AFI 11-202 Volume 3, FLIP GP and AP, FARs, and applicable host nation guidance. Units collocated with simulator should perform this event in the simulator but may be accomplished in the aircraft during operational or continuation training missions on a non-interference basis. Any AFTTP 3-3.KC-135 Tactical Arrival maneuver may be accomplished for P063 credit; however, low altitude high speed arrival (LAHSA) will only be trained in the simulator. See AFTTP 3-3.KC-135 for maneuver options, techniques, and procedures. (**Exception:** 509 WPS / KC-135 Weapons Instructor Course. See event M050, Tactical Sortie. Pilots may log event complete if accomplishing PF or PNF duties.

7.14.37. **P064—Slide Exercise.** Accomplish this maneuver in tactical context single ship or in formation. Complete the event in aircraft/ Level C+ certified ATD. See AFTTP 3-3.KC-135 for techniques on the set-up and execution of this event and the common errors associated with Slides. The purpose of this event can be found in AFTTP 3-1.KC-10/KC-

135 (S), *KC-135 Combat Tactics* or AFTTP 3-3.KC-135. Pilots may log the event if accomplishing PF or PNF duties. See event M050, Tactical Sortie.”

7.14.38. **P065—Scram Exercise.** Accomplish this maneuver in a tactical context. Complete the event in aircraft/ Level C+ certified ATD. See AFTTP 3-3.KC-135 for techniques on the set-up and execution of this event and the common errors associated with Scrams. The purpose of this event can be found in AFTTP 3-1.KC-10/KC-135(S) or AFTTP 3-3.KC-135. Pilot may log the event if accomplishing PF or PNF duties. See event M050, Tactical Sortie.

7.14.39. **P066—Maneuver—Steep Turns.** Aircrews may use up to 45-degrees bank angle when accomplishing this event. Complete the event in aircraft/Level C+ certified ATD. See AFTTP 3-3.KC-135 for techniques on the set-up and execution of this event and the common errors associated with Maneuver Steep Turns. The purpose of this event can be found in AFTTP 3-1.KC-10/KC-135(S) or AFTTP 3-3.KC-135. See event M050, Tactical Sortie.”

7.14.40. **P067— Mid-Mission Join Up.** Rejoin with another aircraft using either visual turning rejoin techniques, timing, Rules of Eight, or Whiz Wheel as described in AFTTP 3-3.KC-135. Pilot may log the event as the maneuvering aircraft. Pilot may log the event if accomplishing PF or PNF duties. Day/VMC conditions are required to accomplish visual turning rejoin techniques, all others may be accomplished and logged in IMC or night conditions. See AFTTP 3-3.KC-135 for techniques on the set-up and execution of this event and the common errors associated with Mid-Mission Join Ups. The purpose of this event can be found in AFTTP 3-1.KC-10/KC-135 (S) or AFTTP 3-3.KC-135. See event M050, Tactical Sortie. Complete the event in aircraft or Level C+ certified ATD. Dual log with N040 when performed in an anchor area.

7.14.41. **P068—Combat Descent.** This event is broken into two types; Turning and Straight ahead. Complete the event in either the aircraft or Level C+ certified ATD. Combat descents done in conjunction with formation scram training require IP supervision on one of the aircraft for the purpose of managing formation deconfliction. When accomplishing a turning combat descent as single ship or formation, conduct in VMC under IP supervision. See AFTTP 3-3.KC-135 for maneuver options, techniques, and procedures. Pilots may log if accomplishing PF or PNF duties. See event M050, Tactical Sortie.

7.14.42. **P069—Defending Climb.** A defending climb is an evasive maneuver flown in response to surface fire. See AFTTP 3-3.KC-135 for techniques on the set-up and execution of this event and the common errors associated with Defending Climbs. Complete the event in either aircraft/Level C+ certified ATD. Pilots may log event complete if accomplishing PF or PNF duties in the seat to maximize CRM reactions during the tactical scenario. The purpose of this event can be found in AFTTP 3-1.KC-10/KC-135(S) or AFTTP 3-3.KC-135. See event M050, Tactical Sortie.

7.14.43. **P070—Instrument Approach.**

7.14.44. **P071—Holding.**

7.14.45. **P072—Penetration (Published or STAR).**

7.14.46. **P073—En Route Descent.**

7.14.47. **P080—Instrument Approach (Auto or Coupled).** Approach with autopilot coupled to the ILS.

- 7.14.48. **P100—Precision Approach.** Dual log with P070.
- 7.14.49. **P101—ILS Approach.** Dual log with P100 and P070.
- 7.14.50. **P102—ILS (Gyro Mode).** Dual log with P100 and P070.
- 7.14.51. **P103—PAR Approach** (if available). Dual log with P100 and P070.
- 7.14.52. **P104—MLS Approach.** Removed IAW ATS Quality Assurance Change Proposal Q093363.
- 7.14.53. **P110—Non-Precision Approach.** Dual log with P070.
- 7.14.54. **P111—VOR/TACAN/FMS Procedures.** Includes fix-to-fix navigation, course interception, and general radio aid navigation. This event does not include an instrument approach.
- 7.14.55. **P112—VOR/TACAN/Localizer/FMS Approach.** Dual log with P110 and P070.
- 7.14.56. **P113—ASR Approach.** Dual log with P110 and P070.
- 7.14.57. **P115—Back-Course LOC.** Dual log with P110 and P070.
- 7.14.58. **P117—RNAV/GPS Approach.** KC-135 is certified for RNAV (GPS) LNAV approaches. Guidance information originates from a certified approach from an FMS database. See aircrew training program in [Chapter 5](#). Dual log with P070 and P110.
- 7.14.59. **P130—Circling Approach.** Dual-log with type approach flown.
- 7.14.60. **P140—Visual Traffic Pattern.** Maneuver flown to position aircraft for landing from the visual traffic pattern. May be dual logged with P061.
- 7.14.61. **P160—Missed Approach.**
- 7.14.62. **P170—Approach and Go-Around, Simulated Engine-Out.** If accomplished in the aircraft, IP supervision or qualified AC. Simulator Only for units collocated with an OFT. Non-collocated units should perform this event in the OFT but may accomplish in the aircraft during operational or continuation training missions on a non-interference basis.
- 7.14.63. **P171—Approach and Go-Around, Simulated Engine-Out, Power Rudder Off.** If accomplished in the aircraft, direct IP supervision required. Dual log with P170. Simulator Only for units collocated with an OFT. Non-collocated units should perform this event in the OFT but may accomplish in the aircraft during operational or continuation training missions on a non-interference basis.
- 7.14.64. **P172—Approach and Go-Around, Simulated Engine-Out, FCAS Off.** Simulated loss of an outboard engine with loss of SYD/EFAS. Accomplish under direct IP supervision, if accomplished in the aircraft, with rudder power on to low approach only. Dual log with P170. Simulator Only for units collocated with an OFT. Non-collocated units should perform this event in the OFT but may accomplish in the aircraft during operational or continuation training missions on a non-interference basis.
- 7.14.65. **P180—Approach and Landing, Simulated Engine-Out.** If accomplished in the aircraft, IP supervision or qualified AC is required. Simulator Only for units collocated with an OFT. Non-collocated units should perform this event in the OFT but may accomplish in the aircraft during operational or continuation training missions on a non-interference basis.

- 7.14.66. **P190—Landing.**
- 7.14.67. **P192—Landing, Night (unaided).** Dual log with P190. See AFI 11-401, for “night” criteria.
- 7.14.68. **P193—Landing, 50-Degree Flaps.** Dual log with P190.
- 7.14.69. **P194—Landing, Partial Flaps.** Dual log with P190.
- 7.14.70. **P195—Landing, Simulated Engine-Out, 4 Engine Takeoff.** Direct IP supervision, if accomplished in the aircraft.
- 7.14.71. **P196—Landing, Full-Stop.**
- 7.14.72. **P198—Landing, Right Seat.** Dual log with P190. All pilots will track right seat landings completed on each sortie.
- 7.14.73. **P199—Landing, Left Seat.** Dual log with P190. All pilots will track left seat landings completed on each sortie. Loss of currency does not result in a loss of mission ready status.
- 7.14.74. **P200—Touch-and-Go Landing.** Currency requirement for touch-and-go certified AC. Loss of currency does not result in a loss of mission ready status. Dual log with P020, P190, and P192 as applicable.
- 7.14.75. **P211—Simulated Two Engine Landing.** OFT only.
- 7.14.76. **P212—No Airspeed/No AOA Approach.** OFT only.
- 7.14.77. **P215—Landing Attitude Demonstration.** Dual-log with P190 and P200. Direct IP supervision.
- 7.14.78. **P216—Right Seat Braking Exercise.** OFT Only; includes FTU/Formal Instructor Courses. Exercise teaching braking from the right seat. Event may be accomplished as a taxi exercise on the runway or taxiway.
- 7.14.79. **P240—Landing Gear Manual Extension.** See procedures and restrictions in AFI 11-2KC-135 Volume 3 and procedures in flight manual.
- 7.14.80. **P250—Main Flap Manual Operation.** Should be accomplished on the ground (if applicable). See procedures and restrictions in AFI 11-2KC-135 Volume 3 and procedures in flight manual.
- 7.14.81. **P260—HAVE QUICK Radio Procedures.** Training consists of properly configuring the radio for HAVE QUICK operation and making at least one transmission and reception using HAVE QUICK mode of operation with any source. When practical, rendezvous and refueling should be accomplished utilizing the HAVE QUICK mode of operation. Does not require flight, but must be accomplished in aircraft.
- 7.14.82. **P270—Secure Radio Operation.** Training consists of properly loading SECURE VOICE code and making at least one transmission and reception using SECURE VOICE with like equipped aircraft. BO and SOAR Navigator proficiency for loading SECURE VOICE codes only. Dual log with P272 when accomplished. See AMCH 33-1, *AMC Tanker Airlift Communications Handbook* (U). Does not require flight, but must be accomplished in aircraft.

7.14.83. **P271—Authentication Procedures.** Training consists of demonstrating proper challenge and reply authentication procedures using the TRIAD authenticator. Units will determine how best to accomplish the training (i.e., authenticate a transmission with command post, between aircraft in formation, etc.).

7.14.84. **P272—KY-58 Radio Operation.** Crewmembers will demonstrate keying (e.g., SKL, etc.), loading KY-58, and completing secure radio transmission with another aircraft as well as demonstrate proper procedures to zeroize KY-58 and/or KYK-13.

7.14.85. **P280—Aircrew Chemical Defense Qualification Training (ACDTQT).** An exercise emphasizing hands-on training, dressed out in partial chemical defense (CD) ensemble. Do not accomplish in conjunction with a formation take-off or a night formation departure. The purpose of the exercise is to enable crewmembers to become aware of their limitations while wearing the equipment. Complications of heat exhaustion, fatigue, hyperventilation, limited dexterity, and hampered communication can all be experienced during the exercise. Observers must closely monitor crewmember actions during the exercise. If a crewmember experiences difficulties such as excessive thermal stress, hyperventilation, headaches, etc., and either the observer or crewmember believes it is unsafe to continue, the equipment will be immediately removed. Use the following aircrew CD items: Flying helmet (if applicable); MBU-19/P hood and mask assembly; Filter pack with filters and CQU-7/P blower assembly with filter canisters and batteries; MXU-835 intercom assembly; Filter pack suspension straps; and Glove set (cotton, butyl, Nomex).

7.14.85.1. ACDTQT should be accomplished in an ATD (government-use time) with visual displays, provided a simulator exists or is available. If accomplished in a simulator, instructors may observe the exercise, no other supervision is required. There is no restrictions for who (and how many crewmembers) may wear the gear.

7.14.85.2. If performed in the aircraft, only one Pilot will be dressed out at any time.

7.14.85.3. The AC will be supervised by an IP occupying the right seat. CP and MPD pilots will be supervised by an IP or experienced AC (as determined by the Sq/CC) in the pilot seat. A safety observer crewmember will occupy the jump seat. Pilots will don the gear and accomplish at least one take-off, approach, and landing, and complete all crew position checklists associated with approach and landing.

7.14.85.4. Navigators will be supervised by another Navigator (Boom Operator may supervise KC-135 navigators) and wear the gear for a minimum of 30 minutes. Boom Operators, supervised by another crewmember will wear the gear during take-off, approach, and landing.

7.14.85.5. Crewmember will be current in LL04 before accomplishing this event in the aircraft or ATD.

7.14.86. **P290—Aircraft Alert Start Procedures.** See also G210, Ground Alert Start Procedures. The initial accomplishment must be in an aircraft that has been cocked to simulate alert status (i.e., windshield cover, pitot covers, engine plugs, etc., installed, if appropriate). Crew (two Pilots and one Boom Operator) must respond via normal alert notification (which requires engine start) or from a wing tip position and accomplish alert start and taxi checklist items while in the chocks. Pilots must receive a thorough briefing by

a unit IP on APU operation before performing an alert start. Subsequent requirements may be accomplished in an ATD or the aircraft.

7.14.87. **P300—Cargo Loading.** Initial P300 event must be IB supervised. Accomplish either floor loading or palletized cargo loading during a deployment, operational or training mission or exercise. A Cargo Load event consists of all T.O. 1C-135-9 checklists from Loading Coordination/Preparation through Cargo Off-loading. If unable to complete Cargo Off-loading due to mission requirements, those items must be reviewed prior to logging this event. P300 may be dual logged with successful completion of Q180, Cargo Qualification.

7.14.88. **P310—Instructor and Evaluator Duties.** Creditable when providing instruction or

AFI 11-2KC-135 Volume 2 evaluation in-flight or instructing in the ATD.

7.14.89. **P311—Flight with An Instructor.**

7.14.90. **P312—Instructor Techniques.**

7.14.91. **P335—Prep for Contact.**

7.14.92. **P355—Trouble Shooting AAR Equipment Malfunctions.** FTU or Instructor Course with BOPTT or BOWST only.

7.14.93. **P360—Mission Planning and Briefing.**

7.14.93.1. **P360A—AFMSS Mission Planning.**

7.14.93.2. **P360B—AFMSS DAFIF Data Loading.** Identify, load and verify successful update to on-board aircraft system installed on CNS/ATM aircraft.

7.14.93.3. **P360C—Manual Moment Computations.** Compute weight and balance using manual moments. For Pre-Instructor Upgrade training, discussion should include information found in applicable weight and balance technical orders and techniques for ensuring proper computations.

7.14.94. **P361—Preflight.**

7.14.95. **P362—Pretakeoff.**

7.14.96. **P363—Climb.**

7.14.97. **P364—Cruise.**

7.14.98. **P365—Autopilot Off Cruise.**

7.14.99. **P366—Checklist Procedures and Use.**

7.14.100. **P367—Crew Coordination.**

7.14.101. **P368—Post Flight.**

7.14.102. **P369—Aircraft Equipment Operation.** Use this event when the crewmember demonstrates proficiency in operating the appropriate aircraft equipment: 1. Ground start and taxi procedures (P, CP). 2. Hydraulic system (P, CP). 3. Fuel panel management (P, CP). 4. Pneumatic system (P, CP). 5. APU (ALL). 6. AAR system (BO). 7. Radar and navigation systems (P, CP, N). 8. Communication radios (ALL). 9. MPRS (P, CP, BO, if applicable).

7.14.103. **P380—Spoiler and Lateral Control Demonstration.** Requires IP supervision. Demonstration of roll rates and aileron forces required for different spoiler settings and the reduced lateral control effectiveness after spoiler or hydraulic malfunction.

7.14.104. **P382—Trim Demonstration.** Requires IP supervision. Demonstration of primary and secondary methods to trim the aircraft.

### 7.15. Qualifications and Certifications “Q” Events.

7.15.1. **Q001—Open-Book Qualification Examination.** See AFI 11-2KC-135 Volume 2.

7.15.2. **Q002—Closed-Book Examination.** See AFI 11-2KC-135 Volume 2.

7.15.3. **Q003—Mission Evaluation.** Pilot Mission Evaluation. See requirement in AFI 11-2KC-135 Volume 2

7.15.4. **Q005—ATD Evaluation.** Administered in ATD (OFT, CTP, BOPPT, BOWST), according to AFI 11-2KC-135 Volume 2 (Do not use for reoccurring checkride requirements). See FTU syllabi for evaluation conducted aboard KC-135 OFT simulators.

7.15.5. **Q010—OPLAN-8010 Certification.** Upon completion of training, certification by Wg/CC or designated representative, IAW AMCI 10-450, *Support of Nuclear Planning and Operations*, that the aircrew member can perform the OPLAN-8010 mission.

7.15.6. **Q011—Formation Lead Certification.** Units will develop this program. See formation lead duties in AFI 11-2KC135 Volume 3. Designed to certify an AC (upgrading MPD pilot) as formation lead.

7.15.7. **Q014—Difference Certification.** Documents all training required to qualify individuals in a different MDS aircraft or different tactic requiring certification is complete (reference A0XX courses). Q014 is not required when an AA01 Qualification/Mission Difference Evaluation or AAXX series evaluation is accomplished in same MDS.

7.15.8. **Q015—Special Operations Air Refueling (SOAR) Certification.** Certifies completion of all training required to air refuel special operations aircraft. Commanders will determine the requirement for this event and missions to be certified using this event.

7.15.9. **Q016—Conventional/Mobility Certification.** Wing or Group Commander (or designated representative) certification that a crewmember is prepared to accomplish the unit’s conventional or mobility mission as specified in the unit’s DOC statement and AEF commitments.

7.15.10. **Q017—ILS PRM Certification.** See training program description in [Chapter 5](#).

7.15.11. **Q021-Q033—AAR Certification.** BO—Q021, Q022, Q023, Q028, Q029, and Q033. ACs—Q028 and Q033. BO initial qualification according to AFI 11-2KC-135 Volume 2 may refuel all receivers except the aircraft below. Certify crewmembers in the following category certifications:

7.15.11.1. **Q021—BRAVO Probe Equipped Receivers.** Complete video program # 1918 prior to flight or BOWST profile. Video #1918 may be used for certification if probe receivers are not available and unit is collocated with BOWST. If video certification is used, in-unit certification must complete Q022 prior to starting Q021

training. Students may accomplish Q021 prior to Q022 if actual receivers are used for Q021 certification.

7.15.11.2. **Q022—CHARLIE Receptacle Equipped Fighters, Day.** Complete video program #1919 before flight.

7.15.11.3. **Q023—CHARLIE Receptacle Equipped Fighters, Night.** Complete video program #1919 before flight.

7.15.11.4. **Q028—GOLF Day Heavy Receiver. (KC-10, C-5, C-17, E-4, or B-2).** Accomplishment with one receiver aircraft will certify a pilot and/or boom operator for all five MDS heavy aircraft.

7.15.11.5. **Q029—GOLF Night Heavy Receiver. (KC-10, C-5, C-17, E-4, or B-2).** Accomplishment with one receiver aircraft will certify boom operator for all five MDS heavy aircraft (N/A for pilots).

7.15.11.6. **Q033—MPRS Certification.** This is a Sq/CC certification for crewmembers to operate KC-135 aircraft equipped with MPRS pods. Review A006 training material within 90 days of Q033 certification. See MPRS Certification Training at [paragraph 5.6.4.3](#) for details. Boom Operators may accomplish Q033 certification in BOWST; however, A006 must be accomplished prior to G991 profile.

7.15.12. **Q043—ATD—OFT/WST Simulator Operator Training.** See [paragraph 5.6.5 Purpose:](#) Ensure Sq/CC designated crewmembers are familiar with the OFT or WST safety systems, hazards/precautions associated motion systems, and emergency stop/emergency evacuation procedures. Q043 is a one-time certification after initial training with ATS contractor aboard Level C+ OFT training device.

7.15.13. **Q044—Tactics Maneuvers Certification.** See [paragraph 5.6.6](#) for details. See latest information and syllabus on AMC/A3T CoP.

7.15.14. **Q045—KC-135T-model Certification.** Documents completion of all training required to certify individuals in the KC-135T-model aircraft (see [paragraph 7.2.8](#) for course details and [paragraph 2.5.2](#) for certification requirements).

7.15.15. **Q050—Aircraft Commander Touch and Go Landing Certification.** Designed to certify ACs by the Sq/CC to allow the AC to accomplish unsupervised touch and go landings.

7.15.16. **Q051—Supervision Of Touch and Go Landings Certification.** Designed to certify AC by the Sq/CC to perform unsupervised touch and go landings and supervise unit pilot's touch and go landings and receiver air refueling.

7.15.17. **Q052—Supervision During Receiver Air Refueling.** Designed to certify AC by the Sq/CC to supervise unit pilot's during receiver air refueling.

7.15.18. **Q060—EMCON 3 Certification.** Requires Sq/CC certification for crewmembers to accomplish EMCON 3 procedures during formation, rendezvous, and AAR on both operational and training sorties.

7.15.19. **Q070—EMCON 4 Certification.** Requires Sq/CC certification for crewmembers to accomplish EMCON 4 procedures during formation, rendezvous, and AAR on both operational and training sorties.

7.15.20. **Q160—Instrument Refresher Course Examination.** See requirements in AFI 11-202 Volume 2.

7.15.21. **Q170—FEF Review.**

7.15.22. **Q180—Cargo Qualification.** See requirement in AFI 11-2KC-135 Volume 2. Dual log with P300 Cargo Loading.

7.15.23. **Q340—Briefing and Control of Passengers Certification Training.** See requirements in **paragraph 5.6.10.** **OPR:** AMC/A3TK. **Unit:** Squadron.

7.15.24. **Q579—RNAV/GPS Operations Certification.** **Purpose:** Certify Pilots to fly RNAV 1 & 2 routes, RNAV/GPS Approaches. **Description:** Course is designed for Pilots qualified on KC-135R aircraft equipped with FMS-800. RNAV/GPS CBT will be followed by a one hour minimum of IBT, which must include a thorough review of relevant publications, terminologies and environments followed by proficiency training in the OFT. OFT requirements in **Chapter 5.** **OPR:** MAJCOM: AMC/A3T. **Training Aids:** CBT.

## 7.16. Air Refueling (R) Events.

7.16.1. **R010—Receiver AAR. Qualification Training.** Consists of practice in receiver AAR including closure and contacts. The instructor will demonstrate all limits and manual boom latching. The student must be able to establish contact under simulated conditions of radio silence, pilot director lights out, and tanker auto-pilot off. Students must be declared safe in day activity by an instructor prior to advancing to night activity. The first night mission should include training during twilight and extend into the hours of darkness. During the hours of darkness, conduct practice in rendezvous, closure, and contacts until able to maintain sustained contact for 10 minutes without a disconnect. **Continuation Training.** Pilots may credit one R010 per Tanker ARCT by accomplishing a closure from the pre-contact position and maintaining a 10-minute sustained toggles-engaged contact. Instructors and evaluators should accomplish at least two receivers AAR while occupying the right seat. **Note:** Dual-seat qualified (non-instructor) ACs must be under direct IP supervision when attempting contacts from the right seat. Pilots must be under direct instructor supervision when attempting contacts from either seat.

7.16.2. **R011—Receiver AAR, Indoctrination.** Ability to maintain pre-contact position, recognize any unsafe condition, and safely separate one aircraft from the tanker.

7.16.3. **R012—Receiver AAR (Day).**

7.16.4. **R013— Receiver AAR, Aircraft.** Dual log with R010.

7.16.5. **R020—Receiver AAR (Night).**

7.16.6. **R035—Receiver AAR (Heavy Onload).** Requires minimum onload of 35,000 pounds of fuel. For qualification training, the pilot must accomplish a total of 15 minutes toggle-engaged time.

7.16.7. **R040—Receiver AAR Breakaway and Emergency Separation.** Initiated with the receiver in the AAR envelope, see procedures in ATP-56(B). ACs must demonstrate proficiency in executing the breakaway. For Pilots, include checklist duties only. All crewmembers must be familiar with the requirements, conditions, and communication signals to initiate a breakaway.

- 7.16.8. **R050—Receiver AAR, Tanker Auto Pilot-Off.** The tanker autopilot must be disengaged and AAR contacts should be practiced for a minimum of 10 minutes.
- 7.16.9. **R060—Tanker AAR.** Credit only one R060 for each receiver cell/ARCT regardless of the number of aircraft in formation. Award credit if AAR contact is established (10 minute toggles engaged time is desirable). ACs and pilots may receive credit when occupying either seat position. Additional ACs, Pilots and BOs may log R060 if they accomplish refueling in their primary crewmember position.
- 7.16.10. **R061—Tanker AAR, Indoctrination.**
- 7.16.11. **R063—No Power Limits.**
- 7.16.12. **R064—Pressure Disconnect.** (Formal Instructor Course, Instructor only).
- 7.16.13. **R065—Receiver Lateral Stability.** (Formal Instructor Course, Instructor only).
- 7.16.14. **R067—Simulated Receiver Engine-Out.** (Formal Instructor Course, Instructor only).
- 7.16.15. **R070—Tanker AAR Breakaway and Emergency Separation.** Breakaway should be initiated with the receiver in the AAR envelope. The Pilot and BO must demonstrate proficiency in executing breakaway procedures.
- 7.16.16. **R071—Receiver-Only Separation.** (Formal Instructor Course, Instructor only).
- 7.16.17. **R072—Tanker-Only Separation.** (Formal Instructor Course, Instructor only).
- 7.16.18. **R073—MPRS AAR Pod Breakaway/Emergency Separation.**
- 7.16.19. **R080—Tanker AAR Autopilot Off.** All axes of the tanker auto pilot must be disengaged and AAR contacts must be practiced for a minimum of 10 minutes.
- 7.16.20. **R100—Tanker AAR, Heavy Receiver.** The XX-135, XC-130, E-3A, E-4, E-6, E-8, C-5, C-17, C-32, B-52, B-1, B-2, and KC-10 are designated heavy receiver. Dual-log with R060.
- 7.16.21. **R120—Contacts.** For qualification/certification, proficiency in day contacts must be demonstrated prior to attempting radio silent or night contacts. Includes the total number of contacts accomplished. Boom Operators may only credit 3 contacts per BOWST session.
- 7.16.22. **R125—Day Contacts.** For qualification/certification, proficiency in day contacts must be demonstrated prior to attempting radio silent or night contacts. Dual log R120.
- 7.16.23. **R130—Night Contacts.** Loss of night currency will not cause loss of MR status for day operations. Dual-log with R120/R140 (if applicable)/R150 (if applicable).
- 7.16.24. **R135—Preparation for Contact Procedures.**
- 7.16.25. **R140—Tanker Manual Contact.** Prior to attempting, students must demonstrate knowledge of tanker manual operational equipment and procedures. Boom Operators may only credit 2 TMO contacts per BOWST session. Dual log R120.
- 7.16.26. **R150—Fighter Contact.** Log the actual number of contacts accomplished. BO must obtain a contact with the fighter. Additional BO may also log a R150 if they accomplish a contact. Currency is not required for alert duty not requiring this event (i.e.,

8010, START alerts, etc.). BO may log R150 for B-1 refueling, provided the individual is Q022 qualified. Dual log R120.

7.16.27. **R155—Probe and Drogue Contact.**

7.16.28. **R165—Radio Silent AAR.** For mission certification, Boom Operator will demonstrate the ability AAR radio silent to an IBO during an actual AAR. Any type receiver may be used for this training. The individual's training records must show certification in radio silent AAR before achieving mission qualification status or participating in EMCON 3 or 4 operations, see ATP-56(B) for EMCON descriptions. Pilots may log R165 any time it is accomplished by the Boom Operator.

7.16.29. **R170—Tanker Heavyweight Offload.** Requires a minimum offload of 50,000 pounds and a start AAR gross weight of 250,000 pounds. A 1 percent deviation from these weights is authorized.

7.16.30. **R180—Radio Silent Visual Signals.**

7.16.31. **R190—Tanker Drogue AAR.**

7.16.32. **R195—Tanker Wing Pod AAR.**

7.16.33. **R220—Manual Boom Latching (MBL).**

7.16.34. **R225—Reverse Flow AAR.** This event (KC-135s in the tanker role) is restricted to AETC Instructors at formal school only. On aircraft equipped with the ARR [B] system, KC-135R/Ts aircrews may practice procedures (under IP supervision).

7.16.35. **R230—Emergency Boom Hoist.**

7.16.36. **R400—Tanker Power Management.** (AETC Instructor Cadre only).

7.16.37. **R410—Aerodynamic Effects of Boom Position.** (AETC Instructor Cadre only).

7.16.38. **R420—Simulated Loss of Tanker Engine During AAR.** (AETC Instructor Cadre only).

7.16.39. **R430—Tanker AAR Evaluation Platform.** (AETC Instructor Cadre only).

7.16.40. **R440—Aerodynamic Effects of Various Closures.** (AETC Instructor Cadre only).

7.16.41. **R450—Turns and Altitude Changes While In Contact.** (AETC Instructor Cadre only).

7.16.42. **R460—Night Light Demonstration.** (AETC Instructor Cadre only).

**7.17. Special Operations (S) Events.** *Note:* "S" events are required for SOAR qualified crewmembers per the specific continuation training table. Failure to complete the continuation training in the required training period does not result in NMR status.

7.17.1. **S036—SOAR Rendezvous.** (SOAR certified only). Special operations rendezvous utilizing enroute overtaking rendezvous procedures (see AFI 11-2KC-135 Volume 3 Addenda C).

7.17.2. **S101—In-flight ARC-210 DAMA SATCOM Training.** Loading secure tape, uplink and downlink frequencies, and zeroizing procedures for the ARC-210 DAMA SATCOM radio.

7.17.3. **S200—NVG Operations.**

**7.18. Survival Training (SS) Events.** Refer to AFI 16-1301, for specific instructions and course requirements. **OPR:** AMC/A3T

7.18.1. **SS01—Local Area Survival. Purpose:** Identify local policies and procedures that could affect an aircrew member's recovery. Determine personnel recovery tactics, techniques and procedures applicable to local area flying operations. **Description:** Event requirements are defined in AFI 16-1301. **Unit OPR:** AMC/A3DT. **Additional Information:** SS01 is a one-time requirement, to be accomplished prior to the first flight; each base of assignment. Units may combine and dual log with Aircrew Flight Equipment Familiarization Training (LL01). Each unit is responsible for tailoring training to meet unit needs.

7.18.2. **SS02—Combat Survival Training (CST). Purpose:** Academic and field training designed for aircrew members whose duties may include overflight of or deployment to hostile territory. CST provides aircrew members an opportunity to demonstrate their ability to operate aircrew flight equipment (AFE), employ survival/evasion techniques, and practice rescue procedures under simulated combat conditions. **Description:** See AFI 16-1301 and MAJCOM supplement. This course includes in-depth instruction for aircrew members to demonstrate their ability to operate aircrew flight equipment, employ survival/evasion techniques, and rescue procedures under simulated combat conditions. **Unit OPR:** Wing Tactics/SERE. Course length will not exceed one training day. Units may schedule aircrew members to complete both CST and WST events in a single training day.

7.18.3. **SS03—Conduct After Capture (CAC) Training. Purpose:** Training designed for crewmembers in units with a war fighting responsibility. **Description:** Commonly referred to as Resistance Training (RT), provides refresher training for wartime, governmental, and hostage detention situations. **Additional Information:** Course is classified "Secret" and requires a classified capable classroom. Mission Ready (MR)/Combat Mission Ready (CMR) and personnel assigned to combat-coded units will receive CAC every 36 months. 36 month currency starts from last accomplishment of training date, either formal school or continuation training. **Unit OPR:** Wing Tactics/SERE.

7.18.4. **SS05—Water Survival Training (WST).** To provide crewmembers the opportunity to demonstrate proficiency for survival and recovery from a water environment using weapon system survival equipment. **Description:** Conduct initial S-V90-A (SS32) according to AFI 16-1301. Crewmembers will demonstrate the ability to employ water survival techniques and rescue procedures. Survivor needs using water-related equipment, accessories, and procedures will be stressed. An emphasis will be placed on the appropriate use of passenger support equipment and the proper care of passengers during a survival situation. See MAJCOM supplement. **Additional Information:** Mission Ready (MR)/Combat Mission Ready (CMR) and personnel assigned to combat-coded units will receive WST every 36 months. 36 month currency starts from last accomplishment of training date, either formal school or continuation training. See water survival training "hands on" requirement in AFI 16-1301 for course details. Course length will not exceed six

hours. Units may schedule aircrew members to complete both WST and CST in a single training day. **Unit OPR:** Wing Tactics/SERE.

7.18.5. **SS07—Contingency SERE Indoctrination (CSI).** CSI is a Combatant Command directed activity for High Risk of Capture/Isolation (HRC/ I) personnel deploying to a specific theater of operations or contingency. CSI is current for a period of time as determined by gaining Combatant Command (normally 2 years). If no certified briefer is available locally, coordinate (with sufficient lead time) through AMC/A3DT for a scheduled briefing. **OPR:** Wing Tactics/SERE. **Additional Information:** HQ/AF AND MAJCOMS do not control course content or frequency. Waiver authority is the COCOM CFACC. As required by contingency and/or theater training tasking only.

7.18.6. **SS19—Evasion Conduct After Capture (ECAC) (S-V88-AL) (Initial).** Provides post-egress evasion and conduct after capture procedure training for Flight Surgeons, AE aircrew members, and other designated personnel. Not applicable for Pilots, Navigators or Boom Operators.

7.18.7. **SS20—Combat Survival Training (CST), Wartime Level C (S-V80-A) (Initial).** CST must be completed prior to being awarded MR status.

7.18.8. **SS31—Water Survival Training, Parachuting (S-V86-A) (Initial).** Meets the requirements for initial Water Survival Training, however, due to the removal of parachutes from the KC-135, S-V90-A (SS32) is the preferred course for new aircrew. WST must be completed prior to being awarded MR status.

7.18.9. **SS32—Water Survival Training, Non-Parachuting (S-V90-A) (Initial).** WST must be completed prior to being awarded MR status.

#### 7.19. MPD (V) Events.

7.19.1. **V280—MPD Phase I.**

7.19.2. **V281—MPD Phase II.**

7.19.3. **V282—HQ AMC Orientation Tour / GRACC.**

#### 7.20. Visual Threat Recognition & Avoidance (VT) Events.

7.20.1. **VT01—Initial VTRAT.** Trains aircrew to recognize and avoid surface-to-air threats in the tactical environment. The training should be accomplished at the formal school. VTRAT is available at KC-135 simulator training sites. Course should be taught in a group setting. Advance scheduling notice is required. Dual log VT05 upon completion.

7.20.2. **VT05—Threat Recognition Refresher.** Purpose: Ensure aircrew are trained to recognize tactical environment aircraft threats. This training will focus on threat recognition and reporting. VTRAT is available at KC-135 simulator training sites; however, advance scheduling notice is required. VT05 can be completed in conjunction with G060. Course may be taught in a group setting. Dual log VT05 upon completion of VT01. Units with no VTRAT device are authorized to complete the VTRAT VT05 CBT. **OPR:** AMC/A3D. **Training Aids:** VT05 CBT and/or VTRAT device. **Instructor:** Unit Tactics.”

#### 7.21. NVG (VV) Events.

7.21.1. **VV01—NVG Training and Qualification.**

**7.22. Unit Defined (X) Events.** Reserved for use by local units. Publish OG/CC level guidance documenting local event identifiers, associated ARMS nomenclature, volume, currency and/or frequency. OG/CC should review all “X” events for relevancy to the unit’s mission during the TRP. This review will be documented in the TRP minutes (see [paragraph 1.4.5.1.1](#)).

7.22.1. (Added-MILDENHALL) **XTIN – Theater Indoctrination Training.** **Purpose:** Documents completion of all ground training requirements for USAFE theater indoctrination IAW AFI 11-202V1\_USAFESUP\_I. **Description:** All aircrew members complete and document this one-time training event before flying in the USAFE theater. Training will consist of all requirements published in applicable Air Force, USAFE, and local training instructions. **OPR:** 351 ARS/DOT. **Course Development:** 351 ARS/DOT. **Instructor:** Qualified instructor pilot. **Training media:** Lecture.

7.22.2. (Added-MILDENHALL) **X170 - Annual FCIF Review.** **Purpose:** Documents an aircrew member’s annual FCIF review per AFI 11-202V2\_USAFESUP\_I. **Description:** All aircrew members review all active FCIFs before their first flight at Mildenhall. Periodic reviews will be accomplished thereafter. The annual FCIF review expires the same calendar day of the following calendar year. Log X170 for initial review to establish a due date for follow-on reviews. **OPR:** 351 ARS/CCV.

7.22.3. (Added-MILDENHALL) **XTAC – Quarterly Tactics Read File Review.** **Purpose:** Documents quarterly tactics read file accomplishment. **Description:** Aircrew will review the tactics read file located on SIPRNET at O:\100OG\OSK\Tactics Read File or on standalone laptops provided in 100 OSS/OSK. The tactics read file is mandated by AMCI 11-207 and contains classified and unclassified information of timely interest to aircrews. Aircrew will complete one XTAC event per quarter. **OPR:** 100 OSS/OSK.

7.22.4. (Added-MILDENHALL) **XPAS – Pilot’s Performance Advisory System (PPAS) Training.** **Purpose:** Documents PPAS Training. **Description:** One-time training event for pilots, navigators, and boom operators before using PPAS. Training will include an instructor-led review of the AMC-developed slideshow, currently in accordance with Mildenhall FCIF 12-001. **OPR:** 351 ARS/DOT. **Course Development:** HQ AMC/A3TK. **Instructor:** Qualified instructor pilot/navigator. **Training media:** Lecture.

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**Attachment 1****GLOSSARY OF REFERENCES AND SUPPORTING INFORMATION*****References***

Public Law 92-204, *Appropriations Act for 1973*

Public Law 93-570, *Appropriations Act for 1974*

Executive Order 9397, *Numbering System for Federal Accounts Relating to Individual Persons*

DoD 4515.13-R, *Air Transportation Eligibility*, November 1994

AFPD 10-9, *Lead Command Designation and Responsibilities for Weapon Systems*, 8 Mar 2007

AFPD 10-21, *Air Mobility Lead Command Roles and Responsibilities*, 1 May 1998

AFPD 11-4, *Aviation Service*, 1 Sep 2004

AFPD 16-8, *Arming Of Aircrew, Mobility, And Oversea Personnel*, 18 May 1993

AFPD 51-4, *Compliance With the Law of Armed Conflict (LOAC)*, 26 Apr 1993

AFI 10-403, *Deployment Planning and Execution*, 13 Jan 2008

AFI 11-200, *Aircrew Training, Standardization/Evaluation, and General Operations Structure*, 19 Jan 2012

AFI 11-202 Volume 1, *Aircrew Training*, 22 Nov 2010

AFI 11-202 Volume 2, *Aircrew Standardization/Evaluation Program*, 13 Sep 2010

AFI 11-202 Volume 3, *General Flight Rules*, 22 Oct 2010

AFI 11-215, *USAF Flight Manuals Program (FMP)*, 22 Dec 2008 (Certified Current, 3 Jan 2011)

AFI 11-218, *Aircraft Operations and Movement on the Ground*, 28 Oct 2011

AFI 11-290, *Cockpit/Crew Resource Management Training Program*, 11 Apr 2001

AFI 11-2C-5, Volume 1, *C-5 Aircrew Training*, 21 Jan 2010

AFI 11-2KC-135 Volume 2, *KC-135 Aircrew Evaluation Criteria*, 26 May 2010

AFI 11-2KC-135 Volume 3, *C/KC-135 Operations Procedures*, 18 Sep 2008

AFI 11-2KC-135 Volume 3, Addenda A, *C/KC -135 Aircraft Configuration*, 24 Jul 2008

AFI 11-2KC-135 Volume 3 Addenda C, *KC-135 Special Operations*, 3 Sep 2008

AFI 11-301, Volume 1, *Aircrew Flight Equipment (AFE) Program*, 25 Feb 2009

AFI 11-401, *Aviation Management*, 10 Dec 2010

AFI 11-402, *Aviation and Parachutist Service, Aeronautical Ratings and Aviation Badges*, 13 Dec 2010

AFI 11-403, *Aerospace Physiological Training Program*, 20 Feb 2001

AFI 11-412, *Aircrew Management*, 10 Dec 2010

AFI 11-421, *Aviation Resource Management*, 13 Dec 2010

AFI 14-105, *Unit Intelligence Mission and Responsibilities*, 3 Jun 2002

AFI 14-105, AMC Supplement 1, 5 Nov 2002

AFI 14-202 Volume 1, *Intelligence Training*, 10 Mar 2008

AFI 16-1301, *Survival, Evasion, Resistance, and Escape (SERE) Operations*, 6 Sep 2006

AFI 31-207, *Arming and Use of Force By Air Force Personnel*, 29 Jan 2009

AFI 33-201, Volume 2, *Communications Security (COMSEC) User Requirements*, 26 Apr 2005

AFI 36-507, *Mobilization of the Civilian Work Force*, 21 Jul 1994

AFI 36-2101, *Classifying Military Personnel (Officer and Enlisted)*, 14 Jun 2010

AFI 36-2107, *Active Duty Service Commitments (ADSC)*, 25 Nov 2009

AFI 36-2201 Volume 1, *Air Force Training Program*, 15 Sep 2010

AFI 36-2226, *Combat Arms Program*, 24 Feb 2009

AFI 36-2238, *Self-Aid and Buddy Care Training*, 6 Jan 2009

AFI 36-2251, *Management of Air Force Training Systems*, 5 Jun 2009

AFI 48-123, *Medical Examinations and Standards*, 1 Jan 2011

AFI 51-401, *Training and Reporting to Ensure Compliance With The Law Of Armed Conflict*, 17 Dec 2008

AFMAN 24-204 (I), *Preparing Hazardous Materials for Military Air Shipments*, 1 Sep 2009

AFJI 11-204, *Operational Procedures for Aircraft Carrying Hazardous Materials*, 11 Nov 1994

AFMAN 10-401V2, *Planning Formats and Guidance*, 1 May 1998

AFMAN 11-210, *Instrument Refresher Program*, 3 Feb 2005

AFMAN 11-217 Volume 1, *Instrument Flight Procedures*, 22 Oct 2010

AFMAN 33-363, *Management of Records*, 1 Mar 2008

AFMAN 36-2236, *Guidebook for Air Force Instructors*, 12 Nov 2003

ATP-56(B), *Air-to-Air Refueling*, 22 Jan 2010

AFTTP 3-3.KC-135, *Combat Aircraft Fundamentals—KC-135*, 1 Jul 2004

AFTTP 3-1.KC-10/KC-135(S), *KC-10/ KC-135 Combat Tactics*, 2 Nov 2008

AF Visual Aid (AFVA) 11-224, *Aircraft Marshalling Signals*, 1 Jun 2004

AMCH 33-1, *AMC Tanker Airlift Communications Handbook*, 1 Feb 2001

AMCI 10-450, *Support of Nuclear Planning and Operations*, 10 Feb 2011

*Foreign Clearance Guide*

JP 3-50, *Personnel Recovery*, 5 Jan 2007

T.O. 00-20-1, *Aerospace Equipment Maintenance Inspection, Documentation, Policy and Procedures*, 1 Sep 2006

***Adopted Forms***

AF Form 8, *Certificate of Aircrew Qualification*

AF Form 63, *Active Duty Service Commitment (ADSC) Acknowledgement Statement*

AF Form 522, *USAF Ground Weapons Training Data*

AF Form 847, *Recommendation for Change of Publication*

AF Form 1042, *Medical Recommendation for Flying or Special Operational Duty*

AF Form 1522, *ARMS Additional Training Accomplishment Report*

AF Form 4022, *Aircrew Training Folder*

AF Form 4023, *Aircrew Training Progress Report*

AF Form 4024, *Aircrew Training Accomplishment Report*

AF Form 4025, *Aircrew Summary/Close-Out Report*

AF Form 4031, *CRM Skills Criteria Training/Evaluation*

AF Form 4168, *COMSEC Responsible Officer and User Training Checklist (LRA)*

AF Form 4324, *Aviation Resource Management System (ARMS) Upgrade Worksheet*

AFTO Form 781A, *Maintenance Discrepancy and Work Document*

AFTO Form 781H, *Aerospace Vehicle Flight Status and Maintenance*

DD Form 365-4, *Weight and Balance Clearance Form F – Transport/Tactical*

DD Form 1833, *Isolated Personnel Report (ISOPREP)*

***Abbreviations and Acronyms***

**K**—Annual

**AAR**—Air to Air Refueling

**A3T**—Chief, Aircrew Operations and Training

**AC**—Aircraft Commander

**ACDE**—Aircrew Chemical Defense Ensemble

**ACDT**—Aircrew Chemical Defense Training

**ACDTQT**—Aircrew Chemical Defense Task Qualification Training

**ACQ**—Aircraft Command Qualification

**ACU**—Aircraft Commander Upgrade

**AD**—Active Duty

**ADLS**—Advanced Distributed Learning Service (ADLS)

**ADS**—Automatic Dependent Surveillance (-A/-C) Addressed/Contract; (-B) Broadcast

**ADSC**—Active Duty Service Commitment

**AEF**—Air Expeditionary Force

**AETC**—Air Education and Training Command

**AF**—Air Force

**AFB**—Air Force Base

**AFC2IC**—Air Force Command and Control Integration Center

**AFCESA**—Air Force Civil Engineering Support Agency

**AFCITA**—Air Force Complete Immunizations Tracking Application

**AFDL**—Air Force Distance Learning

**AFE**—Aircrew Flight Equipment

**AFGCIC**—AF Global Cyberspace Integration Center

**AFI**—Air Force Instruction

**AFJI**—Air Force Joint Instruction

**AFMAN**—Air Force Manual

**AFMSS**—Air Force Mission Support System

**AFPD**—Air Force Policy Directive

**AFRC**—Air Force Reserve Command

**AFSC**—Air Force Specialty Code

**AFSIR**—Air Force Spectrum Interference Resolution

**AFTO**—Air Force Technical Order

**AFTTP**—Air Force Tactics, Techniques, and Procedures

**AIT**—Aircrew Intelligence Training

**AMC**—Air Mobility Command

**AMCAOS**—Air Mobility Command Auxiliary Operational Squadron

**ANG**—Air National Guard

**AOC**—Air Operations Center

**AP**—Auto Pilot

**APU**—Auxiliary Power Unit

**ARMS**—Aviation Resource Management System

**AR**—As Required

**ARC**—Air Reserve Component (ANG and AFRC)

**ARCT**—AAR Control Time  
**ARMS**—Aviation Resource Management System  
**ASEV**—Aircrew Standardization/Evaluation Visit  
**ASR**—Airport Surveillance Approach  
**AT**—Academic Training  
**ATC**—Air Traffic Control  
**ATD**—Aircrew Training Device  
**ATS**—Aircrew Training System  
**B**—Biennial  
**BAQ**—Basic Aircraft Qualification/Qualified  
**BMC**—Basic Mission Capable  
**BO**—Boom Operator  
**BOPTT**—Boom Operator Part Task Trainer  
**BOWST**—Boom Operator Weapon System Training  
**C**—Cyclical (17-Month Qualification Evaluation Cycle)  
**CAC**—Conduct After Capture  
**CBRNE**—Chemical, Biological, Radiological, Nuclear and High Yield Explosive  
**CBT**—Computer-Based Training  
**CC**—Commander or appropriate ARC Operations Supervisor  
**CCP**—Command And Control Procedures  
**CEA**—Career Enlisted Aviator  
**CHUM**—Chart Update Manual  
**CLT**—Cargo Loading Trainer  
**CNS/ATM**—Communication, Navigation, Surveillance/Air Traffic Management  
**COMSEC**—Communications Security  
**CONOPS**—Concept of Operations  
**CONUS**—Continental United States  
**CoP**—Community of Practice  
**CPDLC**—Controller Pilot Data Link Communications  
**CRG**—Contingency Response Group  
**CRM**—Crew Resource Management  
**CRO**—COMSEC Responsible Officer

**CRW**—Contingency Response Wing

**CSD**—Class Start Date

**CSI**—Contingency SERE Indoctrination

**CST**—Combat Survival Training

**CT**—Continuation Training

**CUR**—Currency

**CWD**—Chemical Weapons Defense

**DMO**—Distributed Mission Operations

**DMT**—Distributed Mission Training

**DNIF**—Duty Not Involving Flying

**DO**—Deputy Commander for Operations

**DOC**—Designed Operational Capability

**DOD**—Department of Defense

**DQT**—Difference Qualification Training

**DSN**—Defense Switched Network

**ECAC**—Evasion Conduct After Capture

**EMCON**—Emission Control

**EOC**—End Of Course

**EP**—Fully Certified/Qualified Evaluator Pilot (who is performing evaluator duties on the mission)

**ESD**—Evaluator Standards Document

**ETCA**—Education and Training Course Announcements

**ETP**—Equal Time Point

**FAA**—Federal Aviation Administration

**FAIP**—First Assignment Instructor Pilot

**FB**—Basic Qualified Boom Operator

**FCIF**—Flight Crew Information File

**FE**—Flight Examiner

**FEF**—Flight Evaluation Folder

**FLIP**—Flight Information Publications

**Flt/CC**—Flight Commander

**FMAC**—Fuel Management Advisory Computer

**FMS**—Flight Management System

**FMS**—Foreign Military Sales

**FN**—Basic Qualified Navigator

**FP**—Qualified Pilot

**FPC**—MR MPD Phase I Pilot

**FPK**—Graduate of Aircraft Commander or re-qualification course (ACIQ, PCO, PREQ) in local Mission Ready training

**FPL**—Qualified MR Aircraft Commander Course Graduate prior to Aircraft Commander Certification (ARMS Code)

**FPN**—Qualified Non-Mission Ready Pilot (ARMS Code)

**FPQ**—Flight Qualified Mission Ready MPD Pilot

**FS**—Flight Surgeon

**FTC**—Faculty Training Course

**FTL**—Flying Training Level

**FTU**—Formal Training Unit

**GATM**—Global Air Traffic Management

**GIPTT**—CNS/ATM Integrated Hand Controller Part Task Trainer

**GPS**—Global Positioning System

**GPRD**—Graduate Program Requirements Document

**GRACC**—Global Ready Aircraft Commander Course

**GST**—Ground System Training

**GT**—Ground Training

**GTL**—Ground Training Level

**HARM**—Host Aviation Resource Management

**HF**—High Frequency

**HQ**—Headquarters

**HRC**—High Risk of Capture

**IA**—Information Assurance

**IAP**—Instrument Approach Procedure

**IAW**—In Accordance With

**IBO**—Instructor Boom Operator

**IBT**—Instructor-Based Training

**ICAO**—International Civil Aviation Organization

**IFF/SIF**—Identification, Friend or Foe, Selected Identification Features

**ILS**—Instrument Landing System  
**IMC**—Instrument Meteorological Conditions  
**IN**—Instructor Navigator  
**IOS**—Instructor Operator Station  
**IP**—Fully Certified/Qualified Instructor Pilot who is performing instruction on the mission  
**IPD**—International Program Directives  
**IQT**—Initial Qualification Training  
**IRC**—Instrument Refresher Course  
**ISD**—Instructional Systems Development  
**ISOPREP**—Isolated Personnel Report  
**L-BAND**—Satellite Communications Frequency  
**LAHSD**—Low Altitude High Speed Departures  
**LNAV**—Lateral Navigation  
**LOAC**—Law Of Armed Conflict  
**M**—Monthly  
**MAF**—Mobility Air Force  
**MAJCOM**—Major Command  
**MB**—Mission Boom Operator  
**MCT**—Mission Certification Training  
**MDS**—Mission-Design-Series (i.e., KC-135R)  
**MFD**—Multi-Function Display  
**MFR**—Memorandum For Record  
**MILPDS**—Military Personnel Data System  
**MISREP**—Mission Reports  
**MITO**—Minimum Interval Takeoff  
**MLS**—Microwave Landing System  
**MN**—Mission Navigator  
**MNPS**—Minimum Navigation Performance Specification  
**MOST**—Mission Oriented Simulator Training  
**MOU**—Memorandum Of Understanding  
**MP**—Mission Pilot  
**MPD**—Mobility Pilot Development

**MPF**—Military Personnel Flight  
**MPN**—Aircraft Commander (Non-Mission Ready)  
**MPRS**—Multi-Point Refueling System  
**MQF**—Master Question File  
**MQT**—Mission Qualification Training  
**MR**—Mission Ready  
**MSSR**—Media Selection Syllabus Report  
**MTL**—Master Task Listing  
**MWS**—Major Weapon System  
**MX**—Maintenance  
**N/A**—Not Applicable  
**NAF**—Numbered Air Force  
**NAVAID**—Navigational Aid  
**NET**—Not Earlier Than  
**NGB**—National Guard Bureau  
**NLT**—Not Later Than  
**NMR**—Non-Mission Ready  
**NVD**—Night Vision Devices  
**NVG**—Night-Vision Goggles  
**O & M**—Organizational and Maintenance  
**OCONUS**—Outside the Continental United States  
**OFT**—Operational Flight Trainer (KC-135 R-model Simulator)  
**OG**—Operations Group  
**OGI**—Operations Group Instruction  
**OG/CC**—Operations Group Commander  
**OGV**—Operations Group Standardization and Evaluation  
**OMAR**—Objective Media Analysis Report  
**OME**—Operational Mission Evaluation  
**ORM**—Operational Risk Management  
**OPLAN**—Operations Plan  
**OPORD**—Operations Order  
**OPR**—Office Of Primary Responsibility

**OSA**—Operational Support Airlift  
**OSS**—Operations Support Squadron  
**P**—Proficient  
**PA**—Privacy Act  
**PAA**—Primary Aircraft Authorization  
**PACAF**—Pacific Air Forces  
**PAI**—Primary Aircraft Inventory  
**PAMS**—Pilot Absorption Management System  
**PAR**—Precision Approach Radar  
**PCO**—Pilot Checkout (N/A KC-135)  
**PCS**—Permanent Change of Station  
**PF**—Pilot Flying  
**PFT**—Programmed Flying Training  
**PIC**—Pilot In Command  
**PIQ**—Pilot Initial Qualification  
**PM**—Pilot Monitoring  
**PNF**—Pilot Not Flying  
**PO**—Project Officer  
**POC**—Point Of Contact  
**PR**—Progress Review  
**PRM**—Precision Runway Monitoring  
**PTT**—part task trainer  
**QAI**—Quality Assurance Issue  
**QAR**—quality assurance representative  
**QUAL**—Qualification  
**R&C**—Review and Certification  
**RDS**—Records Disposition Schedule  
**RIP**—Report of Individual Personnel  
**RNAV**—Area Navigation  
**RNP**—Required Navigation Performance  
**RPL**—Required Proficiency Level  
**RQT**—Requalification Training

**RTRB**—Realistic Training Review Board  
**RV**—Rendezvous  
**RVSM**—Reduce Vertical Separation Minimum  
**SABC**—Self Aid Buddy Care  
**SATCOM**—Satellite Communications  
**SERE**—Survival, Evasion, Resistance, And Escape  
**SG**—Surgeon General  
**SIM**—Simulator  
**SIMCERT**—Simulator Certification  
**SIPRNET**—Secret Internet Protocol Router Network  
**SKE**—Station Keeping Equipment  
**SME**—Subject Matter Expert  
**SOAR**—Special Operations Air Refueling  
**SOC**—Senior Officer Course  
**SORTS**—Status Of Resources And Training System  
**SPEC**—Specification  
**SPINS**—Special Instructions  
**Sq/CC**—Squadron Commander  
**Sq/DO**—Squadron Director of Operations  
**SRB**—System Review Board  
**SSN**—Social Security Number  
**Stan/Eval**—Standardization and Evaluation  
**START**—Strategic Arms Reduction Treaty  
**TACAN**—Tactical Aid to Navigation  
**TACC**—Tanker Airlift Control Center  
**TCAS**—Traffic Alert Collision Avoidance System (also called E-TCAS)  
**TDAPPS**—Training Data Acquisition, Analysis, and Playback System  
**TDY**—Temporary Duty  
**TERPS**—Terminal Instrument Procedures  
**TFT**—Total Flying Time  
**TG**—Training Guide  
**TIM**—Technical Interchange Meeting

**TL**—Training Level

**TMO**—Tanker Manual Operation

**TMS**—Training Management System

**T.O.**—Technical Order

**TRP**—Training Review Panel

**TTP**—Tactics, Techniques, And Procedures

**TX**—Transition

**UB**—Unqualified Boom Operator

**UDM**—Unit Deployment Manager

**UE**—Unit-Equipped

**UHF**—Ultra High Frequency

**UN**—Unqualified Navigator

**UP**—Unqualified Pilot

**UPT**—Undergraduate Pilot Training

**US**—United States

**USAF**—United States Air Force

**USAFEC**—United States Air Force Expeditionary Center

**USAFE**—United States Air Forces in Europe

**USAFWS**—United States Air Force Weapons School

**VFR**—Visual Flight Rules

**VHF**—Very High Frequency

**VMC**—Visual Meteorological Conditions

**VOR**—VHF Omnidirectional Range

**VTRAT**—Visual Threat Recognition and Avoidance Trainer

**Wg/CC**—Wing Commander

**WIC**—Weapons Instructor Course

**WPS**—Weapons School

**WST**—Weapon System Trainer (Includes Air Vehicle Simulator linked to the Loadmaster or Boom Operator Station)

**WX**—Weather

### *Terms*

**Academic Training**—A course of instruction including, but not limited to, classroom instruction for aircraft systems and operation, flight characteristics and techniques, performance, normal

procedures, abnormal procedures, and emergency procedures. To adequately prepare students, academic courses should be completed prior to simulator or flight training.

**Aircraft Commander (AC)**—Pilot who has been certified to perform “pilot-in-command” duties.

**Aircraft Systems Refresher**—Aircraft and crew position unique systems refresher courses.

**AAR Mission**—Flight that involves AAR procedures as a tanker or receiver aircraft.

**Aeromedical Evacuation (AE)**—The movement of patients under medical supervision to and between medical treatment facilities by air transportation.

**Aircrew Training Device (ATD)**—Includes cockpit procedures trainer, Boom Operator part task trainer, weapons systems trainer, operational flight trainer, celestial training device, table top navigation and rendezvous trainer, cargo loading trainer, and other flight simulators.

**Aircrew Training System (ATS)**—Integrated qualification, upgrade, and continuation training program for crewmembers. Civilian contractors conduct most academic and ATD training.

**Annual**—Training required once every calendar year.

**Basic Aircraft Qualified (BAQ)**—Aircrew member who has successfully completed an in-flight evaluation, but is not mission qualified in his or her assigned aircraft.

**Biennial**—Training required once every two calendar years.

**Boom Operator Part Task Trainer (BOPTT)**—Aircrew Training Device (ATD) providing synthetic flight and tactics environment in which KC-135 Boom Operators learn, develop, improve, and integrate skills associated with the KC-135 boom pod. The KC-135 ATS operates two BOPTT configured for KC-135R training located at Altus AFB. The BOPTT are classified to meet FAA Level-A training device standards; capable of system and emergency procedures training.

**Boom Operator Weapon System Trainer (BOWST)**— Aircrew Training Device (simulator) providing virtual flight environment in which KC-135 Boom Operators learn, develop, improve, and integrate skills associated with the KC-135 boom pod.

**Cargo Load Trainer (CLT)**—Aircrew Cargo Load Trainer device that provides actual environment in which crewmembers learn, develop, improve, and integrate skills associated with their crew position. The KC-135 ATS operate one CLT configured for KC-135R training located at Altus AFB. The CLT is an actual aircraft with wings removed. The interior of the CLT allows crewmembers to configure the space for floor loading and/or cargo rail loads.

**Communications Security (COMSEC)**—COMSEC material, other than equipment or devices, that assists in securing communications and which is required in the production, operation, or maintenance of COMSEC systems and their components. Examples are keys, codes, authentication information in physical or electronic form, call signs, frequencies, and supporting documents.

**Communication, Navigation, Surveillance/Air Traffic Management (CNS/ATM)**—The USAF is equipping aircraft to meet a specific Communication, Navigation, or Surveillance mandate to fly in a sovereign nations specified airspace. CNS/ATM addresses the three major system categories worldwide (communication, navigation, and surveillance) and includes the

intended end state for these changes: the transition from Air Traffic Control (ATC) to Air Traffic Management (ATM). The term further achieves standardization DoD-wide. The Global Access Navigation and Safety (GANS) Team on 6 May 2004 adopted policy for future programming documents such that the term “CNS/ATM” will replace “GATM”.

**Computer-Based Training (CBT)**—Ground training system that uses computer-generated graphics or text in conjunction with interactive programs as the primary medium of instruction.

**Continuation Training**—Ground and flight training events necessary to maintain mission-ready or basic aircraft qualification status.

**Crew resource Management (CRM) Training**—See specifics of CRM in AFI 11-290. CRM is designed to improve aircrew teamwork, dynamics, and effectiveness.

**Critical Phases-of-Flight**—See AFI 11-2KC-135 Volume 3. The instructor must occupy one of the seats or stations, with immediate access to the controls.

**Currency Event**—Flying continuation training events with prescribed maximum interval-between-accomplishment shown in the “CUR” column.

**Cycle**—17-month cycle based on in-flight evaluation completion as defined in AFI 11-202 Volume 2 and AFI 11-2KC-135 Volume 2 and appropriate MAJCOM supplement.

**Direct Instructor Supervision**—Instructor of like specialty with immediate access to controls (for pilot position, instructor will occupy either seat).

**Event**—A training requirement or training event described in this AFI. Several events or tasks constitute a training profile.

**Familiarization Event**—An item completed by demonstration, observation, briefing, or in-seat experience. Proficiency is not required.

**Flight Examiner or Evaluator**—A crewmember designated to administer evaluations as defined in AFI 11-202 Volume 2 and the appropriate MAJCOM supplement.

**Flight Surgeon (FS)**—Medical doctor qualified to perform flight surgeon duties and has current aeronautical orders in that AFSC.

**Frequency**—How often an event must be accomplished to maintain currency.

Term	Definition	Example
180D, 365, etc.	Expires at the end of the <i>n</i> th day after the Last Accomplished Date.	180D: If <b>Last accomplished</b> = 10 Feb 07 <b>Expires End of</b> = 8 Aug 07 <b>Overdue</b> = 9 Aug 07
M, 2M, 6M 12M, 24M, etc.	Expires at the end of the last day of the <i>n</i> th Calendar Month after Last Accomplished.	15M: If <b>Last accomplished</b> = 10 Feb 07 <b>Expires End of</b> = 31 May 08 <b>Overdue</b> = 1 Jun 08
Q - Quarterly	Expires at the end of the last day of the Quarter after the Last Accomplished Quarter. Training Quarters are defined under the term	If <b>Last accomplished</b> = 10 Feb 07 <b>Expires End of</b> = 30 Jun 07 <b>Overdue</b> = 1 Jul 07

	"Quarterly."	
4Q – 4th quarter	Expires at the end of the last day of the 4th Quarter after the Last Accomplished Quarter. Training Quarters are defined under "Quarterly."	4Q: If <b>Last accomplished</b> = 10 Feb 07 <b>Expires End of</b> = 31 Mar 08 <b>Overdue</b> = 1 Apr 08
SA – Semi- Annual	Expires at the end of the last day of the Semiannual period <i>after</i> the training was accomplished. The <i>Semiannual Training Periods</i> are specified under the term "Semiannual."	If <b>Last accomplished</b> = 10 Feb 07 <b>Expires End of</b> = 31 Dec 07 <b>Overdue</b> = 1 Jan 08
A - Annual	Expires at the end of the last day of the Calendar Year <i>after</i> the training was accomplished.	If <b>Last accomplished</b> = 10 Feb 07 <b>Expires End of</b> = 31 Dec 08 <b>Overdue</b> = 1 Jan 09
B - Biennial	Expires at the end of the last day of the 2nd Calendar Year <i>after</i> Training was accomplished.	If <b>Last accomplished</b> = 10 Feb 07 <b>Expires End of</b> = 31 Dec 09 <b>Overdue</b> = 1 Jan 10
T - Triennial	Expires at the end of the last day of the 3rd Calendar Year <i>after</i> Training was accomplished.	If <b>Last accomplished</b> = 10 Feb 07 <b>Expires End of</b> = 31 Dec 10 <b>Overdue</b> = 1 Jan 11
<b>One-time</b>	Self-explanatory	
<b>AR</b> – As required	Self-explanatory	

**Instructor**—Crewmember trained, qualified, and certified by the Sq/CC as an instructor.

**Instructor-Candidate**—A crewmember undergoing upgrade training to instructor.

**Instructor Supervision**—A qualified instructor of like specialty supervising a maneuver or event.

**Mission-Oriented Simulator Training (MOST)**—Part of the aircrew CRM training program; includes a practical application, a full-mission scenario in the OFT.

**Mission-Ready (MR)**—Crewmember who is current, qualified, and certified in the unit's missions.

**Mission Review Panel (MRP)**—Unit level staff, reviews previous day's flight and ground training.

**Mobility Pilot Development (MPD)**—The process by which a MPD pilot transitions from a new dual-seat qualified pilot in the MDS to a fully qualified and certified ACs.

**Monthly**—Training required once every calendar month.

**Night**—After official sunset until before sunrise as defined in AFI 11-401.

**Non-Mission Ready (NMR)**—A crewmember that is unqualified, non-current or incomplete in required continuation training, or not certified to perform the unit mission.

**Operational Flight Trainer (OFT)**—KC-135R-model Aircrew Training Device (simulator) that provides synthetic flight and tactics environment in which crewmembers learn, develop, improve, and integrate skills associated with their crew position. The KC-135 ATS operates 19 OFT devices configured for KC-135R-model training at 13 locations worldwide.

**Overseas Sortie (OCONUS sortie)**—A sortie that includes a take-off or landing outside the 48 contiguous states of the United States.

**Primary Aircraft Authorization (PAA)**—KC-135 aircraft (primary, secondary, instructor or evaluator) and simulator time count towards PAA hours. Do not count other time towards PAA time.

**Part Task Trainer (PTT)**—A physical aircrew training device (ATD) to practice a specific training task e.g., BOPTT or GIPTT) or software on FTU or ATS site CBT system e.g., Data Link, FMAC, etc.

**Pilot Initial Qualification (PIQ)**—Term used to describe the FTU course for initial qualification of a Specialized Undergraduate Pilot Training student into a MAF KC-135 pilot.

**Pipeline**—An initial qualification trainee directed for training by the AF Personnel Center process.

**Quarterly**—3-month periods defined as 1 October to 31 December (first quarter of the fiscal year), 1 January to 31 March, 1 April to 30 June, and 1 July to 30 September.

**Queen Bee ATD**—Simulator used by non-located units.

**Quinquennial**—Training required once every 5-years.

**Requalification Training**—Training to requalify a crewmembers in an aircraft in which they have been previously qualified. See [Chapter 2](#) for requalification training requirements.

**Semiannual**—6-month training periods from 1 January to 30 June and 1 July to 31 December.

**Simulated Engine Failure Take-off Continued (EFTOC)**—Practice procedure simulating engine failure after a take-off or touch and go.

**Supervised Training Status**—Crewmember will fly under instructor supervision as designated by the Sq/CC or Evaluator. Use as result of loss of currency or due to less-than-qualified evaluation.

**Tactical Arrival and Departures (TAD)**—Tactical maneuvers in AFI 11-2KC-135 Volume 3.

**Training Devices**—All trainers, computer assisted instruction, sound-on-slide programs, videos, and mockups designed to prepare students for flight training or augment prescribed continuation training.

**Triennial**—Training required once every three calendar years.

**Weapon System Trainer (WST)**—A device which provides an artificial training/tactics environment in which operators learn, develop, improve and integrate mission skills associated with their crew position in a specific defense system.

**Attachment 1 (MILDENHALL)****GLOSSARY OF REFERENCES AND SUPPORTING INFORMATION*****References***

Privacy Act of 1974

DoDI 7730.57, *Aviation Career Incentive Act of 1974 and Required Annual Report*, 18 July 2003

***Adopted Forms***

AF Form 847, *Recommendation for Change of Publication*

***Prescribed Forms***

None

***Abbreviations and Acronyms***

**AFORMS**—Air Force Operations Resource Management System

**AMC**—Air Mobility Command

**ATP**—Allied Tactical Publication

**GRACC**—Global Ready Aircraft Commander Course

**MAJCOM**—Major Command

**U.S.**—United States

**USAFE**—United States Air Forces in Europe

**USEUCOM**—United States European Command

## Attachment 2

### AIRCREW TRAINING DOCUMENTATION

**A2.1. General Information.** This attachment provides guidelines on proper training documentation. Instructions are provided for AF Form 4022, *Aircrew Training Folder*, AF Form 4023, *Aircrew Training Progress Report*, AF Form 4024, *Aircrew Training Accomplishment Report*, and AF Form 4025, *Aircrew Summary/Close-Out Report*, electronic training folders, and aircrew training guides. These forms are prescribed in AFI 11-2C5 Volume 1, *C5 Aircrew Training*.

A2.1.1. Create an AF Form 4022 Aircrew Training Folder for ETCA formal training courses (formal school or in-unit), mission certification, special qualification and certification (if simulator or flight is required, in-unit upgrade program to the next higher crew qualification, requalification training (formal school or in-unit), AC upgrade training, and all corrective action or additional training requiring a simulator or flight (if directed by the squadron commander). (see AMC/A3T CoP, Universal Aircrew Training, for examples of AF Form 4022, 4023, 4024, 4025). **Exception:** WIC Instructors and students will follow the documentation directed by USAFWS. MCT requirements may be tracked with Cadre Instructor (CIC) when accomplished simultaneously and do not require a separate AF Form 4022.

A2.1.1.1. The unit operations officer may waive the training folder requirement if corrective action or additional training is limited (e.g., if no simulator or flight is required). If initiated, the instructor or flight examiner who evaluated the aircrew member's performance will enter comments pertinent to the training deficiency on AF Form 4023 or the electronic training folder. Use the existing AF Form 4022 for end-of-course evaluations that result in additional training.

A2.1.1.2. At the unit's discretion, training folders for an individual undergoing more than one training program in a short period of time may combine all training into one AF Form 4022; for example, a MPD pilot upgrading to AC may have the upgrade, mission qualification, and formation lead training combined in one folder.

A2.1.1.3. Electronic Training Folders and forms are authorized. MAJCOM approved Unit Developed Electronic Training Folder programs are authorized as long as it complies with Attachment 2 of this section and AF Forms 4023, 4024 and 4025 are used. Overprints cannot alter the original form. Altering of AF Forms 4023, 4024, and 4025 are not authorized without AMC/A3TA approval. Electronic Training Folders and reports not reproduced on paper for inclusion in the AF Form 4022, must be stored in 2 places (a primary and a backup) for at least one year. After one year, training offices should retain a copy of the AF Form 4025 in a permanent record and provide the crewmember with a copy of the electronic training folder. AF Form 4025s should be sent with the members Flight Records Folder upon change of station for the receiving training office to hold on file.

A2.1.1.3.1. Electronic versions must be password protected to ensure data integrity (individual will have read only access to their files).

A2.1.1.3.2. Digital signatures are authorized using “//signed//” plus the individuals name.

A2.1.2. Formal schools will send AF Form 4022 or electronic training folder with all training records to the trainee’s gaining unit. This may be done electronically at the gaining unit’s request. Sq/CC will review formal school training records and enter appropriate comments and signature on the training guide progress record, electronic training folder or AF Form 4023. **Exception:** WIC training folders will be maintained IAW USAFWS direction at the 509 WPS.

A2.1.3. The unit (typically squadron-level) will maintain the training folders for assigned personnel in a location readily accessible to instructors and supervisory personnel. The trainee may review his or her folder at any time.

A2.1.4. The instructor or trainer will review the training folder, to include AF Forms 4023 and 4024 or the training guide, prior to all training periods. Those areas not previously accomplished or those in which crewmembers require additional training, will be noted for possible inclusion during the current training period. Sq/CC or Sq/DO will review active training folders quarterly, and Flt/CCs or Sq training representatives will conduct a monthly review. Annotate monthly and quarterly reviews on AF Form 4023 or in the training guide. Quarterly reviews fulfill the requirement for monthly reviews for the month the review was completed. **Note:** Due to the frequency of review, and brief course length at the FTU, the 97 OG/CC will determine the requirement to review student training documentation.

A2.1.5. Upon completion of training, place hard copy of the AF Form 4025 in the individual’s flight training folder. Place a copy of the AF Form 4025 in the individuals FEF only if directed by the appropriate guidance (e.g., AFI 11-202 Volume 2/MAJCOM Supplement, AFI 11-2KC-135 Volume 2). After one year, training offices should retain a copy of the AF Form 4025 in a permanent record and return the AF Form 4022 to the crewmember. AF Form 4025s should be sent with the members Flight Records Folder upon change of station for the receiving training office to hold on file. Document in ARMS per applicable event and **paragraph 1.8**.

A2.1.6. For ATS and formal school courses. If training guides are not provided by the ATS, use AF Forms 4023, 4024, and 4025.

A2.1.7. For purposes of training documentation, Academic Training (AT) will be considered FTU classroom training only. Ground Training (GT) will be considered all training conducted outside the classroom not associated with a flight or ATD. All G series ground training referenced in this AFI will be referenced as (GT).

A2.1.8. AF Forms 4324 or AF Forms 1522 will be used as a "source document" for recording various aircrew certifications. Completed/original AF 4324s and/ or AF Forms 1522 (with Sq/CC signature) will be kept on file in the unit ARMS office for the duration of the aircrew member's assignment and released to the member upon reassignment. AF Forms 4324, applicable items in Section 1 and Section 2, will be used to document new aircrew certifications that require award of specific ARMS "Q" code identifiers and associated training profiles. Specifically, block 22 will contain the following minimum information: "Q" code (i.e., QXXX), Certification Name (i.e., "MPRS"), and date of certification. AF Forms 1522s may be used in lieu of AF Forms 4324 to document new aircrew certifications

that require award of specific ARMS “Q” code identifiers that do not require assignment of associated training profiles. Forward completed forms to the unit ARMS section for processing. For all certifications and qualifications, the Sq/CC must sign the document. If using an AF Form 1522, the Sq/CC must print and sign their name.

**A2.2. Instructions for AF Form 4022.** This folder is constructed of hard stock paper. The inside cover includes tables for documenting training. AF Forms 4023, 4024, 4025, training guides, and additional information (waivers, etc.) will be attached through the centered holes of the folder. Obtain a folder through the AF publications system. Electronic training folders may be used at the unit’s discretion (see [paragraph A2.1.1.3](#)). *Note:* Formal school instructors are not required to complete the following sections of the AF Form 4022: ground training summary, written evaluations, and flying training summary if this information is tracked by other means.

A2.2.1. Trainee Information (cover): Provides trainee and course information.

A2.2.1.1. Name and grade. Enter the name and grade or rank of the individual in training.

A2.2.1.2. Aircrew position. Enter the aircrew position to which they are qualifying, upgrading, or certifying to.

A2.2.1.3. Unit of assignment. Enter the unit the individual is assigned to.

A2.2.1.4. Type of training. Enter formal course title or, for special mission qualification, enter type, e.g. SOAR, formation lead etc. For other types of training, enter a descriptive identifier.

A2.2.1.5. Class number. Enter formal school class number; otherwise, leave blank.

A2.2.1.6. Course number: Enter only the ETCA formal course number, e.g., “KC135PTX1,” etc. Otherwise, leave blank.

A2.2.2. Ground Training Summary (inside left). This section provides a record of ground training events. Record non-flying training events. Entries are required for CPT, OFT, GIPTT, or NPT. Entries are required on the AF Form 4022 for in-unit academic instruction conducted according to formal school courseware. Identify classroom academic training as AT. MAJCOM approved overprints are authorized and, if used, will be placed on the left side of the AF Form 4022. Individual AT & GT entries are not required to be entered on page 2 of the AF Form 4022. Total AT & GT times must be entered on page 2 of the AF Form 4022. If training guides account for ground training date, event ID, instructor, and training time, AT and GT entries are not required to be entered on page 2 of the AF Form 4022.

A2.2.2.1. Date. Enter the date training was accomplished.

A2.2.2.2. Training period. Enter sequentially numbered training period designators, e.g. “CPT-1,” “OFT-2,” “GT-3, OFT-5, etc.”, or specific course identifier.

A2.2.2.3. Status. Enter incomplete (INC) and the reason, e.g. “INC-MX” (maintenance) or “INC-PRO” (trainee proficiency) when an additional training period, over those remaining, will be required to accomplish the lost training events originally scheduled for that training period; otherwise, leave blank.

A2.2.2.4. Instructor or Trainer (Qualification). Enter the name of the instructor or trainer and aircrew qualification, e.g., AC, IP, IN, etc.

A2.2.2.5. Training time. Self-explanatory. Do not include time normally associated with pre-briefing and debriefing.

A2.2.3. Training Period Designators. Codes to describe training periods. Formal training schools may use more descriptive designators if required.

A2.2.4. Written Evaluations. If applicable and desired, record data for the in-flight evaluation required to complete the training program.

A2.2.4.1. Date. Enter the date the written evaluation was satisfactorily completed.

A2.2.4.2. Type. Enter the AFI 11-2KC-135 Volume 2 description or other appropriate identifier.

A2.2.4.3. Grade. Enter according to AFI 11-2KC-135 Volume 2.

A2.2.5. Performance Evaluation Summary. Record data on required evaluations including reevaluations (if applicable).

A2.2.5.1. Date Recommended. Enter the date recommended for a performance evaluation (CPT, OFT, or flight).

A2.2.5.2. Type Evaluation. Enter AFI 11-2KC-135 Volume 2 evaluation description or other appropriate identifier.

A2.2.5.3. Instructor (Qualification). Enter the name and aircrew qualification of the instructor recommending the student for an evaluation.

A2.2.5.4. Operations review. With the initials of the reviewer, indicate a records review has been accomplished following recommendation for an evaluation. **Note:** Flt/CCs or supervisors will accomplish reviews during formal school training courses. Sq/CC or designated representative will review before flight evaluations.

A2.2.5.5. Date Evaluated. Enter the date the evaluation was completed.

A2.2.5.6. Evaluator. Enter the name of the Flight Examiner.

A2.2.5.7. Grade. Enter according to AFI 11-2KC-135 Volume 2.

A2.2.6. Flying Training Summary (inside right). This section provides a chronological record of flying training sorties. Log all sorties scheduled even if canceled by external factors such as weather (WX) or maintenance (MX).

A2.2.6.1. Date. Enter the date training was accomplished. On operational missions, enter inclusive dates (e.g., 28 Jul - 7 Aug 11).

A2.2.6.2. Training Period. Enter sequentially numbered training period designators. For purposes of training documentation, AT will be considered FTU classroom training only. Ground Training (GT) will be considered all training conducted outside the FTU classroom not associated with a flight, OFT or WST. All G series ground training referenced in this AFI will be referenced as (GT). Simulator Training (OFT & WST) will be considered all training conducted in an OFT or BOWST. Flight Training (S) will be considered all training conducted on the aircraft.

A2.2.6.3. Status. Enter “INC” and reasons, “WX,” “MX,” or “PRO” when an additional training flight, over those remaining, will be required to accomplish lost training events originally scheduled for that period (INC-WX); otherwise, leave blank.

A2.2.6.4. Instructor (Qualification). Enter the name and aircrew qualification of the instructor.

A2.2.6.5. Mission Time. Enter the total flight-time of the training or operational mission in the top half of the block. If documentation of seat-time is required, enter the flight-time the trainee was actually in the seat in the lower half of the block. For MPD training, see **paragraph 5.3.4.1**.

A2.2.6.6. Cumulative Time. Use this block to enter the individual’s total cumulative flight-time in the specific training course. Enter total cumulative flight-time in the top half of the block and, if required, the total cumulative seat-time in the lower half of the block.

A2.2.7. Performance and Knowledge Standards. (For use with AF Form 4024, see **paragraph A2.4.11**)

A2.2.8. Grading Codes. (For use with AF Form 4024, see **paragraph A2.4.8**)

A2.2.9. AF Form 4022 Aircrew Training Folder Closure. The Training Folder is considered closed upon successful completion of the final event required by the training program. Final training events include flight evaluation; instructor validation of training (i.e., “sign-off” flight); and/or Squadron Commander Certification.

**A2.3. Instructions for the AF Form 4023.** This form provides a narrative description of training missions and is also used for documenting operations review of training progress. One form may be used for continuous missions during a single TDY with the same instructor. Complete this form or a unit developed overprint anytime formal training requirements are completed or anytime the IP/IB/AC considers that a write-up is warranted. Electronic forms are authorized (see **paragraph A2.1.1.3**). Overprints cannot alter the original form. Altering of AF Forms 4023, 4024, and 4025 are not authorized without AMC/A3TA approval. File AF Forms 4023 in order with the most recent flight on top. FTU may use MAJCOM approved substitute. An original AF Form 4023 is optional if a MAJCOM coordinated training guide is used to record training (see **paragraph A2.6**). *Note:* An original AF Form 4023 is optional if a training guide or MAJCOM approved electronic training folder program is used to record training.

A2.3.1. Training Period and Date (Item 1). Training period is ground, simulator, or flight (i.e., AT-1, GT-1, OFT-3, S-4, etc.). Also, annotate the date the training occurred. If one form is used to document continuous missions during a single TDY with the same instructor, annotate each flight date and period.

A2.3.2. AT, GT, FLY, and ATD (Items 2, 4, and 6). Annotate time allocated for training and keep a running total (Items 3, 5 and 7) by adding previous totals to current training period time. FTU classroom academic training periods will be annotated as AT and tabulated under the ground training block. Any training event that does not have an ARMS identifier will be documented on an AF Form 4023 or training guide (e.g. RNAV GPS ground training, Formation Lead ground training, Local Area Brief, Tactics ground training,

EMCON 3 & 4, etc.). **Note:** For formal schoolhouse, 97 OG will determine applicability of items 2-8.

A2.3.3. Total Training Time (Item 8). Keep a running total of all training time (add items 3, 5, and 7).

A2.3.4. Remarks and Recommendations (Item 9). Describe the mission scenario. Local overprints are authorized. Overprints cannot alter the original form. Altering of AF Forms 4023, 4024, and 4025 are not authorized without AMC/A3TA approval. Comments will elaborate on trainee strengths and weaknesses, identify problem areas, record unusual circumstances, and indicate student progress. Recommendations will be specific and include tasks requiring further training and the type of training required. If instructor recommendations are not followed, document rationale on the AF Form 4025. If more space is required for annotating remarks, draw vertical arrows through sortie information heading section (Items 1 through 8) and continue remarks.

A2.3.4.1. Operations Review. In addition to reviewing all AF Form 4023 entries, the training Flt/CC or a Sq/DOT representative will conduct a monthly review of active status AF Forms 4022. The Sq/CC or Sq/DO will review active status AF Forms 4022 at least once each quarter. Document reviews on an AF Form 4023. The reviewer will annotate “monthly review” or “quarterly review,” as applicable, in the training period block. Operations review will be annotated, and if required, a separate entry in the training record including comments on the student’s progress will be made. Initial reviews by Sq/CC’s fulfill the requirement for the monthly and quarterly review for the month and quarter the review was completed.

A2.3.4.2. Monthly reviews are not required for formal school courses except in documented cases of unsatisfactory progress. In this case, the training Flt/CC’s initials on the AF Form 4023 or training guide satisfies this requirement. ATS personnel will review the student’s records and ensure all required training is completed prior to entering flight training. If problems are encountered during the flying phase, the squadron will conduct reviews necessary to document unsatisfactory progress.

A2.3.4.3. When the trainee attains sufficient knowledge, experience, and prerequisites for upgrade, the instructor will recommend an evaluation and state: “Recommend evaluation for (crew position)” on the training progress record. Trainees will not be recommended for an evaluation if a TG required event is incomplete or requires corrective action. **Exception:** MPD Pilot ATS progress reviews (evaluations) may be administered with open areas in the TG.

A2.3.5. Instructor Block (Item 10). Instructors will print and sign their name and annotate their rank and crew qualification.

A2.3.6. Students Block (Item 11). Students will print and sign their name.

A2.3.7. Reviewer Block (Item 12). For monthly and quarterly reviews, the Sq/CC, Sq/DO, or training Flt/CC will print and sign their name and indicate their position. The training Flt/CC may use their initials in the review block after reviewing individual AF Form 4023 entries.

A2.3.8. Students and instructors will review the AF Form 4023 or training guide prior to the next training period. **Formal School Courses Only:** To ensure documentation flow does not delay training, once flight training begins, ATS instructors are not required to review the training folder, and may forward subsequent training reports to the flightline unit training representative electronically (electronic signatures authorized), who will review and insert the report into the student's AF Form 4022. Except in cases of unsatisfactory student performance, ATS training reports do not require student or instructor review prior to the next flight training period.

**A2.4. Instructions for the AF FORM 4024.** This form tracks, for each sortie, individual event and task accomplishment and grades. Complete this form or a unit developed overprint with event and task listings, total number of repetitions required, and the required proficiency level (RPL) for each event and task. Electronic forms are authorized (see [paragraph A2.1.1.3](#)). Overprints cannot alter the original form. Altering of AF Forms 4023, 4024, and 4025 are not authorized without AMC/A3TA approval. Simulator, ground training, and flight training events may be combined on a single AF Form 4024 provided they are separated and labeled in the Training Event/Task Listing column. Maintain AF Forms 4024 on the right side of AF Form 4022. An original AF Form 4024 is optional if a MAJCOM coordinated training guide is used to record training (see [paragraph A2.6](#)).

A2.4.1. Name. Enter the name of the individual in training.

A2.4.2. Crew Position. Enter the aircrew position to which they are qualifying, upgrading, or certifying to.

A2.4.3. Course or Phase of Training. Enter the ETCA formal course identifier, e.g., KC-135PTX1. For special mission qualification, enter the type and identify the method of training, e.g., OFT training, flying training, etc.

A2.4.4. Sortie. Enter sortie number e.g., S-1, S-2, CPT-1, etc.

A2.4.5. Date. Enter the date the written evaluation was satisfactorily completed.

A2.4.6. Training Event and Task Listing. Reflects the tasks and subtasks in the training program that require specific student performance or knowledge proficiency standards.

A2.4.7. Number Accomplished. Reflects the number of times an event was accomplished on that sortie.

A2.4.8. Grade. Enter a "B", "F," "P," "S," or "U," as appropriate.

A2.4.8.1. "B" Briefing item only.

A2.4.8.2. "F" Familiarization item; proficiency is not required. The OG/CC or delegate will determine whether "F" items are completed by briefing, demonstration, observation, or actual accomplishment.

A2.4.8.3. "P" Proficient; crewmember has achieved the required proficiency level.

A2.4.8.4. "S" Satisfactory; crewmember has not achieved the required proficiency level but progress is satisfactory.

A2.4.8.5. "U" Unsatisfactory; crewmember was previously proficient, but has regressed or progress is unsatisfactory.

A2.4.9. Total Number Required. Indicates the total repetitions of an event or task required by the course syllabus.

A2.4.10. Total Number Accomplished. Total of the number of repetitions actually accomplished.

A2.4.11. Required Proficiency Level (RPL). RPL for the specific event and task. Each event and task will have a performance standard designated for the required proficiency level the crewmember must achieve. In addition, each event and task may have (optional) a knowledge standard designated and used in the same manner as a performance standard. The standards for specific events are either listed in the applicable master task list (MTL) and evaluation standards document (ESD) for each weapon system or identified in this instruction. For those weapons systems that do not have any RPL listing, all events will have an RPL of “3” for performance and “C” for knowledge (if knowledge standards are used in addition to performance standards). **Exception:** One-time events required for familiarization and not listed in the MTL and ESD or specific weapon system instruction will not have performance and knowledge standard assigned. Performance and knowledge standards follow:

**Table A2.1. Event and Task Performance Standard.**

<b>Event and Task Performance Standard</b>		
<b>Code</b>	<b>Performance is:</b>	<b>Definition:</b>
1	Extremely Limited	Individual can do most activities only after being told or shown how.
2	Partially Proficient	Individual can do most of the behaviors, but not necessarily to the desired levels of speed, accuracy, and safety.
3	Proficient	Individual can do and show others how to do the behavior in an activity at the minimum acceptable levels of speed, accuracy, and safety without the assistance of an instructor. For MPD pilots, proficiency may involve actual aircraft control or pilot duties only. For instructors, proficiency includes the ability to demonstrate, instruct, and supervise ground and flight activity.
4	Highly Proficient	Individual can do behaviors in an activity at the highest level of speed, accuracy and safety.
<b>Event and Task Knowledge Standard</b>		
<b>Code</b>	<b>Knowledge of:</b>	<b>Definition:</b>
A	Facts and Nomenclature	Individual can identify basic facts and terms about the subject and when used with a performance code, can state nomenclature, simple facts, or procedures involved in an activity.
B	Principles and Procedures	Individual can explain relationship of basic facts and state general principles about the subject and when used with a performance code, can determine step-by-step procedures for sets of activities

C	Analysis, and Operating Principles	Individual can analyze facts and principles and draw conclusions about the subject and when used with a performance code, can describe why and when each activity must be done and tell others how to accomplish activities
D	Evaluation and Complete Theory	Individual can evaluate conditions and create new rules or concepts about the subject and when used with a performance code, can inspect, weigh, and design solutions related to the theory involved with activities.

A2.4.11.1. Regression. Once a crewmember has received “P” for an event, the only subsequent grades allowed for that event are either “P” or “U”. Regression occurs when a maneuver is graded “U” after having achieved “P” in the same task. Regression from a “P” to a “U” requires an associated remark on AF Form 4023 explanation in the student’s training folder. The overall grade is at the instructor’s discretion. For regression, the student will re-obtain proficiency prior to the end of the block of training in order to be recommended for an evaluation (when applicable) or certification (when applicable). Regression rules only apply to the training program that the student is currently enrolled in (i.e., an IQT graduate that starts MCT at their new assignment may be graded “S” on any training event that has not been previously graded “P”).

#### **A2.5. Instructions for AF FORM 4025.**

A2.5.1. For each training program complete a summary and close-out report, upon completion of the defined final training program events, including: Evaluation, IP “sign-off” and Sq/CC certification. This form summarizes the individual’s strengths, weaknesses, overall performance, and other pertinent information. Strengths and weaknesses should be a “Trend” (i.e., noted on at least two training reports). A copy of this report will be filed in the crewmembers training folder after completion of training (see [paragraph A2.1.5](#)).

A2.5.2. Sq/CC, Sq/DO or training Flt/CC will ensure the comments on AF Form 4025 do not reflect personal opinions or biases. All comments must be supported by information contained in the AF Forms 4023 and 4024 as applicable. At formal schools, the instructor will accomplish the AF Form 4025, Sq/CC signature is optional. Digital signatures are authorized. After one year, training offices should retain a copy of the AF Form 4025 in a permanent record and return the AF Form 4022 to the crewmember.

#### **A2.6. Aircrew Training Guides (TG).**

A2.6.1. The FTU ATS contractor will develop a TG. Units may also produce TGs, but must coordinate development through appropriate MAJCOM for approval.

A2.6.2. Initiating TG. Training and resource management personnel in each unit will initiate a TG on crewmembers prior to their entering any phase of qualification training. These TG will be inserted in AF Form 4022 and may be used in lieu of AF Forms 4023 and 4024. An original AF Form 4023 and 4024 are optional if a MAJCOM coordinated training guide is used to record training. Overprints cannot alter the original AF Forms 4023, 4024 and 4025. Altering these forms is not authorized without AMC/A3TA approval.

A2.6.3. Use of TG. Specific instructions for annotating training are included in each TG. TGs will be placed in an AF Form 4022 and maintained IAW [paragraph A2.1.1](#).

A2.6.3.1. Active status TG will be carried by the student during all training and operational missions and made available to the instructor for review and annotation. The student will review the TG and initial the training progress record prior to the next training period.

A2.6.3.2. Complete the training progress record portion of the TG in sufficient detail to specify areas of training accomplished, areas needing improvement, recommended specific study areas for the trainee, and recommended training for the next training period.

A2.6.3.3. On missions without an instructor or examiner, the senior qualified counterpart (e.g., AC for MPD pilots, etc.) will accomplish required training for those areas not requiring an instructor. Annotate applicable training information in the TG.

A2.6.3.4. When an initial qualification flight evaluation is not successfully completed and additional training is required, the training Flt/CC will annotate deficient areas on reproduced pages of the appropriate TG and training progress record. Place the mini-TG in the AF Form 4022 and used to document completion of additional training.

A2.6.3.5. At the conclusion of training, when all requirements of the TG are met, fill-out an AF Form 4025 IAW **paragraph A2.5**. Maintain TG and associated AF Form 4025 in a training folder according to **paragraph A2.1.5**.

A2.6.3.6. Do not maintain the training guide in the flight evaluation folder.

#### A2.6.4. Review Procedures:

A2.6.4.1. Instructors and students will review the TG after each training period and discuss training accomplished, problem areas, and immediate goals. To ensure documentation flow does not delay training, once flight training begins, ATS instructors are not required to review the training folder, and may forward subsequent training reports to the flightline unit training representative electronically (electronic signatures authorized), who will review and insert the report into the student's AF Form 4022. Except in cases of unsatisfactory student performance, ATS training reports do not require student or instructor review prior to the next flight training period.

A2.6.4.2. The training Flt/CC or a training flight representative will conduct a monthly review of TGs. This review will be indicated by entering initials and date in the review block of the TG.

A2.6.4.3. The Sq/CC or Sq/DO will review active TGs at least once each calendar quarter and before an evaluation. This review will be a separate entry on the TG and will include comments on weak areas and upgrade potential. Indicate review by signing the instructor-trainer block of the training progress record, and enter "quarterly review" in the training period identifier block.

A2.6.4.4. Records of crewmembers, not receiving training (but in an active status), will be reviewed monthly and quarterly as indicated above. If applicable, the statement, "no training accomplished during this period," the reason why, and the projected date when training will resume will be entered on the student's training progress record.

#### A2.6.5. Disposition of TGs:

A2.6.5.1. Retain each (completed) TGs in AF Form 4022 and maintain according to **paragraph A2.1.5.**

A2.6.5.2. Formal schools will maintain copies of the aircrew training records on incomplete trainees for 6 months.