Managing the Right Projects: Best Practices to Align Project & Corporate Strategies

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NASA Marshall Space Flight Center (MSFC)

If there’s a human endeavor that exemplifies teamwork, it is space exploration. And that teamwork absolutely cannot happen effectively if the boots on the ground – the people doing the work - don’t understand how their work aligns with the larger goal. This presentation will discuss some best management practices from NASA’s Marshall Space Flight Center that have succeeded in helping employees become informed, engaged and committed to the space agency’s important missions.

Specific topics include:

- Alignment Criteria: Linking Projects To Corporate Strategy
- Strategic Analysis: Supporting Decision Making In A Changing Environment
- Communication Strategies: Best Practices To Communicate Change
- Benefits Achieved And Lessons Learned

I. Introduction

The National Aeronautics and Space Administration’s mission is to serve as a research and development organization for aviation and space technologies critical to the United States technological and economic success. NASA’s work falls into four main areas:

- **Space Technology**: Creating new capabilities and spacecraft for affordable, sustainable human and robotic exploration
- **Science**: Exploring the Earth-Sun system, our own solar system, and the universe beyond.
- **Human Exploration and Operations (HEO)**: Operating the International Space Station and prepare for human exploration beyond low Earth orbit.
- **Aeronautics**: Enabling a safer, more secure, efficient, and environmentally friendly air transportation system by pioneering and proving new flight technologies that improve our ability to explore and which have practical applications on Earth

NASA accomplishes this with a budget that is less than one half of one percent of the entire federal budget.

The Marshall Space Flight Center in Huntsville, AL, is one of 10 NASA field centers around the nation. It works under the direction of headquarters in Washington, D.C. Each center has its own unique role in meeting the agency’s goals. Marshall has an annual budget of approximately $2.5 billion and approximately 5,500 civil service and private contractor employees. Marshall has about 4.5 million square feet of occupied space.
I. Alignment Criteria: Linking Projects To Corporate Strategy

Marshall sets strategy and then works to align organizations to this strategy through two key elements: having the right structure in place and having strong leadership with strong employee relationships to communicate down-and-in.

Having the right structure in place to promote discussions and determine where there are breakages or where important decisions need to be made is critical. Mr. Watkins will discuss channels Marshall has in place which allows leaders to bring up issues, share information and promote best practices, all with the goal to keep the organization aligned and engaged with the center’s direction. He will share insight into Marshall’s governance structure, as well as vehicles which help leaders continually understand the current environment as it relates to the center’s business.

He’ll discuss how leaders share the centers goals and priorities down-and-in the organization, including providing real-time examples of how strategies align at the program/project level so that employees understand where the center is going as an organization and how their work directly supports the goals. He’ll also share some leadership qualities that are important to overall success.

II. Resource Management: Best Practices For Resource Management

In a challenging environment, such as the one his center continually faces, Mr. Watkins will describe how critical it is to constantly look at resources and monitor capabilities to ensure Marshall Space Flight Center is equipped to meet current and future agency goals. Much of Marshall’s success has been due to forward planning, keeping a constant eye on where the center needs to go and what workforce numbers, skills, and capabilities will be needed to accomplish both current and future missions.

Marshall has a dedicated Performance and Capabilities Management Office (PaCMO) within OSAC that helps provide information to facilitate this forward look. This office provides Center-wide independent technical, schedule, management, and resource evaluations and assessments of Marshall’s programs, projects, and mission support activities. They continually analyze data to accurately characterize the Center's programmatic and institutional alignment, health, and performance and provide policy and resource recommendations to Marshall’s top leadership to facilitate communication and critical executive management decisions.

Mr. Watkins will discuss a key tool the center uses, called SmartBooks, which are provided to management regularly and provide analytical and graphical methods and techniques to integrate and display performance information to facilitate and focus senior level discussions, highlight issues, and provide for more informed decision-making.
III. Strategic Analysis: Supporting Decision Making In A Changing Environment

Marshall is focused on understanding the ‘whole picture’ of their environment – both inside and outside the center and the agency. To accomplish this, the center engages in multiple avenues of strategic analysis to provide critical information and support Marshall leadership decision-making.

To ensure they have a pulse on the external global environment, including the political environment, space policy, industrial base, etc., OSAC helps to provide continual environmental monitoring and strategic research and analysis of stakeholders and the external environment. The goal is to ensure alignment with agency direction, but with a close eye on changes and events in the external environment that could impact the center’s business.

Internally, Marshall leverages its strategic analysis capability to improve its overall business, providing ongoing assessments of project and institutional performance; and engineering cost-estimating, for example. OSAC continually collects information from around the center for Marshall leadership on important topics, such as budget strategy, product line health, strategic investments, mission support goals, and integrated workforce pictures, and then use that information to develop options and recommendations for leadership consideration. The center’s strong analysis function helps in analyzing and facilitating new work and partnerships, support major strategic planning initiatives, monitor and assess the environment, and manage and integrate center investments, to name just a few key examples.

IV. Communication Strategies: Best Practices To Communicate Change

Communication is perhaps the most critical element to the success or failure of any organization. Mr. Watkins will discuss the importance of focusing on employees as your most critical stakeholder group and ensuring there is open, honest and two-way communication with this group. He will discuss the importance of face-to-face leadership visibility in communicating with employees, and discusses some of the strategies and vehicles Marshall pursues in promoting this type of communication, including hosting regular All-Hands meetings and Executive Road Shows. He will also share some of Marshall’s efforts to venture into social media, such as creation of an internal networking site called ExplorNet.

Mr. Watkins will also share how Marshall is promoting effective communication across the center and ensuring alignment with center goals through development of the Marshall Integrated Strategic Communication Plan, or MISCP. This plan is designed to align center communication activities to the center’s business strategy; enable the center to prioritize its communication activities and resources most effectively to help implement center strategy; and use communication to create, preserve, and strengthen support for Marshall across multiple stakeholder groups. Mr. Watkins will discuss best practices in developing this plan, including understanding the current global environment, space policy, and center strategies in order to develop meaningful communication goals and objectives.

V. Benefits Achieved And Lessons Learned

Finally, Mr. Watkins will share a summary of some of the benefits achieved and lessons learned that can be gleaned from his overall discussion.
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PMO Summit 2012
Today’s Discussion

• The NASA Environment
• Challenges Facing NASA/Marshall
• Best Practices
  • Linking Projects to Corporate Strategy
  • Resource Management
  • Leveraging Strategic Planning and Analysis
  • Communication Strategies
• Benefits Achieved
• Lessons Learned
The NASA Environment
The National Aeronautics and Space Administration

Marshall supports three of the NASA Mission Areas.
Marshall has a key role in NASA’s mission.
## Marshall’s Role in Space Exploration

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<tr>
<th>Lifting from Earth</th>
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<td>Propulsion and Transportation Systems</td>
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<td>Shuttle</td>
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<td>Ares</td>
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<td>Heavy Lift</td>
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<th>Living and Working in Space</th>
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<tr>
<td>Human Exploration Systems and Operations</td>
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<td>International Space Station</td>
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<td>• 24-Hour Science Operations Support</td>
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<td>• ISS Science Experiments</td>
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<td>• Environmental Control and Life Support Systems</td>
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<th>Understanding Our World and Beyond</th>
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<td>Scientific Spacecraft, Instruments and Research</td>
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<td>• Weather Prediction</td>
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<td>• Hurricane Research</td>
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<td>Lunar Science Robotic Missions</td>
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<tr>
<td>Space Science</td>
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<td>Studying our solar system and universe</td>
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Challenges Facing NASA

- Widespread congressional interest in NASA’s future direction
- Frequent changes in mission due to new presidential administrations
- An eroding budget on irregular cycles
- Workforce reductions
- Aging facilities
- IT issues
Setting Direction for NASA

National Policy Context

(Executive Branch)
- American leadership
- U.S. space policy
- National security
- Engage commercial
- Expand international cooperation

Congress’ Role and Interests

(Legislative Branch)
- Authorization and Appropriation
- Workforce levels
- Agency practices
- Shuttle Retirement
- Continued use of the ISS
- Role of commercial providers

Federal Spending for Discretionary Programs Continues to Decrease

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<td>2007</td>
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Source: Office of Management and Budget
Best Practices
Aligning Projects to Strategy
The **purpose of governance** is **to ensure alignment** of the organization’s work and resources to accomplish its strategic direction and goals.

A healthy governance system facilitates changes in the way we work and think – so we can be aligned and adaptable.
Leadership Engagement

- **Show employees how they contribute** - share center goals down and in the organization, helping employees understand how their work aligns.

- **Treat employees with respect** - regardless of their status within the organization.

- **Create an open culture of communication and collaboration** – to regularly solicit employee ideas and concerns.

- **Make the right decision** – Great leaders do what’s right.

- **Continually share information** – Keep employees informed and engaged.
Resource Management
Resource Management is Critical

- Ensure we’re equipped to meet current and future agency/center needs by maintaining appropriate workforce numbers, skills, capabilities
- The Performance & Capabilities Management Office (PaCMO) provides:

  - **Resource and Performance Assessments**, such as:
    - Integrated budget and workforce development
    - Center investment analysis and recommendations
    - Program/project investments

  - **Capability Development and Readiness**, including:
    - Program planning and control capability development
    - Project formulation support
    - Project management

- Analyses and resulting policy and resource recommendations are provided to Marshall’s top leadership to facilitate decision making
Resource Management

SMART BOOK EXAMPLE

Work Forecast

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<td>Current &amp; Highly Probable Total</td>
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<tr>
<td>Moderate &amp; Low Prob.</td>
<td>New Work</td>
<td>New Work 80%</td>
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Leveraging Strategic Planning and Analysis
Strategic Planning and Analysis – External Environment

• Conduct environmental monitoring of stakeholders and the external global environment, including:
  • Political environment
  • Economic/budget environment
  • Space policy
  • Local, national, international interests
  • Aerospace industry needs
  • Competitor positions and interests

• Frequently provide information to executives through email publications; reports; white papers; stakeholder biographies, etc.
Strategic Planning and Analysis – Internal Environment

- Leverage strategic planning and analysis internally to improve the business by providing detailed information on topics such as:
  - Budget strategy
  - Strategic investments
  - Integrated workforce picture
  - Ongoing assessments of project and institutional performance

- Use information to develop options and recommendations for leadership consideration.

- Strategic analysis helps in facilitating new work and partnerships and supporting major strategic planning initiatives.
Communication Strategies
Using Communication to Keep Employees Engaged

- Provide Frequent and Open Communication
- Ensure Face-to-Face Leadership Visibility
  - All-Hands Meetings
  - Executive Road Shows
  - Videos and Blogs
  - Social Media
- Provide Avenues for Employees to Offer Feedback
- Coach Leaders on Leveraging Communication to Manage Through Change
The Marshall Integrated Strategic Communication Plan (MISCP):

- Aligns center communication activities to center business strategy
- Helps prioritize the center’s communication activities and resources
- Uses communication to create, preserve, and strengthen support for Marshall across multiple stakeholder groups
- Helps the organization communicate proactively and strategically versus reactively
Benefits and Lessons Learned
Benefits Achieved

- Alignment of work and resources to strategic direction helps to:
  - Ensure a focused organization that responds quickly to change
  - Encourages leader and employee buy-in and engagement
  - Increases ability to “brand” your organization
Lessons Learned

• Always analyze and plan – for multiple scenarios

• Know where your organization is heading and share this early and often to get everyone on the same page

• Continually build positive employee relationships – not just during the challenging times

• Maintain constant and open communication

• Be collaborative – provide opportunities for feedback