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# Studying the Virtual Classroom: An Examination of Successful VILT Practices

*White Paper*

*by*

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“ I tell you and you forget.  
I show you and you remember.  
I involve you and you understand.”  
– Eric Butterworth

Although this quote applies to most training initiatives, it is even more relevant to the design and implementation of Virtual Instructor-led Training (VILT), the online counterpart to traditional Instructor-Led Training (ILT). With the conflicting requirements of travel costs and the need to reach a larger learner base, organizations are searching for increasingly cost-effective methods to deliver effective training. The data produced by this survey reveals that VILT is one of the fastest growing techniques selected to resolve this paradox. VILT delivers an appealing and efficient alternative to the time, travel and resources required by instructor-led training. As the technologies to support VILT continue to improve in availability, functionality and ease of use, organizations are increasingly turning to this technology as a solution. The apparent question is now how to create “effective” VILT sessions.

General Physics Corporation (GP) partnered with Training Industry, Inc. to help answer that question. In March 2010, we conducted a survey of 114 learning professionals across a wide range of companies to determine how and why organizations are using VILT in their training programs. The results of that study provide a strong overview of the case for VILT, as well as insight into how you can implement VILT programs in your organization.

## Surveying the Industry About VILT

In March 2010, GP commissioned Training Industry, Inc. to conduct a broad survey on how and why VILT is being used as a delivery method. Respondents included 114 learning professionals across a wide range of organizations. In the survey, VILT was defined as any live or synchronous training in which the instructors deliver or facilitate courses through the web and/or teleconferencing to attendees in different locations. Specific research questions included but were not limited to:

- How are companies effectively using VILT?
- What are the strengths and limitations of VILT?
- What are the critical drivers that determine success?
- How can VILT be successfully blended with other delivery modalities?

### Who responded to the survey?

Of the 114 learning professionals who responded to the survey, 111 respondents reported that they used (101) or considered using (10) VILT. The respondents ranged from beginners to “pioneers” of VILT (those using VILT since 2001). The results represent a wide range of companies. Twenty-three percent of respondents work in companies with 1,001 to 5,000 employees, 18% in companies with over 20,000 employees, and 40% in companies with less than 1,000 employees. Twenty percent of the respondents were from Fortune 500 companies. Fifteen industries were represented, including government and education. The most widely represented industries included Technology (17%), Banking/Financial/Insurance (16%) and Business Services/Consulting (15%). The second tier included Training and Development (9%), Telecommunications (7%), Health Care (6%) and Pharmaceuticals (5%). (Figure 1, Appendix A).

### How was the data analyzed?

Data analysis included assessing averages to identify trends and commonalities. To better understand what VILT practices may impact effectiveness, respondents who self-reported being “very effective” at delivering VILT (the VE group) were compared to those who reported being “somewhat effective” or “not effective.” Notable differences between the two groups are highlighted to help determine what may influence successful VILT implementation.

## Analyzing the Results

### ▶ VILT use is growing

VILT is included in a rapidly growing percent of all corporate training. According to the survey results, approximately 27% of courses in 2009 included VILT. The most common growth rate was over 25%. Thirty-three percent say their VILT courses grew by this much in 2009, and 37% expect this growth rate to continue in 2010 (Figure 2, Appendix A).

### ▶ There are multiple organizational drivers for the increasing use of VILT

The ability to effectively train a growing audience at a controllable cost is the primary driver to using VILT. Respondents indicate the two most important drivers for using VILT are to reduce travel costs and time (100%) and increase the number of people trained (75%). A closer look at the companies in the VE group also illustrated that increasing effectiveness (80%) and delivering training with greater consistency (65%) as significant drivers for using VILT (Figure 3, Appendix A).

### ▶ There are a range of topics being delivered through VILT

The topics used most often by respondents in VILT include customer/product training (58%), professional development (54%) and sales training (42%). When looking through the lens of the VE group, the same topics were rated in the top three at 65%, 60% and 50% respectively; additionally, the VE group also used VILT training for compliance courses (50%). Soft skill subject areas were a notable second tier, including leadership skills (33%), management/supervision (29%), on-boarding (29%), customer service (26%) and administrative skills (25%) (Figure 4, Appendix A).

### *Beyond the Data*

*Comparing the average VILT users with those identified as “very effective” demonstrated that the primary topics of the two groups were identical. It is likely that—given the topics—these are VILT sessions that are focused on “the field,” the distributed employees that consist of sales professionals and other employees who do not reside predominately in the corporate offices. The cost of audiences that travel to the traditional ILT classes would be highest, and coordination of the employees with an onsite training schedule would be most complex.*

*The data also revealed that while training organizations may at first focus on the time and cost savings that benefit the top rate topic areas, as they become more experienced with the technology, they begin to look at how they can more effectively deliver a wider range of topics through VILT for an increasing number of learners. The VE group expanded their top tier to include Compliance topics—another subject area that impacts a wide range of employees (if not all) distributed across the organization (both in the corporate office and in the field).*

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## ► **Companies are using a range of technologies to deliver VILT**

There are dozens of competing platforms that facilitate VILT. According to the survey results, companies are using a variety of delivery technologies. The most commonly reported are WebEx (52%), Live Meeting (41%) and GoToWebinar/GoToTraining (27%). The majority of the companies surveyed reported using multiple software programs to deliver VILT (Figure 5, Appendix A).

### *Beyond the Data*

*While the number of competing platforms continues to grow, the leading providers hold a dominant advantage. There is no default leader and it's possible that most companies do not yet have a standard provider of VILT services; so the decision as to what platform to use is left to the designer of the VILT session. This could be why the majority of those respondents indicated that they used multiple providers. Given that VILT is still a relatively new training delivery platform, it is quite possible that many company IT departments have not yet set a standard (mandated) for VILT, leaving the option open for the end users to deploy the platform that they are most comfortable using.*

## ► **There are two main limitations to successful VILT implementation**

The disconnected nature of VILT—the students and facilitator are not in the same room—produces many challenges. Respondents reported that the main limitations to successful VILT implementation include lack of full engagement and technology issues. (Some of the techniques being applied to increase engagement and encourage active participation are identified in the Using This Data to Your Benefit section.) Additionally, the VE group also reported a third limitation that involved learners canceling their attendance in sessions (Figure 6, Appendix A).

### *Beyond the Data*

*The distributed audience of VILT poses two significant challenges. Foremost, the employees participating in the VILT sessions are balancing their attention with many distractions in their office. It is reasonable to assume that the employees are not isolated in a room and 100% focused on the VILT session. More likely, they are probably balancing their attention with email, surrounding employees and other distractions.*

*We will address how the VE group overcomes the engagement limitations. However, participants are then challenged by the second limiting factor of remote participation. In a traditional classroom, you have a captured audience. The requirement for a physical presence carries weight. If the employee doesn't show up, then it's very obvious. However, this weight does not consistently carry over with VILT. Given that the employees are remote and potentially unfamiliar to each other, there is no attached stigma to non-attendance. Through our experience, the greatest influence that can increase attendance is commitment from the employee's manager to complete the training. Manager involvement in the registration of the employee in the VILT and reporting back the completion of the VILT will increase the exposure and likelihood that the employee will attend.*

## ► **Companies are blending VILT with a range of other training formats**

VILT appears to be often used as part of a more comprehensive solution. Survey respondents indicated that roughly half of their VILT courses are part of a blended solution. These VILT sessions are most often mixed with online self-study/e-learning, ILT, and print or other support materials.

### *Beyond the Data*

*In our experience, many blended solutions consist of offline pre-work (online courses or self-study guides) with live interaction. Standalone online training programs are often used for the pre-work. VILT may be gaining popularity because it offers many of the benefits of the online solutions, but it is perceived to be easier to build than standalone e-learning, while the medium itself is more familiar to the employees given its similarity to traditional ILT.*

## ► **Companies are using a range of engagement tools during and after the VILT session**

As noted earlier, the lack of engagement is the primary limitation noted by the respondents. To overcome this issue, the VILT platforms offer numerous tools that can be integrated into the session. According to our results, the most common engagement tools used during VILT delivery include live conversation (82%), chat (64%), polls (54%) and quizzes (54%). Each of these tools requires interaction by the student; participation can be monitored by the facilitator.

The survey also revealed that these tools are commonly used after the VILT session. The most common tools include quizzes (31%), live conversation (24%), blogs (23%), forums (19%), chats (15%) and polls (13%). These are also tools that require student interaction; however, participation is more passive and not required.

Analysis of the VE group identifies that, although they use the same engagement tools as the other respondents, they use more engagement tools overall (during and after). More specifically, the data demonstrated that the VE group had a profound increase in use of tools **after** the sessions (Figure 7, Appendix A).

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## *Beyond the Data*

The tools available with the VILT platforms offer many possibilities for interaction. However, it highlights the need for instructional design in the creation of VILT. Straight lecture and a couple polling questions will not be enough to keep your audience engaged. Good instructional design can apply the tools to keep the audience engaged, and also apply these tools in ways that reinforce learning. The misperception is that an existing ILT can simply be executed online using VILT technology and still produce the same result. The reality is that the ILT course must be redesigned to incorporate these interactive tools and reassess the needs of the learner to produce the same result.

While using VILT does reduce travel costs and could potentially reach a larger audience for a lower cost, the cost of design and development may be higher than its ILT equivalent when accounting for engagement opportunities and content structuring for the VILT environment. Nonetheless, a well-designed VILT can produce substantial cost savings over classroom training.

### ► **The average VILT class size is 20 learners or less**

The vast majority of VILT programs include the same number of students as their ILT equivalents. A smaller class size facilitates better interaction. According to the survey results, the average VILT class size is 20 learners or less, with the VE group reporting an even smaller average class size (14 learners). This goes against the common assumption that VILT will help instructors reach large audiences “in a single session.”

## *Beyond the Data*

While the ability to reach a large audience without the cost of travel is realized by VILT, the individual classes themselves should still remain manageable to allow for adequate interaction between the facilitator and learners. A webcast, where information is merely presented to a wide audience, is not the same thing as VILT where new skills are developed. Classroom management is still required in VILT for the successful application of the interactivity tools.

### ► **Facilitation skills and subject matter expertise are two important instructor characteristics**

Regardless of class size, respondents reported almost unanimously that facilitation skills and topic-matter expertise are the two important factors when selecting an instructor for VILT. The VE group placed higher “critical” status on these two instructor skills. These are typical requirements for instructors in any form of training. However, the next most critical/important facilitator skill was ease with using technology and VILT-specific skills, followed by understanding the audience needs and classroom management. These are the new skill requirements of the VILT instructors. The survey results illustrate that the instructor must know how to use the technology and understand the unique needs of a remote audience (Figure 8, Appendix A).

## *Beyond the Data*

We have found that a facilitator who has excellent online facilitation skills and subject matter expertise is critical to connecting with learners. However, just as important is the ability to manage the use of the tools and resolve technical issues. Therefore, we often used an additional person who provides technical support for the VILT audience and helps facilitate the usage of the interactive tools.

Presenting content while also managing any technical issues that learners are facing can be difficult and can delay and/or affect the learning experience. In addition, compiling the results of exercises and interactions, and preparing them to present back to the audience takes time and can also delay or affect the learning experience. Using more than one facilitator for a VILT session allows one facilitator to stay focused on the topic, while the other can address technical issues and support interactive activities.

### ► **Many companies seek support from internal teams and external service providers**

Management of the overall technology that supported VILT is one of the key influencers of success. Part of the survey focused on support and centralization of support services. The back office functions of administration, scheduling and evaluation are areas in which companies are using the fewest external service providers. Use of internal and external service providers who assist with design and delivery of the instruction, particularly those methods with interactive functionality, is most common. Overall, course design and delivery was the area in which most respondents indicated using external support.

## Using This Data to Your Benefit

The survey data identified many practices that you can adopt to improve the quality of your VILT—examples include blending VILT with other learning modalities; leveraging collaboration tools before, during and after sessions; and engaging smaller class sizes. Adding to those recommendations, we've extrapolated the survey data and combined it with our own experience in designing effective VILT to deliver the following suggestions.

### **Focus on small, scalable wins before implementing organization wide.**

When implementing VILT, it is a good idea to start small as you become more comfortable with the design of engaging VILT sessions and VILT technology. Start with subject areas that offer the highest ROI, such as sales and product training, and with an audience that is most likely to be successful adopting a new technology. As you expand the scope of your VILT offerings, you can incorporate your best practices, expand to a broader subject base and apply any data you've collected about the ROI in VILT.

### **Design your VILT to engage learners in the experience.**

The more technology you put between the learner and content, the more you need to design engaging experiences that allow learners to connect with the content, with the facilitator and with each other. Incorporating collaboration tools and blended formats into your design, during and after the sessions, can be effective in delivering learner engagement.

### **Build mastery of the technology before large-scale implementation.**

Technology does not always run smoothly for facilitators. That goes for the end users as well. The simple act of logging into the online course site itself can hamper an employee's ability to participate. Consider the types of support that your end users may need—before, during and after a VILT session. This helps achieve a stronger human connection in the VILT session.

### **Use a team of facilitators.**

Given the technological challenges associated with VILT, one way to minimize confusion and frustration is to use a team of facilitators. For example, one facilitator's role would be to present content and lead activities, while the other would address participant technical issues, manage polls and monitor chats. Team facilitators do not need to be in the same location, as long as they are coordinated and have a strategy for conducting the session.

### **Gain commitment and enforce accountability.**

To ensure success for VILT, gain learner commitment from the employees and their managers to make it clear that attendance and participation are expected. Management support and reinforcement is a critical factor to establishing learner engagement and accountability.

## Moving Forward in the Virtual Classroom

Based on these survey results, it's likely that VILT will continue to grow in popularity and use. As companies continue to use VILT to reach audiences at a distance, they will face many of the same challenges inherent in the implementation of any new technology. The new technology offers many benefits if it is applied effectively. In the VILT context—where we are focused on the development of knowledge, skills, and performance abilities—it is critical to have an intimate understanding of the needs of the learner and how to leverage the technology to produce the desired result; both the expectation for effectiveness you seek and the result the learner desires.

## About General Physics Corporation

GP is a global training, consulting and engineering company that helps performance-driven organizations solve business issues while creating pathways for continuous improvement.

GP's approach to teamwork is personalized and reinforced by a strong commitment to earning client satisfaction. GP's professionals are dedicated to providing the superior service and flexible solutions that have been the hallmark of the company for more than 40 years. From custom training, sales training and consulting to talent management and business process outsourcing, when working with GP, clients can count on a tailored approach that focuses on their business goals.

For more information, visit [www.gpworldwide.com](http://www.gpworldwide.com) or call 1-888-843-4784.

## About Training Industry, Inc.

Training Industry, Inc. and their portal, [TrainingIndustry.com](http://TrainingIndustry.com), spotlight the latest news, articles, case studies and best practices within the training industry. Their focus is on helping dedicated business and training professionals get the information, insight and tools needed to more effectively manage the business of learning. For more information, go to [www.trainingindustry.com](http://www.trainingindustry.com) or call 1-866-298-4203.

## Additional Resources

The following are resources we have found useful throughout our experience of designing and implementing VILT.

Clark, R.C. (2005). *Harnessing the Virtual Classroom*. Training and Development, 59 (11), 41-45.

Clark, R.C., and Kwinn, A. (2007). *The New Virtual Classroom: Evidence-Based Guidelines for Synchronous e-Learning*. San Francisco: Pfeiffer.

Corbett, W.G., & Huggett, C. (2009, November). *Designing for the Virtual Classroom*. InfoLine.

Driscoll, M., & Rocky, C. (2002, September). *Teaching Technical Skills & Knowledge in the Live Virtual Classroom: 20 Best Practices for Using Application Sharing*. ASTD Newsletter.

Hofmann, Jennifer. (2003). *The Synchronous Trainer's Survival Guide: Facilitating Successful Live and Online Courses, Meetings, and Events*. San Francisco: Pfeiffer.

Hofmann, Jennifer. (2004). *Live and Online!: Tips, Techniques, and Ready-to-Use Activities for the Virtual Classroom*. San Francisco: Pfeiffer.

Hofmann, Jennifer. (2005). *How to Design for the Live Online Classroom: Creating Great Interactive and Collaborative Training Using Web Conferencing*. Sunnyvale, TX: Brandon Hall.

Huggett, Cindy. (2010). *Virtual Training Basics*. Alexandria, VA: ASTD Press.

Hyder, Karen, et al. (2007). *The eLearning Guild's Handbook on Synchronous e-Learning*. Santa Rosa, CA: The eLearning Guild. Free eBook available at [www.elearningguild.com](http://www.elearningguild.com).

Pulchino, J. (2005). *The Synchronous E-Learning Research Report 2005*. The eLearning Guild Research. [www.elearningGuild.com](http://www.elearningGuild.com).

Stonebraker, P.W., & Hazeltine, J.E. (2004). *Virtual Learning Effectiveness: An Examination of the Process*. The Learning Organization, 11 (32), 209-225.

Wang, A.Y., & Newlin, M.H. (2002). *Predictors of Performance in the Virtual Classroom: Identifying and Helping At-Risk Cyber-Students*. T.H.E. Journal, 29 (10), 21-28.

## About the Authors

### William West

Bill, a Vice President within GP Learning Solutions at General Physics Corporation, has 25 years' experience in organization change management, education technology and process reengineering. He has directed performance development organizations that have won 18 international competitions. He founded Option Six, an e-learning development company, which was awarded seven state entrepreneurship awards and was named three times in the Inc. 5000. Bill was recently named Entrepreneur of the Year by the Small Business Development Center.

### Matthew Donovan

Matt, Executive Director of Client Services within GP Learning Solutions at General Physics Corporation, has an M.S. in Instructional Systems Technology and over 15 years' experience crafting training and development solutions with a focus on e-learning and the use of problem-based learning and performance simulations. His teams have developed e-learning that has earned top honors from Brandon Hall and Horizon Interactive. Matt has also received an ISPI 2009 Presidential Citation, and in 2009, he was named by Training Magazine as one of the Top 10 Young Trainers.

### Rose Benedicks

Rose is a Team Leader and Senior Instructional Designer at General Physics Corporation. She has an M.S. in Instructional Systems Technology and a degree in technical writing. She has extensive needs analysis and instructional design experience—online and classroom—with a focus on story and scenario-based online learning. Rose has played lead roles in projects for several Fortune 500 companies in technology, healthcare and consumer products. Her experience includes working with highly technical and creative marketing content in a corporate environment.

### Laurie Carmody

Laurie is an Instructional Designer at General Physics Corporation and has a M.S. in Instructional Systems Technology. She is also a Certified Professional in Learning and Performance (CPLP) from the American Society of Training and Development (ASTD). Laurie has experience designing and developing instruction in highly regulated corporations as well as delivering technology classes at the college level. ■



Training | Consulting | Engineering

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Appendix A

Figure 1

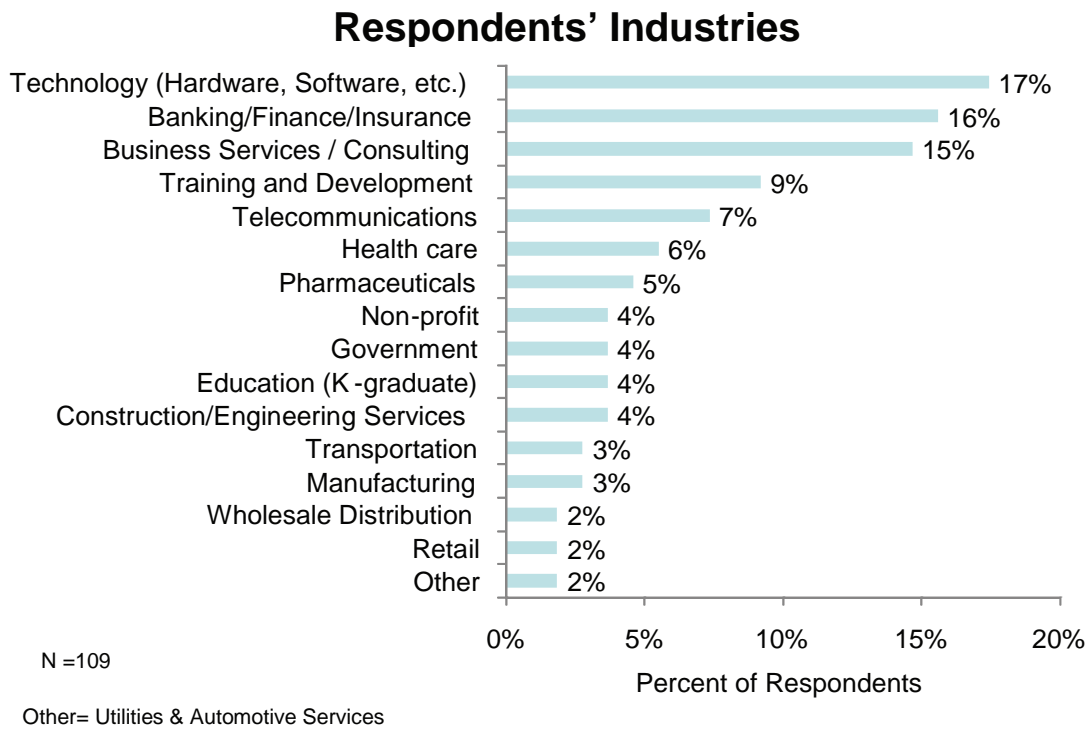
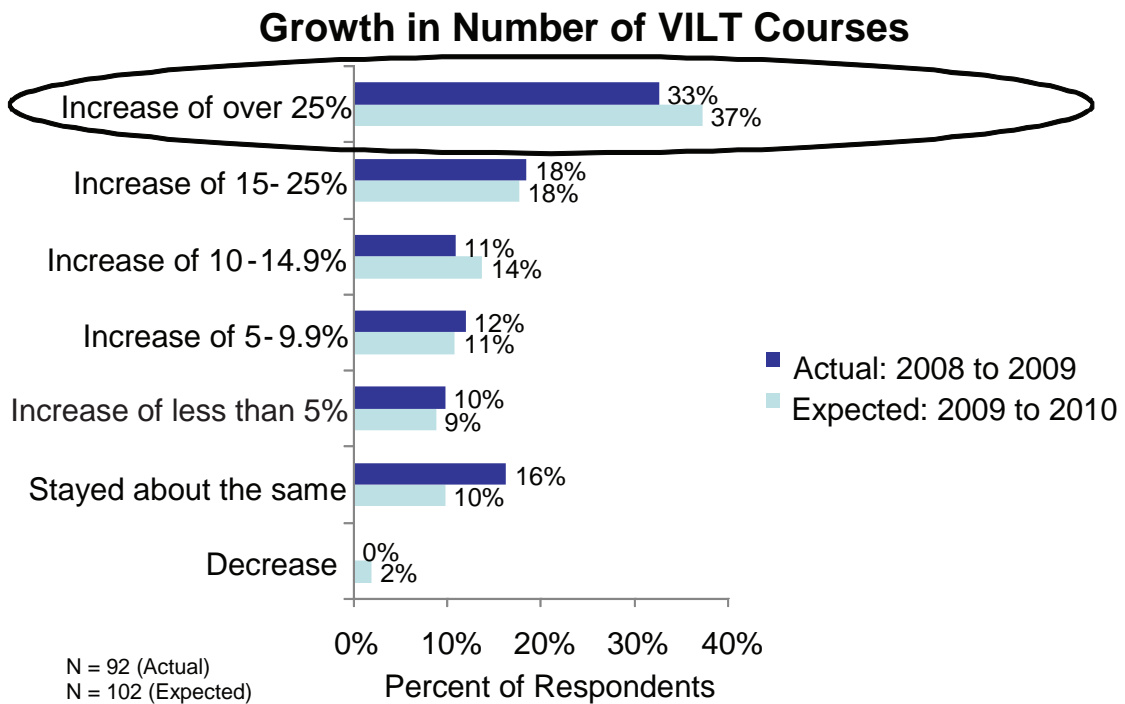


Figure 2



Appendix A

Figure 3

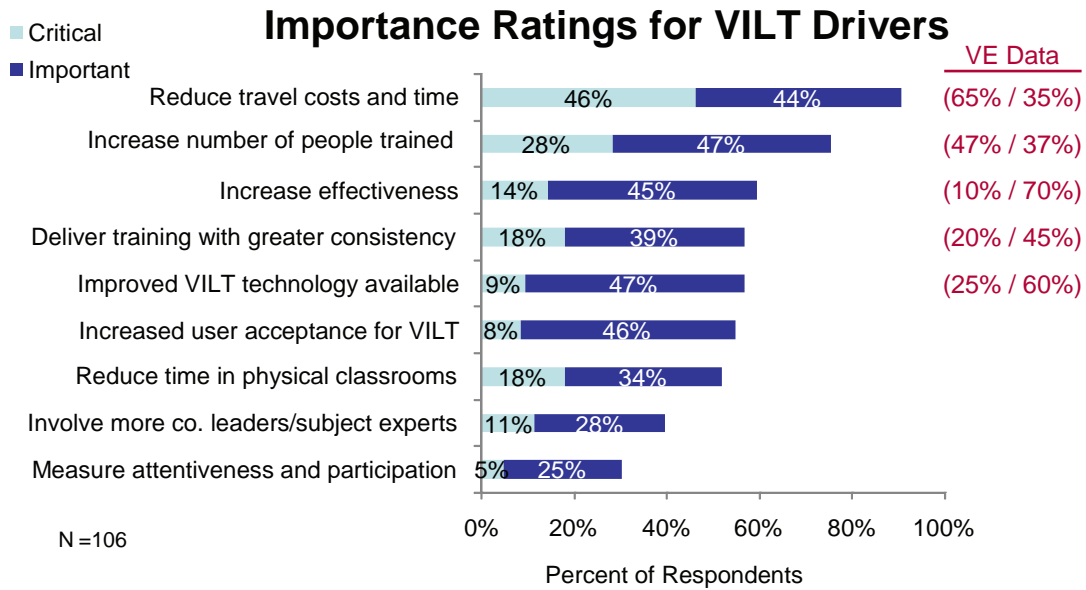
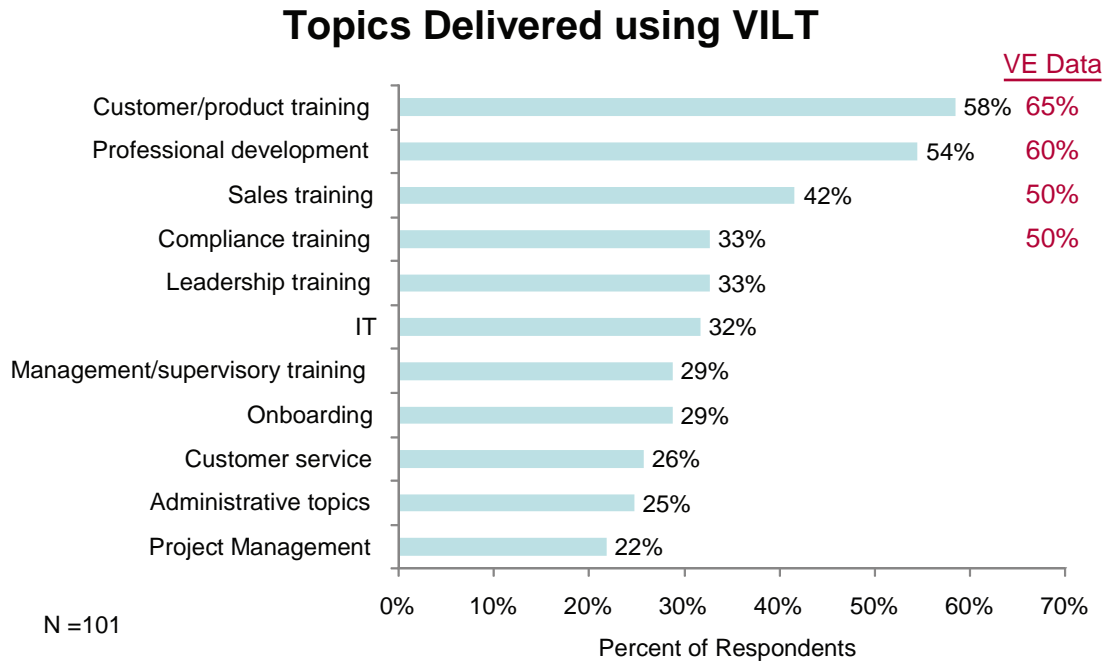


Figure 4



Appendix A

Figure 5

VILT Technologies Used

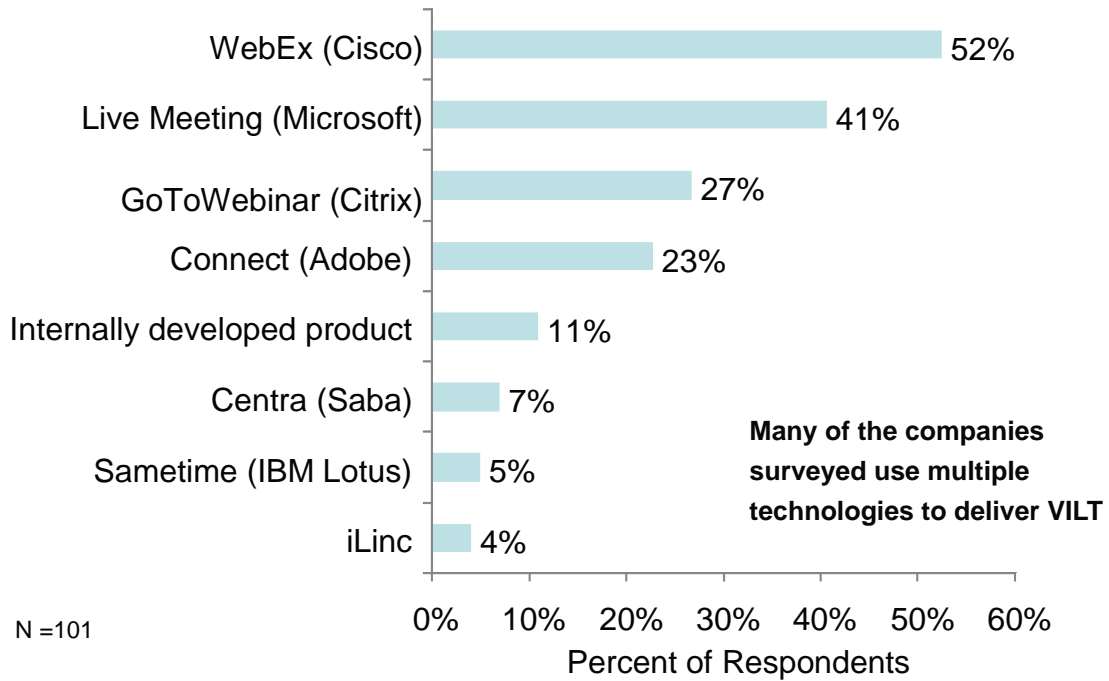
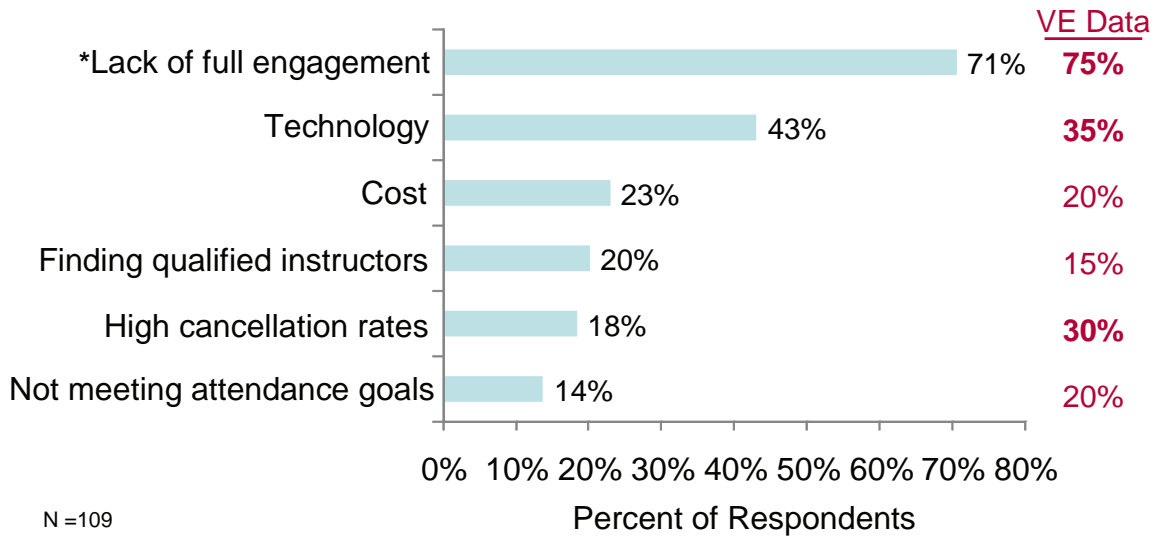


Figure 6

Limitations of VILT



Appendix A

Figure 7

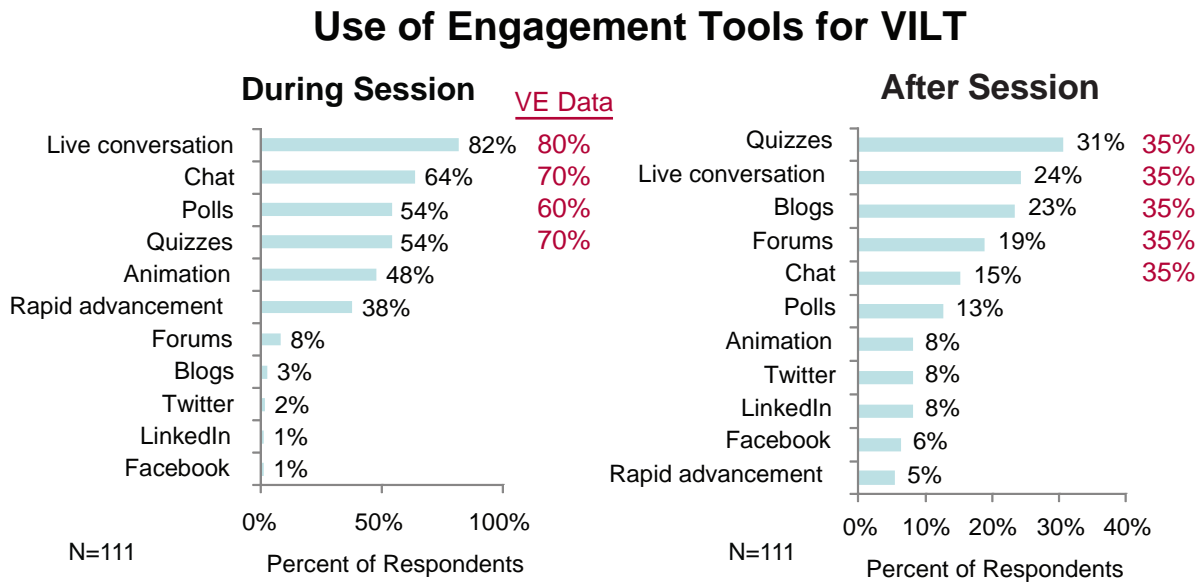


Figure 8

