

# Optimizing Myers-Briggs Type Indicator Training: Practical Applications

Dr. Jennifer Tucker  
Otto Kroeger Associates

*While many in the DoD systems development community have been exposed to the Myers-Briggs Type Indicator (MBTI)<sup>®</sup> assessment, many acknowledge not actively applying its insights to their work. Ultimately, because every system begins and ends with the human mind, the cognitive theory that underlies the MBTI is directly applicable to development work and management. This article summarizes practical ways to apply the MBTI to project and systems management.*

Most experienced hands in the DoD system development community have encountered the MBTI assessment. A common tool for better understanding communication, leadership, and teams, the MBTI has been administered to millions of people over more than three decades. That means a lot of workshops, a lot of money, and a lot of hours.

Despite this, trainers frequently find themselves leading MBTI workshops where most participants have taken the assessment before, but where few remember the preference scales or their personal type preferences. Even fewer are able to describe how they have used type to better manage themselves, others, and the projects they lead. A recent participant at a Defense Acquisition University workshop I facilitated captured it best: “DoD implementation of the MBTI has historically been, at best, suboptimal.”

This article reviews practical and concrete methods for applying the MBTI assessment and its underlying theory of psychological type. An applied understanding of psychological type to solve problems helps build better systems and can improve the optimization and ROI on MBTI training programs.

## Psychological Type

The MBTI assessment is based on the work of Carl Jung, a Swiss psychiatrist who developed psychological type, one of the most comprehensive theories explaining human personality. The psychological type model proposes that we each have in-born preferences for how we get our energy, go about gathering information and making decisions, and generally orient ourselves to our world. The theory is captured in the four scales of MBTI assessment. Each scale represents a dichotomy of preferences. Just as you have a preference for writing with your right or left hand, type theory asserts that you have a preference for

one of two sides of each of the four scales. Figure 1 summarizes the scales and the preferences, with the center items being the dichotomies, also known as *preference pairs*.

Too often, MBTI workshops explain the scales and help people identify their preferences on the scales, but then reach the end of the time allotted. This leaves little to no time to explicitly relate the

---

**“An applied understanding of psychological type to solve problems helps build better systems and can improve the optimization and ROI on MBTI training programs.”**

---

principles of psychological type to the actual problems of project management and systems development. Another common occurrence is a workshop that focuses purely on relationship issues, but without an explicit connection between those relationships and the achievement of project goals.

## From Individual Preferences to Project Performance

The links between psychological type and project performance are strong. The way our brains function drives how we engage with projects. When people come together on a systems project, their preferences play out together at the project level. In fact, psychological type preferences can often be detected as specific project-level patterns that are either actively supporting or threatening success. As described in [2],

projects are often at the most basic level:

- Externally facing or internally facing (aligned with either Extraversion or Introversion).
- Fact driven or possibilities driven (aligned with either Sensing or Intuition).
- Product focused or customer focused (aligned with either Thinking or Feeling).
- Structured or emergent (aligned with either Judging or Perceiving).

What follows is an example of how individual psychological preferences play out at a systems level.

At a personal level, Judging or Perceiving relates to whether we prefer showing the world our decisions or our data gathering. Judgers tend to prefer closure, structure, and decisiveness in public, and keep their data gathering internal. Perceivers tend to prefer openness, flexibility, and adaptability—and keep their decisions internal. At a systems level, this is often reflected in how project teams manage changing requirements and the systems development process itself. Teams that emphasize Judging tend to work to minimize uncertainty, often attempting to lock in requirements early, consistent with a Waterfall development world view. Teams that emphasize Perceiving tend to take a more emergent adaptive approach to development, evolving designs based on the learning done over time.

The best systems development approaches blend closure and adaptation, characteristics of Judging and Perceiving. Examining the processes followed in well-constructed iterative, adaptive, and Spiral software development methodologies reveal this balance. These processes reflect fluidity in moving between activities that gather information (eliciting requirements, storyboarding), focus on decisions (deliverables sign-off, product releases), and those that blend the two (prototyping to both expose new needs and determine desired directions; testing to both expose bugs and resolve them).

At the individual level, the goal is to

<sup>\*</sup> MBTI, Myers-Briggs, and the Myers-Briggs Type Indicator are registered trademarks of the MBTI Trust, Inc.

identify preferences to arrive at one's four-letter personality type: ESTJ for Extraversion, Sensing, Thinking, Judgment and INFP for Introversion, Intuition, Feeling, Perception. A personality type is made up of the four letters that reflect the aggregation of a person's preferences on each scale: For example, I prefer Introversion (I), Intuition (N), Feeling (F), and Judging (J), so my *type* is INFJ. Understanding my type allows me to better manage my personal strengths and blind spots, on a project or in any other environment. At the project level, the goal is to balance all the preferences and their contributions across the project; this is because in the end, each of the eight preferences provides a benefit to a project. By learning to balance each pair of preferences, we can realize the contribution of each and mitigate the risk of over-emphasizing one at the expense of the other.

Table 1 summarizes the patterns I have seen on projects over the course of the past decade, where the overemphasis of one preference at the detriment of the other has translated into concrete risks on real projects. More examples of these are covered in both [2] and [3].

### Type as a Problem Solving and Decision-Making Model

Much of what leaders and teams do each day, including the tasks that support systems development, consist of two primary activities: taking in information and making decisions based on that data. As such, data gathering and decision-making are key components of planning and problem solving.

The second and third scales of the psychological type model, Sensing and Intuition and Thinking and Feeling, were identified as the mental functions by Carl Jung. Sensing and Intuition are the preferences that make up the perceiving function, or how we prefer to gather information. Thinking and Feeling are the preferences that make up the judging function, or how we prefer to make decisions. Together, these four preferences create a practical and easy-to-apply decision-making and problem solving model.

Table 2 (see the following page) represents the components of an all-function model for problem solving and decision-making. There are three steps to using this model:

1. Explicitly state the specific problem being faced, need to be filled, or the decision to be made. This can be harder than it sounds. Sensing groups tend to dive into the history and the details,

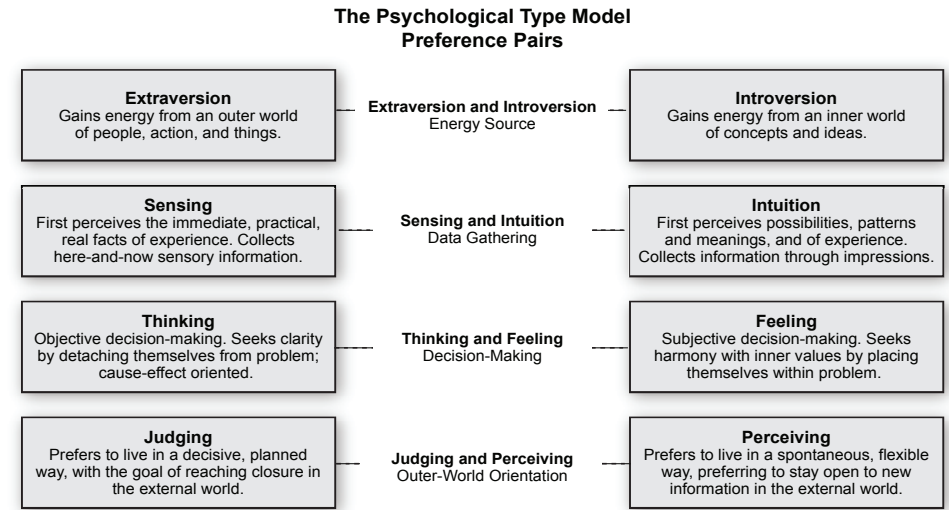


Figure 1: MBTI Assessment Preference Scales [1]

and must integrate these into a single statement that captures the building blocks. Intuitive groups tend to see everything as related, and must work to develop a statement that is concrete and specific enough to work with in a meaningful way.

2. Next, for that need or problem statement or decision to be made, ask the questions in Table 2. Most teams find it helpful to work through the questions in order. Block the time so that the group reserves an even amount of time for each of the four preferences.
3. Finally, identify the decisions, action items, and next steps that are suggested by the discussion, and craft a plan for implementing and communicating these.

I have seen groups effectively self-facilitate this process in a one- to two-hour

meeting. With some focus, these groups start to solve problems and make decisions that can have a genuine impact on project success. Through this process, the team also generally discovers which of the preferences come more easily to the group. Answering the questions linked to preferences that are on the radar will generally yield more familiar conversations (i.e., the content will likely already be on the group's view screen). For the preferences that come less easily to the group, the questions are likely to reveal new and fresh information that has not yet been previously considered. This is content that may have previously fallen under the radar; the associated type preference, therefore, might benefit from some additional attention.

### Type and Project Planning

This same all-function model can be

Table 1: Preferences Out of Balance Lead to Risks

MBTI Preference	Result of Overemphasis
Extraversion	Scope creep, if too much discussion leads to more action items, and possibilities spoken aloud are interpreted as directions and decisions.
Introversion	A lack of scope clarity and alignment, if people assume that others know the decisions and direction when (in fact) they do not.
Sensing	More time tracking than doing, if the team focuses too heavily on the granularity and specifics of schedule and task elements.
Intuition	Slipping timelines, if the concrete realities of task performance take longer than the big-picture visioning anticipated.
Thinking	Lack of user involvement and stakeholder buy-in, if technology-focused specifications overcome people-oriented interests.
Feeling	Lack of tough trade-offs and risk management, if the team works to keep all stakeholders happy and avoid necessary constructive conflict.
Judging	Project completion without project success, if the drive for closure overcomes the benefits of needed discoveries along the way.
Perceiving	Interim success without actual completion, if the pursuit of options leads to exhaustion of time and budget without a final product.

Preference	Effective Questions: “In Making This Decision or Solving This Problem ...”
<b>Sensing</b>	<ul style="list-style-type: none"> <li>• What is the current situation, as it is? What facts and details describe where we are?</li> <li>• What past experience can we learn from?</li> <li>• What are the important details on which to focus?</li> <li>• What should we keep that works?</li> </ul>
<b>Intuition</b>	<ul style="list-style-type: none"> <li>• What are the patterns or themes across the details and past experience?</li> <li>• What is the big-picture view? What is the vision we want to achieve?</li> <li>• Are there relevant models or concepts to help frame the issue?</li> <li>• What are the possibilities or options? What could we do?</li> </ul>
<b>Thinking</b>	<ul style="list-style-type: none"> <li>• What are the criteria that will determine the best approach? How will we decide?</li> <li>• What are our best alternatives with their respective pros and cons?</li> <li>• What are the most logical solutions?</li> <li>• How will we objectively assess success?</li> </ul>
<b>Feeling</b>	<ul style="list-style-type: none"> <li>• With whom do we need to collaborate and in what ways?</li> <li>• How will the proposed options and goals impact the various people involved or impacted in the situation?</li> <li>• Which approaches will promote maximum acceptance and ownership?</li> <li>• How will we communicate our plan to others?</li> </ul>

Table 2: All-Function Problem-Solving and Decision-Making Model [1]

applied to project planning. It is widely accepted that project planning done well can save time later, particularly when it is done with an eye to how uncertainty and change will be handled downstream. Given the importance of project planning, it is an attractive activity to consider through the lens of psychological type.

From a psychological type perspective, early planning—because it is by definition future focused—is often positioned under

the Intuition preference, with common references to visioning and thinking *outside the box*. Later, when work breakdown structures are underway, the more present and detail-focused Sensing preference may take center stage. When balanced well, all four preferences support effective planning:

- **Sensing:** Provides experience-based data and best practices that can help bridge the present to future vision.

Table 3: Equalizing Unbalanced Functions

Action	When Either Side is Overemphasized		Ways to Balance
<b>Data Gathering</b>	<b>Sensing.</b> Plans become an overly detailed compilation of people’s anticipated daily activities, and are too specific and all-encompassing to reveal the big-picture and general decision-making criteria.	<b>Intuition.</b> Plans become too abstract to be useful, miss the realities that are required to craft schedules and budgets, and are not grounded in concrete data to support daily decision-making.	<ul style="list-style-type: none"> <li>• For each element of the vision, take the time to break it down into the concrete action and steps that will bring that element to fruition.</li> <li>• Once the details are in place, regularly recheck to affirm alignment with the big picture.</li> <li>• If the project gets too <i>in the weeds</i>, take the time to identify root causes, patterns, and brainstorm possibilities.</li> <li>• If the project gets <i>lost in theory</i>, work to identify specific tactical steps that can be taken immediately to head in the right direction.</li> </ul>
<b>Decision-Making</b>	<b>Thinking.</b> Plans leave out the customer’s perspective and fail to spend adequate time on change management and communication.	<b>Feeling.</b> Plans omit the decision criteria and performance measures that will drive tradeoff decisions and objective measures of progress.	<ul style="list-style-type: none"> <li>• Develop objective criteria for alternative analysis and trade-off decision-making.</li> <li>• Assign both roles and specific times in the project schedule for stakeholder and customer outreach.</li> <li>• If the project overemphasizes products and problems, stop and take time to focus on how stakeholders are being consulted and included.</li> <li>• If the project is overemphasizing people concerns, ask what needs to be done to refocus on objective decisions.</li> </ul>

- **Intuition:** Provides future possibilities, patterns, and conceptual models for the future.
- **Thinking:** Provides objective evaluation criteria for decisions and trade-off analysis.
- **Feeling:** Considers how directions and decisions will be perceived by and impact different groups and people.

Table 3 summarizes what project plans can struggle with when the Perceiving and Judging preferences are out of balance, and some steps that can be taken to re-balance each pair.

### Balancing Preference Pairs at the Project Level

The discussion now turns to the implementation and communication phases, and how to balance issues like Extraversion and Introversion, as well as Perceiving and Judging, at the project level.

For example, Extraversion and Introversion are useful in understanding one’s source of energy at the individual level. At the project level, the preference pair can be useful for determining and monitoring stakeholder and team involvement and communication.

Projects that are out of balance towards Extraversion (too much external focus) can struggle from an over-involvement of stakeholders, leading to difficulties with expectations management and in keeping sensitive or incomplete ideas from being widely released. Projects that are out of balance towards Introversion (too much internal focus) can struggle with a lack of communication, and may fly so far under the radar that they lose upper leadership support.

For balancing Extraversion and Introversion, ask the following questions:

- Who should be involved in what kinds of project decisions and how will they be engaged?
- What is the needed breadth and depth of engagement with different stakeholder groups?
- How will we communicate and maintain connections with team members, senior leaders, and customers?

Judging and Perceiving—which relate to preferences for closure and openness—are invaluable tools at the project level for balancing both attentiveness to meeting milestones and openness to opportunities and contingencies.

Projects that are out of balance with Judging can struggle with coming to closure too early, with concerns about meeting milestones trumping considerations of new information. In these cases, contin-

agency planning is often left off the list, as the project team works to eliminate uncertainty rather than plan for it. Projects that are out of balance with Perceiving struggle with staying open too long, running out of time and resources as different alternatives are explored.

For balancing Judging and Perceiving, ask the following questions:

- What milestones will be set as check-in points, and how will these check-ins occur?
- How do we plan to be flexible? How will we know when a goal or objective no longer makes sense, and how will we regroup when that happens?
- What are some of the contingencies that would trigger a review of the project plan, processes, and proposed products?

### Maximizing the Return on Investment

Once they learn about the benefits of applying type to project and systems management, many managers ask whether they should be selecting team members based on preferences. It is tempting to want to take this route; however, because it evaluates preferences—but not skills, knowledge, or abilities—the MBTI assessment is not a valid tool for hiring, team selection, or promotion.

Instead, managers should construct a list of the behaviors and experiences that would ideally be reflected across a project team, or in a specific role that needs filling. The ideas explained in this article can be used to inform that list to select a diverse set of people for the team, or to identify individuals that would bring behaviors, skills, and experiences that are underrepresented. For example, systematically looking across the preferences may highlight skills that are needed, but that may not have been previously valued. The goal is to recruit a group of people that can deliver on those skills, regardless of their actual preferences.

It is never too late to integrate type or the MBTI assessment as a tool in project planning or execution. For example, a mid-point project review utilizing the all-function problem solving model may help reveal patterns in the project's risks that had not been detected, or actions that had not been previously considered to correct course. It can even be used at the end of a development project as the mission changes from development to longer-term operations or deployment. Wherever the project might be in its life, reviewing the benefits of each preference

## Software Defense Application

This article strives to connect relationship management with software development through a tool that many in the DoD are familiar with—but have not yet optimized in project delivery. It provides concrete examples of how the MBTI can be applied to better understand common software development challenges, building on MBTI knowledge that many DoD personnel already have, but are not yet clear on how to apply.

is a great step for continuous improvement. Start with this exercise, which asks some basic questions:

- When considering all eight type preferences, what are we doing well?
- What are we not doing so well?
- What do we need to do differently based on this?

Often, the answers will point to opportunities for greater balance across the preferences, to both maximize strengths and fill holes.

Systems development and IT professionals are frequently criticized for focusing on the benefits of a specific software or process tool, rather than focusing on the customer's functional need or problem. Too often, professionals marketing the MBTI assessment do the same thing: They market and deploy the tool without making the direct link to a problem or need that the customer actually has. This results in fun workshops and enhanced self-awareness for those who connect with the tool, but may not be the optimal outcome for the system as a whole, given the cultural investment in the MBTI across the DoD.

The reality is that the theory underlying the MBTI is a remarkably flexible one, and can be used as a diagnostic assessment and intervention tool at multiple levels: individual, team, project, and organization. Now that many DoD programs and projects have experience with the MBTI, it is time to take the next step, expanding its application to more deeply understand and address all the thorny challenges of project performance. Doing so will lead to better conversations, better teams, and better systems—one program at a time. ♦

### References

1. Rutledge, Hile. *MBTI Introduction Workbook*. Fairfax, VA: Otto Kroeger Associates (OKA), 2006.
2. Tucker, Jennifer. *Introduction to Type and Project Management*. Mountain View, CA: CPP, Inc., 2008.
3. Culp, Gordon L., and Anne Smith. *The Lead Dog Has the Best View*. Reston, VA: ASCE Press, 2005.

### About the Author



**Jennifer Tucker, Ph.D.**, is the consulting director of OKA, where she facilitates technical and scientific work groups, conducts leadership and team development workshops, and leads organizational assessments. Her work focuses on applying both personality models and social theories to help practically reframe and navigate the complexities of scientific and technological systems and teams. Tucker holds a bachelor's degree in environmental science, a master's degree in management, and a doctorate in science and technology studies. She is the author of the booklet "Introduction to Type and Project Management" and has been a certified Project Management Professional since 2005.

OKA  
 3605 Chain Bridge RD  
 Fairfax, VA 22030  
 Phone: (703) 591-6284  
 E-mail: jtucker@typetalk.com

### Feeling environmentally friendly?

Start a new subscription or update an existing one to get CROSSTALK delivered by e-mail instead of snail mail.

**SHANAE.HEADLEY@HILL.AF.MIL**