



Sustained Materiel Readiness

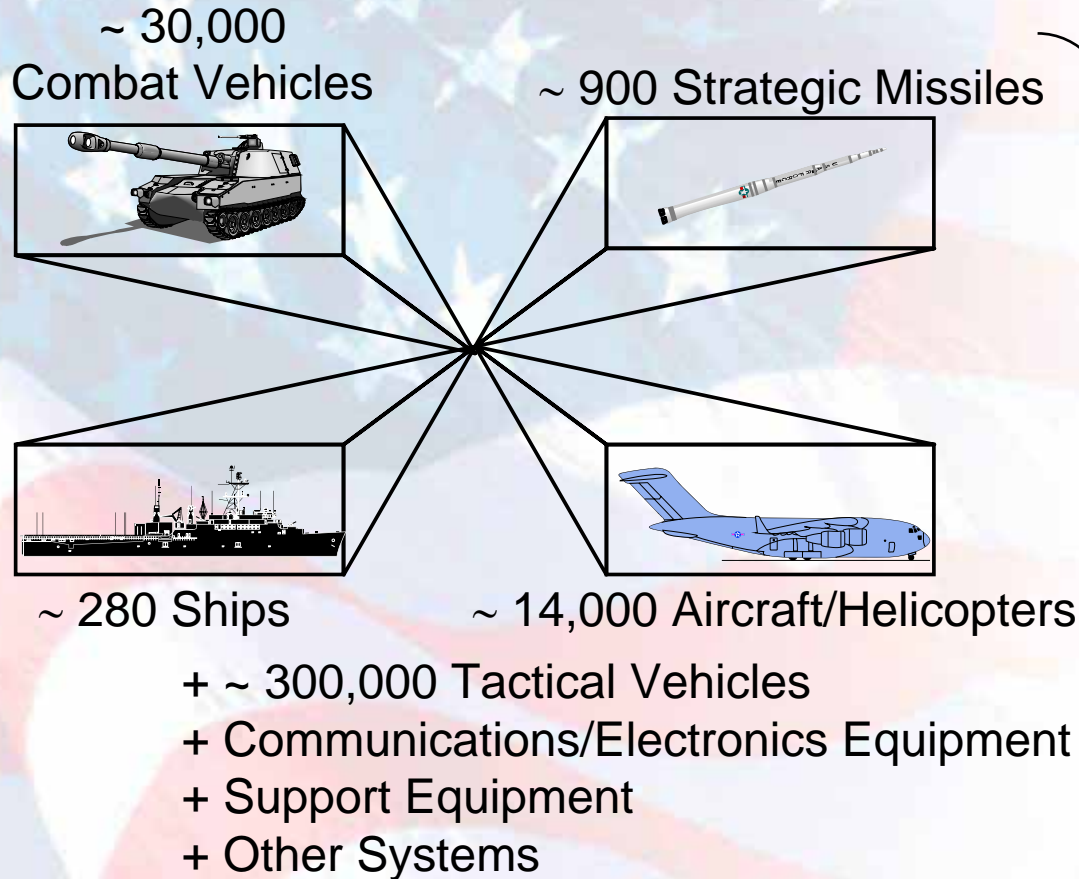
**THE WARFIGHTER NEEDS.....
AVAILABLE, TECHNICALLY SUPERIOR WEAPON SYSTEMS THAT
ENABLE –**

***SUCCESSFUL COMPLETION OF THE MISSION
RETURN HOME SAFELY***

David Pauling, ADUSD (MR&MP)



Systems Supported



Maintained by:

- 678,000 DoD personnel
- Private sector companies

Maintenance cost:

~ \$63 billion per year

National Defense PP&E is valued at ~ \$700 Billion



Sustained Materiel Readiness



ISSUE:

- **Concentrate on achieving/sustaining SPG/CPG readiness**
 - **Balance Safety, Reliability, Maintenance and supply distribution activities to achieve materiel readiness at best cost.**
 - **Optimize “TIME-ON-WING” and “TURN AROUND TIME”**
- **Promote End-to-End (E2E) Materiel Readiness Value Chain Perspective across DoD**
- **Sustain Optimize Materiel Condition Reliability**
- **Sustain Optimize support cost, cycle time**



Sustained Materiel Readiness



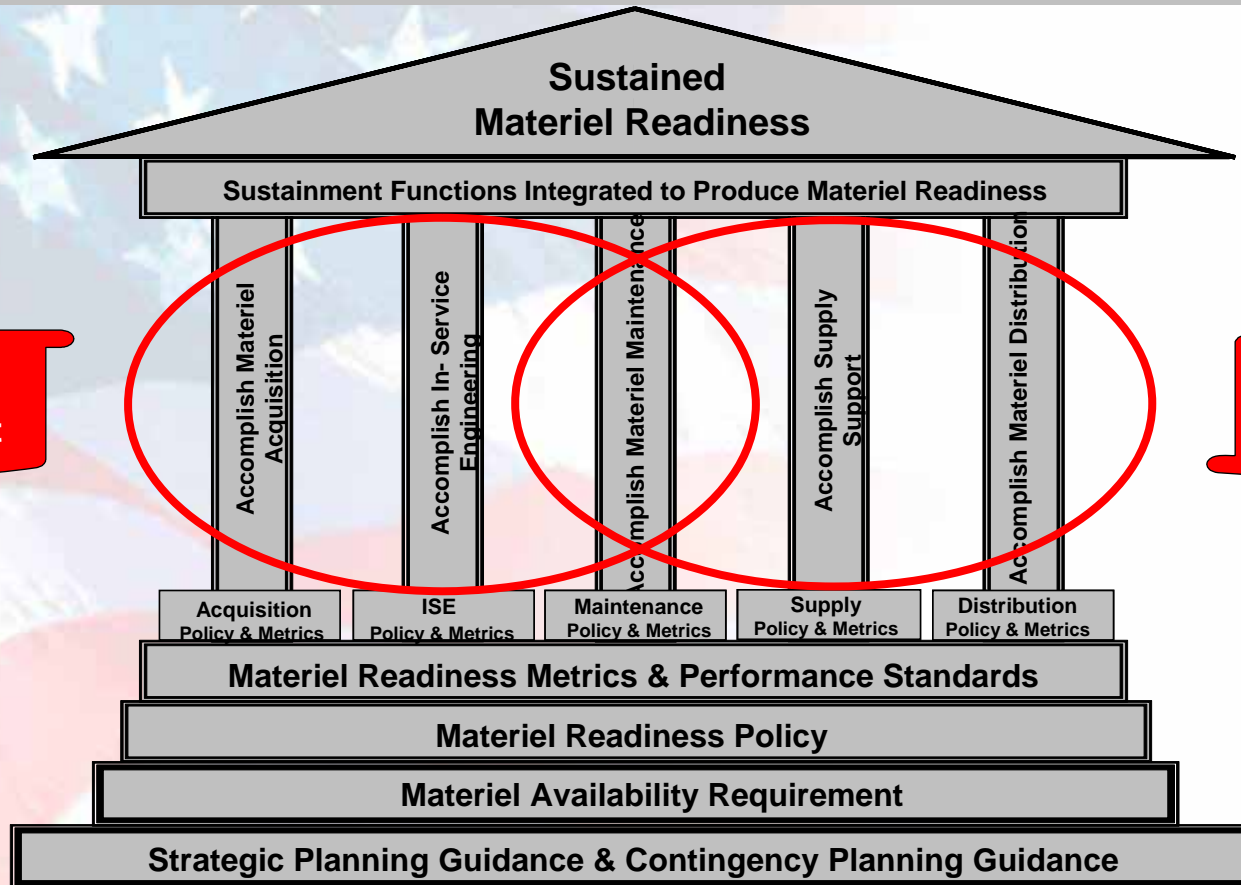
WAY AHEAD:

- **Translate SPG/CPG capabilities to Weapon System/Materiel Requirements**
- **Develop cause and effect predictive models**
- **Foster and promote continuous process improvements**
 - **Capability (Co)**
 - **Technical superiority technology insertion**
 - **Dependability (Do)**
 - **Safety/Reliability/Condition Based Maintenance +**
 - **Availability (Ao)**
 - **Cycle process discipline**
 - **Lean, Six Sigma, Theory of Constraint, Etc.**
 - **Institute Integrated Budgets (engineering, logistics, industrial)**



Focus

There are leverage points within weapon system value streams that drive overall materiel readiness

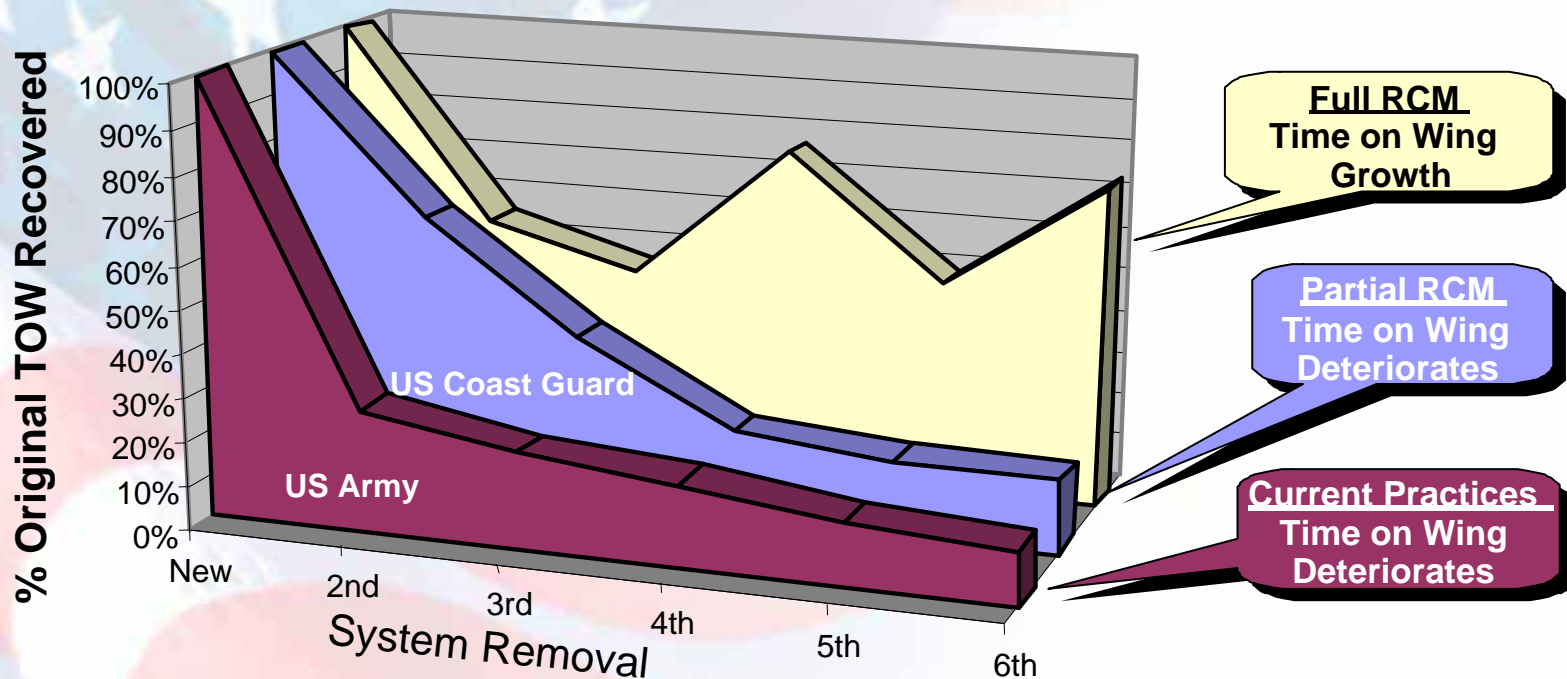


Leverage point: the points at which attention and/or application of resources would result in tangible improvements/benefits to the entire end-to-end materiel readiness value stream.



System Life Recovered After Repair

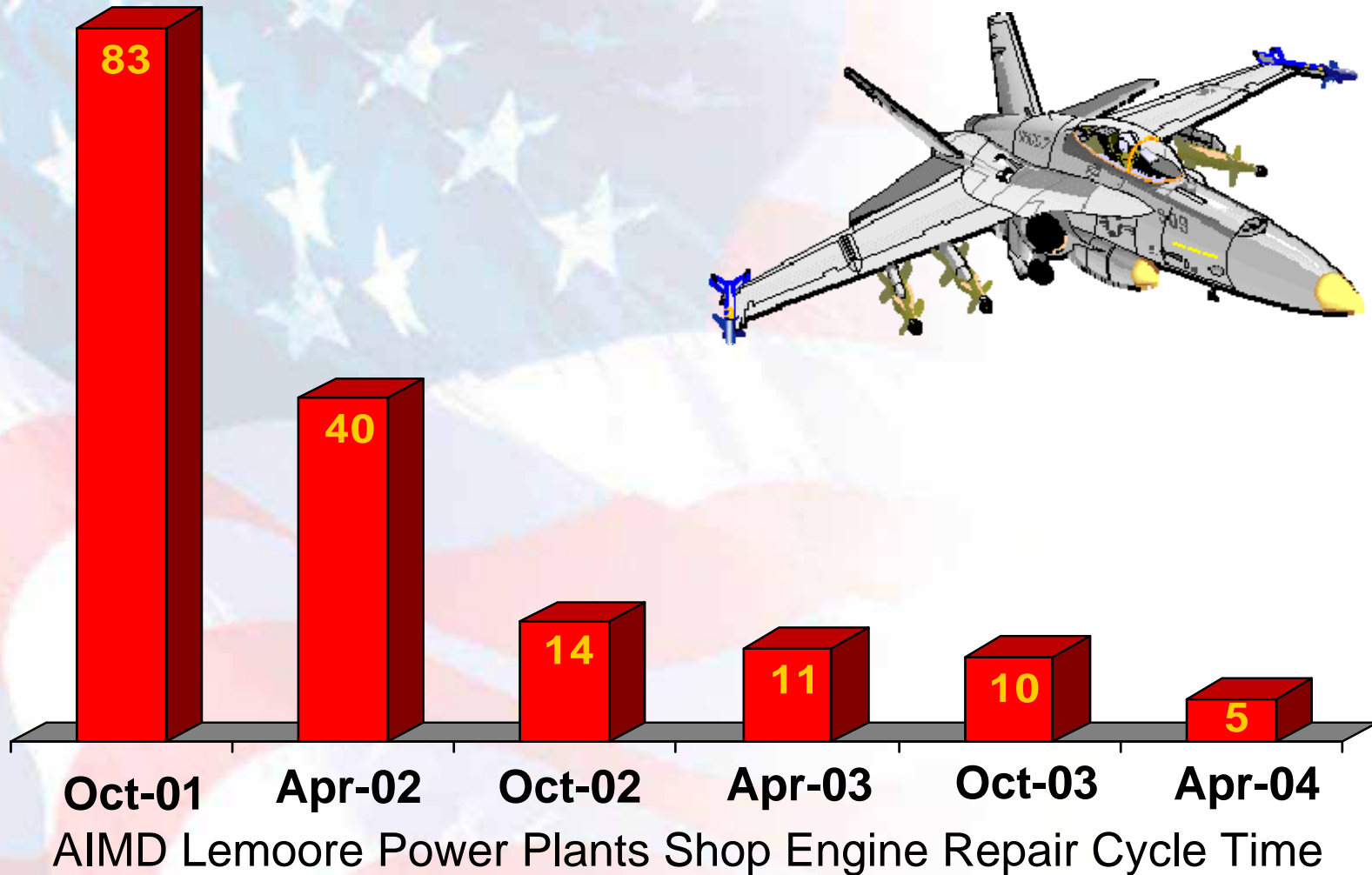
Reliability Centered Maintenance vs. Current On-Condition Practices



RCM =
Reliability
Centered
Maintenance

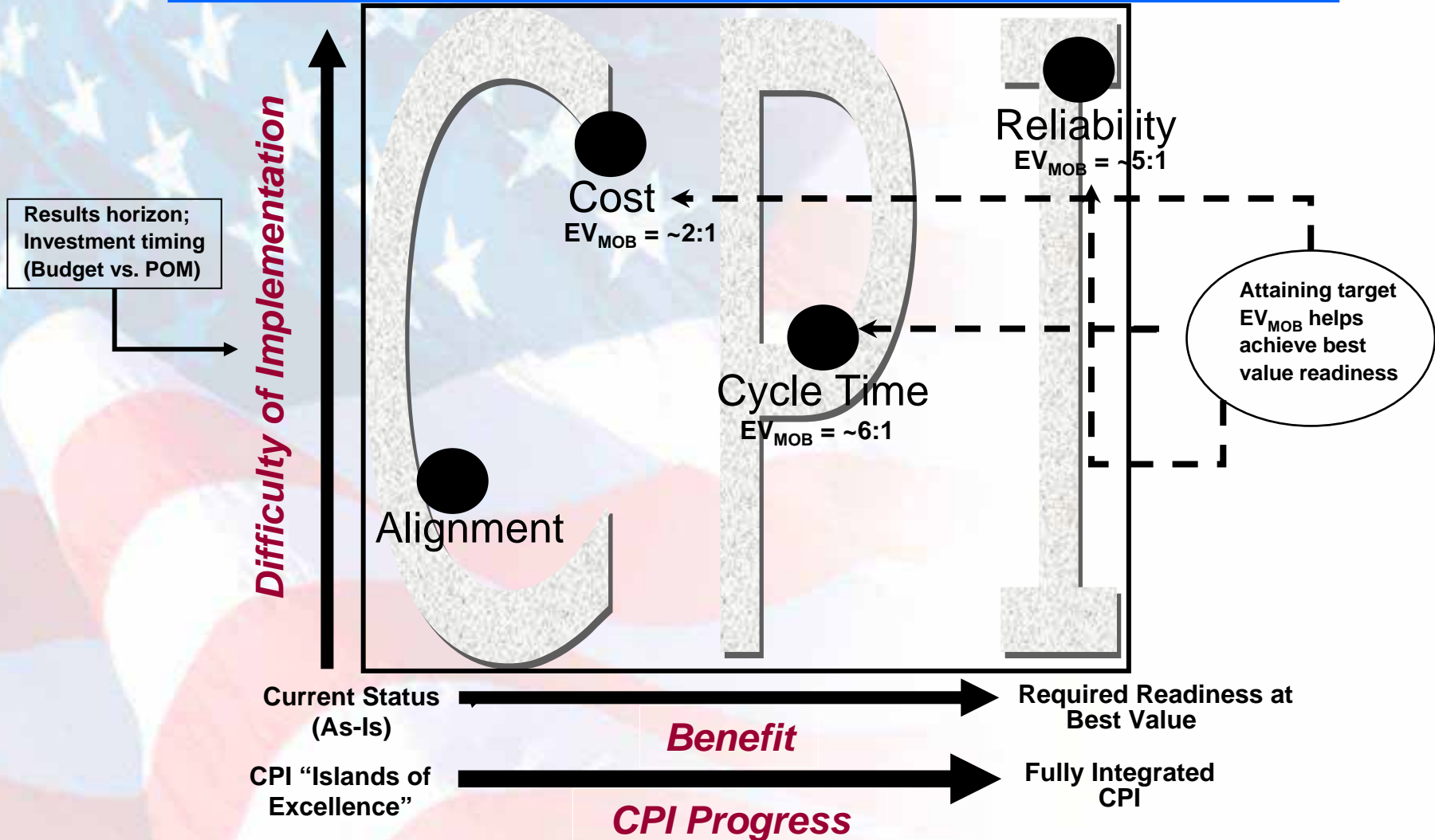
3X+ improvement in Time on Wing (TOW) with Comprehensive Reliability Centered Maintenance vs. Current On-Condition Practices

Focus on Continuous Improvement (Maintenance Cycle Time)





Applying CPI in each area in an integrated manner achieves maximum benefits



EV_{MOB} = Expected value for magnitude of benefit



SUMMARY



OSD and DoD Components

- Identify Strategic Materiel Readiness Requirements
- Employ useful Materiel Readiness Standards/Measurement Tools/Processes
- Resource to achieve/sustain Materiel Readiness most efficiently/effectively

Five Pillars for Sustaining Materiel Readiness

- Policy (E2E)
- Measuring materiel readiness
- Optimizing materiel reliability
- Optimizing materiel turnaround time/cycle time
- Balancing resources

UID/SIM
enables
this!

