

**BY ORDER OF THE COMMANDER
EDWARDS AIR FORCE BASE**

**EDWARDS AIR FORCE BASE
INSTRUCTION 16-501**



17 SEPTEMBER 2014

Operations Support

**412TH TEST WING CAPABILITIES-BASED
FINANCIAL PLANNING PROCESS**

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RELEASABILITY: There are no releasability restrictions on this publication

OPR: 412 TW/XP

Certified by: 412 TW/XP
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Pages: 14

This publication implements Air Force Instruction (AFI) 16-501, Control and Documentation of Air Force Programs. The primary objective of the planning process is to link capabilities-based planning to execution tracking using the Capability Analysis and Risk Assessment (CARA) process. The CARA process identifies 412th Test Wing (TW) capabilities, requirements and costs to deliver the capabilities, risks associated with delivering the capabilities, and information needed to make decisions that optimize the capabilities and minimize risk. This Capability based process integrates planning for all Test & Evaluation (T&E) and Operation & Maintenance (O&M) TW organizations, regardless of funding source. TW planning will not include requirements for O&M program elements that are centrally managed at the AFMC functional level. This instruction is applicable to all TW personnel who plan, manage, and/or execute tasks, projects, or programs. This instruction may be supplemented at any level, but all supplements that directly implement this publication must be routed to the OPR for coordination prior to certification and approval. Ensure that all records created as a result of processes prescribed in this publication are maintained in accordance with (IAW) Air Force Manual (AFMAN) 33-363, Management of Records, and disposed of IAW Air Force Records Disposition Schedule (RDS) located in the Air Force Records Information Management System (AFRIMS). Refer recommended changes and questions about this publication to the Office of Primary Responsibility (OPR) using the AF Form 847, Recommendation for Change of Publication; route AF Forms 847 from the field through the appropriate functional chain of command. This instruction does not require tiers at or below the Wing level.

1. Responsibility and Authority

1.1. The Wing Commander, supported by the Group Commanders/Directors and Wing Staff Agencies (WSA) (referred to as the TW Council), provides corporate guidance for capabilities-based planning; reviews and updates the GCRM; reviews and constrains the capability roadmaps; approves funding allocations in accordance with strategic direction; reviews and modifies the CARA Integrated Requirements List (IRL); and makes final resource allocation decisions.

1.2. Test Wing Groups and their associated Capability Owners (COs) are responsible to the TW Commander for ensuring their capabilities meet current and future customer requirements; assessing the capability state defined in the GCRM; developing capability roadmaps that support the GCRM; meeting funding allocation targets; defending their requirements during the IRL review; identifying risks associated with delivering the capabilities; and recommending funding adjustments to minimize those risks. The COs are accountable to the Commander for executing to the plan.

1.2.1. Capability stakeholders and functional organizations support the Capability Owners with requirements identification, cost estimates, capability analyses, risk assessments, and other CARA product development. This includes but is not limited to the development of workload (flying hours, engineering labor, etc.), maintenance, information technology, and investment requirements.

1.2.2. Financial Managers support the COs with the financial elements of IRL requirements identification within their responsible work breakdown structures (WBS).

1.3. The 412 TW Plans & Programs Office (412 TW/XP) facilitates the capabilities-based planning process for the Program Objective Memorandum (POM) and Financial Plan (FinPlan), working with the 412 TW Financial Management Office (412 TW/FM) and 412th Comptroller Squadron (CPTS). Along with the Groups and WSAs, this team identifies CARA data requirements; communicates/documents allocations for budget and offset targets; directs CARA team activities; collects, analyzes, and interprets CARA data; develops IRL iterations; and delivers CARA products for 412 TW Council and higher headquarters review and final use. 412 TW/XP also facilitates the development and TW Council review of the capability roadmaps by the Capability Owners. (Reference Figure 1.1)

1.4. Financial Management & Comptroller Squadron (412 TW/FM & 412 CPTS) owns FinPlan and Execution year planning (ExPlan). They identify the available budget authority; allocate initial budget and offset funding targets; estimate fallout and reimbursable earnings; and ensure compliance with all financial rules and regulations as part of the IRL development. (Reference Figure 1.2)

Figure 1. CARA POM Process Flow

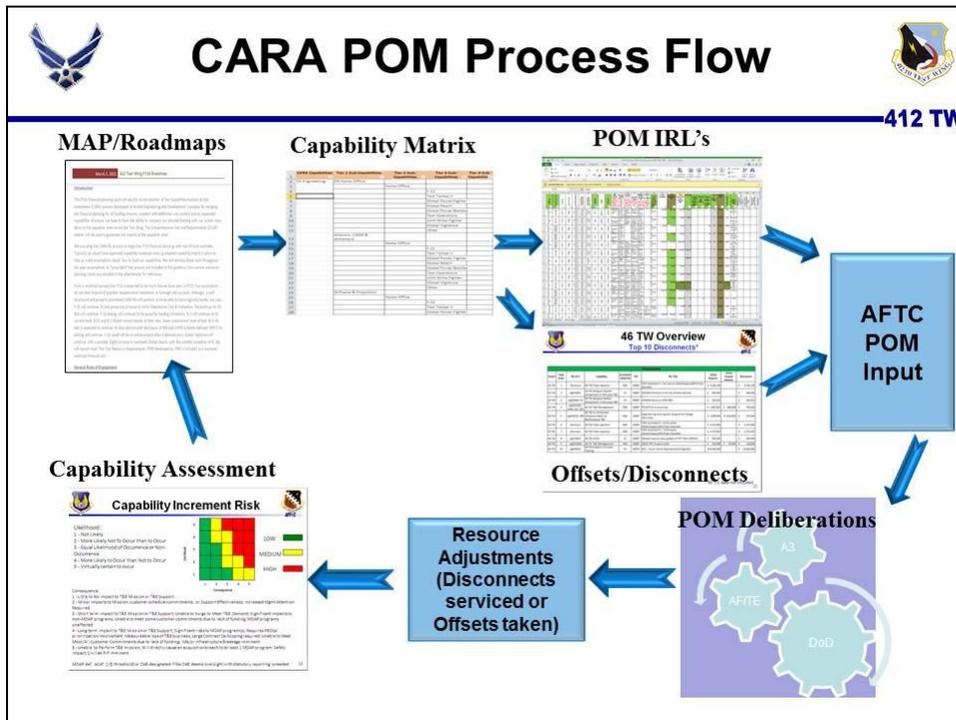
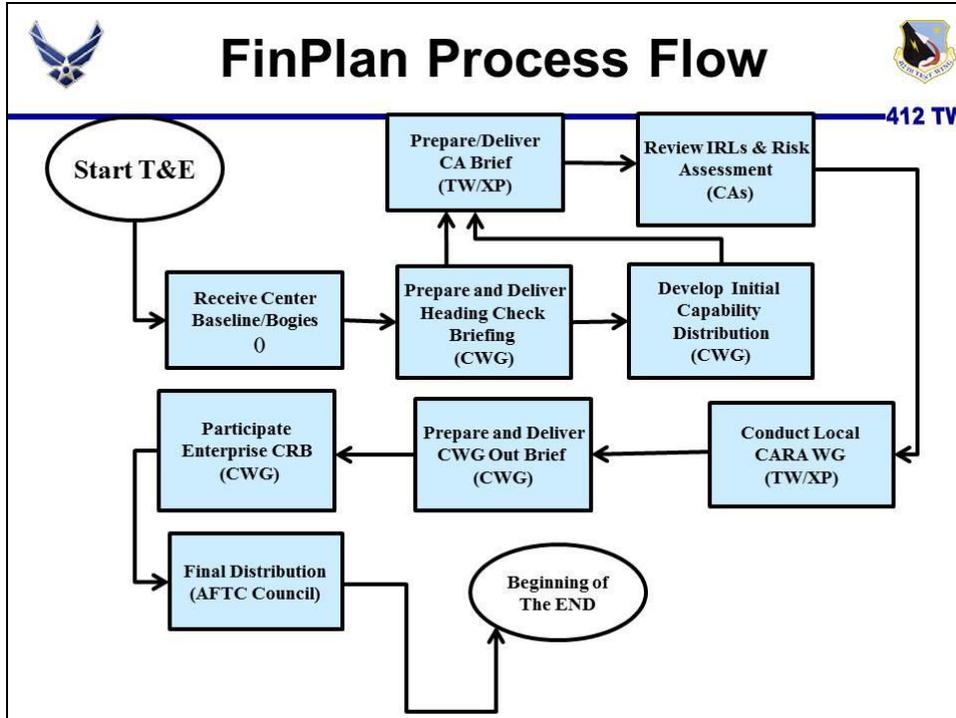


Figure 2. FinPlan Process Flow



2. Planning Guidance

2.1. Capability Roadmaps. Capability Owners develop roadmaps that define the path to achieve the capability status defined in the GCRM. Roadmaps compare 412 TW's current capabilities with future requirements and identify the level of growth (gaps), sustainment or reduction required. Capability requirements are determined by examination of applicable strategic plans (AF, AFMC & AFTC), current and forecasted national needs, higher headquarters, AFTC Mission Area Plans and TW Council direction, customer requirements (as forecast in Test Resource Requirements (TRR) and Flight Actuals and Billing (FAAB) data), alternate facility status, and other factors that may influence TW capabilities.

2.1.1. The Strategic Planning Branch of 412 TW/XP develops a template and timeline for Capability Roadmap development and facilitates an approval process through the TW Council. Once the roadmaps are constrained and approved by the TW Council, they are used as guidance to develop the workload IRL and to plan the Program Objective Memorandum (POM) inputs to higher headquarters.

2.1.2. The Strategic Planning Branch of 412 TW/XP sets time-tables for the Systems Engineering Board (SEB) and TW Master Architects to assist the Capability Owners in the development, vetting, and incorporation of the capability roadmaps.

2.2. Graduated Capability Readiness Matrix (GCRM). The TW Council uses the Capability Roadmaps as decision aids to populate the GCRM in order to identify the desired current and future status of all 412 TW capabilities. The GCRM is a spreadsheet containing the WBS used to define 412 TW capabilities along with the TW Council's decision on how to resource the capability for the Future Year Defense Program (FYDP) timeframe. The information in the GCRM is used by the Groups to aid in building the IRLs. 412 TW/XP maintains the GCRM for the 412 TW and makes it available to the Groups. The 412 TW Council reviews the GCRM twice annually and the results are used to develop capability priorities and IRL funding levels.

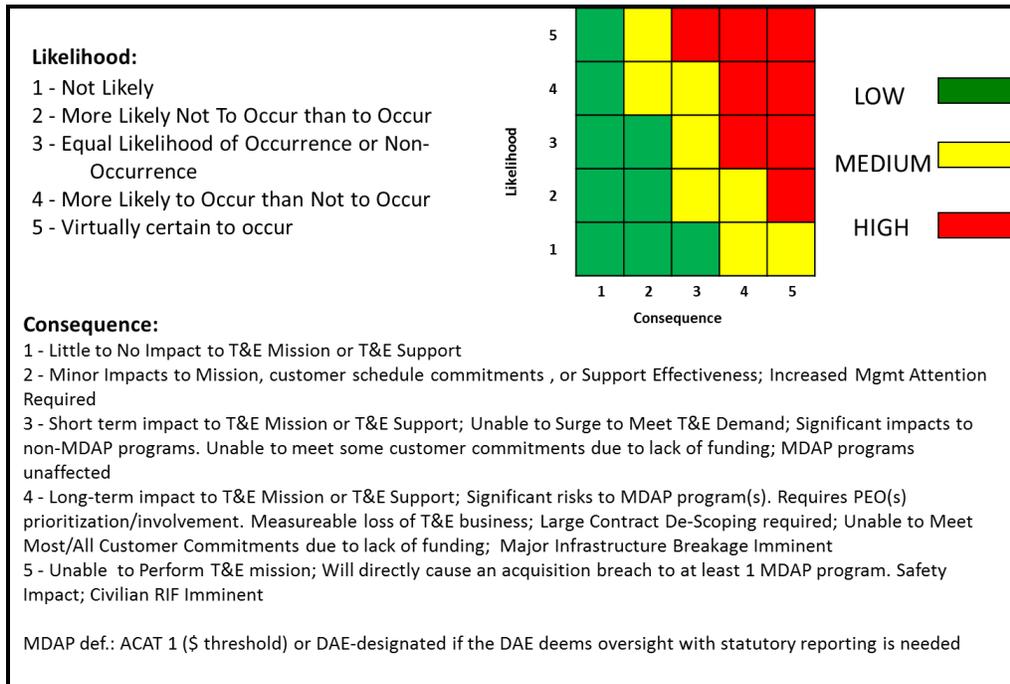
3. CARA IRL Development

3.1. Overview. The 412th Test Wing capabilities identify the requirements through the CARA process that the 412 TW plans to deliver for the fiscal year defense planning (FYDP) for POM (a five year look), of the next fiscal year for FinPlan and allocates the available resources necessary to deliver those capabilities with acceptable risk. The definitions for the levels of acceptable risk are defined in Figure 3.1. The definitions are typically used during the POM build process, but not during the FinPlan build process.

3.2. Integrated Requirements List (IRL). Capability Owners input all DBA and RBA resource requirements for the budget year (for FinPlan) or through the FYDP (for POM) into an Integrated Requirements List. IRL data is input/broken down into a work breakdown structure (WBS) developed for each capability. Data includes a unique IRL number, capability supported, Group level organization, IRL title, scope, impact if not funded, program element codes, cost centers, element of expense/investment code, funding designator (fully funded, funded offset, unfunded, unfunded disconnect), and manpower estimates. For POM builds, the IRLs also include columns of information unique to AFMC's Command Management System (CMS). The CMS defines categories of resources similar to the CARA funding designations, but uses the capability increment risk defined in Figure 3.1

as a reference. A funding designation crosswalk is also included in Figure 3.2. Manpower data includes the number of full time equivalents (FTEs), number of contractor man-year equivalents (CMEs), Officers, Enlisted and over hires (OHs). The TW Council uses the IRLs to adjust and optimize the allocation of resources.

Figure 3. Risk Assessment Model



3.2.1. The 412 TW/FM maintains the IRL spreadsheet database and controls its configuration. 412 TW/FM will keep a copy of the IRL spreadsheet on a SharePoint server with read-only access so that government members of the 412 TW can review it at any time. The COs or their designated representatives may submit inputs or changes to the IRLs through 412 TW/FM. The 412 TW/FM will coordinate all changes through the 412 TW/XP. Any stakeholder with inputs or changes must submit them through the appropriate CO. If resource requirements are not identified in the IRLs, they will not be considered for funding during the CARA process.

3.2.2. As the capabilities analysis generates issues and concerns, a risk assessment is made that allows key field issues to be identified and addressed. The risk assessment is based on a modified systems engineering risk model, using probability of risk occurrence mapped against consequences of the risk for each key issue.

3.2.3. The 412 TW/XP maintains the individual capability risk assessments developed by the capability owners for all areas. These briefings will be used during Test Wing internal deliberations and for test enterprise deliberations across the AF Test Center. 412TW/XP will also develop a Test Wing level risk assessment for TW/CC approval to be used for external budget deliberations.

3.3. Building the IRL. Capability Owners and designated advocates will assemble stakeholder teams to assist in identifying capability requirements for the IRL. In addition to

RDT&E (3600) and O&M (3400) funding, Improvement & Modernization (I&M), and Sustainment, Restoration & Modernization (SR&M) funding will be identified to their Total Operating Authority (TOA). Total Operating Authority (TOA) shall include Direct Budget Authority (DBA) and all Reimbursement Budget Authority (RBA), including pass-thru or non-critical RBA. Manpower inputs to IRLs must match the UMD provided by 412 MSG/FSS via passcode and positions assigned.

3.4. Resource Allocation and Offset Targets. 412 TW/XP, working with 412 TW/FM (for T&E funds) and 412 CPTS (for O&M funds) determine anticipated funding and offset allocations by Program Element Code (PEC) for distribution to the Capability Owners. The 412 TW Council reviews and the Wing Commander approves the allocations prior to distribution. Methods of distributing the allocation and offset targets among the capabilities will vary from year to year but regardless of the distribution, the targets are considered to be a starting point subject to TW Council-directed adjustments. The level of offset will vary by PEC and current year circumstances.

3.5. Constraining the IRL. Capability Owners analyze customers' needs for the planning period and apply funding to the requirements. Funding is applied to each IRL with the goal of meeting mission and workload needs and minimizing risk given the available resources. The funding level for each IRL item is characterized using one of four possible funding designations from the IRL Crosswalk (Table 3.1): fully funded (FF), funded offset (FO), unfunded disconnect (UD), or unfunded (UF). Table 3.2 depicts the Unfunded Requirement definitions. The total of FF and FO requirements must not exceed the distributed funding allocation. The sum total of the FO requirements must meet the offset targets and the offsets must be executable and severable. The FO and UD IRLs are further characterized by prioritizing them per the codes in Table 3.1. It is expected that the offsets will have impact to the mission, and the impact must be communicated clearly in the IRL Impact if not Funded field. IRL items characterized as UD are those recommended for funding to the TW Council but should be lower priority than the least-dear funded requirement (FO or FF) in the same PEC. UF requirements are important to deliver a lower risk capability but may not be viable in tightly constrained budgets. The UF may also be candidates for "fall-out" funds from prior year execution and will be kept updated in the IRL listing by 412 TW/FM and 412 CPTS. The UD and UF IRLs can also be funded with fall-out funds during the year, so it is important to include all needs for all PECs.

Table 1. IRL Designation Crosswalk

Used for FinPlan & POM		Used for POM Only	
CARA Funding categories crosswalk for POM and FinPlan	CARA Categories	CMS Funding Categories	CMS Risk Definition
Fully Funded (FF)			
Highest Priority	FF-1	ARR-F	Funding to get to at least "Yellow"
Secondary priority	FF-2	ARR-F	Funding to get to at least "Yellow"
Important to fund	FF-3	ARR-F	Funding to get to at least "Yellow"
Funded Offsets (FO)			
Hard Take	FO-4	ARR-O	Funded Offset
Medium Take	FO-5	ARR-O	Funded Offset
Least Dear	FO-6	ARR-O	Funded Offset
FUNDING LINE			
Unfunded Disconnects (UD)			
Should Fund	UD-7	ARR-D	Unfunded Continuing Work to achieve at least "Yellow"
Important	UD-8	ARR-D or I	Unfunded new work to achieve at least "Yellow"
Lower Priority	UD-9	ARR-D or I	
Unfunded Requests			
Mission Critical	UF 1-N	TR-UF	Existing work to achieve "Green"
Mission Essential	UF 1-N	TR-I	New work to achieve "Green"
Mission Support	UF 1-N	UF	Everything Else
Mission Efficiency	UF 1-N		
Quality of Life	UF 1-N		
Safety	UF 1-N		
Legal	UF 1-N		
Training/Education	UF 1-N		
<p>NOTES:</p> <p>**UD IRLs become UF IRLs after the Fin Plan deliberations conclude, and the funding line is established.</p> <p>**UF IRLs are to be categorized using the 412 TW Unfunded Request Categories, then ranked by the Groups 1-N. UF IRLs are typically funded after the FinPlan stabilizes and when prior year roll-over and execution year un-allocated funds are available. UF IRLS can and should be added</p>			

anytime during the year, with special attention to when funds become available, usually early 2nd quarter of the FY.

Table 2. UR Category Definitions

Unfunded Request Categories	Definitions
Mission Critical	A requirement that will cause mission failure if not funded - Time critical/immediate consequences, Safety implications, Program breach to cost, schedule, performance; Stops “important” work now (Critical Path), Current year RBA stream jeopardized, Defense Acquisitions Breach (DAB) breach
Mission Essential	A requirement that is necessary to accomplish the mission effectively. However, if funding is not obtained, the mission can still be achieved, although not at the most effective level - Some slack in time / near term consequences, Possible safety issues, Potential program breach to cost, schedule, performance, Work stoppage (Non-Critical Path), Future year RBA stream jeopardized
Mission Support	A requirement that is of lesser importance to accomplishing today’s mission but is important for the future - Future test capability jeopardized, Reserve capacity, Long range impact, Undefined RBA stream
Mission Efficiency	Efforts that enhance the ability to carry out testing and other business processes in an efficient manner can be related to process improvements that reduce time or effort to carry out the mission.
Quality of Life	Efforts that enhance readiness by positively influencing efforts to recruit and retain top quality people. Designed to improve the living and working conditions of members and families by satisfying basic needs, such as housing, medical care, office space, etc. allowing members to focus on performing the mission
Safety	Situation/condition that requires immediate attention, unsafe non- life threatening situation, action required by law, contract breach, regulation/instruction violation, Include Risk Assessment code(RAC) # from 412 TW/SE
Legal	Situations which specifically require immediate attention due to a violation of law or regulation.
Training/Education	Requirements for Training and Education to encompass technical, proficiency, currency and developmental

	training and related expenses
Buy Down	Current year funded requirements which can legally be funded with prior year dollars. This helps buy down execution year requirements freeing up current year dollars for reallocation.
Prior year UR	Prior year unfunded requirement that was not funded and is still valid in the execution year.
Category Stratification 1-N	Higher ranked projects will have higher mission impact if not funded and higher need to be funded now. Lower ranked projects will have lower mission impact, and lower need to be funded now.

3.6 CARA Working Group (CWG) Review. 412 TW/XP facilitates a capability line-by-line review of the IRLs with the TW Council and Capability Owners. The purpose of the review is for the TW Council to adjust which requirements (IRLs) are funded, partially funded, or unfunded to meet Test Wing goals and optimize the funding distribution across capabilities. During the review, Capability Owners explain their requirements, identify key disconnects and offsets, and provide responses to the TW Councils questions and concerns.

3.7. IRL Adjustment. The TW Council will identify the top disconnects. O&M and RDT&E disconnects will be forwarded to AFTC for possible funding and SRM designated IRLs will be marked as UD and vetted through the Civil Engineering Division's Facility Board process for prioritization and possible funding. 412 TW/FM will maintain an updated version of the unfunded disconnect file to serve as an unfunded requirements list for the various PECs. The COs are to keep their IRLs updated with unfunded requirement regardless of funding source. (412 TW/FM and 412 CPTS provide an estimate by PEC of forecasted fall-out.) The TW Council reviews all offsets and disconnects and makes fund/unfund adjustment decisions based on Test Wing needs which in turn adjusts the funding balance up or down. The balance sheet maintained by 412 TW/FM is updated to ensure the program remains affordable with the proper level of management reserve.

3.8. Finalize Plan. Once the Enterprise CARA Working Group (ECWG) has approved the IRLs, the data will be input into the Comprehensive Cost and Requirement (CCaR) system for use during current year of execution by the Resource Advisors. The prioritized UD's and UF's will be used by 412 TW/FM and 412 CPTS as their initial Unfunded Requirements (UR) List that will be used for UR data calls. Unless otherwise directed by command, the current CARA funded lines (FF and FO) will serve as the baseline numbers to begin the following year FinPlan. For POM builds, 412 MSG/FSS will input manpower information into CMS. The AFTC/XP-OL will use our POM IRLs to populate CMS with Flying Hour Program (FHP), Civ Pay and Non-Pay data.

4. Execution Tracking

4.1. Overview. Execution tracking is the purview of 412 TW/FM and 412 CPTS, and is covered here to provide the planning to execution connection to complete the CARA process.

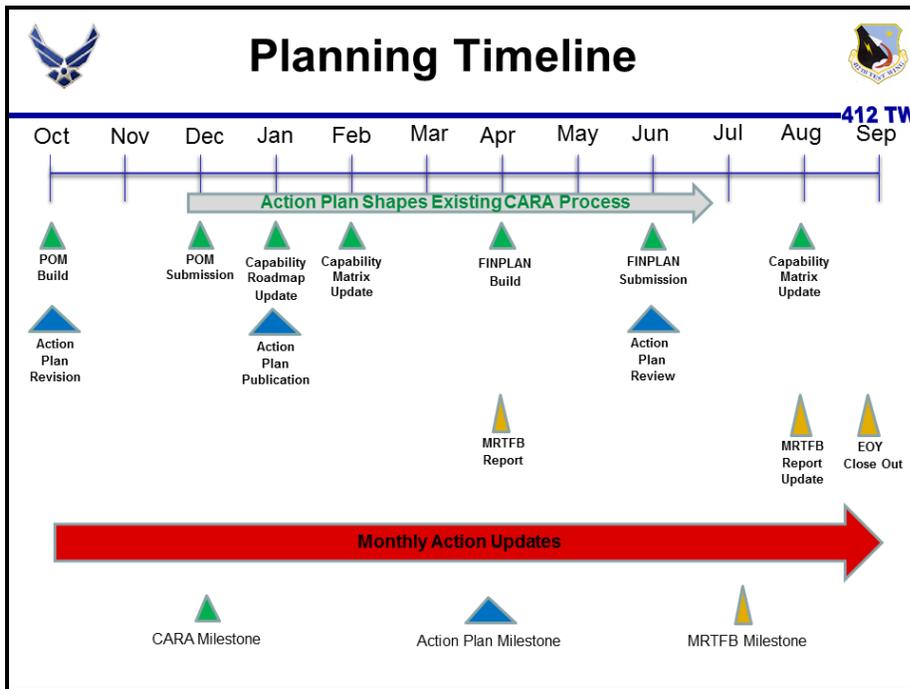
The TW Council reviews cost, schedule, and performance data from the current CARA revision during recurring financial management reviews. If significant adjustments to the program are needed, the TW Council approves those adjustments. The revision becomes the new program baseline and 412 TW/FM updates the IRLs in CCaR and the FM checkbook to reflect the new baseline. Figure 1.1 illustrates the CARA POM process flow and Figure 1.2 shows the FinPlan process flows. Figure 4.1 depicts the Resource Planning Timeline.

4.2. Financial Management Reviews. Execution tracking is accomplished using monthly execution reviews and the quarterly Financial Management Board hosted by 412 CPTS. These reviews are provided to the TW Council by the Groups, and provide an assessment of the execution of actual funding expenditures compared to the CARA FinPlan. The TW Council provides guidance and determines if any redirection is warranted.

4.3. Adjustments. Any programmatic changes that are identified during the year of execution and require an adjustment to a group or squadron's budget must be handled accordingly. The Group Commanders/Directors may approve revisions below the threshold that are within their overall budget allocation. Any revisions above the authorized threshold set by the 412 TW/CC must be brought before the TW Council for approval. These proposed revisions can be identified during monthly execution reviews, Financial Management Board or during TW Council meetings. 412 FM/FM or 412 CPTS will maintain the adjustment file and Resource Advisors will make adjustment to their budgets as directed by the TW Council (or below-threshold for administrative adjustments).

4.4. Baseline IRL. FM will use prior year IRLs and baselines as a starting point for next year's program with adjustments made to account for known programmatic changes and any information provided by AFTC. At the end of the fiscal year, the executing program will be reviewed and analyzed against actual execution data from CCaR and adjustments to next year's program will be made.

Figure 4. Resource Planning Timeline



5. **Metrics.** The metrics for this procedure is planned verses actual expenditures, and the generation and timeliness of the FinPlan and POM submission to AFTC.

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Commander

Attachment 1**GLOSSARY OF REFERENCES AND SUPPORTING INFORMATION*****References***

AFI 16-501, Control and Documentation of Air Force Programs, 15 August 2006

AFMAN 33-363, Management of Records, 01 March 2008

Adopted Forms

AF Form 847, Recommendation for Change of Publication

Acronyms and Abbreviations

412 TW/CC—412th Test Wing Commander

412 TW—412th Test Wing

412 TW/FM—412th Test Wing Financial Management Office

412 MSG/FSS—412th Mission Support Group Force Support Squadron

412 CPTS/CC—412th Comptroller Squadron Commander

412 TW/XP—412th Test Wing Plans and Programs Office

AFMC—Air Force Materiel Command

AFTC—Air Force Test Center

AFTC/XP—OL -Air Force Test Center Plans and Programs Office Operating Location

CARA—Capability Analysis and Risk Assessment

CCaR—Comprehensive Cost and Requirement System

CME—Contractor man-year equivalents

CMS—Command Management System

CO—Capability Owner

DAB—Defense Acquisitions Board

DBA—Direct Budget Authority

ECWG—Enterprise CARA Working Group

EEIC—Element of Expense/Investment Code

ExPlan—Execution Plan

FF—Fully funded

FHP—Flying Hour Program

FinPlan—Financial Plan

FMB—Financial Management Board

FO—Funded Offset

FYDP—Future Year Defense Program
GCRM—Graduated Capability Readiness Matrix
I&M—Improvement & Modernization (I&M)
IRL—Integrated Requirements List
O&M—Operation & Maintenance
PEC—Program Element Code
POM—Program Objective Memorandum
RAC—Risk Assessment Code
RAP—Resource Advisory Panel
RBA—Reimbursable Budget Authority
RDT&E—Research, Development, Test and Evaluation
SR&M—Sustainment, Restoration & Modernization
TOA—Total Obligation Authority
TRR—Test Resource Requirements
UD—Unfunded Disconnect
UF—Unfunded Request
UR—Unfunded Requirement
WBS—Work Breakdown Structure
WSA—Wing Staff Agency