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### **Run!AzTech Quick Look GASP Filters**

### **Table of Contents**

INTRODUCTION	2
RUN!AZTECH GASP FILTER TABLES	2
GASP TENET 1: COMPLETE	3
Test 1: Baseline Durations >2 Months	3
TEST 2: FORECAST DURATIONS > 2 MONTHS	4
TEST 3: FORECAST DURATIONS > 2 MONTHS IN 3 MONTH LOOK AHEAD	5
Test 4: Estimated Durations	
TESTS 5 & 6: MISSING BASELINE DATES & BASELINE DURATION	6
TEST 7: CROSS REFERENCE FIELDS	
TEST 8: DUPLICATE / BLANK NAMES	7
GASP TENET 2: TRACEABLE	8
TEST 9: MISSING LOGIC	8
TEST 10: SUMMARY LOGIC (& CONSTRAINTS / DEADLINES)	8
TEST 11: FINISH-TO-START (FS) RELATIONSHIPS	
TEST 12: SS OR SF SUCCESSOR WITHOUT EITHER FS OR FF SUCCESSOR	9
TEST 13: TOTAL FLOAT > 3 MONTHS	
TEST 14: SNETS / FNETS BEYOND 3 MONTH LOOK AHEAD	
TEST 15: SNETS / FNETS WITHIN 3 MONTH LOOK AHEAD	12
GASP TENET 3: TRANSPARENT	13
TEST 16: TASKS WITH LEADS	13
TEST 17: TASKS WITH LAGS	
TEST 18: CONSTRAINTS W/O RATIONALE	
Test 19: Lead/Lag w/o Rationale	
Test 20: Hard Constraints	
TEST 21: EXCESSIVE LAGS	16
GASP TENET 4: STATUSED	17
TEST 22: INVALID FORECAST DATES	17
TEST 23: INVALID ACTUAL DATES	17
TEST 24: OUT-OF-SEQUENCE (OOS) STATUS CONDITIONS	
GASP TENET 5: PREDICTIVE	19
TEST 25: PUSH FORWARD TEST	
TEST 26: PROGRAM COMPLETION TRACE TEST	
TEST 27: NO LOE IN PATH TO PROGRAM COMPLETION	21
TEST 28: APPROPRIATE CONSTRAINTS APPLIED TO ENDPOINT MILESTONES	
TEST 29: CRITICAL PATH LENGTH INDEX (CPLI)	22





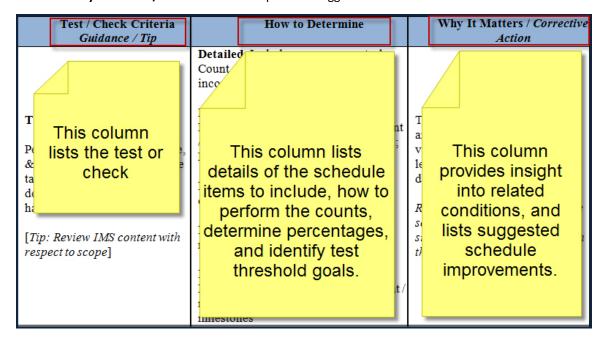
#### Introduction

Run!AzTech provides a series of automated filters aligned to the Generally Accepted Scheduling Principles (GASP)<sup>1</sup>. These principles are divided into Tenets with subsequent tests to support each. The twenty nine Quick Look tests featured in Run!AzTech help provide an automated answer to schedule validity. The first five tenets provide an answer to whether a schedule is Complete, Traceable, Transparent, Statused, & Predictive.

#### **Run!AzTech GASP Filter Tables**

For easy reference, the Quick Look Filters are arranged below. Columns explain each test by GASP tenet:

- The "Test / Check Criteria; Guidance / Tip" describes the "issue"
- The "How to Determine" describes the "test"
- The "Why It Matters/ Corrective Action" provides suggested schedule "fixes"



Use these tables along with Run!AzTech Quick Look filters to determine schedule alignment with the first five GASP tenets. Enjoy!

Note: Several GASP tests require in-depth analysis and automation provided in our comprehensive scheduling tool for MS Project, Run!AzTech. Other tests require a manual filtering approach, feel free to contact AzTech should you choose to purchase comprehensive support.

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<sup>&</sup>lt;sup>1</sup> Acknowledgement: The GASP concept comes from the <u>National Defense Industrial Association (NDIA)</u> Planning & Scheduling Excellence Guide (PASEG).





### **GASP Tenet 1: Complete**

Test Description	How to Determine	Why It Matters / Corrective Action
Test 1: Baseline Durations >2 Months  Determine % of incomplete tasks with baseline durations greater than 44 working days (2 months).  Tip: Shorter baseline durations reflect original planning scope granularity for efficient execution & precise performance measurement.	1. Apply Run!AzTech Quick Look GASP 1: Test 1 2. Observe & record percent score displayed in message box.  Uses Quick Look Filters: QL_01A_BL_Dur_>2mo_Numerator QL_01B_BL_Dur_>2mo_Denominator  Run!AzTech divides the numerator (N) count by the denominator (D) count.  Goal: 5% or less.  Compares: (N) number of incomplete,	•
	non-LOE, non-planning package, non-external, non-summary, non-milestone tasks that have baseline duration greater than 44 working days to (D) number of incomplete, non-LOE, non-planning package, non-external, non-summary, non-milestone tasks with baseline durations greater than 0 days.	





How to Determine	Why It Matters / Corrective Action
1. Apply Run!AzTech Quick Look GASP 1: Test 2	Why It Matters: Shorter tasks (2 months or less in duration) provide
Observe & record percent score displayed in message box.  Uses Quick Look Filters:  QL_02A_Fcst_Dur_>2mo_Numerator	more visibility into how the tasks are planned & allow a more objective progress evaluation.
QL_02B_Fcst_Dur_>2mo _Denominator	Corrective Action: Review & verify tasks with forecast durations longer
count by the denominator (D) count.	than 44 working days or split into tasks less than 44 days.
Compares: (N) number of incomplete, non-LOE, non-planning package, non-external, non-summary, non-milestone tasks that have durations greater than 44 working days to (D) number of incomplete, non-LOE, non-planning package, non-external, non-summary,	
	1. Apply Run!AzTech Quick Look GASP 1: Test 2  2. Observe & record percent score displayed in message box.  Uses Quick Look Filters: QL_02A_Fcst_Dur_>2mo_Numerator QL_02B_Fcst_Dur_>2mo _Denominator  Run!AzTech divides the numerator (N) count by the denominator (D) count.  Goal: 5% or less.  Compares: (N) number of incomplete, non-LOE, non-planning package, non-external, non-summary, non-milestone tasks that have durations greater than 44 working days to (D) number of incomplete, non-LOE, non-planning





Test Description	How to Determine	Why It Matters / Corrective Action
Test 3: Forecast Durations > 2 Months in 3 Month Look Ahead  Determine % of incomplete tasks with durations greater than 44 working days (2 months) that are within next 3 months.  Tasks clearly defined & well planned with easier to status shorter durations, provide granularity for precise performance measurement.	1. Apply Run!AzTech Quick Look GASP 1: Test 3  2. Observe & record percent score displayed in message box.  Uses Quick Look Filters: QL_03A_Fcst_Dur_>2mo_within_3mo_Numerator QL_03B_Fcst_Dur_>2mo_within_3mo_Denominator  Run!AzTech divides the numerator (N) count by the denominator (D) count.  Goal: 5% or less.  Compares: (N) number of incomplete, non-LOE, non-planning package, non-external, non-summary, non-milestone tasks activities within 3 months of status date that have durations greater than 44 working days to (D) number of incomplete, non-LOE, non-planning package, non-external, non-summary, non-milestone tasks within the same period.	Why It Matters:  3 month look ahead period scope must be understood & planned to execute efficiently.  Shorter tasks (2 months or less in duration) provide more visibility into how the tasks are planned & allow a more objective progress evaluation.  Corrective Action: Review & verify tasks with forecast durations longer than 44 working days or split into shorter tasks; apply this approach to advanced look ahead periods to affect changes.
Test 4: Estimated Durations  Determine number of incomplete tasks with estimated durations.  Tip: Indicates incomplete planning (durations have not	<ol> <li>Apply Run!AzTech Quick Look GASP</li> <li>Test 4</li> <li>Observe &amp; record detected number displayed in message box.</li> <li>Uses Quick Look Filter: QL_04_Est_Dur</li> </ol>	Why It Matters: Estimated durations are the default in MSP indicating there has not been any duration input for that task. This suggests the planning has not yet been completed.
been addressed).	Goal: Zero exceptions.  Detects: number of incomplete tasks that have estimated durations.	Corrective Action: Replace estimated durations for all non- milestone tasks with durations from the CAM.





Test Description	How to Determine	Why It Matters / Corrective Action
Tests 5 & 6: Missing Baseline Dates & Baseline Duration	1. Apply Run!AzTech Quick Look GASP 1: Tests 5 & 6.	Why It Matters: Missing baseline information may indicate
Determine all tasks without baseline dates & valid baseline durations.  Tip: Cannot determine if tasks	2. Observe & record detected number displayed in each message box.  Uses Quick Look Filters: QL_05_No_BL_Dates, then QL_06_No_BL_Dur	lapse in proper schedule management processes & exhibit lack of performance measure capabilities.
are early or late during execution without proper baseline.	Goal: All tasks have baseline dates & baseline duration.  Detects: number of all tasks that do not have established baseline start, baseline finish, or baseline duration.	Corrective Action: Populate & maintain proper baseline dates & durations (baseline the schedule).
Test 7: Cross Reference Fields  Comprehensive data field referencing in IMS.  Tip: Demonstrates source information tracks to each other, is represented in the IMS, & enables better program management.	Use the "A_AllFields" Table to identify related User Defined Fields for Test 7.  Verify all documents cross-referenced to the IMS are represented with their own field in the IMS & are appropriately populated  Required: CAMs, CAs, IMP, WBS, SOW, EVT, Work Package, Planning Package Recommended: OBS/IPT  Determine related fields in the IMS for each artifact & search for completeness.  Analyst uses judgment to determine if IMS is adequately cross-referenced.  Goal: All required fields complete.	Why It Matters: Data cross reference fields exist & are populated to demonstrate source data alignment & provides a verifiable basis for IMS planning.  Corrective Action: Populate & maintain proper artifact data fields in the IMS.





Test Description	How to Determine	Why It Matters / Corrective Action
Test 8: Duplicate / Blank Names	Sort the entire IMS by task name, observe obvious task name duplicates & blank names for Test 8.	Why It Matters: IMS task nomenclature is best understood when organized, unique,
Search for blank or duplicate task names in the entire IMS.	Be aware of sorting parameters e.g. in MSP do not check the option Keep Outline Structure for sorting	meaningful, & not reliant on summary or grouping titles to supplement their
Tip: Unique & descriptive task names define the scope content & deliverable, aide	when including summary tasks; not checking the option eliminates	comprehension.
user comprehension & facilitate determining progress during status.	outline structure as the primary sort that would prevent task name alignment as a primary sort for comparison.	Corrective Actions: Use present tense action verbs as described in the IMP if applicable, for each
	Through several iterations, search task names containing common	non-summary task where possible, when revising task names.
	words to discern repetitive phrases that do not exhibit uniqueness, such as several tasks that merely state "Perform Test", not differentiating	Words such as analyze, design, draft, determine, produce, conduct, review
	specific tests.	& approve provide insight into unique descriptive
	Goal: All names are unique & not blank.	task names & aid understanding each task deliverable.

**GASP Complete Evaluation** 





### **GASP Tenet 2: Traceable**

Test Description	How to Determine	Why It Matters / Corrective Action
Test 9: Missing Logic	1. Apply Run!AzTech Quick Look GASP 2: Test 9	Why It Matters: External feed-in
Determine number of incomplete tasks without logic (predecessors or successors).	2. Observe & record detected number displayed in message box.	milestones w/o predecessor or feed-out milestones w/o successor
Tip: Logic is fundamental for	Uses Quick Look Filter: QL_09_No_Logic	may be appropriate, but all other activities need proper logic found within
establishing an achievable schedule & imperative for its	Goal: Zero exceptions.	the IMS.
predictive capability. Missing logic calls into question schedule soundness & critical path validity.	Detects: Number of incomplete, non- LOE, non-external, non-summary tasks that do not have at least one predecessor or one successor.	Corrective Action: Determine appropriate predecessors & / or successors for tasks missing logic.
Test 10: Summary Logic (& Constraints / Deadlines)	1. Apply Run!AzTech Quick Look GASP 2: Test 10	Why It Matters: Logic or constraints
Identify summary tasks with applied logic or constraints.	2. Observe & record detected number displayed in message box.	applied to summary tasks may have unintended consequences to subordinate detail tasks &
Tip: Applying logic or constraint to summary tasks potentially	Uses Quick Look Filter: QL_10_Summary_Logic	may be difficult to discover when reviewing / analyzing schedule
obscures impacts to detailed tasks & hinders schedule	Goal: Zero exceptions.	information.
analysis.	Detects: Number of all summary tasks that have predecessors or successors or constraint dates or deadline dates applied.	Corrective Action: Remove logic, constraints, & deadlines from summary tasks & apply logic & appropriate constraints & deadlines to detailed tasks.





Test Description	How to Determine	Why It Matters / Corrective Action
Test 11: Finish-to-Start (FS) Relationships	1. Apply Run!AzTech Quick Look GASP 2: Test 11	Why It Matters: Promoting parallel activities risks scheduling
Determine % of incomplete tasks using FS relationships (preferred).  Tip: FS relationships avoid scheduling activities in parallel & ensure the least opportunity for creating resource conflicts.	2. Observe & record percent score displayed in message box.  Uses Quick Look Filters: QL_11A_FS_Rel_Numerator QL_11B_FS_Rel_Denominator  Run!AzTech divides the numerator (N) count by the denominator (D) count.  Goal: 90% or greater.  Compares: (N) number of incomplete, non-LOE, non-summary tasks that have finish-to-start predecessor relationships to (D) number of incomplete, non-LOE,	more work than can be executed & potentially understates projecting accurate program finish.  Corrective Action: Verify the use of any non-FS relationships & change to FS if appropriate.
	non-summary tasks.	
Test 12: SS or SF Successor Without Either FS or FF Successor (Start-to-Start (SS) or Start-to-Finish (SF) Successor without either Finish-to-Start (FS) or Finish-to-Finish (FF) Successor)  Determine number of incomplete activities using only SS or SF successor relationships.  Tip: SS relationships may be valid, but not having at least one additional FS successor relationship prohibits establishing finish consequences, resulting in meaningless total float values.	<ol> <li>Apply Run!AzTech Quick Look GASP</li> <li>Test 12</li> <li>Observe &amp; record detected number displayed in message box.</li> <li>Run!AzTech function</li> <li>Goal: Zero exceptions.</li> <li>Detects: Number of incomplete, non-LOE tasks that have a SS or SF successor, but also do not have at least one FS or FF successor relationship to another task.</li> <li>Note: Condition, potentially equivalent of missing a successor.</li> </ol>	Why It Matters: Relying only on SS or SF successor relationships does not model a finish consequence to the activity. Once in-progress, it loses its impact to other activities, does not retain priority to finishing & can reflect meaningless total float value to program end.  Corrective Action: Determine & apply additional, appropriate FS or FF successor relationships.





Test Description	How to Determine	Why It Matters / Corrective Action
Test 13: Total Float > 3 Months	<ol> <li>Apply Run!AzTech Quick Look GASP</li> <li>Test 13</li> <li>Observe &amp; record percent score</li> </ol>	Why It Matters: Excessive total float is indication the task is not properly sequenced,
Determine % of tasks with total float >60 working days.	displayed in message box.  Uses Quick Look Filters:	either starting too early, or is missing a potential successor that could
Tip: Indicates a task may slip greater than 3 months without impact to program completion.	QL_13A_TF_>3mo_Numerator QL_13B_TF_>3mo_Denominator  Run!AzTech divides the numerator (N)	impact critical path determination & not properly forecasting program completion.
Suggests a task is starting too early (missing an identified predecessor), or is not reflecting potential impacts to critical path (missing an identified successor).  Possibility that some scope is not identified (tasks not present in the IMS).	count by the denominator (D) count.  Goal: 5% or less.  Compares: (N) number of incomplete, non-LOE, non-summary tasks that have total float greater than 60 working days to (D) number of incomplete, non-LOE, non-summary tasks.	Usually, identifying the end task in a path for missing successors is effective in addressing high total float for all tasks in the path.  Corrective Action: Determine appropriate predecessors & / or successors for tasks with excessive total float.
		Tip: Sort the detected tasks in descending total float order to focus corrective actions on tasks with largest total float values.





Test Description	How to Determine	Why It Matters / Corrective Action
Test 14: SNETs / FNETs Beyond 3 Month Look Ahead	<ol> <li>Apply Run!AzTech Quick Look GASP</li> <li>Test 14</li> <li>Observe &amp; record percent score</li> </ol>	Why It Matters: Generally, assumptions are less accurate in further look ahead
Determine % of SNET or FNET constraints on tasks > 3 month look ahead.	displayed in message box.  Uses Quick Look Filters:  QL_14A_SNETorFNET_beyond	periods, especially when attempting to model resource availability with SNETs / FNETs.
Tip: Anticipate using less "no earlier than" constraints in periods further out, due to uncertainty & related rationale,	_3mo_Numerator QL_14B_SNETorFNET_beyond _3mo_Denominator	Corrective Action: Review the "No Earlier Than" constraints &
relying more on logic alone to schedule a project.	Run!AzTech divides the numerator (N) count by the denominator (D) count.  Goal: 5% or less.	replace with logic relationships where practical.
	Compares: (N) number of incomplete, non-LOE, non-summary, non-external tasks beyond 3 months from status date that have SNETs or FNETs to (D) number of incomplete, non-LOE, non-summary, non-external tasks beyond 3	
	months from status date.	





Test Description	How to Determine	Why It Matters / Corrective Action
Test 15: SNETs / FNETs within 3 Month Look Ahead	1. Apply Run!AzTech Quick Look GASP 2: Test 15	Why It Matters: Generally, conditions are well known in the
Determine % of SNET or FNET constraints on tasks < =3 month look ahead.	Observe & record percent score displayed in message box.  Uses Quick Look Filters:	immediate near term & predecessors alone may not sufficiently model resource availability for
Tip: Anticipate using more "no	QL_15A_SNETorFNET_within _3mo_Numerator	task execution.
earlier than" constraints in immediate period, due to certainty, to refine dates,	QL_15B_SNETorFNET_within _3mo_Denominator	Use SNETs / FNETs appropriately, but not in place of logic.
where logic alone may not adequately model the project.	Run!AzTech divides the numerator (N) count by the denominator (D) count.	Corrective Action: Validate the "No Earlier
	Goal: 10% or less.	Than" constraints & replace with logic
	Compares: (N) number of incomplete, non-LOE, non-summary, non-external tasks within 3 months from status date that have SNETs or FNETs to (D) number of incomplete, non-LOE, non-summary, non-external tasks within 3 months from status date.	relationships where practical.

**GASP Traceable Evaluation** 





### **GASP Tenet 3: Transparent**

Test Description	How to Determine	Why It Matters / Corrective Action
Test 16: Tasks with Leads	1. Apply Run!AzTech Quick Look GASP 3: Test 16	Why It Matters: Leads can distort total
Determine number of incomplete tasks with leads > one day (imposed logic	Observe & record detected number displayed in message box.	float & mask potential impacts to successor path tasks.
accelerations to successors).	Uses Quick Look Filter: QL_16_Leads_>1d	Promote decomposing tasks & durations to
Tip: Ignores tasks finishing & successor starting on same day condition; Difficult to	Note: Leads may be defined as a negative lag.	facilitate Finish-to-Start relationships without leads.
understand & manage "time overlap" created using leads.	Goal: Zero exceptions.	Corrective Action:
	Detects: Number of incomplete, non-LOE, non-summary tasks that have negative lag predecessors (greater than one day).	Eliminate leads to allow schedule logic to drive dates.
Test 17: Tasks with Lags	1. Apply Run!AzTech Quick Look GASP 3: Test 17	Why It Matters: Lags interject vagueness
Determine % of incomplete tasks with lags (imposed logic delays to successors).	2. Observe & record percent score displayed in message box.	related to a "time gap" represented by the lag & are difficult to understand & manage.
Tip: Difficult to understand & manage "time gap" created using lags.	Uses Quick Look Filters: QL_17A_Lags_Numerator QL_17B_Lags_Denominator	Lags should only model "wait time", not replace work effort or be used to
	Run!AzTech divides the numerator (N) count by the denominator (D) count.	anticipate successor start dates.
	Goal: 5% or less.	Corrective Action: Minimize lags to allow
	Compares: (N) number of incomplete, non-LOE, non-summary tasks that have predecessors with lag to (D) number of incomplete, non-LOE, non-summary tasks.	schedule logic to drive dates.





Test Description	How to Determine	Why It Matters / Corrective Action
Test 18: Constraints w/o Rationale	1. Apply Run!AzTech Quick Look GASP 3: Test 18	Why It Matters: Documented explanations are required to
Determine % of incomplete tasks that have constraints without comments (rationale)	Observe & record percent score displayed in message box.  Uses Quick Look Filters:	understand constraint use, including validity & underlying intent.
in Notes field.  Note: Recognize that the	QL_18A_Constraints_No_Notes _Numerator QL_18B_Constraints_No_Notes	Aids in decision making & schedule maintenance.
schedule authors may utilize another custom field or	_Denominator	Corrective Action: Add explanations for
document to explain constraints use (such as in the IMS Supplemental Guidance	Run!AzTech divides the numerator (N) count by the denominator (D) count.	deadlines & constraints to the Notes field.
documentation), may need to adjust test results accordingly.	Goal: 5% or less.	
Tip: Rationale aids understanding applied constraints.	Compares: (N) number of incomplete, non-LOE, non-summary tasks that are not ASAP & do not have Notes entries to (D) number of incomplete, non-LOE, non-summary tasks that are not ASAP.	





Test Description	How to Determine	Why It Matters / Corrective Action
Test 19: Lead/Lag w/o Rationale	1. Apply Run!AzTech Quick Look GASP 3: Test 19	Why It Matters: Rationale is required to understand lead / lag use,
Determine % of incomplete tasks that have leads or lags	2. Observe & record percent score displayed in message box.	including validity & underlying intent.
without comments (rationale) in Notes field.	Uses Quick Look Filters: QL_19A_Leads_Lags_No_Notes	Aids in decision making & schedule maintenance.
Tip: Rationale aids understanding applied delays or accelerations.	_Numerator QL_19B_Leads_Lags_No_Notes _Denominator	Corrective Action: Add explanations for leads / lags to the Notes field.
	Run!AzTech divides the numerator (N) count by the denominator (D) count.	Also see Leads (Test 16) above for alternative
	Goal: 5% or less.	techniques.
	Compares: (N) number of incomplete, non-LOE, non-summary tasks that have predecessor leads or lags & do not have note entries to (D) number of incomplete, non-LOE, non-summary tasks that have	
Test 20: Hard Constraints	predecessor leads or lags.  1. Apply Run!AzTech Quick Look	Why It Matters:
Determine number of incomplete tasks utilizing hard constraints, prohibiting free	GASP 3: Test 20  2. Observe & record detected number displayed in message box.	Documented constraints affecting late dates may be necessary to establish key need dates & total float other than relying
flow of logic-driven IMS.  Tip: Prevent dates from reflecting driving predecessor	Uses Quick Look Filter: QL_20_Hard Constraints	solely on backward pass calculations (use sparingly).
impacts.	Goal: Zero exceptions.	Corrective Actions:
Includes: Must Start On Must Finish On Start No Later Than Finish No Later Than	Detects: Number of incomplete, non-LOE tasks that have MSO or MFO or SNLT or FNLT constraints applied.	Eliminate hard constraints from IMS & consider using deadlines instead.  Deadlines enable forecast impacts while providing accurate total float values.





Test Description	How to Determine	Why It Matters / Corrective Action
Test 21: Excessive Lags	1. Apply Run!AzTech Quick Look GASP 3: Test 21	Why It Matters: Excessive "wait time" complicates schedule
Determine number of incomplete tasks with excessive lags (delay values	Observe & record detected number displayed in message box.	management / visibility.
greater than one month).	Run!AzTech function	Corrective Action: Replace excessive lags with documented /
Tip: Excessive lag values potentially extend beyond one	Goal: Zero exceptions.	maintained "no earlier than" constraints".
status period, complicating analysis of dates.	Detects: Number of incomplete, non-LOE, non-summary tasks that have	
	predecessors or successors with lag values greater than 20 working days.	

**GASP Transparent Evaluation** 





### **GASP Tenet 4: Statused**

4. Statused - Schedules reflect valid actual and forecast dates, and tasks maintain previously established logical relationships.

Test Description	How to Determine	Why It Matters / Corrective Action
Test 22: Invalid Forecast Dates	1. Apply Run!AzTech Quick Look GASP 4: Test 22	Why It Matters: It is not possible to perform future work in
Determine number of incomplete tasks that are not statused up to status date.	Observe & record detected number displayed in message box.  Uses Quick Look Filter:	the past, therefore all tasks with work scheduled earlier than status date must re-schedule that
Tip: Includes incomplete tasks without appropriate actual start or actual finish dates < status date, or in-progress	QL_22_Invalid_Forecast_Dates  Goal: Zero exceptions	work later than status date.  Corrective Actions:
tasks with remaining duration starting < status date.	Detects: Number of non-summary tasks that have forecast start or forecast finish dates earlier than the status date, without the applicable actual start or	Address invalid dates & incomplete tasks that are earlier than Timenow by providing accurate status
Tip: Unaccomplished work in the past is not accurate status, causes inaccurate projections, & diminishes	actual finish dates, or remaining duration not beginning at the status date for inprogress tasks.	& / or forecast dates.  Not reflecting proper status jeopardizes
schedule reliability.	Note: IMS cannot have tasks with invalid forecast dates.	performance measurement & successor path task projections.
Test 23: Invalid Actual Dates	1. Apply Run!AzTech Quick Look GASP 4: Test 23	Why It Matters: Status date defines separation between past
Determine number of tasks with actual start or actual finish dates in future.	2. Observe & record detected number displayed in message box.	& future. It is not possible to accomplish effort in the future, beyond Timenow
Tip: Tasks reflecting achievement in the future do	Uses Quick Look Filter: QL_23_Invalid_Actual_Dates	(status date).  Corrective Actions:
not have accurate status; this causes inaccurate projections & diminishes schedule	Goal: Zero exceptions.	Correct the actual start or finish dates of tasks listed
reliability.	Detects: Number of non-summary tasks that have actual start or actual finish dates later than the status date.	in the future.  Not reflecting proper
	Note: IMS cannot have tasks with invalid actual dates.	status jeopardizes performance measurement & successor
		path task projections.





# 4. Statused - Schedules reflect valid actual and forecast dates, and tasks maintain previously established logical relationships.

Test Description	How to Determine	Why It Matters / Corrective Action
Test 24: Out-of-Sequence (OOS) Status Conditions  Determine number of tasks that contain status conditions violating their logic relationships.  Tip: Any tasks with out-of-sequence status condition render IMS projecting capabilities unreliable.	Review & detect tasks reflecting Actual Starts or Actual Finishes in current status cycle that are incongruent with predecessor logical relationships for Test 24.  1. Select a field to highlight all tasks within the IMS (e.g. Task Name)  2. Apply Run!AzTech OOS & follow prompts  3. Review the OOS report (Excel export) and address tasks highlighted with OOS status.  E.g. an incomplete FS predecessor to an in-progress successor — that has an Actual Start & its predecessor does not have an Actual Finish, does not honor the relationship.  Note: XLS report automatically saves to the same folder where the IMS is stored.  Goal: Zero exceptions.	Why It Matters: Out-of-sequence status conditions override logic & potentially return overly optimistic successor path projections & meaningless total float values.  Corrective Action: Resolve out-of-sequence status issues by either changing logic (if appropriate) or correcting the actual start or finish dates.

**GASP Statused Evaluation** 





#### **GASP Tenet 5: Predictive**

5. Predictive - Schedules provide logic-driven forecast information, meaningful critical paths, and reflect achievable program completion dates.

Test Description	How to Determine	Why It Matters / Corrective Action
Test 25: Push Forward Test  Assess logic network integrity to program completion.  Tip: Delaying an incomplete task with least total float reflects proportionate delay to program completion, demonstrating logic path to program completion.	Observe / record program completion milestone Early Finish date.  Perform a successor trace by selecting a current period task with the least amount of total float, add 600 working days to existing duration, recalculate the schedule & click the <i>Trace</i> button, using the <i>R</i> (for Right) option.  Verify the program completion milestone Early Finish date reflects a proportionate delay; the milestone is in the filtered set of tasks if it is logically tied to the successor trace task.  Check for a logic break if the milestone is not present in the filtered set of tasks.  Failed test when milestone does not reflect anticipated delay.  Repeat this test on another current period task to ensure consistency.  Note: If task with least total float has positive 25 working days total float, may only expect a 575 working day delaying	•
	impact to milestone.	

Note: Please contact AzTech to purchase additional support for conducting manual schedule tests, or a comprehensive assessment of your system.





5. Predictive - Schedules provide logic-driven forecast information, meaningful critical paths, and reflect achievable program completion dates.

Test Description	How to Determine	Why It Matters / Corrective Action
Test 26: Program Completion Trace Test  Determine % of non-LOE, incomplete tasks logically tied	1. Perform a predecessor trace by selecting the program completion milestone & clicking the <i>Trace</i> button, using defaults (no options), highlight all tasks & Count.	Why It Matters: Although a percentage is calculated for test, it is more meaningful to review suspect tasks.
to program completion.  Tip: Feed-out tasks detected during this test should have documented rationale.	Note LOEs detected in path; decrement number of LOE from detected number for accurate calculation See Test 27 with respect to detected LOE.	Even a relatively few significant tasks without a successor path to program completion is reason for concern.
Note any hard constraints assigned.	<ul> <li>2. Apply Run!AzTech Quick Look</li> <li>GASP 5: Test 26</li> <li>3. Observe &amp; record detected number displayed in message box for</li> </ul>	Ideally all incomplete, non-LOE, non-summary tasks are logically tied to completion milestone.
	denominator.  Uses Quick Look Filter:  QL_26B_Program_Completion _Trace_Test_Denominator.	Corrective Actions: Investigate tasks not detected by the test, address missing successor path logic to milestone.
	Divide Trace Count by number of total incomplete, non-LOE, non-summary task (QL_26B).  Goal: 95% & greater.	Essential tasks not logically tied to program completion render IMS as not predictive & invalidate critical path.
	Note: Review tasks not detected in the path by selecting Flag19 = "No" before continuing with other tests (Trace populates Flag19 with "Yes").  These are the tasks not logically tied to the program completion milestone.	





# 5. Predictive - Schedules provide logic-driven forecast information, meaningful critical paths, and reflect achievable program completion dates.

Test Description	How to Determine	Why It Matters / Corrective Action
Test 27: No LOE in Path to Program Completion	Perform a predecessor trace by selecting the program completion milestone & clicking the <i>Trace</i> button, using the <i>L</i> option to detect LOE in the	Why It Matters: LOE should not be logically tied to discrete work & should not be part
Use the <i>Program Completion Trace Test</i> set-up for this check.	path; window displays the number of LOE detected.	of the critical path.
Tip: Identify LOE tasks	Review the LOE tasks detected.	Corrective Action: Investigate & remove LOE logic to discrete tasks &
detected as having logical successor paths to program completion.	Investigate to confirm that these LOE tasks are logically tied to discrete tasks & milestone & recommend changing logic.	program completion to ensure LOE stays off of the critical path.
	Goal: No LOE tied to discrete effort.	Recommend using a LOE completion milestone to terminate LOE logic if necessary.
Test 28: Appropriate Constraints Applied to Endpoint Milestones	Identify & review the endpoint milestones to ensure appropriate, documented constraints provide meaningful total float values & permit	Why It Matters: Need dates reflect management's target.
Verify related milestones have appropriate constraints that provide meaningful schedule measures.	driving predecessors to establish forecast dates.  Note: Method & rationale for establishing need dates (Late Dates)	Constraints affecting the backward pass to program end & major milestones (if applicable) enable accurate total float
Tip: Missing constraints diminish program	should align with IMS Supplemental Guidance documentation.	calculation & permit precedence logic impacts.
management prioritization Avoid using hard constraints that override predictive nature of logic network.	Goal: All endpoint milestones should have constraints applied.	Corrective Action: Validate appropriate constraints used on endpoint milestones.
		Consider using documented deadlines.





5. Predictive - Schedules provide logic-driven forecast information, meaningful critical paths, and reflect achievable program completion dates.

Test Description	How to Determine	Why It Matters / Corrective Action
Test 29: Critical Path Length Index (CPLI)	1. Determine working days duration from status date to program completion Early Finish date in IMS, <b>A</b> (critical path	Why It Matters: Although geared towards performance, this test
Project performance indicates the ability to finish on time.	2. Add amount of total float, <b>B</b> (least	reflects IMS realism of completing on time & is meaningful when
	<ul><li>positive or negative value) to A &amp; total.</li><li>3. Divide total (A + B) by A (critical path length, as determined above).</li></ul>	satisfactorily passing all previous GASP tests.
	(A + B) / A	
	Goal: Should not be less than 0.95 with target of 1.00 (>1.00 is favorable <1.00 is unfavorable).	

**GASP Predictive Evaluation** 

Note: Please contact AzTech to purchase additional support for conducting manual schedule tests, or a comprehensive assessment of your system.





#### Key Web or E-Mail Links for More Info, Tech Support, or to Add to our Wish List

<u>Run!AzTech Ribbon for MS Project</u> - Check here for the latest on Run!AzTech Ribbon for MS Project 2013 and beyond and for Run!AzTech for MS Project 2010 and earlier.

http://goaztech.com/run-aztech-for-ms-project.aspx

AzTech Tool Suite Page- Check here for the latest on all of AzTech's tool suite offerings.

http://www.goAzTech.com/technology.aspx

<u>AzTech Tool Suite Hotline</u> - For technical assistance with any of our tools, please drop us a line at our Tool Suite Hotline.

http://www.goAzTech.com/aztech-tool-suite.aspx

<u>AzTech Wish List</u> - Have an idea or a suggestion on how to improve our tools? We love hearing from our customers, please shoot us an email!

wishlist@goAzTech.com

<u>AzTech Tool FAQs</u> – Check here to see if your question has already been answered!

http://www.goAzTech.com/faqs.aspx