*Measurement and Evaluation... Made Simple*

# Add Muscle to Your Post-Program Level 1 Evaluations with Predictive Questions

*ATD CORE4 Conference*
*October 24, 2022*

PHILLIPS ASSOCIATES

# Today's Presentation

Have you ever wondered if conducting Level 1 evaluations are worth the effort? If you've had this thought, you're not alone. According to a recent ATD research study, 83% of organizations evaluate some learning programs at Level 1. Yet, only 35% view the data they collect as having high value.

In this highly informative session, you will learn how to include predictive questions in your Level 1s that forecast Level 2 participant learning, Level 3 training transfer, and Level 4 improved business results. Of course, these predictions aren't proof that specific program outcomes are inevitable. However, they begin to answer the question business executives and L&D professionals both want answered: "Is this program delivering value?"

*"Incredibly helpful "– simple, valid and effective guidelines for doing Level 3s."*

-Southeast Florida ATD Chapter Member

*"Speaker, content, everything was great"*

-Training 2019 Conference attendee

*"Ken supported the material with relevant examples and activities and I was able to relate the method to my company's current practice."*

-Southeast Florida ATD Chapter Member

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# About Your Presenter — KEN PHILLIPS, CPTD

Ken Phillips delivers all programs and workshops in his signature style: professional, engaging, and approachable.

Ken is founder and CEO of Phillips Associates and the creator and chief architect of the Predictive Learning Analytics™ (PLA) learning evaluation methodology. He has more than 30 years experience designing learning instruments and assessments and has authored more than a dozen published learning instruments. He regularly speaks to Association for Talent Development (ATD) groups, university classes and corporate L&D groups. Since 2008, he has spoken at the ATD International Conference on topics related to measurement and evaluation of learning.

Prior to pursuing a Ph.D. in the combined fields of organizational behavior and educational administration at Northwestern University, Ken held management positions with two colleges and two national corporations. In addition, he has written articles that have appeared in *td* magazine, Training Today and HR.com, and is a contributing author to five books in the L&D field.

He earned the Certified Professional in Learning and Performance (CPLP) (now CPTD) credential from ATD in 2006 as a pilot pioneer and was recertified in 2009, 2012, 2015, 2018 and again in 2021.

Ken can be reached at (847) 231-6068 or ken@phillipsassociates.com.

**Upcoming Events:**
Ken is a frequent presenter at ATD chapter meetings and other industry events. Here's a preview of where he'll be speaking next.

**November**
1, 3, 8, & 10

**ATD Suncoast Chapter**

Workshop Title: Mastering M&E: Less Stress More Success Creating Level 1 – 4 Evaluations

**February**
6 – 8

**Summit for Clinical Op Executives (SCOPE)**

Session Title: Level 3 Evaluations Made Simple, Credible, & Actionable

12 – 14

**Training Magazine Annual Conference & Expo**

Session Title: Level 3 Evaluations Made Simple, Credible, & Actionable

# Add Muscle to Your Level 1 Evaluations Job Aid

➢ **Level 1 evaluation facts \***

- 83 % of organizations evaluate some learning programs at Level 1 of the five-level evaluation model

- Organizations that use Level 1s on average evaluate 54% of all their training programs at Level 1

- Of those organizations using Level 1 evaluations only 35% view the data they collect as having high or very high value.

➢ **Four reasons for the disconnect between the % of organizations that use Level 1s and the value obtained from the data collected**

- Level 1 evaluation data is not viewed as valuable

- Level 1 evaluation data is not systematically analyzed for trends and patterns nor is it used too make program comparisons

- Few L&D leaders have a specific objective in mind for collecting Level 1 data

- Many L&D professionals lack the knowledge and skills needed to create valid scientifically sound Level 1 survey items

➢ **The solution: *Add Muscle to you Post-Program Level 1 Evaluation Forms with Predictive Questions* \*\***

➢ **What are predictive questions?**

- They forecast the results a learning program is likely to achieve

- The data collected begins to answer the question business executives and L&D professionals both want answered: "Is this program delivering value?"

- The predictions aren't proof that specific program outcomes are inevitable but rather a forecast that certain results are likely (like a weather forecast)

➢ **Predictive Metric #1: Calculating a Level 2 Learning Gain Score**

- Ask two parallel learning-based survey questions:

  1. How much did you know about the material taught in this program **before** attending?

  2. How much do you know about the material taught in this program **after** attending?

- How to calculate a learning gain score:
  - ✓ Compute an average **Before** score and an average **After** score using the data collected from the two questions above
  - ✓ Subtract the average **Before** score from the average **After** score
  - ✓ The difference is the learning gain score

- **Predictive Metric #2: Calculating a Level 3 Training Transfer Likelihood Score**

  - Ask five training transfer survey questions
    1. How relevant was this program to you and the tasks and requirements of your work?
    2. How confident are you in your ability to apply the new information you learned in this program back on the job?
    3. How likely are you to have an immediate opportunity to apply the new information you learned in this program back on the job?
    4. How likely is your manager to actively engage you in a discussion regarding your use of the new information you learned in this program?
    5. What obstacles, if any, might keep you from applying what you learned in this program back on the job?

  - How to calculate a training transfer likelihood score:
    - ✓ Compute a total score for each of the first four training transfer predictive questions
    - ✓ Sum the four total scores together and divide the result by the number of program participants. Next, divide the resulting number by four
    - ✓ The result is a training transfer likelihood score

  - Training transfer score ranges interpretation information
    - ✓ A score of six or greater indicates that program training transfer is likely to be high
    - ✓ A score between three and six indicates that program training transfer is at risk
    - ✓ A score of two or less indicates that training transfer is likely to be low

  - What to do if your training transfer likelihood score falls below six:
    - ✓ Analyze the obstacles identified in question five above for themes and patterns
    - ✓ Consolidate all like-minded obstacles into clusters
    - ✓ Count the number of obstacles in each cluster
    - ✓ Place the clusters in numeric order from highest to lowest
    - ✓ Focus on the top two or three clusters and take targeted corrective actions to mitigate or eliminate the obstacles

➢ **Predictive Metric #3: Calculating a Level 4 Improved Business Results Likelihood Score**

- Ask two parallel business results survey questions:
    1. How likely are any of your department's crucial business metrics to improve because of you applying the information you learned in this program?
    2. How confident are you in your response to the previous question where 0% equals no confidence and 100% equals high confidence?

- How to calculate an improved business results likelihood score:
    ✓ Multiply each program participant's response to question one by their confidence percentage from questions two. Next, divide the total by 100 creating an adjusted response
    ✓ Add the adjusted responses and divide the total by the number of participants
    ✓ The result is an improved business results likelihood score

- Improved business results score ranges interpretation information
    ✓ A score of six or greater indicates that an improved business result is likely
    ✓ A score between three and six indicates that an improved business result is at risk
    ✓ A score of two or less indicates that an improved business result is unlikely

## DOING THE LEARNING GAIN SCORE MATH

**Instructions**
- Form a group of 3, 4, or 5 persons.

- Review the information in the chart below.

- Determine the learning gain score for the ten program participants.

- Be prepared to share your results with the whole group.

**Key**

Compute an average **Before** score and an average **After** score using the data collected from the two learning gain survey questions

Subtract the average **Before** score from the average **After** score

The difference is the learning gain score

| Participant Number | Question #1: How much did you know about the material taught in this program BEFORE attending? | Question #2: How much did you know about the material taught in this program AFTER attending? |
|---|---|---|
| 017 | 5 | 5 |
| 020 | 5 | 7 |
| 003 | 6 | 6 |
| 014 | 3 | 5 |
| 025 | 4 | 6 |
| 006 | 2 | 5 |
| 027 | 1 | 6 |
| 018 | 3 | 6 |
| 019 | 3 | 7 |
| 010 | 4 | 7 |

**Calculation 1:**

| Knowledge Before Attending Program | ÷ | Number of Participants | = | Average Pre-program Knowledge Level |
|---|---|---|---|---|

**Calculation 2:**

| Knowledge After Attending Program | ÷ | Number of Participants | = | Average Post-program Knowledge Level |
|---|---|---|---|---|

**The learning gain score is:**_____

## DOING THE TRAINING TRANSFER LIKELIHOOD SCORE MATH

### Instructions
- Form a group of 3, 4, or 5 persons.

- Review the information in the chart below.

- Determine the training transfer likelihood score for the ten program participants.

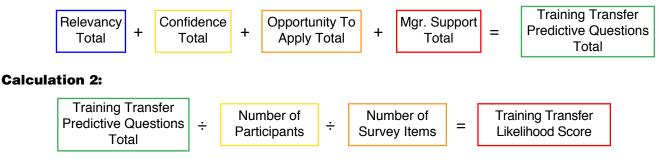- Be prepared to share your results with the whole group.

### Key
Compute a total score for each of the four training transfer survey questions

Sum the four total scores together and divide the result by the number of program participants. Next, divide the resulting number by four

The result is the training transfer likelihood score

| Participant Number | Relevancy Question | Confidence Question | Opportunity to Apply Question | Mgr. Support Question |
|---|---|---|---|---|
| 017 | 7 | 4 | 2 | 7 |
| 020 | 6 | 4 | 7 | 5 |
| 003 | 4 | 5 | 4 | 4 |
| 014 | 4 | 2 | 6 | 6 |
| 025 | 5 | 6 | 4 | 5 |
| 006 | 3 | 5 | 4 | 5 |
| 027 | 4 | 3 | 6 | 4 |
| 018 | 2 | 4 | 7 | 7 |
| 019 | 5 | 5 | 4 | 4 |
| 010 | 4 | 6 | 5 | 6 |
| **Total** | | | | |

**Calculation 1:**

$$\boxed{\text{Relevancy Total}} + \boxed{\text{Confidence Total}} + \boxed{\text{Opportunity To Apply Total}} + \boxed{\text{Mgr. Support Total}} = \boxed{\text{Training Transfer Predictive Questions Total}}$$

**Calculation 2:**

$$\boxed{\text{Training Transfer Predictive Questions Total}} \div \boxed{\text{Number of Participants}} \div \boxed{\text{Number of Survey Items}} = \boxed{\text{Training Transfer Likelihood Score}}$$

## DOING THE IMPROVED BUSINESS RESULTS LIKELIHOOD SCORE MATH

**Instructions**

• Form a group of 3, 4, or 5 persons.

• Review the information in the chart below.

• Determine the improved business results likelihood score for the ten program participants.

• Be prepared to share your results with the whole group.

**Key**

Multiply each program participant's response to question one by their confidence percentage from question two. Next, divide the total by 100 creating an adjusted response

Add the adjusted responses and divide the total by the number of participants

The result is an improved business results likelihood score

| Participant Number | Likely Improvement in Business Results | Confidence Level of Response | Adjusted Response |
|---|---|---|---|
| 017 | 7 | 60 | |
| 020 | 5 | 90 | |
| 003 | 4 | 35 | |
| 014 | 6 | 100 | |
| 025 | 5 | 70 | |
| 006 | 5 | 90 | |
| 027 | 4 | 50 | |
| 018 | 7 | 75 | |
| 019 | 4 | 50 | |
| 010 | 6 | 60 | |

**Calculation:**

| Adjusted Responses Total | ÷ | Number of Participants | = | Improved Business Results Likelihood Score |

# In the world of Measurement & Evaluation...
## *only* PHILLIPS ASSOCIATES **shows you HOW!**

## CORPORATE WORKSHOPS

*Offer These Workshops To Your Entire Learning & Development Team*

### Mastering M&E 2-Day Workshop

Provide your L&D team with the latest guidelines and hands-on techniques for creating valid, scientifically sound Level 1, 2, 3, and 4 evaluations that produce data perceived by business executives as both credible and valuable.

### Boost Training Transfer Using Predictive Learning Analytics™ (PLA) 2-Day Workshop

Equip your L&D team with a systematic, credible and repeatable process for maximizing the value of your learning investments by boosting training transfer.

### Crack the Code of Level 2 Test Question Design 1-Day Workshop

Equip your L&D team with practical tips and specific techniques for creating quizzes and tests that actually measure something.

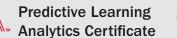### Survey Magic: Capturing Elusive Level 3 Evaluation Data 1-Day Workshop

Equip your team with a five-step process for creating Level 3 surveys that capture on the job behavior change.

## PUBLICATIONS

Phillips Associates publishes articles of interest to learning and development professionals, such as:

- **The PLA Series** – Ongoing articles, case studies, and ebook on the topic of Predictive Learning Analytics

- **The M&E Series** – Ongoing articles, case studies, and ebook on topics related to the measurement and evaluation of learning

## PARTNERSHIPS

Phillips Associates partners with training organizations and consulting firms to deliver its corporate workshops and measurement and evaluation consulting services to private businesses and public sector organizations around the world. Contact Ken for more information about establishing a partnership arrangement.

**Sign up for our mailing list and download members-only resources at www.phillipsassociates.com**

## *Coming Soon:* 2 NEW CERTIFICATION PROGRAMS

**PLA™** Predictive Learning Analytics Certificate

**M&E** Mastering M&E Certificate

*Learn more at www.phillipsassociates.com*

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*Are you looking for a* **PROVEN SPEAKER** *for an upcoming* **CHAPTER MEETING** *or* **WORKSHOP…**

…a presenter you can count on to provide a HIGHLY-ENGAGING PROGRAM and RELEVANT CONTENT your members will value? If the answer is yes, you may have just found your next speaker: Ken Phillips, founder and CEO of Phillips Associates.

Ken is available to present on the following topics. All include the valuable, "how-to" tips and hands-on measurement and evaluation techniques that L&D professionals crave—and can't find anywhere else!

## The "How-To" Measurement & Evaluation Series
### *Only Phillips Associates shows you how!*

### PRESENTATIONS

ALL TOPICS CAN BE DELIVERED IN-PERSON OR VIRTUALLY.

- **Power up your Level 1 Evaluations and Gain Surprisingly Useful, Valued Data**

- **Create Level 2 Quizzes & Tests That Actually Measure Something**

- **The Holy Grail: Capturing Elusive Level 3 Evaluation Data**

- **Business Results Made Visible: Design Proof Positive Level 4 Evaluations**

- **Boost Training Transfer Using Predictive Learning Analytics™ (PLA)**

- **Going the Distance: Making Sense Out of Evaluation Data**

### 1-DAY WORKSHOPS

- **47 Tips and Best Kept Secrets for Creating Level 1–4 Evaluations**

- **Crack the Code of Level 2 Test Question Design**

- **From Training to Application: Bridge the Gap with Predictive Learning Analytics™ (PLA)**

- **Survey Magic: Capturing Elusive Level 3 Evaluation Data**

**What Past Participants Have Said:**

*"Incredibly helpful—simple, valid and effective guidelines…"*

*"All the information was valuable. The speaker was excellent and engaging."*

*"Excellent advice. Fantastic info to bring back to work."*

*"Because of your workshop, I know my level 4 evals will accurately capture what is essential for the eval as well as state exactly how the training contributed to improvements in the bottom line."*

Learn more at **www.phillipsassociates.com**



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