



x-masterclass - Three flows

EDUCATION IN SYSTEM DEVELOPMENT, GMP & IMPLEMENTATION OF AXAPTA

In this paper you will find a description on education and training in Axapta system development, education in the inventory, production and GMP module and the education of how to implement Axapta modifications compliant with FDA.

x-masterclass is a course concept aimed at Axapta developers and people who want to become Axapta developers. x-masterclass learning solutions are designed by experts for experts. All courses share the same ambitious goal, to give experienced developers the knowledge and skills they need and accelerate that knowledge to be among the market's best.

THE EDUCATION PROGRAM

The education program presented in this paper is based on a flow based on three main flows. These three education flows will work as framework for the development of your competence build-up in your organisation. The education addresses three categories of profiles of the participants:

Profile 1

Developer with almost no experience in Axapta, but experienced on other platforms

Profile 2

Developers with 1-2 years of experience with developing modification in Axapta, who later on will be in charge of developing modifications of GMP.

Profile 3

Primary actors in this profile will be project-, QA managers and developers, who are involved in implementation of Axapta for Life Sciences modifications, and who might be involved in other modifications directed to regulated industries.

To cover the education of these three profiles we suggest three education flows based on the following masterclass categories of courses:

- Axapta system development masterclass
- Axapta module architecture masterclasses
- Axapta implementation masterclass

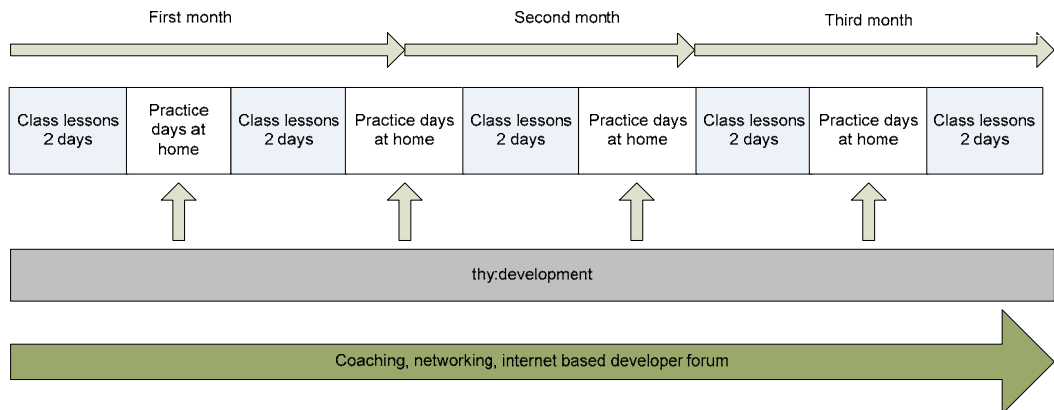
1 AXAPTA SYSTEM DEVELOPMENT MASTERCLASS

Axapta system development masterclass combines self-paced studies with classroom and individual coaching sessions. Course materials include case-based learning examples, extensive topic-divided manuals and an online knowledge portal.

This masterclass addresses **profile 1** participants. This participant is typical a programmer who has a few years experience in a programming environment different from Axapta - and who wants to get started with Axapta.

The course flow will in general be based on individual planning with each participant. As tool for this planning we will use the introduction of the **Contract Learning**.

The framework for the initial planning of the masterclass will look like the flow shown in the figure below:



Duration

The duration of the masterclasses is 10 classroom days.

Further reading:

Course description (pamphlet):

http://www.x-masterclass.com/Read_course_descript.84.0.html

Contract Learning:

http://www.x-masterclass.com/fileadmin/downloads/Contract_Learning_and_x-masterclass.pdf

2 AXAPTA ARCHITECTURE MASTERCLASSES

These masterclasses addresses **profile 2** attendees. Basic programming in X++ is assumed known.

They are aimed at you, who want to understand the architecture and design of the modules in Axapta: inventory, production, project, sales/purchase, customer/vendor, ledger and GMP.

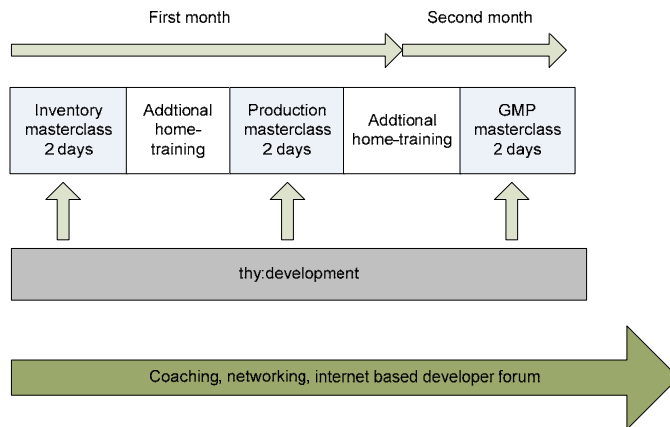
The masterclasses gives an understanding of the architecture and design of the module in question. Through each course the focus will be on the module's data model and the background for the design of it.

Each course sets off in the solution of a number of development tasks, which the participant is enabled to implement during the course.

In the development tasks the focus will primarily be on problems in relation to the data model, but also various technical and design problems in relation to the solution will be addressed.

The masterclasses currently consists of 6 masterclasses. Of these we recommend an education flow based on three masterclasses on Inventory Module, Production Module and the GMP module.

For the education of skilled developers with 1-2 years of Axapta experience, we suggest the following flow:



Duration

The duration of the masterclasses is 2 classroom days per masterclass, in total 6 days.

Further reading:

Axapta module architecture masterclass:

http://www.x-masterclass.com/Courses_-_axapta_mod.27.0.html

3 AXAPTA IMPLEMENTATION MASTERCLASS

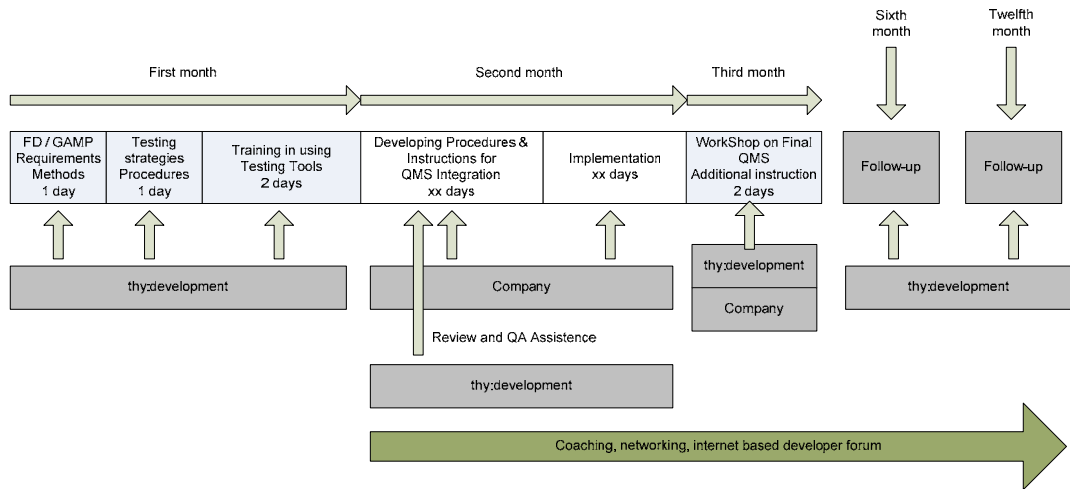
This masterclass addresses **profile 3** participants.

The masterclass focuses on integration between Axapta solutions and new or existing Quality Management Systems (QMS). All examples, guidelines and instructions are based on our own QMS, which complies fully with the US Food and Drug Administration (FDA) and GAMP4 guidelines for validation of computer systems.

The masterclass inspires participants to make their own integrated solutions between programming and QMS. A successful, real-life solution is presented. In training sessions, the participants try out processes described in procedures and instructions, including use of the tool box. Comprehensive discussions on how to proceed are based on presentations, hands-on training and the participants' own experience.

The complete course flow consists of consulting activities, "home-work" at your organisation, and four days with classroom sessions. These class room days will cover lessons in requirements to implementation according to FDA, examples on procedures, instructions and templates, and training in the use of the tools Version Control, Reference Tool, Unit Test, and the tool for Best Practice validation.

In the figure below the complete course flow for this masterclass is shown:



Duration

The duration of the masterclass will be 4 classroom days. Additional time should be included for the off-classroom work on procedures and instructions.

Further reading:

Course description (pamphlet):

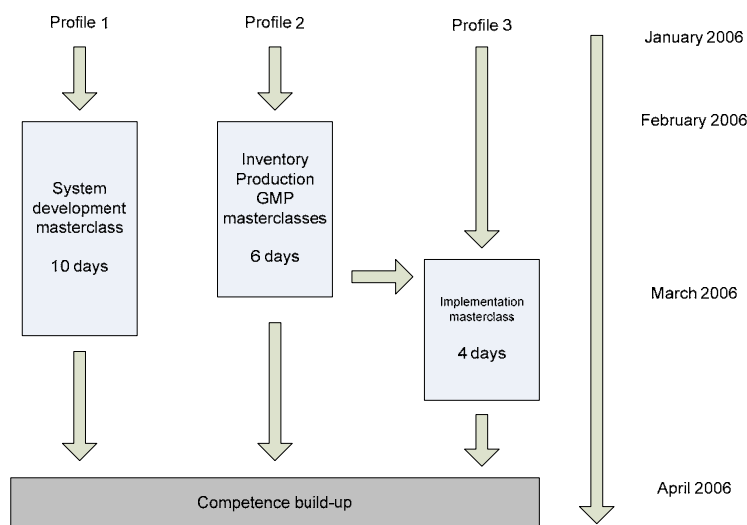
http://www.x-masterclass.com/Leaflet_for_printing.81.0.html

OTHER INFORMATION

On each masterclass we have a maximum of eight participants. Course language will be on English as well as all supplied material is on English.

SUMMARY

The three profiles of participants can be combined in a total education setup as shown in this diagram:



Of course, all models and suggestion are open for discussion. It is important to note, flexibility on our education program is a part of the education concept, both on individual as well as on organisational level.

GENERAL INFORMATION

www.x-masterclass.com

Contract Learning

http://www.x-masterclass.com/fileadmin/downloads/Contract_Learning_and_x-masterclass.pdf

Explanation of used taxonomy in masterclass course descriptions

http://www.x-masterclass.com/fileadmin/downloads/white_papers/Explanation_of_used_taxonomy_in_masterclass_course_descriptions.pdf

x-masterclass concept description

http://www.x-masterclass.com/fileadmin/downloads/white_papers/x-masterclass_concept_description.pdf