Air Force Technical Manual Contract Requirements (TMCR)

for

Center Console Refresh (CCR)

(Program/Modification/Military System)

ATTACHMENT 1, TO CDRL SEQUENCE NUMBER ___A007_____, EXHIBIT
REQUEST FOR PROPOSAL/CONTRACT: _____, CLIN X029

Date: 7 July 2025

SECTION 1. TECHNICAL ORDER (TO) PROGRAM REQUIREMENTS – TMSS LINEAR TMS

1. TMCR Tailoring. Air Force (AF) TO Acquisition procedures, including procedures for tailoring this document, are found in TO 00-5-3, *AF Technical Order Life Cycle Management*, located at http://www.tinker.af.mil/Home/TechnicalOrders.aspx. Any terms or procedures found in this document may be researched at this website. The Contractor may propose and submit, in writing, additional tailoring to the Technical Order Manager Agency/Agent (TOMA), Government Program Manager (PM) and Procuring Contracting Officer (PCO) as required by Section L or the R Modifications to contracts can continue to utilize the existing format until renegotiated/replaced. The acceptance of any contractor tailored TMCR will be at the discretion of the government and is not in effect until accepted in writing by the PCO or specified in the contract.

2. TO Program Scope. The Contractor shall develop and deliver technical manual updates in accordance with (IAW) this TMCR that support the **Center Console Refresh** requirements for technically usable manuals concurrent with the program's TO CONOPS. The Contractor may propose and submit, in writing to the PCO, *additional Section 2 tailoring to propose new TO types (Table 1) and source data and TO updates (Table 2) required to support the* **Center Console Refresh** program's objectives and as defined by the TMSS. The acceptance of any additionally tailored TMCR will be at the discretion of the government and is not in effect until accepted in writing by the PCO.

3. Commercial Manuals. Government will not accept COTS manuals for flightline operations and maintenance on this effort. All Depot COTS manuals will be addressed as below.

3.1. All commercial manuals shall be delivered with either unlimited data rights or as a minimum, Government Purpose License, to allow the AF to electronically store, print, distribute and decollate the commercial manual to allow for printing.

3.2. Approved COTS Manuals shall be delivered with an Identifying TO Publication Sheet, IAW MIL-PRF-32216. All PDF files of commercial data shall be non-password protected to allow the AF to decollate the manual for printing.

3.3. If the proposed COTS data is found to be insufficient after review by the government, the contractor shall prepare supplemental data for the COTS manual as required IAW MIL-STD-38784. If the COTS data cannot be supplemented sufficiently the contractor may be tasked to develop new TM data IAW the applicable TMSS listed in Section 2 Table 1.

3.4. Depot activation technical data will be delivered for parts that AFMC/A4 identifies as core logistics required per 10 USC 2464 (wartime surge, enabling in-house technical depth, and post combat reconstitution).

4. Technical Manual Specifications and Standards (TMSS) Tailoring. AF TMSS tailoring options and some Joint Service TMSS have been documented in preliminary Specification/Standard Interface Records (SIRS) included in Section 3. These preliminary SIRs provide the starting point for further tailoring. Contractors may recommend additional tailoring of the Joint Service TMSS SIRs and provide recommended SIRs for other TMSS as applicable. Tailoring must not change or delete mandatory requirements which are part of the Document Type Definition (DTD) located in Section 2, Table 1.

4.1. Questions concerning TMSS requirements may be submitted in writing with suggestions for resolution and supporting information to the PCO and Richard McCormick, AFLCMC/WLTC, 3001 Staff Drive Post2AC2 94A, Tinker AFB OK, 73145, 405-736-1865. Deficiencies and suggested improvements may be submitted to the TMSS Preparing Activity (PA). Recommendations, corrections and clarifications approved by the PCO, if any, will be maintained with contract documentation.

4.2. For new Reference Designators or questions for wiring diagrams please contact the TOMA.

5. Subsequent TO/Data Requirements. When new TO requirements are identified the Contractor shall notify the Government utilizing DI-TMSS-80067C, *Technical Manual (TM) Contractor Furnished Aeronautical Equipment or Contractor Furnished Equipment (CFAE/CFE) Notices*, or approved Contractor formats. This process requires Government review and approval of recommended additional requirements prior to developing additional data.

6. TO Development. TO updates shall be written to a scope and depth of coverage to support the **Center Console Refresh** flightline operations and maintenance concepts and depot repair and overhaul.

6.1. All TO updates will be delivered per table 2.

6.2. Depot activation technical data will be delivered for parts that AFMC/A4 identifies as core logistics required per 10 USC 2464 (wartime surge, enabling in-house technical depth, and post combat reconstitution).

7. TO Numbering. Contractors shall notify the Government, in writing, of manuals which require TO numbers. TO numbers are not required for manuals to be used exclusively by the Contractor's own personnel. Requests for new TO numbers must be submitted to the TOMA utilizing the TO numbering worksheet (Attachment 2, *Request for Technical Order Number*).

8. Data Rights. Contractors must comply with 10 USC 3771 and Defense Federal Acquisition Regulation Supplement (DFARS) provisions and clauses. The Government's rights in technical data are specified in DFARS 252.227-7013, *Rights in Technical Data-Noncommercial Items*, 252.227-7014, *Rights in Noncommercial Computer Software and Noncommercial Computer Software Documentation*, and 252.227-7015, *Technical Data-Commercial Items* and other applicable provisions and clauses from DFARS 227, 252.227 and DFARS 252.227-7018 *Rights in Noncommercial Technical Data and Computer Software – Small Business Innovation Research (SBIR)*. In accordance with those clauses and provisions, the Contractor grants the Government Unlimited Rights, as defined therein, in all source data, TO publications, TO updates and TO-related documents prepared specifically for the contract. The Contractor also grants the Government Unlimited Rights in all Government-funded business rules (tailoring, and application methods and procedures) and documented business processes developed under the contract for the purpose of TO development. The contractor is required to deliver TO data with the data rights license required by the applicable DFARS clauses. Contractor must identify any data to be delivered to the Government with other than Unlimited Rights IAW DFARS 252.227-7017, *Identification and Assertion of Use, Release, or Disclosure Restrictions* and must mark such data only in accordance with

the applicable DFARS clause. The Contractor must pass through and enforce all requirements in this TMCR to all sub-Contractors.

All TO source data and updates will be delivered with unlimited rights.

9. Classification, Distribution, Destruction, Disclosure, Export Control Notices, and Cyber Security. Contractors shall recommend the correct markings and controls for classified and restricted distribution data and TOs IAW the program's Security Classification Guide (SCG) and Department of Defense Manual (DODM) 5200.01V2_AFMAN 16-1404V2, Department of Defense Instruction (DODI) 5230.24, Department of Defense Directive (DODD) 5230.25, DoDI 5200.48, *Controlled Unclassified Information*, DAFI 61-201, *Management of Scientific and Technical Information* (STINFO) and MIL-STD-38784 (available at http://www.e-publishing.af.mil/ https://www.esd.whs.mil/DD/admin_inst/,or https://assist.dla.mil/online/start/index.cfm). The markings and notices must be reviewed during In-Process Reviews (IPR). The Contractor shall also apply policy and procedures for *Cybersecurity Program Management* IAW AFI 17-130, AFMAN 17-1301, *Computer Security (COMPUSEC)* **NOTE:** Distribution limitations will be determined on a case-by-case basis as TOs are developed, dependent upon TO content.

10. TO Quality the Contractors shall ensure prepared TOs and TO updates are: a) technically accurate and safe; b) written to a scope and depth of coverage to support the depot and flightline operations and maintenance concepts; c) properly classified and marked with export control and distribution limitation statements. The Contractor shall maintain a Technical Manual Quality Assurance (TMQA) Program Plan for this effort. The TMQA Program Plan shall be available for review at the TO Guidance Conference. The TMQA Program Plan shall be sufficiently detailed to support TO certification to include actual performance of procedures or desk-top analysis for non-procedural data. Simulation (walk-through/talk-through) should be reserved for those procedures which would activate explosive devices or present a hazard to personnel or equipment.

10.1. Initial Technical Order Guidance Conference (TOGC). Working through the TOMA, the Contractor shall co-host and participate in a guidance conference for this effort. The TOGC will be held within 30 business days after contract award, can be held in conjunction with the program kick off meeting. The Technical Manual Schedule and Status will be formalized at this conference. The Contractor shall present a briefing on their interpretation of the basic contract, SOW (Statement of Work), CDRLs, DIDs, MIL-SPEC, MIL-DTL, MIL-STD, SIRs, this document and the planned preparation and delivery of the TOs and related data.

10.2. Incremental Deliveries/In-Process Reviews. The Contractor Shall participate and co-chair Incremental Deliveries/In-Process Reviews (IPR) of the data developed for this effort. Incremental Deliveries/In-Process Reviews are to ensure that data being developed as part of this effort is adequate and accurate and IAW contract requirements and cited specifications. The Contractor shall ensure that all appropriate personnel required to execute a successful TO program will either attend or participate in the IPR. IPRs will be held IAW TO 00-5-3 or as defined by the program office. During the IPRs the Contractor will be responsible to maintain a master markup of the documents being reviewed. The Contractor shall develop meeting minutes after each review documenting all approved changes and concurrent agreements for Government review and approval. This master markup will be made available at the next scheduled review. A copy of the markup will be provided to the TOMA or designated individual at the conclusion of the review. The Contractor shall ensure all comments from previous IPRs have been incorporated prior to the next scheduled IPR. With prior approval of the TOMA, IPRs may be combined.

The IPRs will start 30 days after the design requirements are set and approved by the government. The contractor shall provide/deliver incremental deliveries as they complete developed TOs/Chapters

after each event for government review and comments. Each IPR will ensure the TO updates are at the percentage they should be per the IPR Requirements table 4. The contractor shall continue to update the same document after delivery. The contractor shall ensure configuration control by using a new date on the TO/Chapter with each delivery.

The Government shall have access to the Contractors TO Development System.

The IPR schedule will be in concert with the incremental deliveries and included on the Integrated Master Schedule, to be reviewed and concurred at the TO Guidance Conference along with the TMSS.

Depot activation technical data may drive additional IPRs based on what parts AFMC/A4 identifies as core logistics required per 10 USC 2464 (wartime surge, enabling in-house technical depth, and post combat reconstitution).

10.3. TO Delivery Requirements for Incremental Reviews/ In-Process. IPR TO data must be technically edited and reviewed according to the TMQA Program Plan. Manuscript (handwritten) data is not acceptable for any data to be reviewed. The TMQA Program Plan checklists must be available for review by the Government during the IPRs. Delivery requirements are contained in Section 2, Table 3 of the TMCR. At each IPR all manuals will be reviewed per table 4, IPR requirements.

Incremental Deliveries will be informal deliveries by chapter to ensure data is correct. The incremental deliveries will allow the data to be written and developed faster. Incremental Deliveries of the chapters will be delivered through LCMP or the system approved by the TOMA.

IPR and Incremental deliveries shall be delivered in Word fo each manual/chapter updated.

TABLE 4: IPR REQUIREMENTS

TECH ORDER SECTION	IPR 1	IPR 2	IPR 3	IPR 4
-- ALL TOs—(except IPB)	Percent Complete			
Cover/Title Page with TO number	100%			100%
List of Effective Pages (Front Matter)	-	75%	100%	100%
Verification Status Page (Front Matter)	-	75%	100%	100%
Table of Contents (Front Matter)	-	75%	100%	100%
List of Illustrations (Front Matter)	-	75%	100%	100%
List of Tables (Front Matter)	-	75%	100%	100%
Introduction	100%	75%		100%
Safety Summary (as applicable)	50%	75%		100%

any missing chapter/sections	25%	50%	75%	100%
--MAINTENANCE TOs--				
List of Illustrations	25%	50%	75%	100%
List of Tables	25%	50%	75%	100%
Introduction	25%	50%	75%	100%
Safety Summary	25%	50%	75%	100%
General Information	25%	90%	100%	100%
All Maintenance Chapters	25%	50%	75%	100%
Installation	25%	70%	100%	100%
Preparation for Use and Reshipment	25%	70%	100%	100%
Operation	25%	70%	100%	100%
Theory of Operation	50%	50%	75%	100%
Maintenance including Checkout and Troubleshooting	25%	75%	100%	100%
Associated Checklists	25%	50%	75%	100%
--CIRCUIT DIAGRAMS WITH WIRE LIST TOs--	100%	50%	75%	100%
Standard IC Symbols (ANSI COMPLIANT)	-	75%	100%	100%
Cross Reference Index	25%	75%	100%	100%
Wire List	25%	75%	100%	100%
Schematics	25%	50%	75%	100%
any missing chapter/sections	25%	50%	75%	100%
INSPECTION MANUALS/ workcards				
All chapters	25%	50%	75%	100%
--ILLUSTRATED PARTS BREAKDOWN—(IPB)				
Cover/Title Page with TO Number	100%	50%	75%	100%
List of Effective Pages	25%	50%	75%	100%
Table of Contents	25%	50%	75%	100%
Forward	100%	50%	75%	100%
Maintenance Parts List	35%	50%	75%	100%
Numerical Index	25%	50%	75%	100%
Reference Designator Index	25%	50%	75%	100%

any missing chapter/sections	25%	50%	75%	100%
Usable Oncode	25%	50%	75%	100%
SM&R code	25%	50%	75%	100%
WORK UNIT CODES (WUC)				
Table of Contents	25%	50%	75%	100%
Introduction	25%	50%	75%	100%
any missing chapter/sections	25%	50%	75%	100%
FLIGHT MANUALS				
Title	100%			
List of Effective Pages	25%	50%	75%	100%
Front Matter	25%	50%	75%	100%
Section II- Normal and Alert Procedures	25%	50%	75%	100%
Section III- Emergency Procedures	25%	50%	75%	100%
Section IV-Crew Duties	25%	50%	75%	100%
Section V-Limitations	25%	50%	75%	100%
Section VI- Flight Characteristics	25%	50%	75%	100%
Section VII- Adverse Weather Operations	25%	50%	75%	100%
Section VIII- Air Refueling (Reciever)	25%	50%	75%	100%
Glossary	25%	50%	75%	100%
Index	25%	50%	75%	100%
any missing chapter/sections	25%	50%	75%	100%
FANFOLDS (entire checklist)				
Title	100%			
Checklist	25%	50%	75%	100%
Normal Procedures	25%	50%	75%	100%
Alert Procedures	25%	50%	75%	100%
Systems Procedures	25%	50%	75%	100%
Emergency Procedures	25%	50%	75%	100%
Performance Data	25%	50%	75%	100%

Air Refueling Procedures (Receiver)	25%	50%	75%	100%
any missing chapter/sections	25%	50%	75%	100%
FLIGHT MANUAL CHECKLIST				
Title	100%			
Normal Procedures	25%	50%	75%	100%
Alert Procedures	25%	50%	75%	100%
Systems Normal Operations	25%	50%	75%	100%
Emergency Procedures	25%	50%	75%	100%
Air Refueling Operations (Receiver	25%	50%	75%	100%
Check Flight	25%	50%	75%	100%
TCTO				
Entire TCTO	25%	50%	75%	100%
Depot Maintenance				
Depot Level Maintenance and Overhaul	25%	50%	75%	100%
Cover/Title Page with TO Number	100%	50%	75%	100%
List of Effective Pages (Front Matter)	25%	50%	75%	100%
Verification Status Page (Front Matter)	25%	50%	75%	100%
Table of Contents (Front Matter)	25%	50%	75%	100%
List of Illustrations (Front Matter)	25%	50%	75%	100%
List of Tables (Front Matter)	25%	50%	75%	100%
Standard IC Symbols (ANSI and NEMA)	25%	50%	75%	100%
Introduction	25%	50%	75%	100%
Safety Summary (as applicable)	25%	50%	75%	100%
Special Tool and Test Equiment	25%	50%	75%	100%
Disassembly	25%	50%	75%	100%
Cleaning	25%	50%	75%	100%
Inspection Repair and Replacement	25%	50%	75%	100%
Assembly	25%	50%	75%	100%
Accessories	25%	50%	75%	100%
Testing	25%	50%	75%	100%

Table of limits	25%	50%	75%	100%
Fault Isolation/Troubleshooting	25%	50%	75%	100%
Wire List/Schematics	25%	50%	75%	100%
Illustrated Parts Breakdown (IPB)	25%	50%	75%	100%
Maintenance Parts List	25%	50%	75%	100%
Numerical Index	25%	50%	75%	100%
Reference Designator Index	25%	50%	75%	100%

10.4. TO Certification. The Contractor shall certify that new TO procedures and data developed to support the program are accurate, adequate, current, safe, and usable for their intended purpose. The Government may witness the certification activities. The Contractor shall incorporate comments generated by the certification process into the TOs prior to submitting the TOs for verification. At the completion of the certification, the Contractor shall submit a letter to the TOMA through the Government PCO and PM stating that certification has been completed, the certification method used, and that any deficiencies identified during the process have been corrected. The Contractor shall ensure all necessary changes and corrections to affected manuals are accomplished in time to meet contract delivery schedule requirements. The Contractor shall notify the Government, as identified in the contract, at least 180 days prior to the need date, of any Government Furnished Property (GFP), Government Furnished Information, and/or Government Furnished Equipment (GFI/GFE) as required, to perform certification tasks. TO 00-5-1 and TO 00-5-3 must be referenced for additional information on TO Certification requirements.

10.4.1. The Contractor shall propose opportunities to perform TO certification activities in conjunction with Government verification IAW TO 00-5-3, where applicable.

10.5. Verification Support. The Contractor shall support Government verification activities as required by the TOMA and the program Technical Order Life Cycle Verification Plan (TOLCVP). Contractor verification support will consist of on station technical writing and engineering support. The Contractor shall maintain a master mark-up of the document and record minute items during the Government verification process. The Contractor shall also support all post verification reviews and ensure availability until 100% task verification is attained by the Government.

The Contractor shall incorporate a Verification Status Page at the front of each manual until all tasks are verified. VSP example is located in the MIL-STD 38784.

10.6. TO Prepublication Reviews (PPR). PPRs are examinations of TOs that ensure incorporation of agreed upon changes from previous reviews and verification activities. The Contractor shall prepare and deliver copies of TOs and TO updates in MIL-SPEC compliance for the PPR as shown in the delivery matrix. The TOs for PPR must be approved by the Contractor's QA, be in compliance with the MIL-SPECs/DTLs/STDs, and incorporate all verification comments and corrections approved by the TOMA or program management office representative.

11. TO Delivery. TO file delivery requirements are located in Section 2, Table 3 of this document.

12. Source Data Maintenance. Contractors shall maintain accuracy, currency and configuration of TO source data, to include GFI, throughout the contract period of performance. The Contractor shall provide the Government a Configuration Control Management Plan that will be approved by the government to include incremental deliveries. The Contractor shall provide a minimum of annual updates throughout the life of the contract as directed in writing from the PCO. Maintenance includes preparation of source data updates to incorporate corrections, equipment configuration changes, and maintenance and operational concept changes. Additionally, the Contractor shall ensure the accuracy, currency, and configuration of applicable data provided by their sub-Contractors as it effects the technical baseline. The contractor shall have the Configuration Control Management Plan available at the TO Guidance Conference.

NOTE: Contractors will protect GFI provided for the purposes of TO development IAW DFARS 252.204-7000 *Disclosure of Information* and DFARS 252.227-7025, *Limitations on the Use or Disclosure of Government Furnished Information Marked with Restrictive Legends.*

13. TO Maintenance. Contractors shall maintain TOs by preparing emergency, urgent, routine changes/revisions or supplements and source data updates to incorporate corrections, equipment configuration changes, and maintenance and operational concept changes IAW TO 00-5-3. The Contractor shall assist the Government, where applicable, by incorporating and delivering approved changes to the technical data in the field NLT the specified time limits within TO 00-5-3 for Urgent, Work Stoppage, or Emergency changes originating from an approved Recommended Change (RC) process and/or Publication Change Request (PCR) in the Enhanced Technical Information Management System (ETIMS). In the event of non-ETIMS access AFTO FORM 22, 252 policy or other approved change request forms processes will be adhered to. The specified time limits upon receipt of specified change requests are 40 calendar days for urgent changes/revisions, 72 hours for work stoppage changes/revisions, and 48 hours for emergency changes/revisions.

14. Schedules. The Contractor shall develop and maintain an Integrated Technical Manual Schedule and Status throughout the period of performance for all TO development activities associated with this order for the life of the contract. The schedule must be to the system/book or TCTO level and cover all incremental deliveries, in-process reviews and major milestones of development. Any changes to the TM Schedule and Status after the TO Guidance Conference must be coordinated with and approved by program TOMA and PCO.

1C-135-8-1 final will be delivered at the same time as the program black label software

15. Time Compliance Technical Orders (TCTOs). The Contractor shall prepare TCTOs, ITCTOs and resulting TO updates as required in support of **Center Console Refresh** IAW TO 00-5-15 and MIL-DTL-38804 content requirements. TCTOs will be used to document all permanent modifications, initiate special "one time" inspections, or impose temporary restrictions on systems or equipment within specified time limits effecting **Center Console Refresh**. Costs for TCTO package development must be IAW with AFI 65-601Vol.1.

15.1. The Contractor must deliver certified drafts of Immediate Action TCTOs to meet program office plans to satisfy requirements outlined in TO 00-5-3/00-5-15. The Contractor must deliver drafts with comments incorporated within 24 hours of receipt of comments.

15.2. The Contractor must deliver initial certified drafts of Urgent Action TCTOs to meet program office plans to satisfy requirements outlined in TO 00-5-3/00-5-15. The Contractor must deliver final drafts with "final" customer comments incorporated, within 96 hours of receipt of comments.

15.3. The Contractor must deliver initial certified drafts of routine safety TCTOs to meet program office plans to satisfy requirements outlined in TO 00-5-3/00-5-15. The Contractor must deliver

final drafts with “final” customer comments incorporated, within 5 business days of receipt of comments.

15.4. The Contractor must deliver certified drafts of routine TCTOs to meet program office plans to satisfy requirements outlined in TO 00-5-3/00-5-15. The Contractor must deliver final drafts with “final” customer comments incorporated, within 10 business days of receipt of comments.

SECTION 2. TM TYPE AND DELIVERY REQUIREMENTS

NOTES:

- The TO updates will be delivered in the Word version the government is using.

(NEW DEVELOPMENT) TM TYPE (PUBLICATION) SELECTION TABLES.

Table 1
TMSS Requirements for the Center Console Refresh Program
(System/Component)

Title or Type of Manuals	Specification	Required
1. Inspection TOs	MIL-DTL-5096	
a. Inspection and Maintenance Requirements (-6) Manual		☒
b. Acceptance and Functional Check Flight (FCF) Procedures (-6CF) Manual		☒
c. Acceptance and Functional Check Flight (-6CL) Checklist		☒
d. Inspection Work cards (-6WC)		☒
e. Maintenance/Operations Checklists		☒
2. Cargo Aircraft Loading and Offloading TOs	MIL-DTL-5288	
a. Loading Instructions Manual		☐
b. Nuclear Weapon Cargo Loading Manual		☐
c. Checklists		☐
3. Flight Operation Manuals	MIL-DTL-7700	
Flight Manuals		
a. Flight Manual		☒
b. Performance Data Manual		☒
c. Mission Crew Manual and Associated Checklists		☐
d. Fanfold Checklists		☒
e. Supplemental Manual		☒
f. Abbreviated Flight Crew Checklist		☒
g. Non-nuclear Weapon Delivery Manual		☐
h. Aircrew Nuclear Bomb Delivery Manual (Strategic Bomber Aircraft)		☐
i. Aircrew Nuclear Missile Delivery Manual (Strategic Bomber Aircraft)		☐
j. Aircrew Nuclear Bomb Delivery Manual (Tactical Aircraft)		☐
k. Non-nuclear Weapon Delivery Checklist		☐
l. Nuclear Weapon Delivery Checklist (Strategic Bomber Aircraft)		☐
m. Aircrew Nuclear Bomb Delivery Checklist (Tactical Aircraft)		☐
n. Non-nuclear Weapon Delivery Source Data Packages		☐
Weight and Balance (Aircraft)		

Table 1
TMSS Requirements for the Center Console Refresh Program
(System/Component)

Title or Type of Manuals	Specification	Required
a. Loading Data Manual		☒
b. Sample Basic Weight Checklists		☐
4. List of Applicable Publications	MIL-DTL-8031	☐
5. Structural Repair Manuals (for Aircraft)	MIL-DTL-9854	☒
6. Munitions/Weapons Loading Procedures, Non-nuclear and Nuclear TOs	MIL-DTL-9977	
a. Nuclear Weapons Basic Information and Loading Procedures		☐
b. Nuclear Weapons Loading Procedures		☐
c. Non-nuclear Munitions Basic Information		☐
d. Non-nuclear Loading Procedures		☐
e. Non-nuclear Munitions Loading Standard Data Packages (SDPs)		☐
f. Loading Procedures Checklist		☐
g. Single Loading Procedures Checklist		☐
h. Integrated Loading Procedures Checklists		☐
i. Family Group Loading Procedures Checklist		☐
j. Nuclear Weapons Loading Procedure Checklists		☐
k. Functional Check Procedures Checklist		☐
l. NATO Stage B Cross-Servicing Checklists		☐
m. End of Runway (EOR) Procedures Checklist		☐
7. Space Operation and Support Documentation (Intercontinental Ballistic Missiles)	MIL-PRF-38311	☐
8. Work Unit Code Manual	MIL-DTL-38796	
a. Standard WUC Manual		☒
b. Two Chapter Manual		☐
c. Three Chapter Manual		☐
9. Calibration Procedures	MIL-DTL-38793	☐
10. Time Compliance Technical Orders (TCTOs)	MIL-DTL-38804	
a. TCTO		☒
b. TCTO Supplement		☒
11. Aircraft Battle Damage Assessment and Repair TOs	MIL-DTL-87158	☒
12. Illustrated Parts Breakdown	MIL-DTL-38807	☒
13. On-Equipment Organizational Maintenance Manual Set	MIL-DTL-83495	
a. General Equipment (GE) Manual		☐
b. General System (GS) Manuals		☐
c. Combined GE & GS Manual		☒
d. Job Guide (JG) Manuals		☐
e. Fault Reporting (FR) Manual		☐
f. Fault Isolation (FI) Manual		☐
g. Wiring Data (WD) Manual		☒

Table 1
TMSS Requirements for the Center Console Refresh Program
(System/Component)

Title or Type of Manuals	Specification	Required
h. Schematic Diagram (SD) Manual		☐
14. Operation and Maintenance Instructions in Work Package Format	MIL-DTL-87929	
a. Maintenance Manuals		☐
(1) Organizational Maintenance		☐
(2) Intermediate Maintenance		☐
(3) Depot Maintenance		☒
(4) Combined (I&D) Maintenance		☐
(5) On Condition Maintenance		☐
b. Operation & Maintenance Instruction Manuals		☐
c. Special Manuals		☐
(1) Aircraft Engine Testing and Trending Procedures		☒
(2) Aircraft Power Package Testing Procedures		☒
(3) Static Firing of Missile Motors		☐
(4) System Peculiar Corrosion Control		☐
(5) Nondestructive Inspection (NDI)		☒
(6) Aircraft Structural Integrity Program (ASIP)		☒
(7) ATE Operator Test Procedures		☐
(8) Special Requirements for Storage and Maintenance Procedures; AUR Munitions/Launchers and Associated Support Equipment, Conventional Components and CMBR Agents		☐
(9) Parachute Packing Procedures		☐
(10) Operators Instructions (Hand-Held Flight Computers)		☐
(11) Installation-Engineering Facility (Ground C-E Equipment)		☐
d. Checklists (IAW MIL-DTL-5096)		☐
e. With Illustrated Parts Breakdown		☐
15. Commercial Manuals (Evaluate according to MIL-PRF-32216)		☒
16. Aircraft Cross-servicing Guide	MIL-DTL-22202	☐

TABLE 2

SUSTAINMENT/MODIFICATION UPDATES TM TYPE SELECTIONS

NOTES:

- **The Contractor shall recommend any additional TOs/Flight Manuals that need to be updated**
- **All specifications will be in table 1 for each manual**
- **Government will provide TCTO template at TOGC**
- **Depot activation technical data will be delivered for parts that AFMC/A4 identifies as core logistics required per 10 USC 2464 (wartime surge, enabling in-house technical depth, and post combat reconstitution).**
- All delivery requirements are in table 3.

TO Number	Specification	Change	Source Data	
1C-135-2-11-40			WORD	
1C-135-2-11-40-1				
1C-135-2-11-40-2				
1C-135-2-11-40-3				
1C-135-2-11-40-4				
1C-135-2-11-40-5				
1C-135-2-11-40-6				
1C-135-2-11-40-7				
1C-135(K)R(II)-1				
1C-135(K)R(II)-1CL-1				
1C-135(K)R(II)-1CL-1-1				
1C-135(K)R(II)-1CL-2				
1C-135(K)R(II)-1CL-2-1				
1C-135(K)(I)-1				
1C-135(K)R-1-1				
1C-135-6CF-1				
1C-135-6CL-1				
1C-135-6CL-2				
1C-135-6CL-3				
1C-135-4				
1C-135-4-2				
1C-135-4-4				
1C-135-4-5				
1C-135-4-7				
1C-135-4-8				
1C-135-4-9				
1C-135-4-10				
1C-135-4-11-3				
1C-135-4-11-4				
1C-135-4-11-7				
1C-135-4-13				

1C-135-2-2-2				
1C-135-2-2CL-1-1				
1C-135-2-2CL-2-1				
1C-135-2-2CL-2-2				
1C-135-2-2CL-2-3				
1C-135-2-4-2				
1C-135-5-1				
1C-135-2-5				
1C-135-2-6-1				
1C-135-2-7-1				
1C-135-2-10				
1C-135-6CL-1				
1C-135-6CL-2				
1C-135-6CL-3				
1C-135-06				
1C-135-6				
1C-135-6WC-1				
1C-135-6WC-5				
1C-135-8-1				
1C-135-38				
1C-135(K)R-2-12-2				
1C-135(K)R-2-12-1				
1C-135-3-10				
1C-135-2-13-1				
1C-135-2-16-1				
1C-135-WA-1-XXXX			TCTO/WORD	

TABLE 3 – LINEAR TM DELIVERY REQUIREMENTS

FOR __CENTER CONSOLE REFRESH

(System/Item)

NOTES:

- All SGML file delivers MUST include ALL graphic files.
- All TO files must not be password protected.

If "Other" is selected, define media type and quantities: ___Word___

DELIVERY SCHEDULE				
Event ⇨Number of days data required **prior** to event ⇨	In Process Review(s) (15 Days)	Verification (30 Days)	Prepublication Review (30 Days)	Final TO Distribution
⇩Enter physical mailing address, electronic delivery location or web access point ⇩	1C-135-8-1 final will be delivered at the same time as the program black label software			
TOMA ELECTRONIC	Paper/ SGML/ IPDF / X XML / Other/	Paper/ SGML/ IPDF / X XML / Other/	Paper/ SGML/ IPDF / X XML / Other/	Paper/ SGML/ X IPDF / XML / Other/ X
	Paper/ SGML/ IPDF / XML / Other/	Paper/ SGML/ IPDF / XML / Other/	Paper/ SGML/ IPDF / XML / Other/	Paper/ SGML/ IPDF / XML / Other/
	Paper/ SGML/ IPDF / XML / Other/	Paper/ SGML/ IPDF / XML / Other/	Paper/ SGML/ IPDF / XML / Other/	Paper/ SGML/ IPDF / XML / Other/
	Paper/ SGML/ IPDF / XML / Other/	Paper/ SGML/ IPDF / XML / Other/	Paper/ SGML/ IPDF / XML / Other/	Paper/ SGML/ IPDF / XML / Other/
Total Copies Required:				

SECTION 3. SPECIFICATION/STANDARD INTERFACE RECORDS (SIRS)

NOTES:

- **All TMSS applicable to this contract** shall have an appropriately tailored SIR attached to this section.
- SIRs included in the untailored TMCR format represent the minimum tailoring requirements that must be included in the final contract, **unless the entire SIR is not applicable**; e.g., if MIL-DTL-22202D is not required, the entire SIR can be deleted.
- Utilize the TMSS Tailoring Tool located at https://techdata.wpafb.af.mil/tmss/index.html by selecting all applicable TMSS requirements, and the desired tailoring options expressed in paragraphs 6.2. Attach the TMSS Tailoring Tool spreadsheet output in the specified section listed below.
- Unless otherwise indicated, copies of federal and military specifications, standards, and handbooks are available from Acquisition Streamlining and Standardization Information System (ASSIST) web page, https://assist.dla.mil/online/start/index.cfm.
- TMSS entries designated with A, F, M or N refer to Army, Air Force, Marine Corps or Navy requirements.
- Comments (recommendations, additions, deletions) and any pertinent data which may be in use in improving Air Force TMSS documents should be submitted to AFLCMC/HIS, 4170 Hebble Creek Road, Bldg. 280, Door 15, Area A, Wright-Patterson AFB, Oh 45433-5653 or by email to; SGMLsupport@us.af.mil. Do not include the street address, a building number or a zip+4.

SPECIFICATION/STANDARD INTERFACE RECORD FOR MIL-DTL-22202D, 31 March 1999
Supplement 1, 31 March 1999
Manual, Technical, Aircraft Cross-Servicing Guide,
Preparation of

The requirements of 6.2 are met in this SIR (see below).

1.1 In addition to paper delivery, when this specification is used to develop digital delivery files (document type definitions – DTDs) contact the PA for additional instructions.

2.3 Ensure the listing for STANAG/ASCC Air Standard Documents is current. List applicable STANAG/ASCC Air Standards below.

(List STANAG/ASCC Air Standard Documents here.)

2.2.1 (Added) "Other Government documents, drawings, and publications."

DEPARTMENT OF DEFENSE

DODM 5200.01_AFMAN 16-1404	DOD Information Security Program
DOD 5220.22-M	National Industrial Security Program Operating Manual

4. Replace with: "4. **VERIFICATION."**

"All cross-servicing guides must meet the requirements of sections 3 and 5 of this specification, as required by the acquiring activity. The requirements set forth in this specification must become a part of the Contractor's overall inspection system or quality program. The absence of any requirements in this specification must not relieve the Contractor of the responsibility of ensuring that all products or supplies submitted to the Government for acceptance comply with all requirements of the contract. Use of sampling inspections must be at the discretion of the Contractor, and in accordance with commercially acceptable quality assurance procedures. However, use of sampling in QA procedures does not authorize submission of known defective material, either indicated or actual, nor does it commit the Government to accept defective material."

5. Replace with: "5. **PACKAGING."**
"5.1 Packaging Requirements. For acquisition purposes, the packaging requirements must be as specified in the contract or order. When the actual packaging of material is to be performed by DoD personnel, these personnel need to contact the responsible packaging activity to determine packaging requirements. Packaging requirements are maintained by the Inventory Control Point's packaging activity within the Military Department's System Command. Packaging data retrieval is available from the Military Department's or Defense Agency's automated packaging files, CD-ROM products, or the responsible packaging activity."
"5.1.1 Encoded Computer Products. Packaging of encoded computer products for delivery must be in accordance with the requirements of MIL-STD-1840C, Automated Interchange of Technical Information."
"5.1.2 Classified Material. Classified material must be packaged and identified in accordance with DODM 5200.01_AFMAN 16-1404, DOD 5220.22-M, and the implementing Service regulations."

6.2a Title, number, and date of the specification are listed above.
6.2b Issue of DODISS: (*fill in issue of DODISS applicable to this contract*)
6.2c Packaging requirements (see above).
6.2d Verification requirements (see above).

Specification/Standard Interface Record for *(program name)*

The TMSS Tailoring Tool will be used to specify all Project SIR 6.2 options. It can be accessed utilizing the following URL https://techdata.wpafb.af.mil/tmss/index.html. ***The user will attach the output of the tailoring tool under the Project SIR Requirements heading listed below.***

PROJECT SIR REQUIREMENTS

ATTACHMENT 1

Graphics Format Guidelines

(Tailor this Attachment to acceptable Program Formats)

GENERAL GUIDELINES:

- Single column graphics should not exceed 51 Picas High by 20 Picas Wide. (Paper only)
- Full page graphics should not exceed 51 Picas High by 42 picas Wide. (Paper only)
- Fold Out graphics should not exceed 51 Picas High (width on foldouts is not important). (Paper only)
- PNG graphics will not run with the Air Force software utilized to parse SGML files.
- Avoid creating art as PNG and saving in various formats which will fail.

Encapsulated Post Script (EPS):

- Raster based images will not be saved as EPS.
- EPS files must not be a mix of vector and raster images. Vector only.
- Any source data (photos used for tracing etc.); used in aiding of creation of EPS (templates, etc.) will be deleted from illustration prior to saving/exporting.
- If multiple layers are used, then image is to be flattened into 1 single layer before exporting to minimize file size and reduce possible printing issues.

Tagged Image File Format (TIFF):

- Black and white raster images should only be saved as Bitmap and not Grayscale, RGB or CMYK.
- Grayscale or Color images (screenshots, etc.) will be saved as such (Grayscale, RGB or CMYK) and will not be bitmap converted using a halftone screen.
- To further aid in file size reduction for storage purposes, images should be compressed using Group 4 compression when saving/exporting.

Computer Graphics Metafile (CGM):

- Raster based images will not be saved as CGM.
- Any source data used in aiding of creation of CGM (templates, etc.) will be deleted from illustration prior to saving/exporting.
- CGM files must not be a mix of vector and raster images. Vector only.
- If multiple layers are used, then image is to be flattened into 1 single layer before exporting to minimize file size and reduce possible printing issues.
- Unless Version 4 is specifically required for hotspots and/or hyper linking, CGMs should be exported as version 3 to increase cross platform compatibility.

DWG File Format:

- Raster based images will not be saved as DWG.
- DWG files must not be a mix of vector and raster images. Vector only.
- Any source data used in aiding of creation of DWG (templates, etc.) will be deleted from illustration prior to saving/exporting.
- If multiple layers are used, then image is to be flattened into 1 single layer before exporting to minimize file size and reduce possible printing issues.

Joint Photographic Expert Group (JPEG): (Caution: JPEG 2000 files are not to be used at all due to platform display issues.)

- JPEG File format should be used as last resort. Color screenshots/photos should be saved as TIFFs due to possible system compatibility issues.
- B&W Bitmaps should not be saved as JPEGs.

Portable Network Graphics (PNG):

- Used for raster graphics
- Supports lossless data compression
- PNG files do not run thru the parser for the SGML files.

Bitmap (BMP):

- Used for raster graphics

Scalable Vector Graphic (SVG)

- Two-dimensional vector and mixed vector/raster graphics

ATTACHMENT 2
REQUEST FOR TECHNICAL ORDER NUMBER

1. ***PRIME SYSTEM APPLICATION** (If Applicable or N/A)_____
2. ***CONTRACT NUMBER/PURCHASE REQUEST (PR) NUMBER:** _____
3. ***MISSION DESIGN SERIES/NOMENCLATURE** (Name Of Equipment) _____
4. ***FEDERAL STOCK CLASS:**_____
5. ***PART NUMBER**(s):_____
6. ***NSN/FSN:** (or temp NSN) _____
7. ***PUBLICATION TYPE** (Opn & Maint with IPB, Overhaul, WUC, IPB, LOAP, etc.)

_____

8. ***SUGGESTED TECHNICAL ORDER NUMBER**:_____
9. ***RECOMMENDED TITLE OF MANUAL (Leave Blank if Classified)** _____

_____

_____

10. ***CLASSIFICATION OF MANUAL**: _____
11. ***CLASSIFICATION OF TITLE:** _____
12. ***KIND OF EQUIPMENT** (Airborne / Ground / Not Applicable):_____
13. ***TEST EQUIPMENT?** **Yes / No**
14. PROGRAM ELEMENT CODE (PEC): _____
15. LEAD COMMAND: _____
16. DOES MANUAL EXIST FOR SAME/SIMILAR EQUIPMENT? **Yes / No**
17. EXISTING MANUAL TO NUMBER: _____
18. COMMERCIAL OFF THE SHELF (COTS) ITEM: **Yes / No**
19. CONTRACTOR INFORMATION: (If Applicable)
    a. NAME OF VENDOR: _____
    b. ADDRESS: _____
    c. MANUFACTURER'S CODE: _____
    d. POINT OF CONTACT: _____
20. FOREIGN MILITARY SALES (FMS) YES ___ NO ____ (If YES, complete item 21)
21. COUNTRY CODES (For CSTO/FMS manuals): (See TO 00-5-19) _____
22. COMMENTS:_____

*** = Mandatory Field**