



**PTC Product Focus:** [Technology Based Learning Solutions](#)

**Tip(s) of the Week:** [Pro/FICIENCY Customers - Access Free WBT!](#)  
[Technical Support Resources](#)

**News:** [Upcoming Events and Training Information](#)

## PTC Product Focus



### Technology Based Learning Solutions (TBLS)

#### Overview

This section of the newsletter typically focuses on a product or module from the PTC<sup>®</sup> software portfolio. In this edition, a services solution is presented that provides the ability to objectively assess one's knowledge and skills with PTC products and then formulate a continuous learning plan to improve proficiency and value to the organization. This article will focus on the technology offerings that can impact this, with the emphasis being on the Assess-Improve phases. But first, some background on the total continuum and typical training experience.

The learning process is an evolutionary one: new concepts are realized, then tested in practice, then improved and shared. Ideally, this cycle would repeat indefinitely in an effort to optimize processes and develop innovative products. The PTC training methodology carefully follows this "Learn, Assess, and Improve" process and is titled "Precision Learning."

A student traditionally begins learning in a classroom setting from a certified instructor to establish a foundation, or baseline of fundamental skills. The material is delivered in an accelerated forum requiring the trainee to retain a potentially overwhelming amount of material, with minimal time dedicated to reinforcement. The expectation from the customer's management is often "teach and considered taught." Unfortunately for many users, this is where the process stops. Students return to a product development environment where management has high expectations and the pressures to accelerate completion of design tasks are priority one.

The assessment phase for most is subjective or non-existent, resulting in a poor understanding of what training is required to address capability gaps. This leads to an under-utilization of the tools capabilities - whether existing, enhanced, or new. It is not cost-effective for a customer to construct, maintain, and administer a sophisticated mechanism to test users. Even if identified, many training gaps do not justify the travel expenses and downtime of a full in-center training class. Smaller "bite-size" courses delivered using modern web- and computer-based technologies can be applied to fill this need.

The improve phase is also not typically addressed with a formal plan, since in most cases users exist in the quadrant of "unconscious incompetence." That is, you do not know what you do not know! It is expected that the learning envelope will be expanded through interaction with more experienced users, and large doses of trial and error (with no extension on deadlines). The result is that a plateau is often reached and skill improvement stalls.

Is there a more effective way to ensure success with training endeavors? Yes, TBLS!

In summary, the phases of learning and linkage to PTC Precision Learning solutions are:

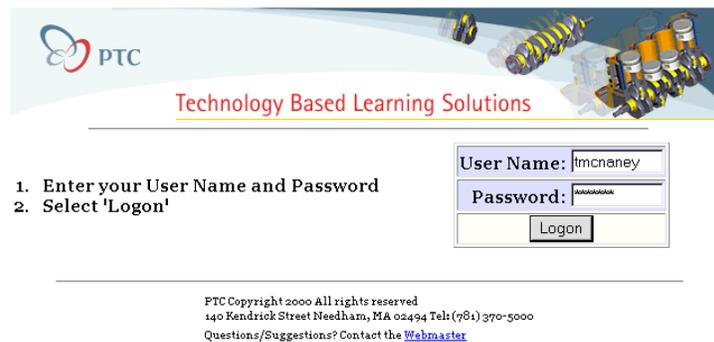
- Learn** - Establish a foundation through the structured and progressive delivery of fundamental and advanced topics. The format is “tell me, show me, let me do.” [Instructor-Led Training](#) in the classroom is the primary format for this. However, based upon customer demand, PTC has recently made available a series of full [Web-Based Training Courses](#) for certain products and process modules. The format is similar to an ILT, but is pre-recorded and delivered under the user’s control via a web-based multimedia interface. PTC is partnering with [CADTRAIN](#)<sup>®</sup> to also provide full Computer-Based Training courses and bundles via their [CADTRAIN Online Assistant \(COAch\)](#)<sup>®</sup>.
- Assess** - Pro/FICIENCY Evaluator provides a web-based objective means to measure the theoretical and practical levels of performance for existing users as well as new hires. Detailed statistics are accumulated to monitor progress and help prescribe appropriate training. Feedback is available immediately as a learning aid and guide to improvement offerings. In fact, several Pro/ENGINEER ILT courses now utilize these online skill assessments in the classroom so the instructor can adapt the course to each student's skill level and learning needs.
- Improve** - While Pro/FICIENCY identifies gaps, these offerings help fill them with a JIT training model. These Web-Based Lessons are very focused “how-to” guides consisting of topical explanation, application, and exercise. These are flavored sub-sets of the full CADTRAIN COAch modules. This is distinct, and not a replacement for the Learning phase!

PTC also now provides our students who attend an Instructor-led course with a free copy of the [Pro/ENGINEER 2001 Student Edition](#) software. This is just one more way we make sure that all participants in our training program can continue to practice and improve outside the classroom or work environment.

In the following section, another level of detail will be explored including screenshots for the Technology Based Learning Solutions. The final section will summarize and highlight the business benefits.

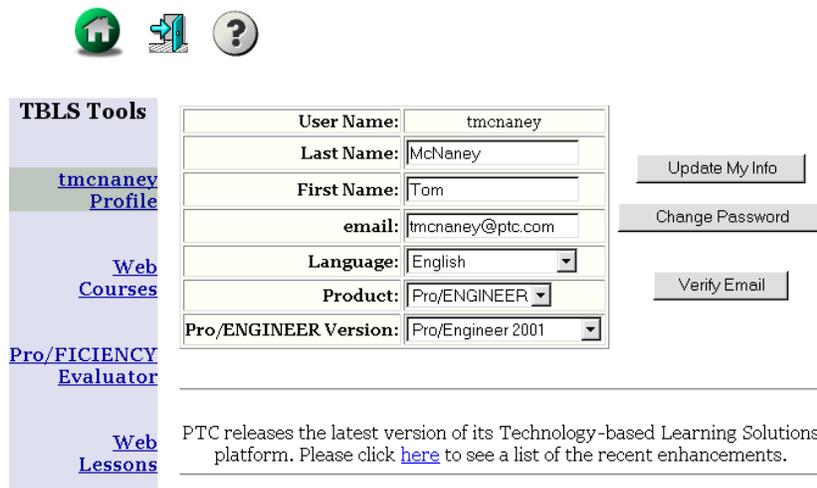
## Capabilities

The TBLS website provides a portal which provides the ability to access the distance learning environment in a secure and personalized manner. Figure 1 shows login screen.



**Figure 1**

Once authenticated, the user is presented with their profile and the ability to select between Pro/FICIENCY Exams, Web Lessons, Web Courses, and prior statistics. The user profile provides the ability to specify the Product Domain and Version. These settings determine which tests and courses will appear in subsequent drop-down lists



**Figure 2**

There are three classifications of [Pro/FICIENCY skill assessments](#):

1. Candidate Screening - Evaluate potential new hires to determine actual skill level.
2. Course CheckPoints – approx. 2-hour evaluation based upon specific course.
3. Benchmarking – approx. 8-hour comprehensive baseline evaluation.

For most, there are also two types of questions:

1. Multiple Choice - test theoretical knowledge and may be answered in any order.
2. Performance-Based Quizzes – downloaded modeling exercises.

(Sheetmetal Question 2 / 40)

[Go To Performance-Based Quizzes](#)

Multiple Choice Sections	
Sheetmetal	
40 Unanswered	
0 Answered	

**Q3268:** An extruded wall is created by sketching a "U-shape", after which an Unbend feature is added to view the model in the flat state. To return the model back to the fully formed or bent position, you should do which of the following?

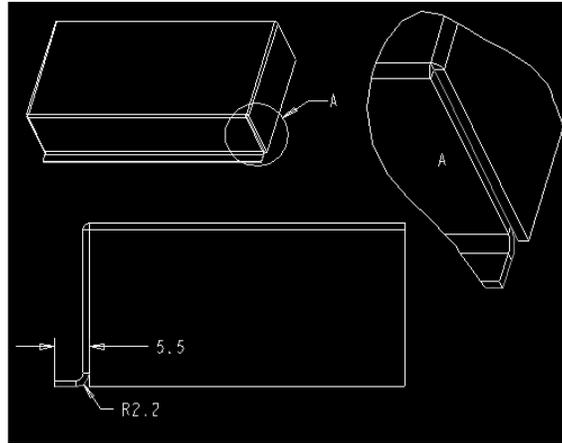
- A) Create a Bendback feature and continue modeling.
- B) Create another Unbend feature to negate the first Unbend feature.
- C) Delete the Unbend feature before continuing with the model.
- D) I don't know

Submit for Grading	Skip Question	Question Review
Pause Test	Terminate Test	

**Figure 3**

The Performance Quizzes evaluate practical applied skills through live modeling exercises. Pro/FICIENCY has the ability to automatically grade uploaded models and check adherence to recommended practices.

**Q1145:** The part provided contains only a primary wall. Create the secondary wall shown in the figure using the dimensions shown. Make sure that the corner geometry appears as illustrated in the detail view. Also, note that the inside geometry of the primary wall has sharp corners (zero radius).



▶ Download the following models and follow the directions shown above. When you're finished, upload the **LATEST** (highest version number) file(s) to the server for grading.

Download: [q1145\\_test.prt](#)

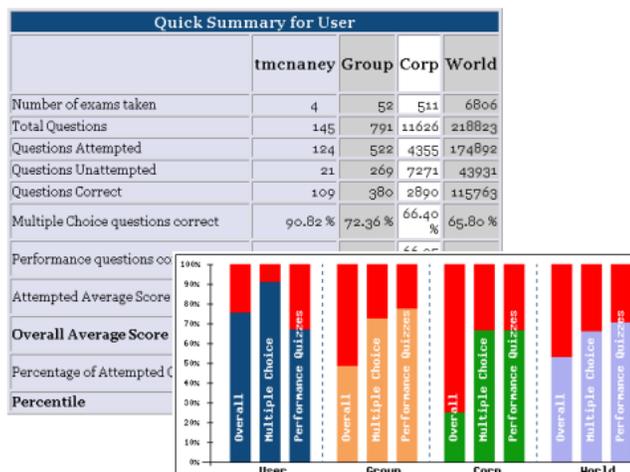
▶ If you want to download zipped versions click here [q1145\\_test.prt.zip](#)

q1145\_test.prt.? -->

**Figure 4**

Upon completion of the test, the results are available immediately and may be analyzed individually or against all tests taken by user, peer group, company, or world. There is the ability to export as a CSV file for custom analyses. The correct answers may be reviewed as a learning aid, and ranked course recommendations are generated..

Course Name	Web Course Title	Overall Average	Incorrect	Total Questions
TRN-779	Intro to Pro/ENGINEER	0.0	2	2
TRN-781	Fundamentals of Design	0.0	1	1
TRN-869	Fundamentals of Sheetmetal	21.212122	26	33



The user can enroll in [Web Lessons](#) to surgically address areas of deficiency. Or, they can be used proactively to prepare for skills needed to complete a project. There are 50+ hours of content available, and these topics were selected based upon common areas identified as needing skill improvement in the general customer base. New titles are continually being added.

**TBLS Tools**

- [tmchaney Profile](#)
- [Web Courses](#)
- [Pro/EICIENCY Evaluator](#)
- [Web Lessons](#)**

**Precision Learning Web Based Training**

You have 930 credits in your Web Lesson Credit pool.

Enroll in an on-line Web Lesson..

Web Lesson Title	End Date
1. COAch for Modeling - Redefining, Rerouting, and Reordering features	Sat Aug 04 2001 Access Expired

**Figure 5**

The newest addition to the Precision Learning family are the [Web Courses](#). PTC developed these as potential full replacements for ILT for select products like BMX, ModelCHECK, and ProductView. They offer a convenient and inexpensive alternative, which can also be applied as update or refresher training.

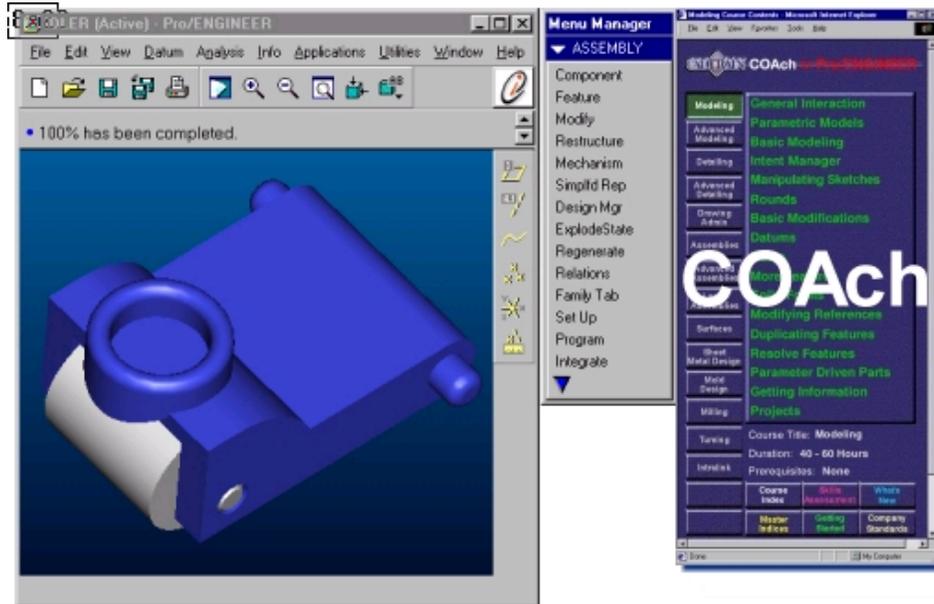
**Increased access to commands**  
*Reduced command navigation*

**Easy Access to common Top-Level commands**

- ✓ Split Toolbar
- ✓ Menubar Expansion and Reduced Hierarchy
  - More commands
  - Easier to access
- ✓ INSERT Menu
- 40% Fewer menu picks

**Figure 6**

Through a [partnership with CADTRAIN](#), their 700+ hours of CBT courses may also be purchased individually or bundled with a Pro/FICIENCY site license to provide unlimited annual access. These are provided on CD-ROM for installation on the local workstation / network.



**Figure 7**

## Benefits

- Objectively measure results from investments in training, and ensure that funds are applied to the correct areas to deliver maximum impact and ROI. A benchmarking firm, [Best Practices LLC](#), performed a study on career path development and determined that “Each \$1 invested in employee training and education had a greater than \$30 return on investment.”
- Invest training funds more effectively by delivering the right training, to the right individuals at the right time. This is especially important during current economic conditions.
- Reduce Cost of Quality through Precision Learning, which parallels the Define, Measure, Improve, and Control phases of the Six-Sigma breakthrough strategy.
- Reduce time to market. There is a direct correlation between Pro/FICIENCY improvements and an increase in productivity, with a improvements of 10% - 30% per annum.
- Allow you to customize your personal continuous improvement program by selecting those modules that are pertinent to your job, project, and career needs.

**Evolve your skills...  
Learn-Assess-Improve with PTC Training Solutions!**

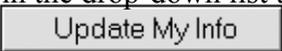
PTC Global Services Organization (GSO) can perform needs assessments and co-develop customized offerings to address all of the critical success factors inherent in turning technology into improved performance:  
**Tool Implementation, Process Improvement, and getting the most from Personnel**

### Access to Pro/E 2001 Update & Pro/I 3.0 User WBT Courses

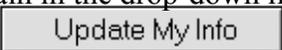
#### Overview

PTC recently introduced a series of WBT Courses, two of which have been included within the available Web Lessons parallel to **Pro/FICIENCY Evaluator**. No formal announcement was made, so unless one went searching they would remain unaware of this availability. The interface for accessing the courses has changed with the latest TBLS Release 5.7 as well. Courses may be completed online in a streaming format, or downloaded to local files. Each contains a structured format with the ability to navigate the table of contents. This consists of a Lecture, Functionality Demo, Lab Exercise, followed by Solution. Once registered, note course expiration (~3 weeks).

#### Pro/ENGINEER® 2001 Update (Interface, Part, & Assembly)

1. Logon to TBLS, your current profile settings will be displayed.
2. Set the Product Domain in the drop-down list to Pro/ENGINEER.
3. Very important – select 
4. Set the Version to 2001.
5. If version changed, select 
6. Select Web Lessons link.
7. Select “Pro/ENGINEER 2001 Update Training” from the bottom of the enroll list.

#### Pro/INTRALINK® 3.0 User

1. Return to user profile in TBLS.
2. Set the Product Domain in the drop-down list to Pro/INTRALINK
3. Very import - Select 
4. Select Web Lessons link.
5. Select “Intralink User 3.0” from the bottom of the enroll list.

#### Benefits

- Receive formal update training with the convenience of your location, time, and pace.
- Sample and compare the content of Web Courses vs. Web Lessons or ILT.

#### Additional Information

If you do not have access to Pro/FICIENCY™ through either learning credits or a site license, it is still possible to test-drive these solutions. This account will be created in real-time and allow you to logon to briefly experience the TBLS environment. Included within this account profile will be access to a simple Web Lesson. Lastly, you can participate in an initial segment of the Pro/ENGINEER 2001 Core Update WBT.

- [Self-register for a TBLS Evaluation Account](#)
- [Login to TBLS](#)
- [Web Course Demo](#) (stream or download)
- [Purchase courses a la carte from the PTC eStore.](#)

## Technical Support Resources

- [Subscribe to the Knowledge Base Alerts](#) (alerts collected and pushed to your Inbox)

Current Subscriptions						
#	Product	Module	Release	TAN	TPI	Action
1	CE/TOL	Any	Any	X	X	<a href="#">Remove</a>
2	ModelCHECK	Any	Any	X	X	<a href="#">Remove</a>
3	Pro/ENGINEER	Any	2001	X	X	<a href="#">Remove</a>
4	Pro/COLLABORATE - Project Collaboration	Any	Any	X	X	<a href="#">Remove</a>
5	Division ProductView	Any	2001	X	X	<a href="#">Remove</a>

Add New Subscription				
Product	Module	Release	TAN	TPI
Pro/INTRALINK	DataServer	3.1	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>

[Add](#)

- [Request a Software Update Tool](#)

Note improved interface to select and route to appropriate shipping address. A Call Number is also generated for tracking purposes. It is really note that new, but many customers are unaware that CD-ROM contents can be immediately selected for download.

**PTC**

[Select Products](#) | [Contact & Shipping Information](#) | [Review/Update Order](#) | [Get Call Number](#) | [View Cart](#)

### Select Products

**Product Name**

- PRO/ENGINEER
- PRO/ENGINEER**
- PRO/FLY-THROUGH
- PRO/INTRALINK
- PRO/INTRALINK SINGLE SITE
- PRO/INTRALINK TOOLKIT ACCESS
- PRO/INTRALINK WEB CLIENT - OP
- PRO/MECHANICA
- PRO/MODEL VIEW
- PRO/NETWORK ANIMATOR
- PRO/PDM
- PRO/REFLEX
- R2001 PRO/ENGINEER NT CDROM SET

	Release	Datecode	Download	Order CD
CDROM	2001	2001490	<a href="#">Download (UNIX)</a> 411.12MB   431093248Bytes <a href="#">Download (WIN)</a> 323.21MB   338907316Bytes	0
	2001	2001490	<a href="#">Download (NT-2000-XP-ptcsetup)</a> 439.09MB   460417198Bytes <a href="#">Download (NT-2000-XP-wininstall-english)</a> 426.75MB   447478198Bytes <a href="#">Download (WIN98)</a> 425.56MB   446233064Bytes	0

**Select link to download archive of entire CD-ROM. Why wait for snail mail? Only products covered on maintenance appear.**

- Knowledge Base - [Using Mechanisms with Top-Down Design](#)

This technique will allow you to combine the power of MDX with the structure and reference control of Design Manager Skeletons. Note that for this technique to work, multiple skeletons must be enabled by setting the config.pro option [multiple\\_skeletons\\_allowed](#) to yes.



### News & Upcoming Events

For a list of all [News & Upcoming Events](#), please visit our website @ <http://www.ptc.com/company/news/index.htm>.

- [01/21/2002] [PTC Announces Tenth Annual Awards Competition](#)
- [01/21/2002] [PTC Awards 2002 Details](#) (register by March 30!)
- [01/21/2002] [Pro/COLLABORATE Webcast Q&A Responses](#)

*Watch for the release of Pro/COLLABORATE 2.0 in February!*

### Training Information

Please visit the [PTC Education Services](#) website under [Services & Support](#) for the latest training information including course descriptions, schedules, locations, and pricing.

- [Instructor-Led Training \(ILT\) Course Descriptions & Pricing](#)
- [ILT Course Schedules](#)  
(also available at the bottom of any Description page.)
- [Web-Based Training Courses](#)

Attend a course at any PTC Center and now receive a free copy of Pro/ENGINEER 2001 Student Edition! This is just one more way to ensure that all participants in our training methodology can continue to practice and improve beyond the classroom and work environment.

Product development means business.™

