

## **The Project Delivery Environment Box Score: A Quantitative Approach to a Qualitative Dialogue<sup>1</sup>**

**Ryan Daugherty**

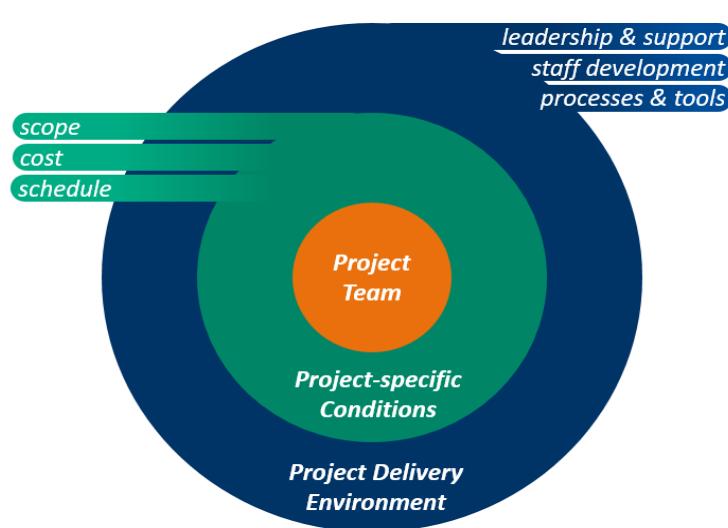
### **Overview**

Adding value in today's global marketplace is accomplished more through teams of people working together on projects than any other work platform.

While project-specific conditions may drive individual project success, the organization's project delivery "*culture*" - *organizational alignment, leadership engagement, development of project staff capabilities, supporting functions, processes, methods, tools* – provides the foundation for collective delivery effectiveness and sustainable success.

### **Dimensions of the Project Delivery Environment**

We tend to think of project success in three project-specific "dimensions" - **scope, cost, and schedule**. *"Did we deliver what the client wanted within the budget and on time?"* These, along with other project-specific measures, can give us a very accurate indication of our success for each project we deliver. In focusing on these project-specific measures, we can lose sight of the influence of the *enterprise* project delivery environment.



*Figure 1: The Project Delivery Environment*

Experience indicates that several common attributes and characteristics define the enterprise project delivery environment. We have grouped the primary influences into three major "dimensions":

**Leadership and Organizational Support:** The project delivery practice has a high level of focus and commitment from senior leadership. The organizational structure – *including support groups* – is centered on project delivery as a core enterprise competency.

**Staff Knowledge and Development:** The enterprise has a clearly defined career path for – and *high value of* – project delivery

<sup>1</sup> How to cite this article: Daugherty, R. (2021). The Project Delivery Environment Box Score: A Quantitative Approach to a Qualitative Dialogue, *PM World Journal*, Vol. X, Issue III, March.

practitioners and is fully committed to the continuous development of staff knowledge and skills.

**Processes and Tools:** The delivery practice is committed to a core "model" of the project delivery "workflow" that provides practical and proven methods, guidance and tools geared to the capabilities of performing staff, and is consistently used day-to-day by all teams. The "model" is also used as the basis for learning and continuous improvement.

## The "Box" Score

Developing a supportive **Project Delivery Environment** requires a sound understanding of current strengths and weaknesses and how they align with the attributes and characteristics of value to the enterprise and its project delivery teams. This understanding is frequently accomplished through comprehensive analyses of a wide range of delivery processes using project management "maturity" models, often involving outside consultants.

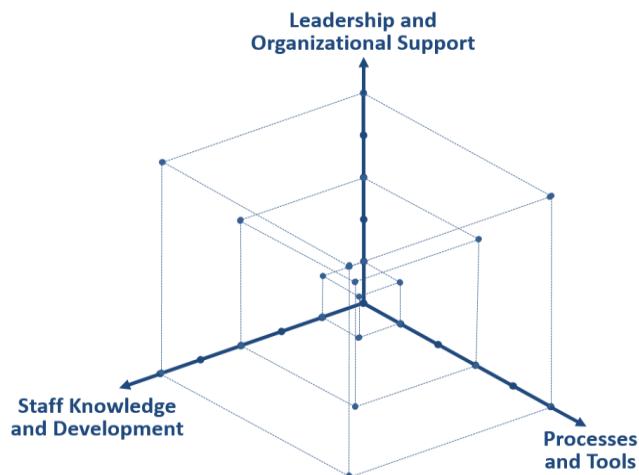
While there is significant value in that approach, we believe that there is equal value in identifying areas of strength and weakness and opportunities for improvement quickly and "organically" with internal resources. Enterprise leadership, project delivery participants, and stakeholders understand their situation – *capabilities, capacities, needs, and constraints* – better than any external source. And, there is much to be gained through the dialogue that takes place.

The "Box Score" approach proposed here uses the three "dimensions" and a simple "quantitative" scoring regimen - where one (1) = Chaos and five (5) = Excellence. The objective is to use the scoring process to initiate a "qualitative" dialogue. Where do we stand and what are our opportunities for improvement?

**Two steps:** A quick assessment then a more comprehensive dialogue:

The **Quick Assessment Scenarios** (Appendix A) and **Scoresheet** (Appendix B) help participants understand the concept and quickly obtain individual perspectives on the three "dimensions."

The more comprehensive **Evaluation Criteria** (Appendix C) provide a richer understanding of specific areas in need of improvement and establish a sound basis for planning improvements. The **Criteria** are intended for use in an open dialogue, generally a **Workshop**, to arrive at a common understanding of terms, consensus agreement about strengths and weaknesses, needs and priorities, and parameters for planning improvement actions. Participants should include enterprise leadership, project delivery teams, supporting functions as well as appropriate stakeholders.



*Figure 2: The “Box Score”*

A useful approach is to have participants independently perform a Quick Assessment with the Scenarios and bring it to a Workshop. Then – as an "ice-breaker" - open the Workshop by creating a composite Quick Assessment and discuss the meaning of the dimensions and rationale for scoring. The Quick Assessment can be set aside for comparison with the results of the more detailed evaluation performed by the group.

*The real value here is in the qualitative dialogue: the discussions, considerations, and agreements that went into reaching consensus on the meaning of the terms, the resultant "scoring," and its' importance to the enterprise.*

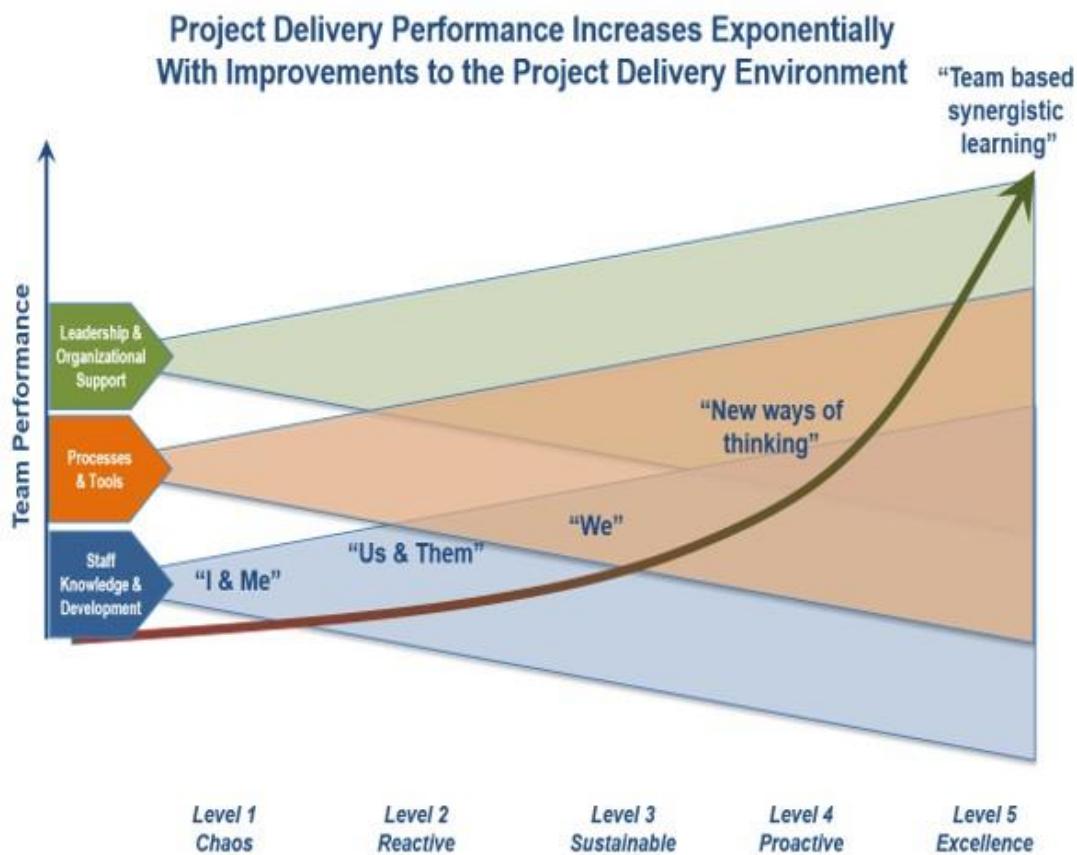
## **Building a Better Practice: It's About Continuous Learning**

The "dimensions" of the project delivery environment are interdependent and synergistic. Processes and Tools are essential for Staff Knowledge and Development, and both are dependent on Leadership and Organizational Support. The adage that a chain is only as strong as its weakest link is in play here.

A truly sustainable and supportive project delivery environment has developed and fully integrated the characteristics comprising these dimensions and is continuously seeking ways to improve them. The maturing of those characteristics into an authentic "learning culture" is the goal.

## **Improving the Project Delivery Environment**

The needs of one enterprise will differ from every other enterprise; no single solution will create a sustainable and effective project delivery environment. But the patterns are very similar. Once leadership and project delivery teams have developed a consensus about an effective project delivery environment, how they stack up, and where it should be, it's time to take the first steps toward that ideal.



*Figure 3 Performance Improvement*

Here are a few ideas for each "dimension" to help you get started:

#### **Leadership and Organizational Support**

- Establish senior leadership alignment, endorsement, and commitment to project delivery practice as a core enterprise competency – *an enterprise "value stream"* - by engaging in a Chartering Workshop. Senior leadership, project leaders, supporting function leaders, and key stakeholders should focus on customer needs and current project delivery practice and create a vision for the future development of the project delivery practice. This effort should result in a formal charter for the project delivery practice documenting consensus agreement on vision, mission, and goals.
- Enhance organizational support for project delivery – *and vice versa* - by building on the Project Delivery Charter to include Project Delivery/Support functions:
  - Support function – *accounting, health and safety, supply chain, et al.* - and project delivery leaders and staff should identify and document interfaces and establish specific needs and requirements for each interface point - *transactions*. This effort

should coincide with developing the Core Project Delivery Workflow described in Processes and Tools (below). Because these "interface transactions" rarely affect only two entities, this effort should be accomplished in the presence of all support functions to establish a common – *across the enterprise* - understanding of the interface requirements and agreements and avoid "silos," The process of developing these interface agreements sets the tone for cooperation and future work together.

- Establish addenda to the Project Delivery Charter for each Support Function formalizing consensus agreements on vision, goals, commitments, and expected outcomes from working together.
  - Based on the Project Delivery Charter and addenda, establish and formalize action plans for building an improved Project Delivery culture, including:
    - Establishing a formal project delivery practice, including potential key performance measures.
    - Defining organizational authorities and responsibilities for project delivery
    - Establishing core project delivery processes and tools
    - Establishing and developing project delivery staff resources

## **Staff Knowledge and Development**

- Review current and intended project delivery and management career paths. Perform a gap analysis with practitioners to identify career path shortcomings. Work with enterprise leadership and project delivery practitioners to develop a consensus vision of the career path for project managers and project delivery staff. Typically, project management career paths are based on graduated steps tied to organizational priorities, proven competency and are directly linked to compensation levels.
  - Establish career path definitions and requirements that align with other career paths, enterprise requirements, and the project delivery model. Professional career paths should be structured to embody "equivalence" ... a "technology-oriented" person should not feel compelled to change to a project management career because they can move faster or have more prestige. *Our experience shows that far more people want to be project managers than people who want to manage projects.*
  - Evaluate project career path requirements and perform a gap analysis to identify needed improvements in formal learning programs, process guidance and tools, and methods for verifying achievement.

**CAUTION:** Use care to avoid creating unwarranted expectations. Advancement should be based on proven success and need, not just the achievement of "merit badges." Base career path levels on formal learning and demonstrated achievement as well as enterprise need.

- Consider establishing - or upgrading - a formal mentoring and coaching program aligned with the project delivery model and career paths. Socialize the importance of mentoring and coaching through workshops designed to match experienced and willing practitioners with appropriate staff. Bear in mind, though, that not every experienced practitioner can – *or wants to* - be a successful mentor. Use care in selecting mentors to make sure they are good teachers.

### Processes and Tools

- Engage leadership, project delivery leaders, staff, and support functions to establish a Core Project Delivery System model - *the preferred project delivery process*. It is typically a graphic representation or - "infographic" or "workflow" – depicting the system, its primary activities, sequence of performance, and its interfaces. The process of developing the "model" also provides a common ground for building team empathy, trust, and an appreciation of needs, requirements, and diversity of thinking.

The enterprise should then use the "model" for:

- Establishing agreement on typical project delivery activities and their sequence
  - The context for identifying support group interface points and requirements
  - The context for developing, evaluating, and organizing guidance and tools
  - The context for identifying, describing, and evaluating opportunities for improvement and a basis for continuous improvement efforts – *what's working and what's not!*
  - The basis for establishing performance measures and indicators.

The model produced through this effort should be in reasonable detail to provide training for new staff and allow support groups and stakeholders to understand the process and their role.

**CAUTION:** A common objection to this approach is that the "model" is seen as rigid, that it requires strict conformance and stifles creativity. We would argue that a clearly documented, well-maintained and consistently used model describing the "preferred" delivery approach provides a sound framework for capturing creative approaches and sharing them with others as discoveries are made, and lessons are learned. The creativity and imagination should go into its "products" – plans, schedules, estimates, forecasts, reports, and into improving the model and its usefulness.

- Develop an inventory of existing guidance and tools using the Core Project Delivery System model as the context for organizing the information. Review each activity and identify the tools and advice that support its performance. Then use the "model" as a simple and intuitive framework for guidance and tools – a "knowledge hub" or "kiosk." *Users – project staff, support groups, and other stakeholders – can then review the process flow, find out where they are in the process, then access the guidance and tools for that activity.*
  - While developing the "model," review the available guidance and tools for each activity and interface area. Work with performers to identify the adequacy and value of the existing guidance and tools and identify additional guidance and tools that would enhance the quality and value of the activity and its products. It is important to focus on User needs and simplicity

– “What do I need to know to do this job right?” *It’s a place to tell them what they need to know, not everything that you know.*

- The process of developing the system model and the evaluation and organization of the guidance and tools provides an excellent opportunity to consider the incentive the delivery teams and other performers have to use it. Evaluate roles and responsibilities and establish performance measures and incentives accordingly.

**Summary:** The power of this approach is threefold. First, the “Box” Score model presents a simple but comprehensive methodology for the team to evaluate its current performance level in all three dimensions. Secondly, it provides a sound basis for devising steps and pathways the enterprise may take toward project delivery excellence and a foundation for continuous improvement. Last, and equally important, it provides the enterprise with an opportunity to bring functions *that are often at odds* together to establish an appreciation of needs and new ways of working together - *working agreements* - that last.

**NOTE:** A Powerpoint presentation including the Scenarios, Scoresheet, Evaluation Criteria and Planning Worksheets are available, without charge, from the author.

## About the Author

The **Approach** described in this article was designed and developed by:



# Ryan Daugherty

Washington, USA



**Ryan Daugherty** is the designer/developer of the Process|Simple™ Platform for Project/Process Knowledge Hubs. He has nearly 50 years of hands-on project delivery management experience with the Boeing Company, CH2M HILL (now Jacobs), among others. He has consulted on public and private sector projects worldwide. Email: [RyanDaugherty@RyanDaugherty.com](mailto:RyanDaugherty@RyanDaugherty.com)



Dave Ellison

Colorado, USA



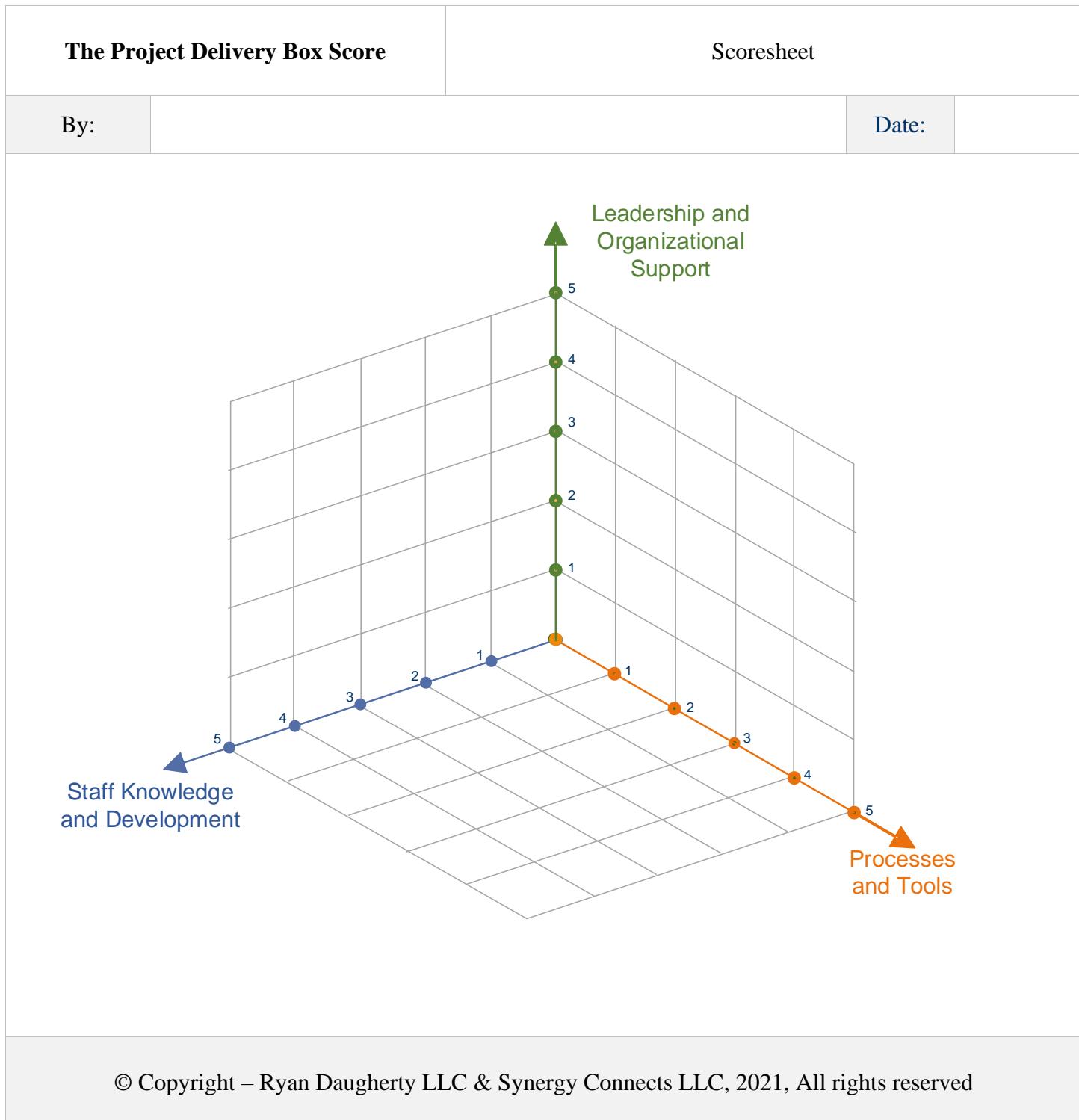
**Dave Ellison, P.E.** is the founder and owner of Synergy Connects, LLC focussed on leadership and team learning. Dave draws on his 27 years of experience as a project/program manager for CH2M HILL (now Jacobs). In 1995 he led the team that developed and implemented the company's Project Delivery System. Email: [Dave\\_Ellison@SynergyConnects.com](mailto:Dave_Ellison@SynergyConnects.com)

## Appendix A – Quick Assessment Scenarios

The Project Delivery Box Score		Quick Assessment Scenarios
Score	Leadership and Organizational Support	
5	<b>Excellence</b>	Project delivery practice is seen as a core enterprise competency. All support processes are fully integrated with the enterprise project delivery system for mutual effectiveness. Enterprise leadership closely follows project delivery throughout and engages in regular meetings and briefings.
4	<b>Proactive</b>	Enterprise leadership is involved in establishing performance thresholds and participates in project reviews. Performance targets are set and managed on qualitative and quantitative bases. Leadership is involved in analyzing the effectiveness of planning and management methods.
3	<b>Sustainable</b>	Leadership recognizes project delivery as a "practice," and the enterprise has a formal system that collects and reports project delivery performance information. Project-facing support functions are responsive to project needs as well as enterprise compliance requirements.
2	<b>Reactive</b>	Leadership is focused on individual projects, receives informal project reports, and manages by exception. Project teams have little or no coordination with other projects for resources to perform the work.
1	<b>Chaos</b>	Leadership sees projects as "one-off" independent endeavors. Enterprise has little or no structure to support project delivery. Project delivery teams and project managers are left on their own and get little or no direction unless – <i>or until</i> – problems arise.
Score	Staff Knowledge and Development	
5	<b>Excellence</b>	There is a clearly defined career path for project managers and established learning programs for all project delivery functions. Appropriately skilled and experienced project managers and staff engage in formal mentoring and coaching. All training is fully integrated with the enterprise project delivery model.
4	<b>Proactive</b>	Enterprise recognizes project managers and project delivery practice as valuable, strategic resources. Internal training in project delivery methods is becoming available. External training and certification are encouraged for all staff.
3	<b>Sustainable</b>	Enterprise recognizes project management as a formal career path and encourages participation in external certification programs. Minimum competencies required for project delivery staff are identified and incorporated into the project management and delivery career path.
2	<b>Reactive</b>	Some enterprise recognition of the value and importance of project management and delivery career development. Some training for project delivery staff is available but is mostly on-the-job experience supplemented by external courses.

1	<b>Chaos</b>	There is no recognition of project management and delivery as a career path. Project Managers are selected by factors other than project delivery knowledge and experience. Projects are under-staffed. Project success is more of a matter of chance and is highly dependent on individual efforts.
	<b>Score</b>	<b>Processes and Tools</b>
5	<b>Excellence</b>	Enterprise-standard processes, methods, and tools are considered of high value and competitive advantage. Enterprise has developed a "model" project delivery system. Continuous improvement has become part of the project delivery culture. Access to guidance and tools is intuitive and straightforward.
4	<b>Proactive</b>	Methods and tools are "standardized," fully integrated with project delivery and support processes, are consistently used across all projects, and their effectiveness is frequently reviewed for opportunities for improvement.
3	<b>Sustainable</b>	An enterprise-wide set of project management processes and tools has been established. New projects follow a consistent process and use tools scaled from this set of processes. Lessons learned from discoveries and mistakes are documented and shared across the enterprise.
2	<b>Reactive</b>	Individual Project Managers select how they manage their projects, resulting in consistency within projects managed by the same Project Manager. Project management tools are used inconsistently and generally as solutions to performance problems.
1	<b>Chaos</b>	Few if any organized project management processes exist. Each project is viewed as unique and autonomous. Project management and delivery tools are non-existent or developed on an ad hoc basis. There is little or no quality control over their use.

### Appendix B – Scoresheet



© Copyright – Ryan Daugherty LLC & Synergy Connects LLC, 2021, All rights reserved

## **Appendix C: Evaluation Criteria**

The Project Delivery Box Score		Evaluation Criteria
Attribute	Characteristic	Description
<b>Leadership and Organizational Support</b>		
<b>Enterprise Recognition</b>	Role in the Enterprise	Does the enterprise – leadership and staff - recognize project delivery as a "core" component of the business – rather than as an "adjunct process"?
	Values and Expectations	Are there clear directions, values, and expectations for project delivery performance in enterprise business planning?
	Participation	Does the enterprise leadership team collaborate with and actively oversee the enterprise project delivery functions?
<b>Resource Commitment</b>	Team Culture	Is there a team-oriented project delivery culture fully committed to sharing knowledge and experience and accomplishing work together?
	Project Resources	Is there a proactive leadership group that continually monitors and balances project delivery staff requirements – quantity and capability?
	Support Resources	Are there adequate and effective resources to support project delivery needs (i.e., accounting, supply chain, human resources, health and safety, environment and sustainability, etc.)?
<b>Organizational Integration</b>	Alignment	Is there a high alignment and integration between leadership, project delivery functions, and support functions?
	Commitment	Is there a collective commitment to achieve organizational and client performance goals?
	Visibility	Are both client and organizational project delivery performance goals clearly articulated and visible to the entire organization?

The Project Delivery Box Score		Evaluation Criteria
Attribute	Characteristic	Description
<b>Staff Knowledge and Development</b>		
<b>Career Path</b>	Formal Career Path	Is there a clear and formally established career path for project managers and project delivery professionals?
	Staff Knowledge of Requirements	Is there a formal program for introducing potential participants to the requirements for advancement on the career path – learning, experience, achievement, and enterprise need?
	Staff Acceptance and Participation	Do project managers and staff recognize the value of pursuing appropriate project delivery career paths?
<b>Formal Learning Program</b>	Structure and Alignment	Does the enterprise have a formal project management/delivery program for individual and team learning aligned with project delivery career paths?
	Alignment with Enterprise	Is the learning program aligned with and supportive of the delivery processes used, the project types delivered, and all interfacing enterprise functions?
	Staff Engagement	Does leadership encourage participation, and are project management and delivery staff engaged in the active pursuit of the learning program?
<b>Mentoring and Coaching</b>	Structure/ Alignment	Is there a formal mentoring program - intervention and coaching - aligned with career path development and learning programs?
	Responsibilities/ Participation	Are staff appropriately assigned responsibilities as mentors/coaches and coached, and have those roles been accepted?
	Leadership Oversight	Does leadership take an active role in monitoring and directing the mentoring program

The Project Delivery Box Score		Evaluation Criteria
Attribute	Characteristic	Description
<b>Processes and Tools</b>		
Model Delivery Process	Project Delivery Workflow	Is there a universally accepted model workflow (major activities, sequences, etc.) for planning and managing the different types of projects that the enterprise delivers?
	Range of Coverage	Is there appropriate performance guidance for all delivery process activities used – or should be – by the enterprise, including interface activities with support processes?
	Process Integration	Do the delivery processes and supporting processes work together to support the performance of other enterprise processes?
Value of Content	Effectiveness of Guidance	Is the process guidance complete, proven, understandable, and result in consistently successful performance?
	Efficiency of Tools	Are appropriate tools and references integrated with guidance to support the performance of delivery process activities? Do they provide consistent results?
Consistency of Use	Continuous Improvement	Are the delivery process models, guidance and tools used as the basis for identifying, evaluating, and improving the quality, efficiency, and effectiveness of project delivery?
	Accessibility	Are the delivery process models and their guidance and tools easily accessible to all participants - easy to understand and use and, intuitively organized for users.
	Incentive for Use	Do project delivery teams and supporting functions understand the benefits of using the processes, and are meaningful and appropriate incentives in place and understood?
	Commitment	Are the project delivery teams and supporting functions accepting of and fully committed to using the model delivery processes and tools - and to their improvement?