

MAG-13 Weekly & Daily Scheduling With and Without SNAP



	Time With SNAP	Time Without SNAP	Quality Improvement With SNAP
Knows situation Availability & qualifications of pilots, aircraft, ranges, etc.	Now: 83 min w/ACTD: 15 min	5 h r s	+ Eliminates resource utilization errors
Knows rules Pre-requisites, crew day & rest, light requirements, etc	Now: 0 min		+ Ensures legal schedules + Reduces risk
Knows goals Qualification buildups, training focus, FRAGs	Now: 45 min w/ACTD: 30 min		+ Produce schedules consistent with goals
Goal negotiation Determine which tasks to do	Now: 52 min w/DARPA: 20 min		+ Computes tasks to meet goals + Help user prioritize and refine goals
Constraint negotiation Determine how to do the tasks	Now: 230 min w/DARPA: 60 min		+ Effective automated selection of resources + Enable exploration of alternative ways to perform tasks
Schedule annotations Ordnance, fuel, etc.	Now: 110 min w/ACTD: 60 min	60 min	
Weekly schedule summary	8.6 weekly + w/ACTD: 6.5 hrs w/DARPA: 3.0 hrs	~ 6hrs Same time via improved GUI & DB 2X improvement due to decreased user/system negotiation	Optimized schedules
Daily schedules	Now: 30 min/day	2 hrs/day	+ Generated from weekly
TOTAL (NOW)	8.6+2.5 = 11.1 hr	6 + 10 = 16 hr	