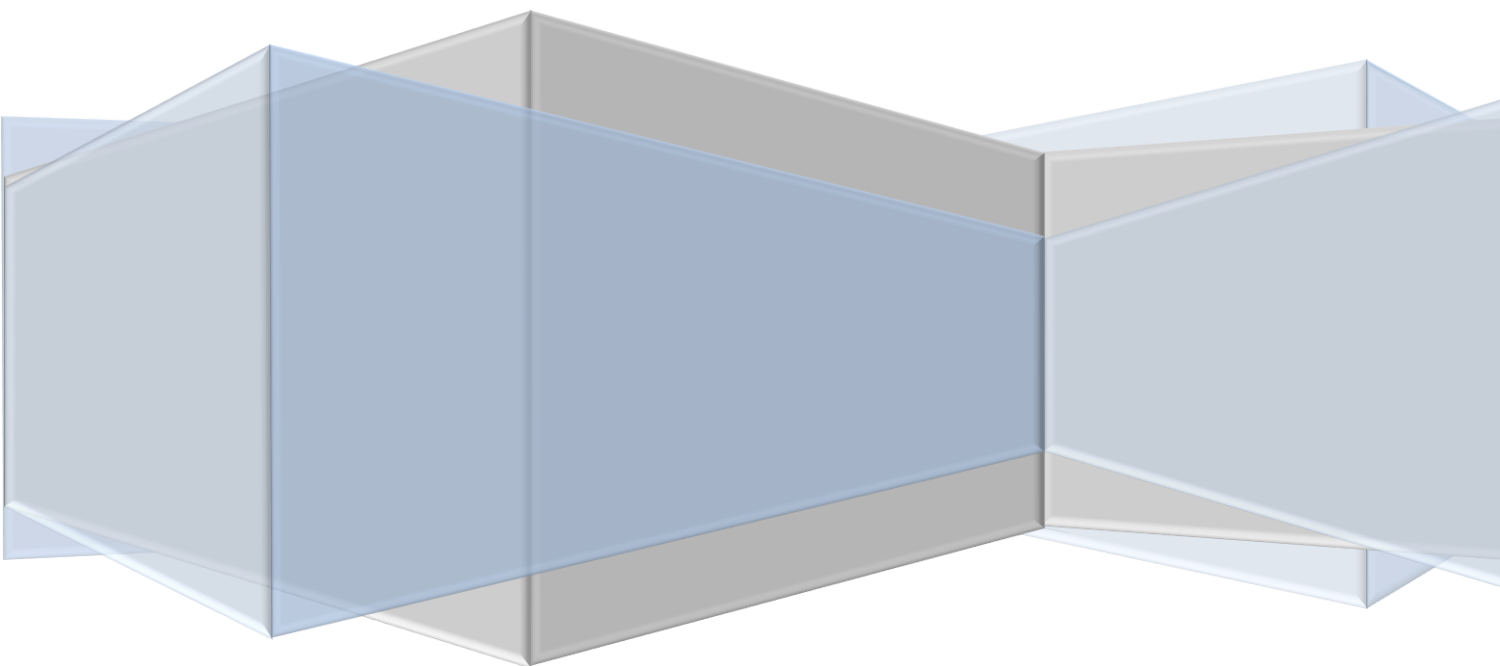# Trainee report

Implementation of a management tool in VB.net with an oracle database

Stephane ROSE

rose_s

Subject 1

NEWCOMER : Take over the project

Word of thanks

First of all, I would like to thank all the team members of the IT department of the Evolupharm Company for their hospitality and their cooperation during my internship. It helped me to integrate myself quickly and easily within the development team.

Specifically, I want to thank sincerely:

. Jean-Pierre CHULOT, the CEO of the Evolupharm laboratory which allowed me to work in his company

. Jean Paul HENON, my supervisor and also the IT department head which integrated me into the development team and gave me confident for the project.

I also want to thank all the team members for their patience, their friendship and their help during my entire trainee and particularly Jean Francois GIBERT which was my tutor and also a mentor for me. He gave me all the tools and the knowledge that I needed to perform my project in the best conditions.

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Newcomer: Discover and take over the project

As a newcomer in Evolupharm, you will need some information about the project I worked for during my internship in order to get an overview of the architecture and the functioning. AS an Epitech student, I could integrate myself into the development team for my third year internship. It was very interesting insofar as developers allow us great freedom with the project. I think it's a real opportunity for you to improve your experience and to work in a very important project.

Firstly, I will introduce the company and its history in order to feel more comfortable with the context of Evolupharm and secondly, I will present you the project and its properties. The aim purpose of this documentation is to give you my knowledge of the project, and to share my idea of the new architecture I tried to develop.

Evolupharm, from the beginning

Evolupharm

Evolupharm in a few word

Evolupharm was created in 1986 in Auneuil, next to Beauvais. Evolupharm group was born with the CEO Jean-Pierre Chulot and 5 pharmacists which want to create their own independent drug business in France. Their strategy is to buy the drug in the state of factory and sell them cheaper than real distributor to pharmacies without the brand.

Nowadays, the company has more than half of the pharmacies but she is also present on the market because it creates and sells his own stuff since the beginning of September 2011.

Evolupharm in some figures

- More than 2500 pharmacists members
- 1 pharmacy in 5 in France
- More than 5000 pharmacy clients

- 120 laboratory partners
- 260 employees
- Around 16 000 orders per month
- 14 000 m² of surface area
- 9000 m² of storage area
- 350 000 euros of turnover in 1986
- 65 million of euros in 2004
- 145 million of euros in 2011

Evolupharm employees

Headquarter

- Jean-Pierre Chulot, CEO
- Pascal Geffray, the President of the Association
- Valérie Carpentier, the personal department

The various departments

- Accounting
- Human relations
- Sale
- Warehousing and logistics
- IT
- Central purchasing
- Central MAD
- Central Generic
- Pharmaceutical quality
- Sales force

The IT Department

The department you will integrate is composed of six people, including Mr. HENON which is the IT department head. Note that during your internship you will not see him a lot because he has a lot of work to do and he is often in meeting with the CEO. The person who will be your supervisor during your trainee is Jean-Francois GIBERT which is the main programmer of the company. He is very helpful and you can ask him about everything you want.

The rest of the team is very nice and friendly and they make you feel comfortable very quickly. They are like a family to each other and then you don't need to wear a suit if you don't want to.

Project presentation

Overview

The command handler

Evolupharm receives commands from a lot of kind of clients and all the clients have specific properties. The problem is that all the programmers developed different software for every single partners and it makes the code very difficult to understand and really heavy.

When a partner makes an order to the company, its software creates an excel file which is sent to our server and stored in a mailbox.
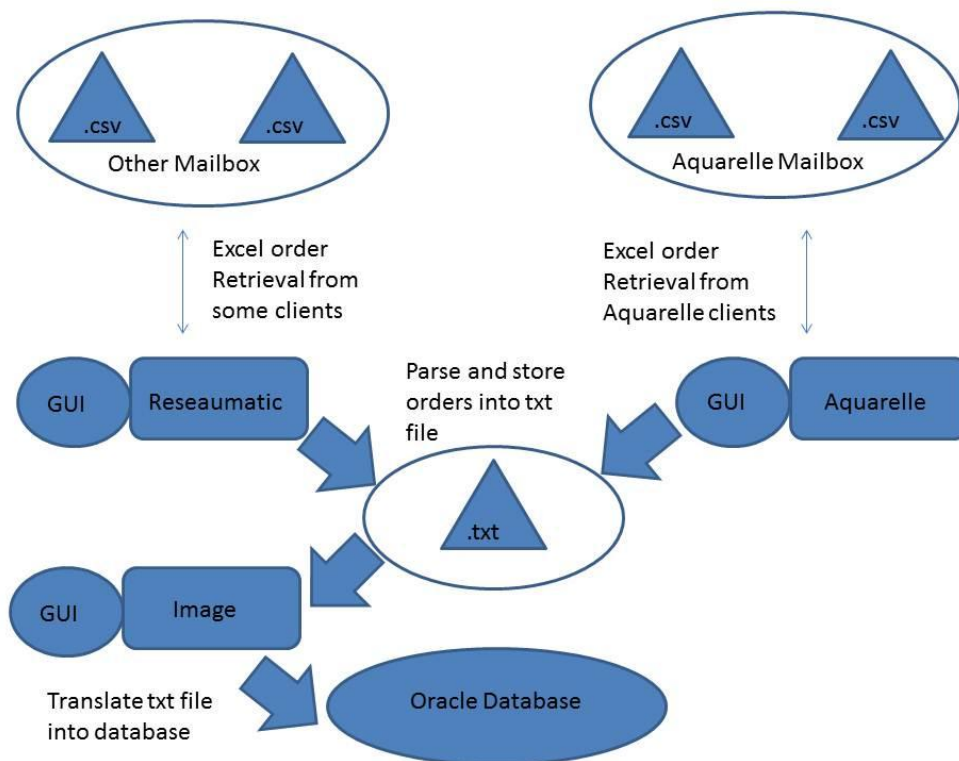
Then, the command handler which called "*Reseaumatic*" drop all the files on the mailbox, parse them to see if there are mistakes, throw out the wrong orders and store the others into another mailbox in .txt file (Note that they are two main command handler in the company which are "*Reseaumatic*" and "*Aquarelle*") These .txt files are used by another software called "*Image*" which consists in taking them and translate the data into the Oracle database.

It seems very simple but, the point is that all the excel file from the client has its own properties and, because of the lack of time, the developer has to develop some extension for each particular properties which is different. With time, they are some recurring problems of compatibility when a client changes some properties in his software that's mean that you have to change the code in all the little extension manually.
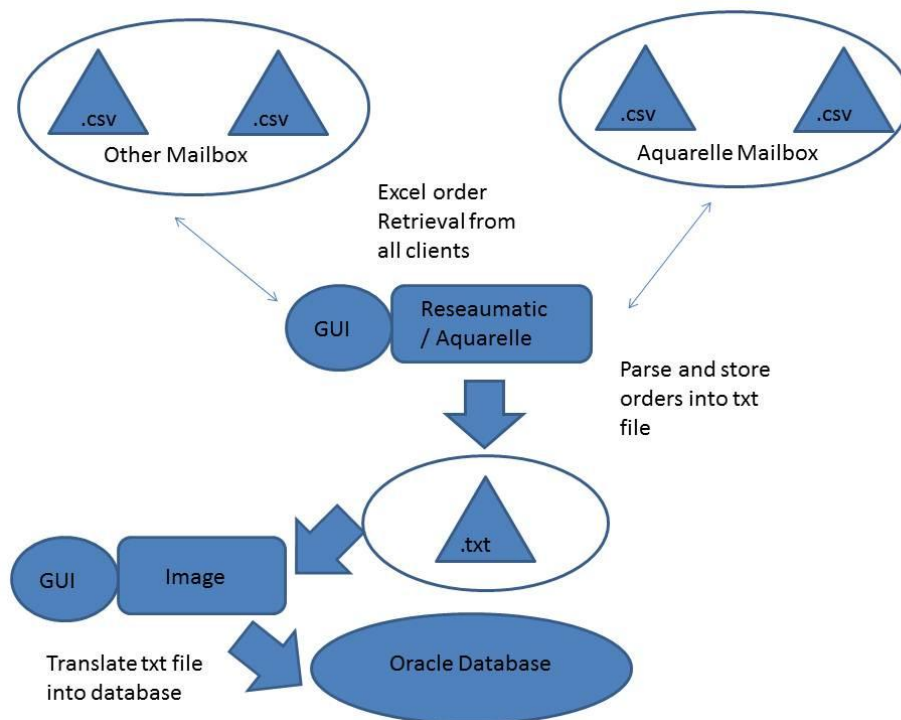
This is where you are going to intervene.

The purpose

The purpose of my work was to gather one of those big extensions into "*Reseaumatic*". It's called "*Aquarelle*" (You can see it on the picture below). The main goal is to bring together all the different clients extensions into "*Reseaumatic*" in order to get one generic software for every member. I didn't have enough time to complete all the tasks so it's your turn to finish it. Due to the confidentiality of some clients, I'm not permitted to write all the client's name, this is why I 'm just focusing on Aquarelle member. To get more details about the implementation code and the UML, you can check the documentation of the company which is available on the trainee mailbox. You can ask to Jean-Francois GIBERT to get some help about that. You can see on the two pictures below an overview of the architecture before and after my internship.

As we can see on the schema the aquarelle software is independent from the "reseaumatic" software

Now the "Aquarelle" software is implemented inside the "Reseaumatic" software and then both GUI are redesigned to use all the properties of the two softwares

The list of technology used

Evolupharm works with windows xp on Visual Studio 2008. The software is developed in VB.net. It's an interesting language because he is very user friendly and combines with visual studio; you can easily take part of big project without a large knowledge of the concept. The thing is, that if you're not a minimum rigorous you can quickly make very big sample of code which are very difficult to handle in the future. So be very careful with that. If you want to get an overview of what VB.net language is you can take a look at these links below:

- http://www.siteduzero.com/tutoriel-3-134798-visual-basic-net.html
- http://plasserre.developpez.com/cours/vb-net/

It's not a difficult language especially if you're familiar with Object-Oriented Programing concept. Otherwise, you can check this page:

- http://en.wikipedia.org/wiki/Object-oriented_programming

Evolupharm uses an Oracle Database. It's a very powerful tool but very complicated for beginners as well. However, the documentation on the web is very helpful and comprehensive.

Conclusion

I wish I could help you to understand in more details the purpose of the project and the context of Evolupharm. I hope that your integration in the programmer team will be easy and as beneficial for you as it was for me. If you have any question and if you want to have a discussion about some things you do not understand. Please do not hesitate to contact me at stephane.rose@epitech.eu. Now it's your turn to take the project and to make it grow.

Good luck and enjoy it.

Subject 2

<u>Convince my supervisor to give me the realization of a new part of the project</u>

First of all, I would like to thank you and Mr. CHULOT for receiving me within EVOLUPHARM to do my third year trainee. It allowed me to improve my experience in a company and develop my sense of responsibility in big projects.

I'm contacting you because I would like to have a discussion about the project managers which consist in regrouping all the different orders from all clients of the company. I send you this letter to ask permission to join the team of programmers and participate in the development of the project.

Indeed, having refunded a large part of the order processing and implementing a large part of the database and the "Aquarelle" client code, I think I can adapt myself quickly to the team and fill my lack of experience with my knowledge of the project. In addition, it would allow me to complete the rest of my work and fix the remaining bugs found during the testing phase before my departure. This could be beneficial for the company to the extent that I would not have to be trained to understand and practice the language vb.net as well as the management of the Oracle database.

Thank you for taking your time to consider my request. I stay at your disposal for any further information.

Best regards,