

# xtUML Online Training Launch

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# Content

- The BridgePoint team will create the course content
- We are currently in the process of outlining and assigning the individual topics
  - The overall outline is available at [https://github.com/xtuml/training/blob/master/doc-training/notes/1\\_training\\_dnt.md](https://github.com/xtuml/training/blob/master/doc-training/notes/1_training_dnt.md)
  - This outline is not complete, we will add to it as we go

# Course Delivery System

Common terms:

- MOOC : Massive Open Online Course
- LMS : Learning Management System

We have chosen to use <http://openlearning.com> as our LMS.

As a start, we will create separate MOOCs for Editor, Verifier, and Model Compilers.

# Features of openlearning.com

- Course management
- Module and Topic segregation and breakdown
- Topics can include text as well as embedded youTube video
- Quizzes
  - Multiple choice
  - Crossword puzzle
  - Fill in the blank
  - Category sorting

We have a created a simple course as a learning exercise:

<https://www.openlearning.com/courses/introductiontoxtuml>

## Introduction to xtUML

# Welcome!

This course introduces the student to eXecutable Translatable UML using xtUML Editor from xtuml.org and BridgePoint from Mentor Graphics.

**Start date:** Learn at your own pace

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## About the Course

xtUML stands for eXecutable Translatable UML. xtUML is a UML profile for software development that allows the user to build UML models of software systems that are executable at the model level. The software models are also translatable to target code using a model compiler.

The xtUML Editor is available from <http://xtuml.org> as open source software. This course introduces the student to xtUML for model driven development.

## Course Team

**Keith Brown**

★ 1 karma

**Cortland Starrett**

★ 0 karma

**Dean McArthur**

★ 0 karma

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## Model Driven Development

We will start by answering the questions:

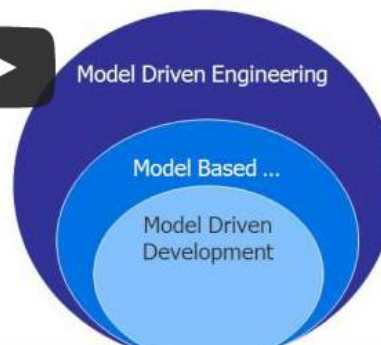
- What is Model Driven Development?
- How does it apply to systems engineering?
- How does it apply to software?

Model Driven Development for Systems Engineering



## What is Model-Driven Development?

- There are many terms used with Model...
- Key characteristics of Model Driven Development (MDD)
  - ✎ The model *is* the design
  - ✎ The model will grow, evolve and extend
  - ✎ There is a flow from abstraction to abstraction
  - ✎ Implementation is directly derived from the model



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## Modeling Software Quiz



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&lt;&lt; Previous Page: UML, xtUML, and the xtUML Process

Next Module: Using xtUML &gt;&gt;

1 The correct answer is the First Answer.

Correct

- ☒ First Answer  
☐ Second Answer  
☐ Third Answer  
☐ Fourth Answer

2 There are many options to choose from. Select "Banana".

Correct

Banana

3 Two answers are correct.

Correct

- ☒ A correct answer  
☐ Incorrect (don't choose this)  
☒ Another correct answer  
☐ Also incorrect

4 Type in "the answer"

Correct

the answer





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## Using xtUML Fill In the Blanks



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## Completed! Well Done

The quick brown fox jumped over the lazy dog. Once upon a time, there lived three little pigs.

Knock knock? Who's there? What's the time Mr wolf?

Save Answers

Word List

fox  
pigs  
there  
dog  
wolf  
time



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## Using xtUML Crossword Quiz

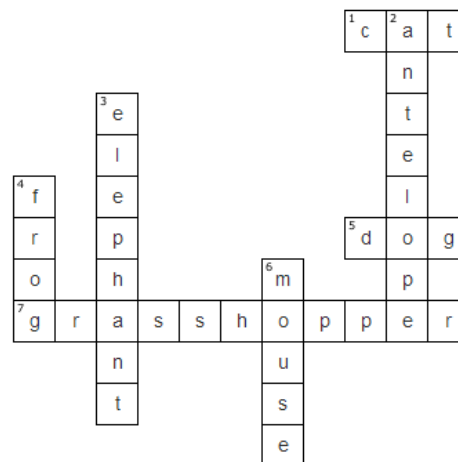
Complete this xtUML related crossword.



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&lt;&lt; Previous Activity: Using xtUML Fill In the Blanks

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## Completed!

## Across

1. Domestic, often fluffy. Meows. cat  
5. "Woof!", said the dog.  
7. Green, jumping insect. grasshopper

## Down

2. Found in Africa, bony horns. antelope  
3. Has a trunk. elephant  
4. Amphibian. Usually green. frog  
6. A mouse likes cheese, chased by 1 across.

Save Answers



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## Using xtUML Category Columns Quiz



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## Completed!

## Fruit

orange

mango

lemon

pineapple

## Vegetable

pumpkin

potato

carrot

## Meat

turkey

lamb

chicken

Drag-and-drop the following sentence connectors into the correct categories above.

[Save Answers](#)[Check Answers](#)

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# Course Content Creation

- We are creating a detailed process to use for creating course content: <https://github.com/xtuml/training/blob/master/doc-training/process/HOWTO-create-a-course.md>
  - Team members will fulfill different roles. Everyone will participate in course development. A few will be actual course administrators.
- We have a new public repository: <https://github.com/xtuml/training>
  - This is where we will store our course page content
  - Videos will be stored on YouTube
  - This allows us maximum flexibility for accepting submissions from the community
  - It also allows us to migrate our course content to a different LMS if we choose

# Course Content Creation - Developer

- Assigned a section of content from the course outline
- Create short videos (typically <5 min) for each topic in the section
- Upload the videos to YouTube as xtUML user
- Create pages in course on github using the page template, add text content and link to the proper YouTube video
  - Example course: <https://github.com/xtuml/training/tree/master/courses/Introduction%20to%20xtUML>
  - Page template: [https://github.com/xtuml/training/blob/master/doc-training/process/templates/Page\\_template.md](https://github.com/xtuml/training/blob/master/doc-training/process/templates/Page_template.md)
- As pages are completed, notify course administrator
- Create quiz content for your section

# Course Content Creation - Administrator

- Create course on [openlearning.com](https://openlearning.com)
- Create modules, pages, and quizzes in the course on [openlearning](https://openlearning.com) using the content from [github](https://github.com)
- Update the index page on [xtuml.org](https://xtuml.org) that links an index item to the proper [youTube](https://www.youtube.com) video

