Developing the ROI of an Online English-as-a-Second-Language Program

Wyeth Pharmaceuticals
USA

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This case was prepared to serve as a basis for discussion rather than an illustration of either effective or ineffective administrative practices. Names, dates, places, and data may have been disguised at the request of the author or the organization.

Abstract
This case study examines the methodology used to determine the return on investment (ROI) of an online English-as-a-second-language (ESL) program. The online ESL program was implemented in more than 20 countries, and the scope of the analysis includes data from all participating countries. A form of ROI analysis had been conducted annually prior to the addition of the Phillips Methodology in 2008. The latest analysis follows the Phillips approach step by step and has provided greater credibility as a result.

ORGANIZATIONAL BACKGROUND
The organization evaluated is a multinational research-based genetic engineering company. In order to respect the privacy of the client company and for purposes of this project, the company will be called “Performance Genetica.” The return-on-investment (ROI) evaluation described here represents the sixth year of evaluating the online English-as-a-second-language (ESL) course from a company called GlobalEnglish (GE). Due to its previous history as a holding company for many different types of businesses,

Note: This case study previously appeared as a journal article in Nathan, E. P. (July 2009). Determining the ROI of an online English as a second language program. Performance Improvement, 40(6), 39–48. Used with permission.
Performance Genetica has an HR function that does not include technical skills training but focuses more on senior management and leadership skills. While the company has shed many of those other businesses and now focuses exclusively on health care, technical training still resides in the various business units that currently exist in the organization. As a result, the GE program was originally sponsored and rolled out by the largest training organization in the company. This group, which is called the Learning & Performance (L&P) department, is responsible for training (directly and indirectly through global affiliates) more than 8,000 employees in the commercial organization (sales and marketing).

THE TRAINING NEED

Due to the size of the organization and the scope of the initiative, good metrics are very important to this project. In 2007, after exposure to the Phillips ROI Methodology (Phillips 2003, p. 52), the existing training evaluation methods that had been previously employed were enhanced by the 12 Guiding Principles of that methodology. As the process is described, this case study will reference the related guiding principles. For the company to meet its succession planning and career ladder goals, it needs to move a number of high-talent and high-potential people from country to country with an expected rotation in the United States. Succession planning is a stated business objective whereby the company is committed to developing and promoting highly talented people. These are the people who are identified as tomorrow’s company leaders. As a U.S.-based multinational corporation, the lingua franca of the company is English. Developing the English language skills for nonnative speakers is a major concern of the company, but one that has been left up to the local affiliates to resolve on their own.

Historically, the affiliates would try to hire high-potential employees who already had suitable English language skills, although no standard for “suitable” was ever established. When employees’ ESL skills were less than “proficient,” it was up to the local affiliates to offer local ESL solutions to their staff. As a result, the outcomes of ESL training have been mixed since each affiliate has taken its own independent approach. In early 2001, a number of affiliates suggested it would be more effective if the company would consider leveraging its global economies of scale to drive a global ESL learning initiative (if possible), since at that time there was no global coordination of this effort.
KEY STAKEHOLDERS
There were a number of stakeholders in this effort. However, it is a complex set of relationships. While the HR group (a key stakeholder) is responsible for the succession planning process, that group offers no ESL training to support that effort. A significant number of succession planning candidates in the affiliates come from their sales and marketing departments; therefore, it was felt the global L&P department (another key stakeholder) should be tasked with supporting the ESL training. In addition, the affiliate HR managers are also key stakeholders responsible for implementing the local succession planning process. These affiliate HR managers will also be critical decision makers in terms of both funding any ESL solution and enrolling affiliate learners in the ESL program.

ADDRESSING THE NEED: ONE FAILURE—ONE SUCCESS
Because succession planning was the driving factor in developing English language skills in high-potential affiliate personnel, the solution had to be one that would be cost-effective, minimize time away from work, and accommodate students at various levels of English capability. After repeated requests from the overseas affiliates for support of this activity, several global ESL training companies were located and reviewed. Ultimately, a global contract meant to leverage global buying efficiencies was negotiated with Berlitz language services. However, after the first year, the approach was abandoned for the following reasons:

1. Despite global pricing, many affiliates were able to find local classroom training at lower prices, usually from a local university.
2. Classroom training sponsored within the company’s local offices presented a challenge in scheduling.
3. To keep costs reasonable by essentially limiting the number of classes available, classes had a wide range of learners at various skill levels. There were beginning, intermediate, and advanced learners in the same classroom, which created a lot of challenges.

After the first year, when the affiliates refused to participate in the Berlitz program any longer, the Berlitz contract was allowed to expire without renewal. An alternate solution needed to be identified—one that would address the problems experienced with the Berlitz program, and one that the markets would be willing to participate in and pay for. A new service was located that could potentially meet this need. The service,
GlobalEnglish, was a one-year-old online ESL training system that had been started by a venture capital company. GE’s premise was simple:

1. English is the global language of business.
2. All resources would be put into developing interactive learning tools to support just one language—English.
3. There would be 11 levels of business English covered in the GE program.
4. There would be different course tracks for different English language skills such as grammar, writing, speaking, and listening.
5. The approach would allow a learner with Level 10 skills in writing to take the Level 10 writing track. However, if the learner had Level 5 English grammar skills, the learner would be placed in the Level 5 grammar track. This would allow for unprecedented customization not possible in a group classroom setting.
6. Instructions on using the system in the first five levels would be provided in local languages until the learner had sufficient English language skills to follow both lesson instructions and lesson content completely in English.

During the second half of 2002, a pilot program for GE was commenced for 50 people in several affiliates. The ROI Methodology was not applied to the pilot. What was used was a simple measure of Levels 1 through 3 results (Kirkpatrick 1998). Specifically, learners provided feedback on their experience using the GE system (Level 1). Their improvement (or lack therefore) in English test scores from their original placement to when they completed the pilot were measured through assessment in the GE system (Level 2). Simulated application exercises, also within the GE system, were measured from the benchmark placement process at the beginning of the pilot to the learner’s final performance at the end of the pilot (Level 3). Based on the results of the pilot, which were favorable, the GE system was adopted.

MEASURING RESULTS FROM 2003 TO 2007

As a result of the pilot, in 2003 the GE program sponsor (the L&P department) was tasked with organizing the global rollout of the program. Since then, a limited ROI analysis was added to the original pilot measures and conducted in the fourth quarter every year. The original ROI method simply asked the learners to provide an estimate of how much time was saved due to the learner’s new English language skills. Once an “hour” value was established, conducting an ROI was relatively easy.
Developing the ROI of an Online English-as-a-Second-Language Program

On average, the company has seen an 800 percent ROI in each of the five years the program has been employed. However, many stakeholders were skeptical about the results of those earlier ROI analyses. Therefore, in 2008, elements of the Phillips (2003) Methodology were added, and for the first time, learners and their managers were asked to report, in addition to how much time was saved due to the learners’ improved English language skills, how confident learners and their managers were in their estimates, and how certain learners (and their managers) were that the GE program was the reason for the results. Using this approach, the ROI methodology employed was enhanced to create a more defensible and credible ROI analysis. The balance of this chapter will focus on this improved process made by using the Phillips (2003) ROI Methodology. In 2008, the last full year for which learner data exists, there were 426 users on the system, an all-time high. Therefore, developing a more credible and rigorous ROI analysis methodology was a very helpful and important activity to measure the value of the program.

EVALUATION APPROACH
As part of the evaluation planning process, objectives were developed at each of the five levels of evaluation. In addition, a data collection plan was developed and agreed on, as were techniques for converting data to monetary values and isolating the effects of the program.

Evaluation Objectives
Following are the objectives established for each level of evaluation.

**Level 1: Reaction Objectives**
1. Determine learner satisfaction with the GE learning methodologies using a five-point Likert scale from “dissatisfied” to “extremely satisfied.”
2. Determine learner self-satisfaction with progress improving English skills using a five-point Likert scale from “dissatisfied” to “extremely satisfied.” This last point can be correlated to actual Level 2 and 3 assessment results to see if learner perception matches reality.

**Level 2: Learning Objectives**
1. Objective test scores for knowledge based on placement assessment and progress assessment in order to progress through the 11 levels.
Chapter 11

An assessment score of 80 percent or higher is required to move to the next level in a particular skill set.

2. Learning objectives will focus on knowledge of vocabulary and rules of grammar.

**Level 3: Application Objectives**

1. Objective test scores for skill application based on placement assessment and progress assessment in order to progress through the 11 levels. An assessment score of 70 percent or higher is required to move to the next level in a particular skill set.

2. Application objectives that focus on reading, writing, listening, and speaking skills as applied to specific, real job tasks as differentiated from simulated tasks or assignments for reading, writing, listening, and speaking skills within GE. It is important to note that reading, writing, listening, and speaking skills, whether applied to a simulated task, as within a course lesson, or applied to a real job task or activity, will be evaluated by similar methods. The difference in this case is that the simulated Level 3 situations within GE can be automatically assessed by the administration module within the GE system. The real-world job application will need to be evaluated by qualified assessors on the job.

3. Assessment by the learners and their managers (or qualified assessors) using an on-the-job checklist of 12 business situations will be conducted. Ratings will be ranked on a measure of five levels of improvement.

**Levels 4 and 5: Business Impact and ROI Objectives**

1. Determine the level of importance of English skills to the learner’s job and career aspirations.

2. Determine the learner’s estimate of time saved due to improved English language skills.

3. Determine the learner’s confidence estimate of how much time was saved due to improved English skills.

4. Determine the learner’s percentage estimate of GE’s contribution to the improvement in the learner’s English language skills.

5. Achieve monetary benefits exceeding costs.
Data Collection Plan
Table 11.1 provides a detailed look at the data collection plan. It is important to note that the Level 2 and 3 data (Kirkpatrick 1998) are actually collected through placement and progress assessments within the GE program administrative module and are not extraneous data collection tools. As an integral part of the GE program, these assessments meet the recognized generally accepted standards and criteria of ESL assessment methodology.

Converting Data to Monetary Values
Based on the data collected, the Levels 1 through 3 objectives contribute to the development of a positive case for the use of GE in delivering ESL learning. Translating that learning into a monetary value will come from the Levels 4 and 5 assessments, which will ask the learners how much time they (and their managers) believe was saved due to improved English language skills. To add to the credibility of this estimate, the respondents’ level of confidence in that estimate will be captured, and ultimately the respondents’ level of confidence in GE’s contribution to that result will be combined to develop a conservative and credible estimate of the time saved due to the learners’ new ESL skills. Once a time saved value is determined (for instance, 1 hour per week), a financial value will be associated with that time (such as a fully loaded labor cost) and an ROI cost determined by taking into account the annual estimate of the value of the time saved, less the annual value of the time spent studying divided by the annual cost per learner for the GE program. This approach will provide a very solid ROI case for the program.

Isolating the Impact of Training
As pointed out by Phillips (2003), a chain of evidence is an essential component of demonstrating the impact and ROI of a training solution used as a performance improvement intervention. Specifically, conducting Levels 1, 2, 3, and 4 evaluations (Kirkpatrick 1998) in addition to the Phillips (2003) Level 5 evaluation is critical to developing a supportable and credible foundation for the overall ROI analysis.

It is important to note that the learners using the GE system are scattered around the globe—along with their supervisors. With 426 users (and associated supervisors) around the world, the most efficient method to gather both learner reaction (Level 1) and business impact (Level 4) and ROI
### Purpose of the Evaluation:
Determine the personal and business impact, including ROI, of employee use of the online ESL training program known as **GlobalEnglish**.

### Program/Project:
*GlobalEnglish online ESL program*

<table>
<thead>
<tr>
<th>Level</th>
<th>Broad Program Objective(s)</th>
<th>Measures</th>
<th>Data Collection Method/Instruments</th>
<th>Data Sources</th>
<th>Timing</th>
<th>Responsibilities</th>
</tr>
</thead>
</table>
| 1     | Reaction and Usage        | • Feedback on a five-point Likert scale  
       |                       | • Annual survey  
       |                       | • Participants' supervisors  
       |                       | • Participants  
       |                       | • GE user data |          | October every year | • GE support services |
| 2     | Learning and Confidence  
       | • Vocabulary and grammar for placement and progress | • There are 11 levels of vocabulary and grammar in GE. To progress from one level to the next, learners will need exam scores of 70% or higher in vocabulary and grammar.  
       |                       | • Online assessments (11 levels for vocabulary and grammar)  
       |                       | • Participants through GE assessments | For placement to begin using the GE program; also for progress as each course is completed to continue to the next level | • GE online program |
| 3     | Application and Implementation (Simulated)  
       | • Listening, reading, writing, and speaking for placement and progress | • There are 11 levels of listening, reading, writing, and speaking in GE. To progress from one level to the next, learners will need exam scores of 70% or higher in each of these areas (listening, reading, writing, and speaking).  
       |                       | • Online assessments (11 levels for listening, reading, writing, and speaking)  
<pre><code>   |                       | • Participants through GE assessments | For placement to begin using the GE program; also for progress as each course is completed to continue to the next level | • GE online program |
</code></pre>
<table>
<thead>
<tr>
<th>Level</th>
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<th>Data Sources</th>
<th>Timing</th>
<th>Responsibilities</th>
</tr>
</thead>
<tbody>
<tr>
<td>4</td>
<td>Application and Implementation (on the Job)</td>
<td>•Observed usage of English skills for emails, telephone conversations, meetings, and presentations</td>
<td>•Checklist using a five-point scale: significantly improved, improved, somewhat improved, not yet improved, and not used at work</td>
<td>•Learners and their supervisors (or trained assessors)</td>
<td>15–45 days following the completion of Level 4, Level 8, and Level 11 of the GE curriculum, which has a total of 11 levels</td>
<td>•Local affiliate administrators and the managers of learner managers; checklist to be conducted by the learners and their managers</td>
</tr>
<tr>
<td>5</td>
<td>Business Impact</td>
<td>•Estimated time savings per month, convert time saved to dollar value</td>
<td>•Annual survey</td>
<td>•Participants</td>
<td>October every year</td>
<td>•GE support services</td>
</tr>
<tr>
<td></td>
<td>•Estimated time savings due to improved English skills</td>
<td></td>
<td></td>
<td>•Participants and participants’ supervisors</td>
<td></td>
<td></td>
</tr>
<tr>
<td>6</td>
<td>ROI</td>
<td>Comments: The plan is to take the estimated monthly time saved as determined by the Level 4 data collection and subtract the time spent in class to determine the “net time saved.” Multiply by the average confidence factor and multiply again by average belief that GE was responsible for the time saved. Annualize that number and divide by the annual cost per learner for GE.</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

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Note: GE = GlobalEnglish.
(Level 5) data was in a single survey. The critical element is that the survey had to be crafted in such a way that learner (and supervisor) reactions and expectations are aligned with a perception of the metrics that are important and relevant to the measure of success and impact used by these learners and supervisors and their organization. By linking Levels 1, 4, and 5 data questions into a single survey, collating the data from potentially more than 850 people (426 learners and the same number of managers) from around the globe, the data collection became a much more manageable task. It is also important to keep in mind that in addition to this annual survey, which captures Levels 1, 4, and 5, the learners are constantly taking Level 2 and Level 3 assessments as they progress through the GE program.

Another factor that was considered in planning to conduct a global ROI study for an online English language program was the quality of English of both the beginning learners and the supervisors. Just because a learner is learning English language skills does not mean all the skills to answer a survey will be mastered or that the learner’s supervisor(s) will have mastered English as well. In addition, there are no resources to translate the survey into all the languages that might be required. As a result, it is important to keep the survey as short as possible, using as simple a form of English as possible, and to leave enough time for respondents to complete the survey. These factors were treated as prerequisite issues and potential constraints that had an impact on the design of the evaluation tools.

Consistent with Guiding Principle 5, “at least one method must be used to isolate the effects of the solution” (Phillips 2003, p. 52), to isolate the contribution of training to improved job performance as a result of better English language skills, a number of the Phillips methods (2003, pp. 111–145) were employed. Two of the nine methods of data isolation techniques cited by Phillips were used in this ROI analysis.

Guiding Principle 7 states that “estimates of improvements should be adjusted (discounted) for the potential error of the estimate” (Phillips 2003, p. 52). To accomplish this, a questionnaire to gather data from learners was developed. The three key questions for the learners in order to capture data for the ROI analysis were these:

1. How much time has been saved due to improved English language skills? ________ hours have been saved each week.

2. On a percentage basis, what is the confidence level concerning the number of hours saved each week? ________%
3. On a percentage basis, what is the confidence level that GE is the reason this time has been saved? _________ %

Again, consistent with Guiding Principle 7, a second questionnaire was developed to gather data from the learners’ supervisors (Phillips 2003, p. 52). The key questions for the supervisors were these:

1. If one were to assume that improved English language skills allow an employee to work more effectively due to the ability to read and respond to English language emails, telephone calls, teleconferences, and meetings with greater skill and confidence, what would an estimate be of how many minutes or hours per week the learner(s) would save due to a perceived improvement in English language skills? _________

2. On a percentage basis, what is the confidence level concerning the number of hours saved each week? _________ %

3. On a percentage basis, what is the confidence level that GE is the reason this time has been saved? _________ %

With the data that resulted from these questions, a unit of measure, that is, time saved, was established that was converted into a dollar value and ultimately generated an ROI and a benefit-to-cost ratio (BCR). This is an approach that, while not terribly sophisticated, is simple to measure, is very defensible to management, and fits within the constraints that exist in conducting a global ROI analysis that were discussed earlier.

EVALUATION RESULTS

Determining the Benefits

As mentioned earlier, for the company to meet its succession planning and career ladder goals, it needs to move a number of high-talent and high-potential people from country to country with an expected rotation in the United States. No financial analysis of the value of such a program has been conducted by the company, and such an analysis is beyond the scope of this chapter. Succession planning is, however, a stated business objective whereby the company is committed to developing and promoting highly talented people. The assumed and accepted benefit of such a program is key to the company’s growth, and effective English language skills are required for the succession planning process to be successful. That said, the financial benefit of the GE ESL program can be found in Table 11.2.
<table>
<thead>
<tr>
<th>Item</th>
<th>Measure</th>
<th>Objective</th>
<th>Source</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Average number of hours per month each learner spends on the GE system</td>
<td>To determine how much time each learner spends using the GE system</td>
<td>Administrative report from the GE system</td>
<td>3.06 hours online per month per learner in 2008</td>
</tr>
<tr>
<td>2</td>
<td>Not all hours spent using the GE system are while the learners are at work</td>
<td>To determine how many work hours are lost due to learners using GE while at work</td>
<td>Learners (from survey)</td>
<td>Learners used GE at work only 26% of the time.</td>
</tr>
<tr>
<td>3</td>
<td>Time spent using the GE system while at work</td>
<td>To determine the average actual monthly study hours used by learners when they are at work</td>
<td>Calculated</td>
<td>3.06 hours online per month per learner × 26% while at work = 0.80 hours per month online at work per learner</td>
</tr>
<tr>
<td>4</td>
<td>Estimated work hours saved per week due to improved English skills</td>
<td>To determine how many work hours are saved each week due to improved English language skills</td>
<td>Learners and supervisors (from survey)</td>
<td>1.68 hours per week</td>
</tr>
<tr>
<td>5</td>
<td>Total estimated work hours saved per month due to improved English skills</td>
<td>To determine how many work hours are saved each month due to improved English language skills</td>
<td>Calculated</td>
<td>1.68 hours per week × 4.3 weeks per month = 7.2 hours saved per month per learner</td>
</tr>
<tr>
<td>6</td>
<td>Net estimated work hours saved per month due to improved English skills (total saved less time consumed online at work)</td>
<td>To determine the number of hours saved each week due to improved English language skills less time online using GE while at work</td>
<td>Calculated</td>
<td>7.2 hours saved per month – 0.80 hours spent online using GE = 6.4 hours net savings per month per learner</td>
</tr>
<tr>
<td>7</td>
<td>Confidence level of estimated work hours saved</td>
<td>To determine the confidence level in the estimate of how many work hours are saved each month due to improved English language skills</td>
<td>Learners and supervisors (from survey)</td>
<td>Respondents indicated only a 37% confidence level in their estimate of the time saved by the learner per week.</td>
</tr>
</tbody>
</table>
### Table: Calculating the ROI of an Online English-as-a-Second-Language Program

<table>
<thead>
<tr>
<th>Item</th>
<th>Measure</th>
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<th>Source</th>
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</tr>
</thead>
<tbody>
<tr>
<td>8</td>
<td>Confidence level that the GE training contributed to the estimated work hours saved</td>
<td>To determine the confidence level in how much the GE training program contributed to the estimated number of work hours saved each month due to improved English language skills</td>
<td>Learners and supervisors (from survey)</td>
<td>Respondents indicated only a 49% confidence level that GE was the reason the learners’ English skills improved.</td>
</tr>
<tr>
<td>9</td>
<td>Calculation of work hours saved per month per learner</td>
<td>Taking an estimate of work hours saved and applying the two confidence level estimates to the value to determine a best estimate of work time saved due to participation in GE</td>
<td>Calculated</td>
<td>(6.4 \text{ hours} \times 0.37 \times 0.49 = 1.17 \text{ hours saved per month per learner})</td>
</tr>
<tr>
<td>10</td>
<td>Calculation of hours saved per year</td>
<td>Taking the monthly hours estimated saved and converting the number to an annual value</td>
<td>Calculated</td>
<td>(1.17 \text{ hours saved per month} \times 12 \text{ months per year} = 14.04 \text{ hours savings per learner per year})</td>
</tr>
<tr>
<td>11</td>
<td>Calculation of dollar value of work hours saved per year per learner</td>
<td>Taking the estimated time saved per year per learner and multiplying it by the fully loaded labor cost</td>
<td>Calculated</td>
<td>(14.04 \text{ hours per year} \times $50.00 = $702 \text{ saved per learner per year})</td>
</tr>
<tr>
<td>12</td>
<td>Total dollar value of hours saved per year by 426 GE learners</td>
<td>Calculating the annual dollar benefit of the GE program for 426 learners</td>
<td>Calculated</td>
<td>($702 \text{ per learner per year} \times 426 \text{ learners} = $299,052)</td>
</tr>
</tbody>
</table>

**Note:** GE = GlobalEnglish.
Chapter 11

Calculating the Costs

For the five years since the GE program was introduced, an annual ROI analysis has been conducted. Each previous year in which the older ROI analysis was conducted, the analysis was applied to just that year, as in the 2008 study. This is consistent with Guiding Principle 9, which states that “only the first year of benefits (annual) should be used in the ROI analysis of short-term solutions” (Phillips 2003, p. 52). Since most learners are only in the system for 12 to 15 months, each year can be considered the “first year” for that audience. That is why the survey is conducted annually. Its ongoing value to each year’s audience needs to be established. By adding the concepts offered by the Phillips Methodology (2006), the quality and credibility of these annual ROI analyses will be enhanced. In fact, the costs that need to be captured for this project are quite easy to calculate. In the previous ROI calculations, a fully loaded labor cost per hour was provided by Human Resources and includes opportunity cost; that is, what work the employee could be doing if he or she was not taking the GE program. This aligns with Guiding Principle 10, which states that “costs for the solution should be fully loaded for the ROI analysis” (Phillips 2003, p. 52). Additional costs include the per user license fee for one year of access to GE as well as the cost of broadband access for GE users. The cost of broadband access to GE turned out to be minuscule. Therefore, that measure, while having been calculated, turned out to be inconsequential in the final analysis. The details of that calculation can be found in Table 11.3.

The actual survey for 2008 was conducted between September 1 and September 24, 2008. The entire calculation of all costs for the GE program implementation can be found in Table 11.4.

Using the data from Tables 11.2, 11.3, and 11.4, the final ROI cost calculation is provided below:

$$\frac{299,052 - 153,601}{153,601} = 0.9469 \times 100 \% = 94.7\% \text{ ROI}$$

The BCR is calculated as follows:

$$\frac{299,052}{153,601} = 1.95:1 \text{ or approximately } 2:1$$

COMMUNICATION PLAN

Guiding Principle 12 states that “the results from the ROI Methodology must be communicated to all the key stakeholders” (Phillips 2003, p. 52).
<table>
<thead>
<tr>
<th>Item</th>
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<th>Source</th>
<th>Value</th>
</tr>
</thead>
</table>
| 1    | Cost of broadband connectivity                                         | To determine the cost of company T1 broadband per person                                      | SBC communications (a broadband supplier)                                               | 1. $23/month/1,000 users or $0.023 per user per month  
2. The cost for the 426 GE learners for an entire month (450 × $0.023) is $9.80 |
| 2    | Percentage and number of hours per month learners spend online with GE | To determine monthly broadband usage per GE learner                                           | GE                                                                                      | 1. 4,821 hours online through April 30, 2008  
2. 4,821 hours/4 months = 1,205.25 hours for all GE learners per month                   |
| 3    | Cost of broadband usage by GE learners                                 | To determine how much of the overall cost of broadband is utilized by GE learners             | Calculated                                                                               | 1. Hours per month per person = 730  
2. Total hours available for 426 GE learners = 730 × 426 = 310,980 hours available  
3. Percentage of monthly hours used by GE learners: 1,205/310,980 = 0.39%  
4. Cost of 426 GE learners’ use of broadband per month = 0.39% × $9.80 = $0.0382  
$0.0382 × 12 months = $0.46/year                                                      |
| 4    | Total cost per year of T1 broadband access for 450 GE learners         | Determine the annual cost of T1 broadband access for all GE learners                          | Calculated                                                                               | $0.46 per year                                                                             |

**Note:** GlobalEnglish.
### Table 11.4  Annual Cost of GlobalEnglish Usage for 426 Learners

<table>
<thead>
<tr>
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<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>GE cost per learner</td>
<td>To measure the cost of the actual training program</td>
<td>GE</td>
<td>$350/learner/year</td>
</tr>
<tr>
<td>2</td>
<td>Number of learners</td>
<td>To determine how many learners require an annual license</td>
<td>Performance Genetica (client)</td>
<td>426 learners</td>
</tr>
<tr>
<td>3</td>
<td>Administration</td>
<td>To determine the cost of administering the GE program</td>
<td>GE</td>
<td>GE handles its own administration as part of the user fee. Performance Pharmaceuticals’ administration costs come to $4,500 per year ($150/year/affiliate × 30 affiliates)</td>
</tr>
<tr>
<td>4</td>
<td>Materials</td>
<td>To determine if there are any material costs</td>
<td>GE</td>
<td>$0. Since the entire program is online and using computers already assigned to learners, there are no material costs. The $350/learner/year fee covers all materials and support costs.</td>
</tr>
<tr>
<td>5</td>
<td>Cost of broadband connectivity</td>
<td>To determine the cost of company T1 broadband per person</td>
<td>Calculated in Table 11.3</td>
<td>Less than $1.00 per year.</td>
</tr>
<tr>
<td>6</td>
<td>Total annual cost of GE</td>
<td>Total cost of implementing GE for 450 users for 1 year</td>
<td>Calculated (Items 1 × 2) plus Items 3, 4, and 5</td>
<td>Total cost of GE for 426 learners for one year = $153,601</td>
</tr>
</tbody>
</table>

**Note:** GE = GlobalEnglish.
Therefore, after determining the ROI and BCR for the GE learning initiative, it was critical to communicate those results to key stakeholders who influence the availability of resources to continue the program. Without communicating the results of the study, there would be a very high risk that in a budgetary downturn, the program could be cut simply because key stakeholders were unaware of the impact of the program. Putting together an effective communication plan required the following elements:

1. Communication must be timely.
2. Communication should be targeted to specific audiences.
3. Media used must be carefully selected.
4. Communication must be unbiased and modest.
5. Communication must be consistent.
6. Testimonials are more effective coming from individuals the audience respects.
7. The audience’s opinion of the learning and development staff (and their function) will influence the communication strategy.

**CONCLUSIONS**

This case study demonstrates that by using a disciplined, comprehensive approach to evaluating the GE online ESL program, it is quite possible to make a strong qualitative and quantitative case for investing in this learning intervention. The Phillips (2006) approach has provided valid and persuasive tools and methods to tease out the financial impact, specifically the ROI, of implementing the GE online learning program. The added rigor, discipline, and operating standards brought to the evaluation process help to insulate the program and the study from critics who use subjective criteria to attack the value of the program. This process moves the entire evaluation methodology for learning programs from a soft, subjective assessment to a concrete, comprehensive, and objective analysis of the impact of the program on learner performance and company business results. These are very powerful tools for training and performance improvement organizations to master and will help training and HPT (Human Performance Technology) professionals support their recommendations for investments in future learning interventions.

**REFERENCES**


**DISCUSSION QUESTIONS**

1. Although trainers are guided to think of program evaluation as including five distinct levels, for reasons of practicality, this study clearly combined the qualitative aspects of Levels 1, 3, 4, and 5 into one survey tool. Is this acceptable? If so, why? If not, why not?

2. Why is the “chain of evidence” so important in a study such as this one?

3. An important part of this ROI case study was the ability to determine an increase in workplace application of improved English-as-a-second-language (ESL) skills by using percentages of time and converting those percentages to dollar values. Were there other methods one could use to determine the financial impact of new ESL skills? Please explain your response.

4. How might the ROI process in this case study be improved?

**ABOUT THE AUTHOR**

**Edward (Ed) Nathan, PhD, CRV,** holds a PhD in education from Capella University with a specialization in training and performance improvement. He holds a BS in animal science from the University of Delaware and an MBA from SUNY at Albany, New York. He is also a Certified ROI Professional (CRP) from the Phillips ROI Institute. Ed began his career in the pharmaceutical industry more than 25 years ago, having held a number of positions within sales, sales management, and international training and performance improvement. At the time that this case study was originally developed, Ed was Director, Institutional Sales Training, at Wyeth Pharmaceuticals. He then joined Pfizer and has recently left and is currently Managing Director for Global Performance Consulting. Ed served for 10 years as a board member of the Society of Pharmaceutical and Biotech Trainers, and he now makes his home in West Chester, Pennsylvania, USA. Ed can be contacted at his email address, EPNathan1@gmail.com.