



CorePath
ROBOTICS

Hand in:

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Counselors:

Michael Larsen
Lise Agerbæk
Ellen Houmøller
Mette Lund Køstner
Adam Montandon

Assignment:

CP Robotics

Keystrokes:

34.271

Link to prototype:

CP Robotics:
- invis.io/HP9L6BUXW

CP Customers:
- invis.io/JP9LHF9NU



TABLE OF CONTENT

■ SECTION 1 - INTRODUCTION	3
EXECUTIVE SUMMARY	3
PROBLEM DEFINITION	4
TOOLS & METHODS	5
HEMPELS COVERING LAW	6
■ SECTION 2 - RESEARCH	7
STRATEGY & TACTICS	7
TRIANGULATION	8
FORMATIVE RESEARCH	9
LITERATURE REVIEW - SECONDARY QUALITATIVE	9
INTERVIEWS - PRIMARY QUALITATIVE	10
FORMATIVE RESEARCH RESULTS	10
SUMMATIVE RESEARCH	11
■ SECTION 3 - CONCEPT & BUSINESS	12
BUSINESS CANVAS MODEL	12
CHOSEN TECHNOLOGY FOR THE CONCEPT	13
■ SECTION 4 - PRODUCT DEVELOPMENT	15
WIREFRAME	15
MOCKUPS	17
PROTOTYPE	18
USER TESTING	18
■ SECTION 5 - PROJECT MANAGEMENT	21
PROJECT MANAGEMENT METHODS	21
SCRUM	21
BELBIN TEST AND ROLES	23
VIRTUAL TEAMS	24
RISK MANAGEMENT	25
■ SECTION 6 - REFLECTION	27
■ SECTION 7 - CONCLUSION	28
■ SECTION 8 - REFERENCES	29
■ SECTION 9 - APPENDIX	30



1

EXECUTIVE SUMMARY

CP Robotics is a spin out of University of Southern Denmark and was established in 2015. CP Robotics is a software company with patented software licenses, PathFinder Basic & PathFinder Cloud, that enables end-users of robotic technologies in the manufacturing industry to perform industrial processes on any industrial robot arm. As the company slowly unfolds and evolves, resellers are needed to further expand the company and its branding. CP Robotics goal is now to reach out to their resellers so they can start having steady income for the new company.

The target of the project is for the students to create a solution for CP Robotics lack of communication with the resellers, and cre-

ate a customer relationship between them. With the help and combination of different primary and secondary research methods, the students are to present a realistic, efficient and thought through solution that enables CP Robotics to establish a customer relationship with their resellers.

This report will give insight into the whole concept development process, and elaborate on the concept and the research behind it. It is shown step-by-step how the concept turns into a prototype from start to finish. The whole product development process is based on the findings of the research to achieve the most suitable and efficient product for the client company.

PROBLEM DEFINITION



How would a user friendly platform that enables CP Robotics to communicate with their resellers be designed?

- Which features are essential to create a user friendly interface
- How does CP Robotics want their visual identity represented in their communication platform
- How does other existing platform prioritize UX/UI?

The problem definition has not been formulated as a Paradox since our given assignment doesn't problematize existing perceptions. The assignment is to create an extranet as the concept and therefore not to create a solution to a problem. The problem definition is based on the research problem type, Planning Problem as the most suitable for this project

since the situation has changed. The robotics market is an ever growing new market, where the resources and knowledge about robotics are usually limited and off-limits to outsiders, which makes it difficult for the whole project to produce a product of great quality.

(Olsen & Pedersen 2005: p. 28-39)

TOOLS AND METHODS

HEMPELS COVERING LAW MODEL

A scientific explanation that has the logical structure of an argument with a set of premises followed by a conclusion.

FORMATIVE RESEARCH

User Research in the start of a project to identify and explore the area of research.

INTERVIEW

Conversation used to investigate user needs and wishes.

LITERATURE REVIEW

Investigating existing materials, in this case existing extranets looking for inspiration.

TRIANGULATION

Used to find a shared truth, convergence, between the different research methods.

BELBIN

Test used to identify each team members preferred roles and responsibilities.

SCRUM

Framework used to manage the development process and structure the workflow.

RISK MANAGEMENT ANALYSIS

Tool used to create an structured overview on all possible risk factors where each risk is graded and a response is prepared to minimize the negative impact.

BRAINSTORM

Creative technique to generate large quantity of ideas and then discussing, developing and iterating on those ideas.

HEMPELS COVERING LAW

HEMPELS COVERING LAW MODEL

Problem	CP Robotics have no resellers
Premise 1	In order to get resellers in the B2B market, it is required as a company to have a shared communication platform/extranet with their resellers.
Premise 2	They can't establish a customer relation with their resellers if they don't have any platform to communicate through.
Conclusion	Therefore we conclude that CP Robotics need an extranet to reach out to their resellers and establish a customer relation.

The main goal for CP Robotics is to get resellers for their company, but to reach that goal, they would need a platform where one-to-one, one-to-many or many-to-many business relationships can be created easily. To create an overview on the problem that has to be solved, the problem is put in a model, called, Hempel's Covering Law to give an overview and keep the focus on the core problem and solution.

The first premise is about companies need to have communication with their partners etc. which is usually happening through various platforms, such as an extranet, which is a common communication platform in the B2B market. The second premise is about, if CP Robotics doesn't have a platform that can reach out to the resellers then it is not possible to establish a customer relation. The conclusion shows that the only way that CP

Robotics can create a customer relationship, is to have an extranet as a starting point so they can communicate with their resellers while establishing a good relation. The extranet will be a great asset for the company to use for structuring and transferring data while being easily accessible for the resellers when dealing with the company's product.

The testing of the concept would also be used to create the warrant for the claim. But since the extranet is not gonna be implemented by CP Robotics any time soon, then it isn't an option to test how their customer relation is created by the extranet. In accordance the warrant for the claim is based on the primary and secondary research, since the prototype can only be tested as a concept and not as a finished product and therefore it can be temporarily concluded that the claim is true.

(Okasha 2002: p. 40-57)



2

STRATEGY & TACTICS

In terms of strategy and tactic in user research, strategy is the overall approach collecting data, while tactics are the methods with which the data is collected. The chosen

strategies for this project are ethnographic research, user testing and visual exploration, while a variety of tactics to research data are being employed, as shown below.



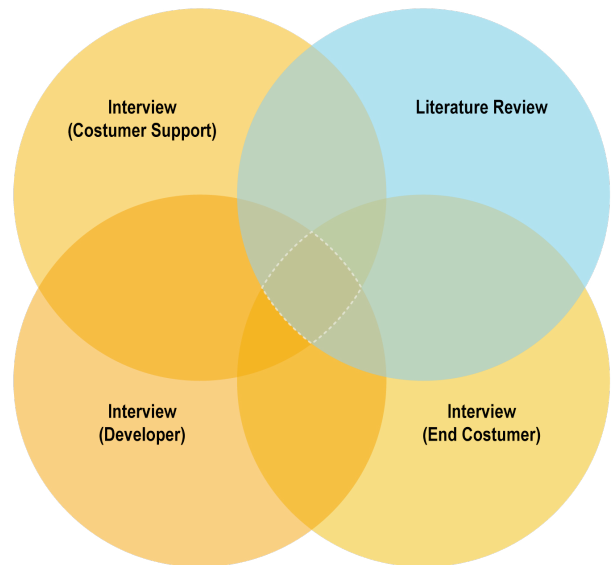
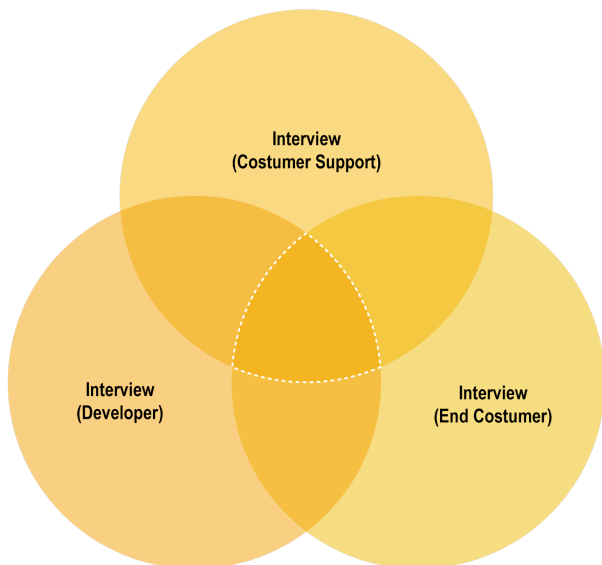
TRIANGULATION

Triangulation is the process of using several research tactics to examine an area of study, with the goal of confirming the findings of each tactic by finding where information overlaps and creates convergence.

(O'Grady 2006: p. 76)

The team have chosen to triangulate the research by covering how other companies' extranets are designed and function from

3 different angles. The team are doing this by interviewing 2 different kinds of users of extranets and a software developer working on extranets. On top of that the team is performing a series of literature reviews to further cover the subject, which is visualised in the triangulation model but with a slightly altered version since the literature reviews play an important role when discovering the convergence/viable data.



FORMATIVE RESEARCH

As part of the formative research the team have chosen the following tactics:

- Interviews
- literature review

Both tactics are being employed with with an ethnographic approach to investigate the respondents experiences, insight and opinions about extranets.

The team has settled on exclusively employing qualitative research tactics for the formative research, as the team sees little to no benefit of acquiring quantitative data compared to qualitative for this specific projects formative phase.



LITERATURE REVIEW - SECONDARY QUALITATIVE

The first step of the formative research is a series of literature reviews as these can be a good way to become familiar with the subject of research and can help create associations which then can also be used in the later phases of development of our extranet solution.

(Ibid, p. 24)

The team have chosen to investigating a number of existing extranets solutions available and looking at a number of things, such as what the functions of the extranet are, fea-

tures, design and information architecture.

The extranets being investigated include Papyrs (Papyrs.com), Blue Water Shipping (bws.dk), Atea and Adobe (adobe.com), which together form a good variety of extranets.

Furthermore the team looks into CP Robotics themselves as a company and how they choose to communicate and brand themselves on their website and other materials.

INTERVIEWS - PRIMARY QUALITATIVE

The team is performing 3 interviews with 3 different types of users of extranets in our formative research: A software developer at Blue Water Shipping, a customer support employee at Atea and a Adobe Creative Cloud customer.

As the team is performing the interviews ourselves and the interviews are done for this specific project and problem definition, these are considered primary research. (*Ibid*, p. 19)

The team chose interviews because this tactic enables us to gain insight into the respondents experiences with, and opinions about the different extranets they have used.

Designing and performing the interviews in a semi-structured format furthermore allows both interviewer and respondent to elaborate

on questions and answers, and dig into certain areas if they find something particular interesting during the interview. The semi-structured format of the interviews suits the purpose of our interviews very well, as we wish to explore areas that the team has little to no insight or knowledge about, but the respondents does. It allows for both interviewer and respondent to direct the conversation into areas the respondents are comfortable with and knowledgeable about.

The team have designed an interview guideline to support the interviewer throughout the interviews. [Appendix 1 - Interview guidelines & Interviews.](#)

The questions in the guideline functions as anchor points for the conversation, if it should go stale or too far from the subject.

[Appendix 2 - Interview mockups](#)

FORMATIVE RESEARCH RESULTS

Through our qualitative research and triangulation we have established convergence about what is the most essential things to have in mind when designing our extranet concept. Both our literature reviews and interviews has shown that existing extranets focus on easy-of-use and user friendly design by having simple and easy to navigate interfaces and navigation and just the necessary. These traits are shared across of extranets despite different primary functions.

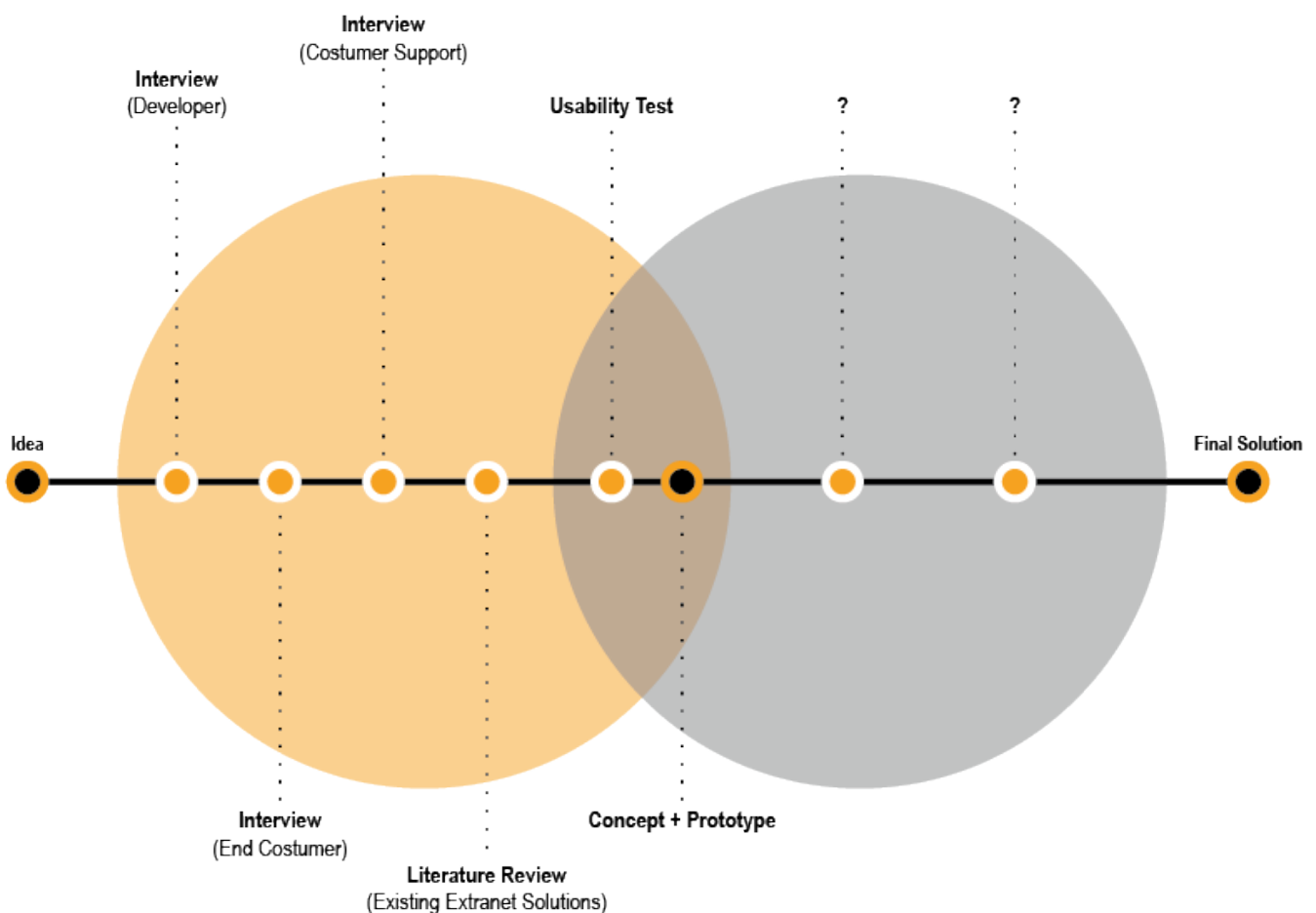
User friendliness is something that is valued highly for users on both customer

and company sides. The respondents at Blue Water Shipping and Atea both said that the extranet minimizes the time spent on manual labor on the company side and thus made the process of handling tickets and orders easier and more efficient. This saves the company time and money and makes for a better experience for the customer. Both also noted that using the extranet should be and that using their extranet is an easy and intuitive process, but that an initial learning phase was to be expected.

SUMMATIVE RESEARCH

As the scope of our project only covers developing and designing a concept for an extranet for CP Robotics and not the actual developing of the extranet it is tough to do any summative research at the current stage. If we were to do research once the extranet have been fully developed, summative research could be used to conclude on whether or not the final extranet solution has been successfully designed and developed and

whether or not further improvement should be made to it (*Ibid*, p. 20). Interviews, usability testing or web analytics could all be viable methods of summative research in this case. Through usability testing and interviews research could be done on how users navigate and use the extranet while expressing their thought process vocally and web analytics could put the way users navigate the extra into statistics, e.g. through heatmaps.





3

BUSINESS CANVAS MODEL

Business Model Canvas: CP Robotics

Key Partners: - Resellers - Universal Robots	Key Activities: - Software developing - Branding Key Resource: - Robot arms - Funding	Value Proposition: Software: - Unique - Efficient - Money saving Extranet: - Easy to use - Efficient - User-Centered	Customer Relationship: Healthy communication & relationship to resellers Channels: - Flyers - Conventions - Extranet	Customer Segments: - Resellers - SME's
Cost: - Salary - Rents - Equipment		Revenue: - Sales - More funding		

The chosen business model for CP Robotics is based on the information from their business plan. The plan points out that CP Robotics lives off fundings and that they will need further funding in the upcoming years. Therefore, as seen under the Key Resources in the BMC, funding is placed as one of the resources there is necessary for CP Robotics to live and continue their work. Further

funding is also placed in Revenue since CP Robotics will need more funding. To be able to achieve the goal of further funding and sales, then they need to get in touch with resellers and establish customer relationships. That is why Value Proposition is an important step in the Business Model Canvas. One of the values that CP Robotics currently have is their own software, that they develop, which

is unique on the robotics market, an efficient tool for SMEs and is money saving for the companies as well. The second value that CP Robotics will get, is the extranet. The extranet offers an easy-to-use system to communicate efficiently with their resellers. The system is also User-Centered around the resellers' needs. Those values will give CP Robotics a

major improvement in their customer relationships with the resellers, which also brands CP Robotics as a more serious and successful company, that increases their chances to be funded furthermore. The extranet is also another communication channel next to their current flyers and convention showups.

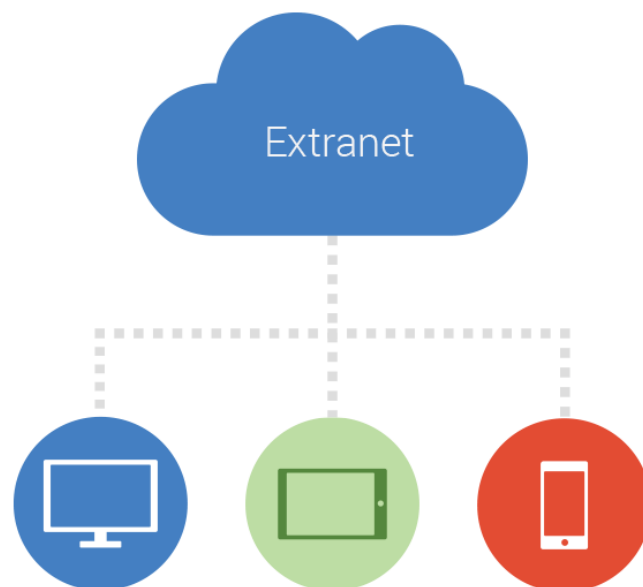
(Osterwalder & Pigneur 2010: p. 14-44)

CHOSEN TECHNOLOGY FOR THE CONCEPT

The chosen technology for the concept is an extranet for CP Robotics with the focus on creating a customer relation with resellers. The extranet is an user-centered digital platform which, in its basic form, is a website with a login that allows controlled access to partners, vendors and suppliers or an authorized set of customers.

Parts of the information that is usually found on an extranet is some of the same information from the company's intranet but made into a subset to create a private network organization.

With the limited resources of gaining knowledge from the robotics market, a research was done by the team where they interviewed different companies who have an extranet as their solution to reach out to their resellers. Extranets has for many years been used as a powerful branding tool for B2B companies, and as a part of our research, the company Blue Water Shipping and ATEA has been providing us a knowledgeable insight, on how they use their extranet and what they have gained from it.



The research has resulted in the concept of an extranet being the most suitable solution for CP Robotics. Even Though the research was done on companies from different markets, the data is still deemed reliable since extranets are not an uncommon solution for the B2B market. Taking the secondary data in account, the articles also shows that B2B is the most suited solution for industrial manufactured companies.

The platform is efficient and structured while still being highly adaptable, all depending on if the extranet is developed by CP Robotics itself or if they choose to use premade systems such as Papyrs etc. Not only does it make sharing specific information to specific resellers easier by creating a smooth communication, but it also helps CP Robotics have a more professional image on the market which will help them stand out from companies that doesn't have an extranet.

Alternatives, instead of using an extra as communication platform, would be the traditional

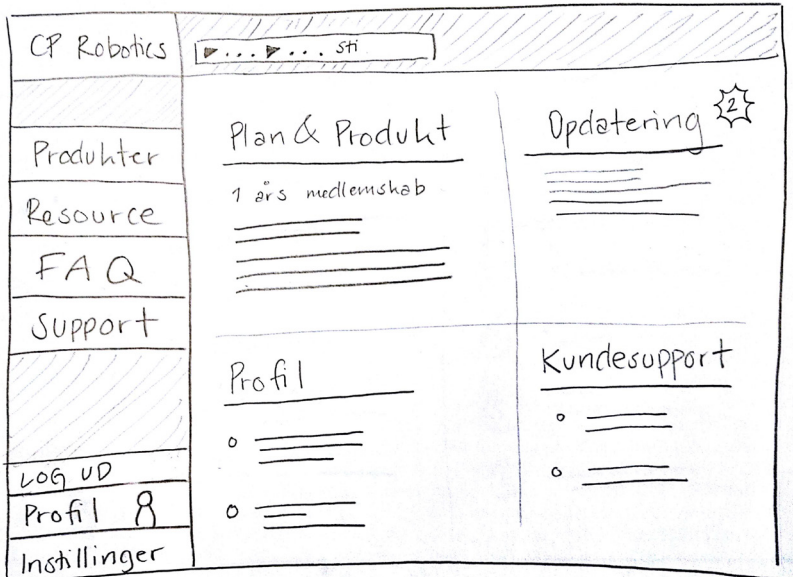
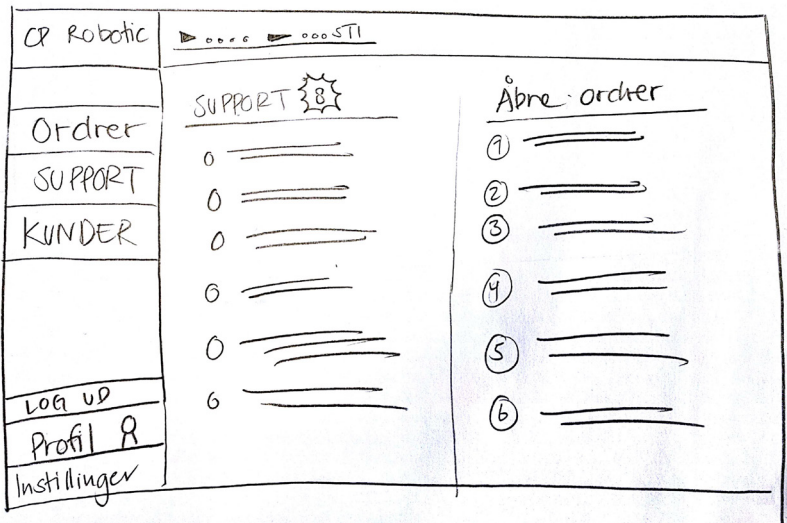
emails and phonecalls. But those options will always be available, especially is it needed if there is complications with the communication on special orders or have some questions that can't be answered through the informations on the extranet. Meetings with clients and resellers will still happen but would be in a lesser degree since the extranet will be used as the main platform to share informations, and the meetings will instead be more about urgent problems or situations that would have to be discussed face to face.



4

WIREFRAME

Sketches



CP Robotics extranet

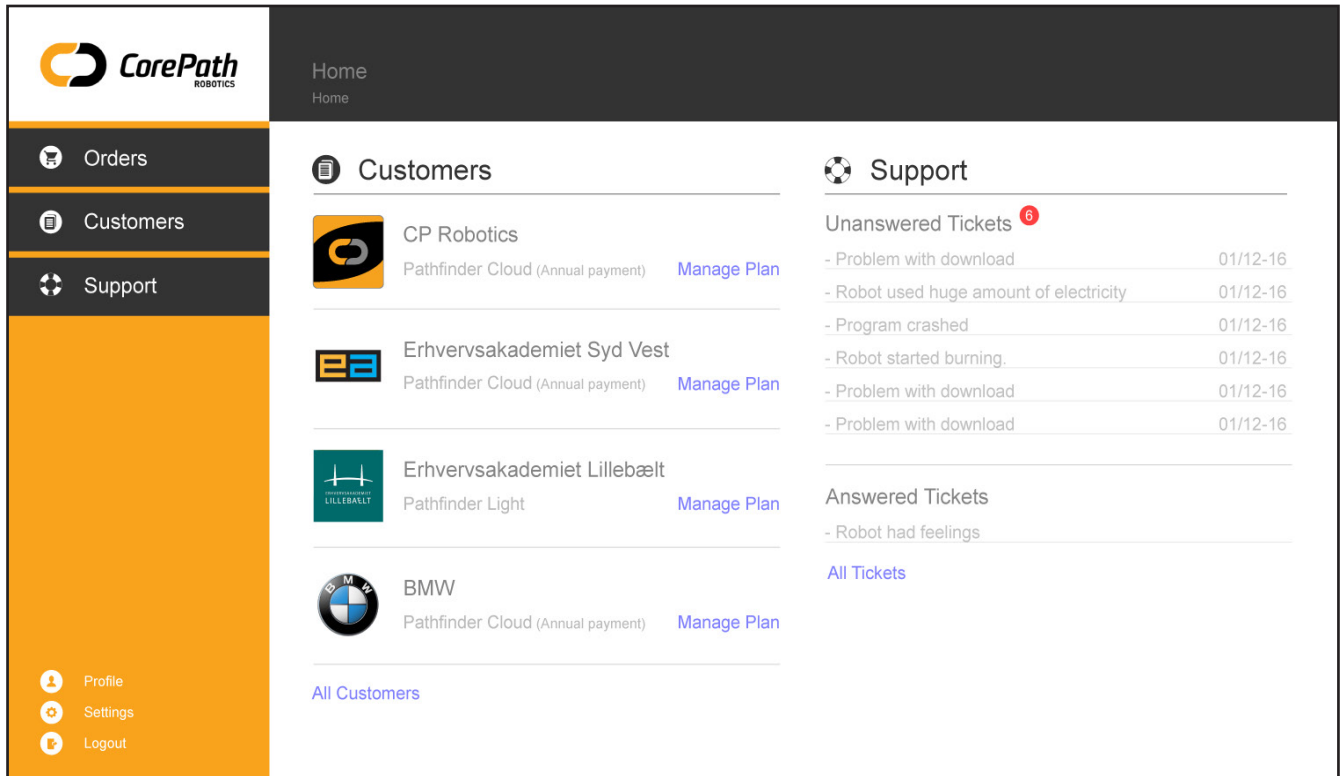
CP Robotics	▶▶ Path	
Order	<div style="display: flex; justify-content: space-around;"> <div style="width: 45%;"> <h3 style="text-align: center; text-decoration: underline;">Support</h3> <ul style="list-style-type: none"> ● _____ _____ ● _____ _____ ● _____ _____ ● _____ _____ </div> <div style="width: 45%;"> <h3 style="text-align: center; text-decoration: underline;">Current Orders</h3> <ol style="list-style-type: none"> ① _____ _____ ② _____ _____ ③ _____ _____ ④ _____ _____ ⑤ _____ _____ </div> </div>	
Support		
Customers		
Profile		
Options		
Log out		

Resellers extranet

CP Robotics	▶▶ Path	
Products	<div style="display: flex; justify-content: space-around;"> <div style="width: 45%;"> <h3 style="text-align: center; text-decoration: underline;">Plan & Products</h3> <ul style="list-style-type: none"> ● _____ _____ </div> <div style="width: 45%;"> <h3 style="text-align: center; text-decoration: underline;">Updates</h3> <ul style="list-style-type: none"> ● _____ _____ </div> </div> <hr/> <div style="display: flex; justify-content: space-around;"> <div style="width: 45%;"> <h3 style="text-align: center; text-decoration: underline;">Profile</h3> <ul style="list-style-type: none"> ● _____ _____ ● _____ _____ </div> <div style="width: 45%;"> <h3 style="text-align: center; text-decoration: underline;">Support</h3> <ul style="list-style-type: none"> ● _____ _____ ● _____ _____ </div> </div>	
Resources		
FAQ		
Support		
Profile		
Options		
Log out		

MOCKUPS

CP Robotics extranet - Link: <https://invis.io/HP9L6BUXW>

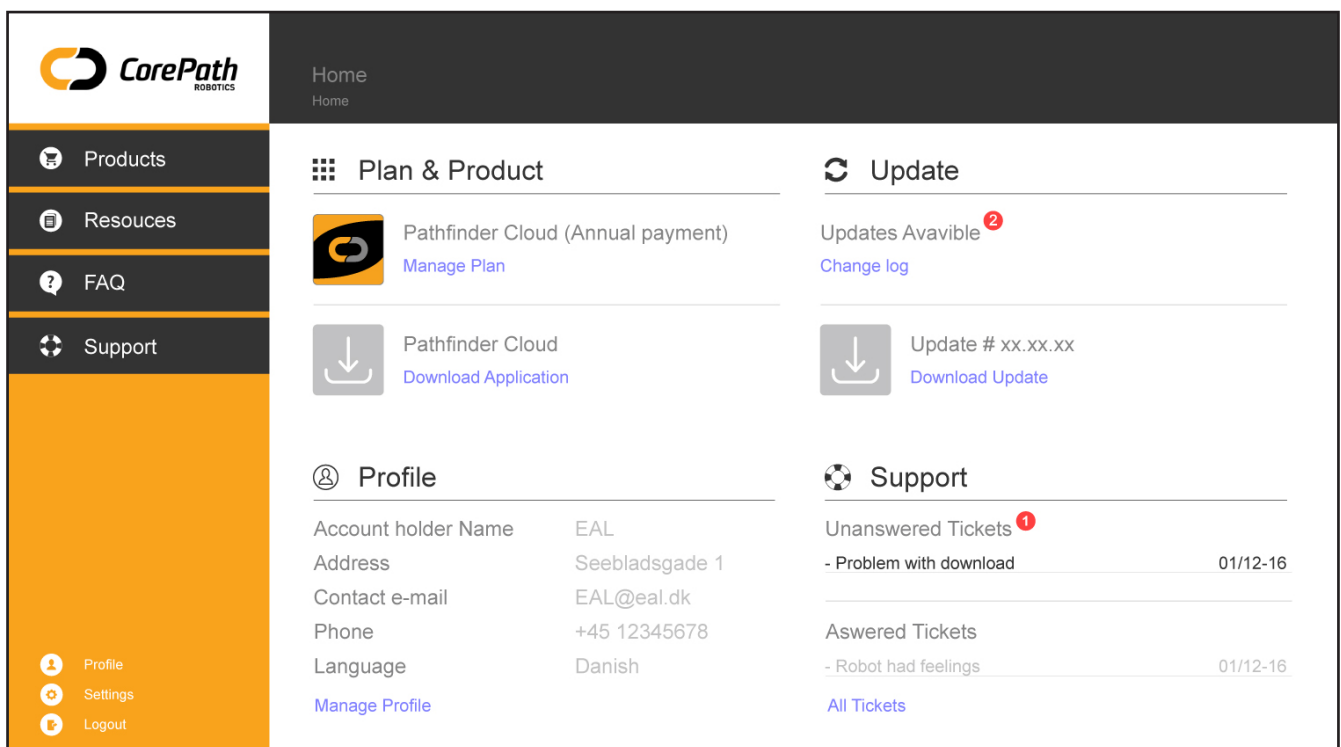


The mockup shows the CP Robotics extranet home page. It features a dark header with the CorePath Robotics logo and a 'Home' link. A left sidebar contains navigation options: Orders, Customers, Support, Profile, Settings, and Logout. The main content area is divided into three sections: Customers, Support, and a bottom profile section. The Customers section lists three accounts: CP Robotics (Pathfinder Cloud), Erhvervsakademiet Syd Vest (Pathfinder Cloud), and Erhvervsakademiet Lillebælt (Pathfinder Light), each with a 'Manage Plan' link. The BMW account is also listed with a 'Manage Plan' link. The Support section shows 'Unanswered Tickets' (6) and 'Answered Tickets' (1), with a list of ticket details including dates and descriptions. A 'All Tickets' link is provided at the bottom of the support section.

Customer	Product	Plan
CP Robotics	Pathfinder Cloud	Annual payment
Erhvervsakademiet Syd Vest	Pathfinder Cloud	Annual payment
Erhvervsakademiet Lillebælt	Pathfinder Light	
BMW	Pathfinder Cloud	Annual payment

Ticket Status	Description	Date
Unanswered (6)	- Problem with download	01/12-16
Unanswered	- Robot used huge amount of electricity	01/12-16
Unanswered	- Program crashed	01/12-16
Unanswered	- Robot started burning.	01/12-16
Unanswered	- Problem with download	01/12-16
Unanswered	- Problem with download	01/12-16
Answered (1)	- Robot had feelings	

Resellers extranet - Link: <https://invis.io/JP9LHF9NU>



The mockup shows the Resellers extranet home page. It features a dark header with the CorePath Robotics logo and a 'Home' link. A left sidebar contains navigation options: Products, Resources, FAQ, Support, Profile, Settings, and Logout. The main content area is divided into three sections: Plan & Product, Update, and Profile. The Plan & Product section lists 'Pathfinder Cloud (Annual payment)' with a 'Manage Plan' link and a 'Download Application' button. The Update section shows 'Updates Available' (2) with a 'Change log' link and an 'Update # xx.xx.xx' with a 'Download Update' button. The Profile section displays account details: Account holder Name (EAL), Address (Seebbladsgade 1), Contact e-mail (EAL@eal.dk), Phone (+45 12345678), and Language (Danish), with a 'Manage Profile' link. The Support section shows 'Unanswered Tickets' (1) and 'Aswered Tickets' (1), with a list of ticket details including dates and descriptions. A 'All Tickets' link is provided at the bottom of the support section.

Product	Plan	Action
Pathfinder Cloud	Annual payment	Manage Plan

Update	Action
Update # xx.xx.xx	Download Update

Field	Value
Account holder Name	EAL
Address	Seebbladsgade 1
Contact e-mail	EAL@eal.dk
Phone	+45 12345678
Language	Danish

Ticket Status	Description	Date
Unanswered (1)	- Problem with download	01/12-16
Aswered (1)	- Robot had feelings	01/12-16

PROTOTYPE

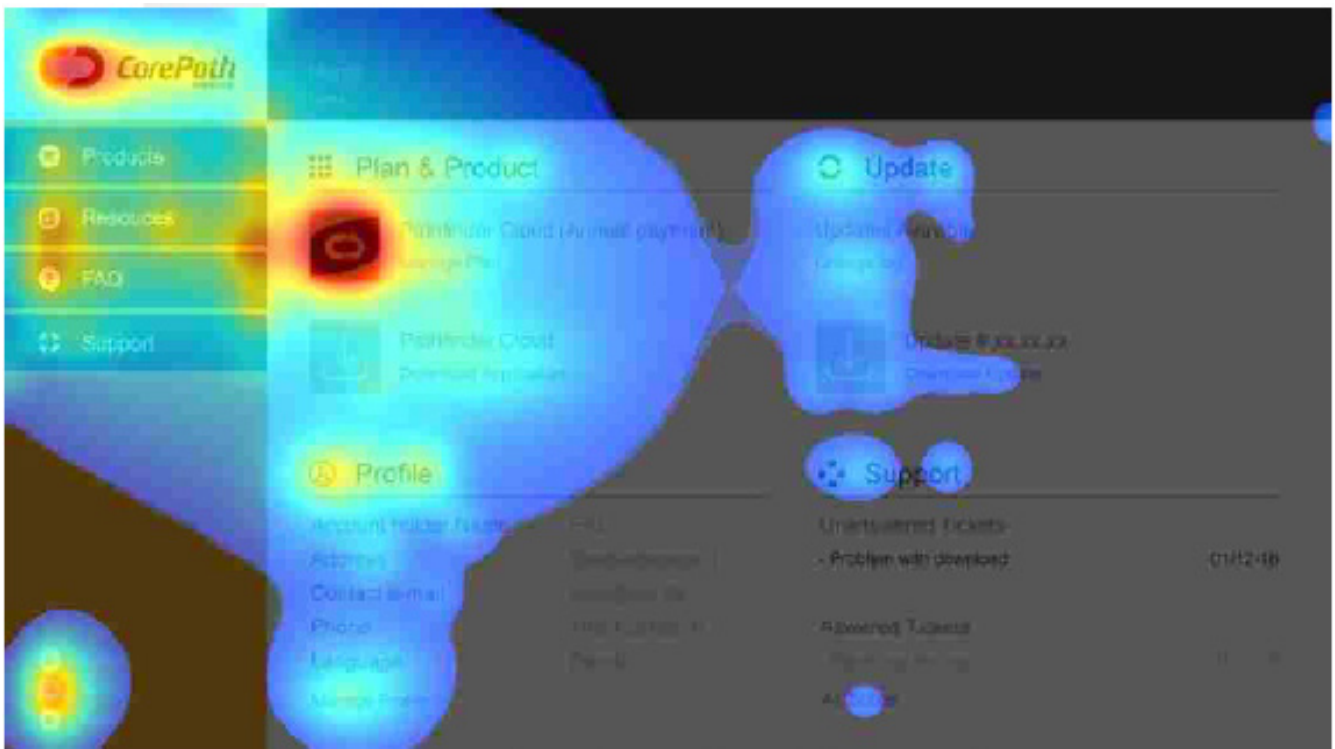
A prototype can best be described as mockups made interactive. “it’s the difference between seeing the blueprint versus exploring the model house”

(How & Why Prototypes are Mandatory in Design - Designshack 2016).

The purpose of the prototype is to test whether or not the flow of the extranet is smooth and to iterate on the design of the extranet. It also serves a good way of communicating and showcasing the concept of the extranet, something that is useful when pitching.

The team has chosen to build a prototype through Invision App (www.invisionapp.com) as this is a simple, free and easy-to-use solution for prototyping and one that the team has experience using.

USER TESTING



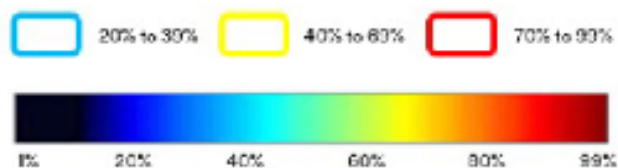
The setup for testing the concept has been done by using 3M Visual Attention Software on vas.3m.com. 3M VAS is an eye-tracking software that tests your design, such as mockups of websites, pictures etc. It analyzes your product to decide what parts of your

design grabs your clients attention and helps you decide what things you should focus more on. It also helps improve the design by creating a report of the analysis that can be downloaded as a pdf. The numbers from the report could be how many percent does

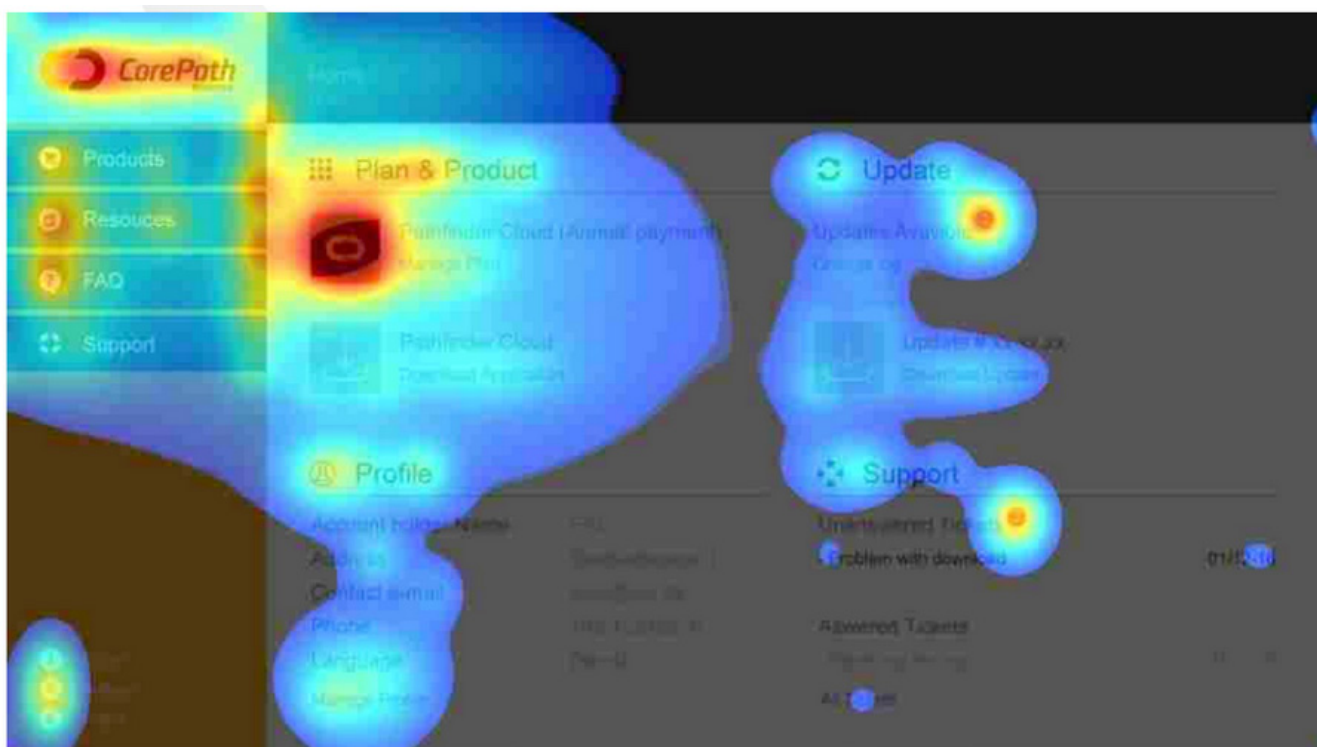
the placement of a logo get out of the total view percentage. With the help of the results from the test, can you do some changes in the design and try to analyze once again, to see if the results are better in the new report and then comparing the numbers.

By testing the chosen design for the extranet, the team have seen some significant differences. The example that is shown in the pictures, is from the frontpage of the extranet for the CP Robotics's client. The first test the team made with 3M VAS, was with the first finished version of the frontpage. The report that was made of the analysis showed a heatmap of the whole page and how the attention was spread. As seen in the picture, the whole right side is only covered with a bit of blue areas, which generates 20-39% attention in the first 3-5 seconds. Compared to the right side it is not much, since all the red and orange/yellow areas are primarily on the right side.

Probability of visual fixation within first 3-5 seconds



The team decided to add notification icons, as seen in the picture, next to update and support. This change on the design made the right side be way more interesting and generated up to 80% attention. The icons has been marked as orange/yellow areas, which also is very important, because that indicates that the specific area with orange/yellow colour generates around 80% attention in the first 3-5 seconds. If the update or support has an active notification, then it is showing that there is something new going on, and by having those red icons next to the text it generates the needed attention to this side of the frontpage.



The team would have made further testing of the prototype, but since it was difficult to find available resellers in the robotic market to test on, this couldn't be done. Even though the testing was not possible to execute, a plan was still made on how the testing could be done. The group would have tested the design and the UX of the extranet by doing Think-Aloud usability tests with the target group. A click dummy has been prepared for this testing, by using the online prototyping tool, InVision. By using a click dummy to-

gether with Think-Aloud tests the group can gather useful data about how the user interacts with the extranet and also notice where the difficulties are. After the Think-Aloud test, the team would ask follow-up questions and gather comments or suggestions on improvements. The testing would also be executed on CP Robotics, since they have a different layout on their side of the extranet and their input would be valuable data to be gathered and used for further improvement implementations.



5

PROJECT MANAGEMENT METHODS

Since this is a developing project with changing requirements, the best suited project management method would be Scrum compared to Prince2, where big changes during a project is nonexistent. Scrum is an agile framework method that is an adaptable and effective method, whereas Prince2 is great for a linear A to B process where the start and finish is known and strict coordinated. Looking at the project as a whole, also shows that the Prince2 couldn't have been implemented, as the project doesn't fit the many and different criterias of Prince2. An example like the 7 key principles, which is the foundation and the unique aspect that defines the method, gives a set of principles/criterias for a project to fulfill if Prince2 should be implemented.



SCRUM

There are three roles in Scrum: The Product Owner, the developer team, and the Scrum Master. The Product Owner for this project has been the teacher Michael and the client from CP Robotics, Sabina. The developer team consists of Ruben, Morten, Ermin and

Amy. The Scrum Master of the project is Amy as well, which was decided upon her previous experience as organizer and team leader. The scrum master is responsible for ensuring the team's well-being and that the team is following the Scrum process.

For example, to making sure that there is a Daily Scrum meeting and that everyone answers the standard three questions;

- What did you do yesterday?
- What will you do today?
- Are there any difficulties in your way?

While using scrum as a project management method, the first thing you should do is to create a list of things to be done (Product Backlog). If an item on the list has a high priority it should be placed at the top of the list, on the other hand if the priority is low it should be placed at the bottom of the list. By doing this, the development team now have a prioritized list of items and should immediately be able to efficiently start their work.

When a development team works with Scrum, they work in sprints. A sprint is a repeated set period of time. When starting a sprint the Product Owner and the developers agree on which items from the backlog they will complete during the sprint. These items from the product backlog will then become a part of the sprint backlog. During a sprint, the Product Owner is not allowed to change the inventory of the sprint backlog.

Meanwhile the development team need to have scrum meetings so they can coordinate their work according to the backlog. The Daily Scrum is a daily meeting that are used for coordinating the work of the developers. The sprints and items from the backlog has been delegated to the different team members based on their skills and their engagement in the different items. This way the team can easily cover all the necessary sprints and



complete them to be able to continue the project.

The items in the Product Backlog are often referred to as “User stories” or “Stories”. The Stories are created by the product owner and should represent some business’ needs. The development team needs to think about how a story should be completed. In the beginning of a sprint, the development team takes the stories from the sprint backlog and breaks the stories into tasks.

When the developer team is doing their daily scrum, they are using a scrum board to coordinate their work. The scrum board contains the stories from the current sprint. The scrum board is also there to help the developer team to easily see what everyone is working with. While the individual developer works with the different tasks, the task moves from state to state as it develops.

Task states are;

- To Do
- In Progress
- Done

Some teams include additional task states such as;

- Needs Review
- Needs Testing.

Usually the team members need review on the different tasks that was completed. This was a good thing to do since it cleared out what items has been finished and which was not.

At the morning scrum meetings, there wasn't really any problems, since every member of the team would have finished their individ-

ual tasks in time. After answering the three standard questions, the team could update the scrum board and start on working once again.

In overall has Scrum been an effective project management method, since using Scrum has made working as a developing team much easier. It also helped each member to easily pick up and complete tasks more efficiently and structured, while still communicating through the daily meetings and common communication. (Scrum - Scrumalliance 2016)

BELBIN TEST AND ROLES

Even though it wasn't a project requirement to work in groups determined by the Belbin test, it still has been used to define our skill-sets and how to balance out the different tasks in the project. Belbin's team roles is defined by 9 different roles, which is further divided into 3 groups:

- Action oriented
- People oriented
- Thought oriented

The belbin roles has been used to give the team an overview on, how the team members can supplement each other in the best way possible.

Looking at the different roles that each of the team members have, it might seem as if there is not a good of a balance in the team since some of the teams belbin's roles are either the same or shared. But even though there is several of the same roles, the team



still covers all 3 categories. Amy's primary role as shaper and secondary role as implementer, is a part of the action oriented category together with Ermin's secondary role, shaper. With those two roles, the team covers aspects such as that the shapers often see obstacles as exciting challenges and they tend to have the courage to push on when others feel like giving up on the project. This has been really significant in the beginning

of the project, where all groups experienced difficulties with CP Robotics and the project description, but the team kept going forward and stayed strong to achieve the best result. Amy's secondary role as implementer showed that she is disciplined and work very systematically and efficiently. Those skills was well fitting to her role as Scrum Master. She is organized and was the facilitator in the group, which helped the team to stay structured and got things done.

Ermin's primary role as Resource Investigator is a part of the category called people oriented. His role helped the group with exploring available options and possibilities, such as research methods etc.

Ruben and Morten has the role as Resource Investigator as their secondary and even though the role usually has a downside of losing enthusiasm quickly, the two shapers would motivate and help to get back on track. In the last category, Thought Oriented, we have Morten and Ruben's primary roles as Plant. The role is the creative innovator who comes up with new ideas and approaches.

Morten was the one who worked on creating mockups of the extranet, his creativ-

ity was clearly shown through that process. Ruben used his creative skillset to work out interviews together with Amy and helped Morten in the process of designing the extranet. Plants usually show signs of being an introvert or having introvert tendencies, but it has shown to be a positive thing for the project because of their ability of working independent. *Appendix 5 - Belbin diagram*

Belbin roles:



Amy

Primary: Shaper

Secondary: Implementer



Ermin

Primary: Resource Investigator,

Secondary: Shaper



Ruben

Primary: Plant,

Secondary: Resource Investigator



Morten

Primary: Plant

Secondary: Resource Investigator

VIRTUAL TEAMS

With an increasingly competitive pressure, working as a virtual team can be necessary in today's globalized world and while technological advancement has made management and organization of virtual teams easier, they still pose a range of risks.

The biggest challenges virtual teams face is the lack of face-to-face interaction with team

members and lack of resources. *(DeRosa & Lepsinger 2010, p. 6)*

Building trust and engagement within a team can be tough without face-to-face interaction. Initial face-to-face interaction at the start of the project however, makes this less of an issue. Although our team do communicate through text as well, our team have the opportunity to meet face-to-face on almost

a daily basis and exercises this. Thus, we can minimize the risk of miscommunication that lack of face-to-face interaction can cause.

As with every team a lack of focus, goals and priority and lack of clear roles can be a concern (ibid, p. 9.). However, by discussing and deciding on a clear direction of our project and making sure everyone understand their roles in the team at the start of the project, we eliminate these pitfalls.

RISK MANAGEMENT

A certain amount of risks is always involved when doing projects and for a project manager, is it important to be able to control the risks as much as possible to prevent delays or other intervening processes, so that the best results can be achieved by the end of the project.

With the use of risk management tools, a qualitative and quantitative risk analysis is made to get an overview of all risks during our project and how they should be handled when encountered, to minimize the impact.

Appendix 6 - Risk management analysis

The qualitative risk analysis is a great way to show an overview of every possible risks that can be encountered during the process, and the quantitative risk analysis is a collection of all the risk events which are of top priority, due to a massive impact on the project. A more detailed way of handling every specific risk is planned, to be one step ahead of all the different risk factors. In the quantitative analysis, quality, time and resources are rated and

Lack of resources could be another real concern for a small team like ours. However, our primary resources are time and people and by planning our project well and executing it properly, we minimize the potential waste of resources.

Overall the risks that virtual teams face are eliminated by the fact that we primarily aren't a virtual team.



given a grade, so that the team is aware of what risk has the most probability to happen and a response has already been prepared as seen on the analysis. The analysis also shows that only 2-3 risks are at a high priority and with that information, the team can be prepared for it instead of being overwhelmed of the unseen obstacles that may happen during a project and result in delay or low quality of product.

By combining the two risk management tools with our project management method, Scrum, a way of eliminating some internal risks are possible. Since Scrum is an agile process where retrospective sprint meetings are done, the risk factors can be reduced and the process tailored.

In general, there has been a lot of changes

during the project, making the project vulnerable and delayed in some aspect. As seen in the tables, a lot of the risks surrounds the lack of information and resources to gain the knowledge in the given market. But a realistic and cost efficient response has been made to counteract the risks of highest priority and impact to ensure the project's success.

(Tonnquist 2009: p. 141-161)



6

REFLECTIONS

This project has been a challenge to work with in the sense of gathering valuable and relevant information surrounding the B2B robotics market. The team has worked with this challenge by researching and gathering data from similar markets. Ideally the research should contain from sources that are in the robotics market to gain knowledge that don't have to be looked upon with a critical view and whether the data is reliable enough or not.

Through the challenge, the team has gained experience with comparing markets with others and finding similarities, as well as finding essential features and contents in extranets. Further testing would involve more extensive user research if more time was given. There are still aspects of the product that can be further researched and a user test with people from the target group would help produce

a better end result. Also close collaboration together with CP Robotics and other robotics firm would have made the product development process more efficient, since it would have allowed tests of the usability and the design.

During the whole process the resources of the knowledge have been very limited and hard to obtain which has resulted in a triangulation with only few people to base the research upon. The participants in the interview are qualified and knowledgeable people with experience surrounding extranets, but even so, their work position limits their inside knowledge as they are only a small part of their big company. To widen and have a more indepth triangulation, more people with different work positions can be involved to have a more solid research foundation to base the product development on.



7

CONCLUSION

Through user research the team has gained extensive knowledge about the functions, structure and information architecture of existing extranet solutions.

To design and develop an extranet as concept that communicates well with CP Robotics' resellers, the team had investigate a series of existing extranets and the data from several interviews and literature reviews. The team concluded on the user research that ease-of-use and simplistic design are the highest valued traits of current existing extranets, apart from of course meeting the functional needs of the users.

The extranet will provide a communicative starting point between the company and their resellers. And as mentioned earlier in

the report, it will also be used as an efficient branding tool since the company is new on the market. Through a structured and user friendly platform, communication is less prone to be misunderstood and the chances of miscommunication is highly minimized as all the parties will be corresponding through written emails and other documentations. This will secure a better user experience for both parties and the extranet is an suitable and easy-to-implement solution for the CP Robotics.

With the results from the user research and through iterations the team has then developed a concept that helps CP Robotics communicate with their resellers in a convenient, professional and efficient way for all parties involved.



8

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INTERVIEW GUIDELINES & INTERVIEWS

1. Hvad er extranettets primære funktion?
2. Er der elementer ift. Det visuelle design som kan forbedres? Hvilke? Evt. Hvordan?
3. Er der elementer ift. Sidens struktur som kan forbedres? Hvilke? Evt. Hvordan?
4. Hvordan er det en fordel for jer at bruge et extranet at kommunikere med jeres kunder fremfor at tage ordre over mail/telefon.
5. Er jeres valg af kommunikationsmidler baseret på størrelsen af firmaet eller af jeres produkt.
6. Oplever du at extranettet er designet til den optimale brugeroplevelse for begge parter?
7. Er navigationen ligetil på extranettet? - Kan du finde de ting du skal bruge hurtigt?
8. Er der gjort noget for at guide brugeren igennem extranettet? Eller er designet ligetil?
9. Er der lagt vægt på firmaets visuelle identitet i udvikling af extranettet? Hvordan kommer det til udtryk?

Firma: Atea - Peter Thanh Hoa (Teknisk screener)

Sted: E-mail

Tid: 18. november 2016

- 1. Hvad er extranettets primære funktion?**
 - At modtage og behandle indkomne sager fra kunderne
- 2. Er der elementer ift. Det visuelle design som kan forbedres? Hvilke? Evt. Hvordan?**
 - Der er som sagt ikke et system som vi screener bruger endnu, men det kommer det til at være i den nærmere fremtid, så det kan jeg ikke svare på.
- 3. Er der elementer ift. Sidens struktur som kan forbedres? Hvilke? Evt. Hvordan?**
 - Det kan jeg ikke svare på endnu.
- 4. Hvordan er det en fordel for jer at bruge et extranet at kommunikere med jeres kunder fremfor at tage ordre over mail/telefon.**
 - Du sparer tid og mindsker manuelt arbejde samtidig med at du mindsker fejl, hvilket giver bedre performance, bedre service, bedre ry, flere mulige kunder. Og Generelt resultere det i mere tilfredse kunder når alt det andet spiller sammen.
 -
- 5. Er jeres valg af kommunikationsmidler baseret på størrelsen af firmaet eller af jeres produkt.**
 - Størrelsen men det gør også vores arbejde mere fleksibelt. Atea laver alt inden for IT løsninger.
- 6. Oplever du at extranettet er designet til den optimale brugeroplevelse for begge parter?**
 - jeg vil tro at det i starten kommer til at være en del ændringer og rettelser for at få det til at passe ind til de mange forskellige afdelinger der nu skal bruge værktøjet
 - Vi vil have ansat udviklere og programmører specifikt til at tilpasse servicenow til det vi skal bruge det til og når det kommer på plads så ja, det vil skulle blive nemmere at arbejde og samarbejde med kunderne og noget af det vi kommer til at bruge servicenow til er at trække data på vores arbejde. Det giver også bedre statistik.
 - På hvordan vi arbejder, dataen samles og bearbejdes som information hvoraf vi tager udgangspunkt i hvordan vi forbedre vores afdelinger osv.
- 7. Er navigationen ligetil på extranettet? - Kan du finde de ting du skal bruge hurtigt?**
 - Ja det er meget ligetil. Det er webbaseret og man går via et link for at logge på, hvilket er nemt nok. det er fleksibelt så hvis ikke det er ligetil som vi ønsker det, så skal vi nok få det rettet til så det giver mening
- 8. Er der gjort noget for at guide brugeren igennem extranettet? Eller er designet ligetil?**
 - Der vil altid være noget oplæring, men det forventes at være lettere og intuitiv
- 9. Er der lagt vægt på firmaets visuelle identitet i udvikling af extranettet? Hvordan kommer det til udtryk?**

Firma: Blue Water Shipping - Chris Hansen (Programmør)

Sted: Skype

Tid: 26. november 2016

- 1. Hvad er extranettets primære funktion?**
 - Booking af forsendelser

- 2. Er der elementer ift. Det visuelle design som kan forbedres? Hvilke? Evt. Hvordan?**
 - Extranettets design er lige blevet fornyet/lavet væsentligt om. Ift det gamle design er den primære ændring at det er gjort mere enkelt og overskueligt. Overflødige funktioner er fjernet

- 3. Er der elementer ift. Sdens struktur som kan forbedres? Hvilke? Evt. Hvordan?**
 - Gået fra 67 → 7 systemer overall. Nyt system, igen simplificeret.

- 4. Hvordan er det en fordel for jer at bruge et extranet at kommunikere med jeres - kunder fremfor at tage ordre over mail/telefon.**
 - Brugen af extranettet gør at der er mindre arbejde for speditørerne og derved effektiviseres processen.

- 5. Er jeres valg af kommunikationsmidler baseret på størrelsen af firmaet eller af jeres produkt.**
 - Ja

- 6. Oplever du at extranettet er designet til den optimale brugeroplevelse for begge parter?**
 - Ja, begge extranettet er designet med begge parter i tankerne. Og der kan redigeres i rettigheder for begge parter alt efter hvad de har brug for at se.

- 7. Er navigationen lige til på extranettet? - Kan du finde de ting du skal bruge hurtigt?**
 - Ja, det er lige blevet optimeret → Simplificeret, færre punkter (som resultat af at en lang række funktioner er fjernet)

- 8. Er der gjort noget for at guide brugeren igennem extranettet? Eller er designet ligetil?**
 - Blue Water har workshops hvor deres speditører undervises i hvordan man bruger extranettet og de instruerer kunderne.

- 9. Er der lagt vægt på firmaets visuelle identitet i udvikling af extranettet? Hvordan kommer det til udtryk?**
 - Brug af bestemt logo, én bestemt blå og nuancer som ligger tæt op ad.

Jacob Nielsen - Bruger af Adobe (Elev på skolen)

Sted: Interview

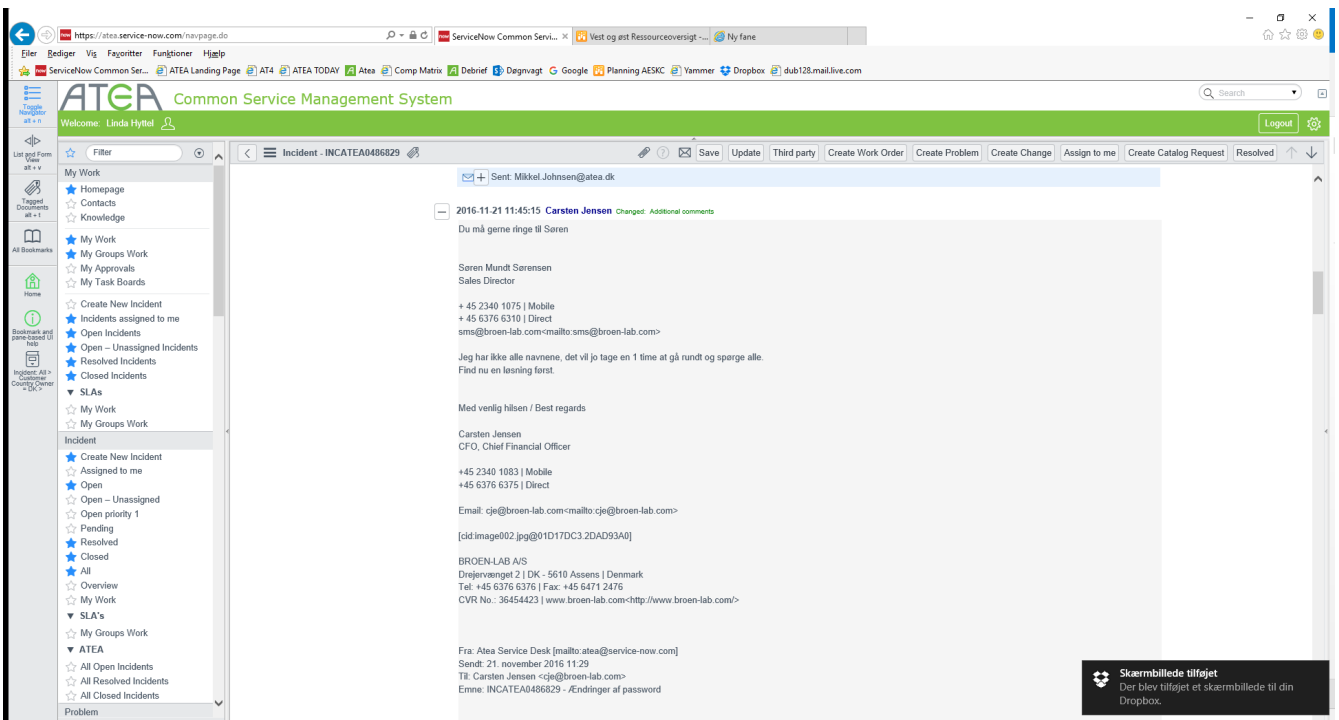
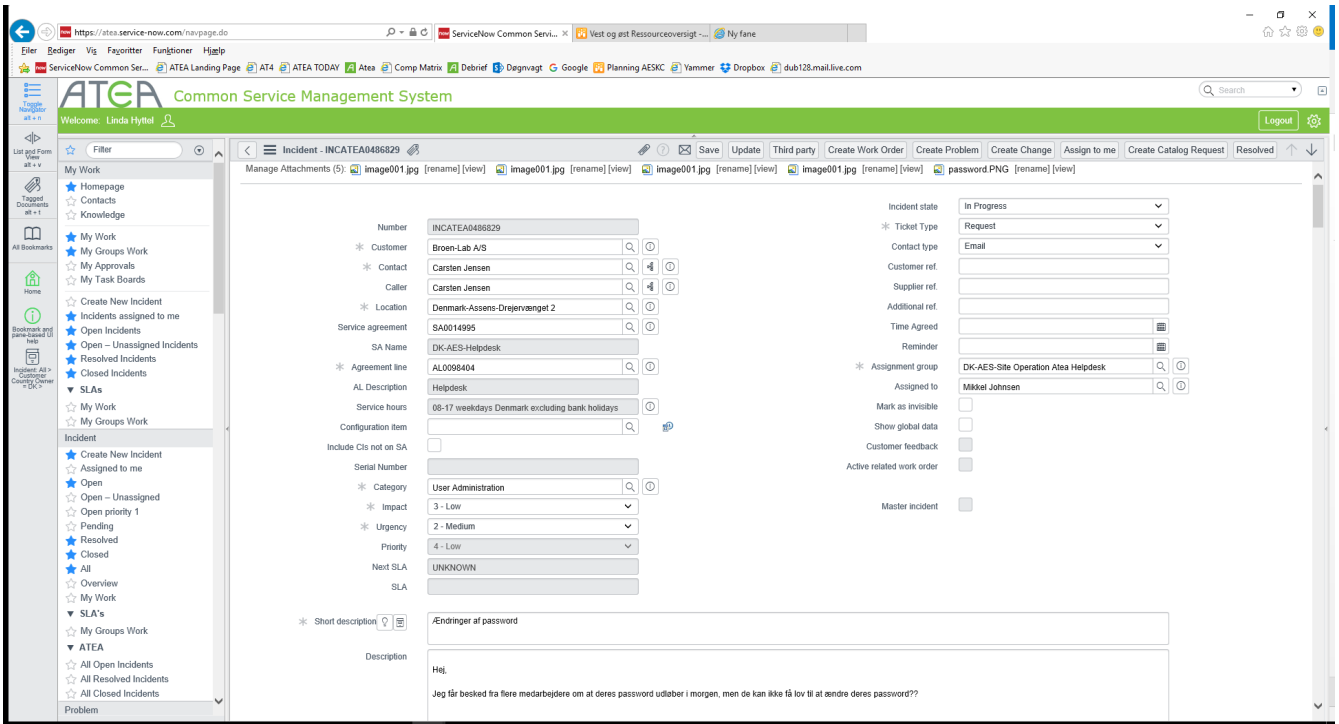
Tid: 26. november 2016

- 1. Hvad er extranettets primære funktion?**
-At sælge adobes pakker (produkter) til firmaer/privat personer.
- 2. Er der elementer ift. Det visuelle design som kan forbedres? Hvilke? Evt. Hvordan?**
-Jeg er personlig kæmpe fan af adobes udseende, da jeg mener at deres visuelle layout udstråler lige præcis hvad de sælger
- 3. Er der elementer ift. Sidens struktur som kan forbedres? Hvilke? Evt. Hvordan?**
- De har et billede med tekst på som baggrund, og så har de noget text der ligger hen over, hvilket er meget forvirrende at se på.
- 4. Hvordan er det en fordel for jer at bruge et extranet at kommunikere med jeres kunder fremfor at tage ordre over mail/telefon.**
-Det gør det væsentlig lettere at oprette og købe en pakke/produkt, end hvis jeg skulle til at ringe/sendte mail til support. Vil mene at checkout delen er nemmere ved brug af extranet.
- 5. Oplever du at extranettet er designet til den optimale brugeroplevelse for begge parter?**
- Både og, det overordnede design er rimeligt lækkert og overskueligt, men der er nogle små detaljer som kan forbedres, f.eks er navigationen ikke synlig nok (for lav kontrast).
- 6. Er navigationen ligetil på extranettet? - Kan du finde de ting du skal bruge hurtigt?**
- Ja
- 7. Er der gjort noget for at guide brugeren igennem extranettet? Eller er designet ligetil?**
- Ja, der er masser af ikoner som viser hvad de forskellige ting er/gør.
- 8. Er der lagt vægt på firmaets visuelle identitet i udvikling af extranettet? Hvordan kommer det til udtryk?**
- Det vil jeg mene, det er gjort meget brugervenligt, da det er er simpelt sådan at enhver med den mindste forstand på computere kan bruge det. Efter som deres target group er folk der på den ene eller anden måde bruger deres eller lignende produkter.

2

INTERVIEW MOCKUPS

Atea



ServiceNow Common Service Management System

Welcome: Linda Hyytel

Incident - INCATEA0486829

Actual Times

Opened by: Carsten Jensen
 Opened: 2016-11-21 10:19:34
 In progress by: Mikkel Johnsen
 Actual in progress: 2016-11-21 10:26:30

Estimated hours:
 Registered hours:

Invoicing

Partial invoice: -- None --
 Next invoice date:

Related Links

Third party
 Add time card
 Add mileage
 Add expenses
 Add Fixed price item
 Send SMS
 Spare Part look-up

Task SLAs

SLA	Type	Stage	Start time	End time	Actual elapsed time	Actual elapsed percentage	SLA
Denmark Pri 4 Response INC (4H)	SLA	Completed	2016-11-21 10:19:34	2016-11-21 10:26:30	6 Minutes	2.89	
Denmark Pri 3 Response INC (2H)	SLA	Completed	2016-11-21 10:19:34	2016-11-21 10:26:30	6 Minutes	5.78	

Skærbillede tilføjet
 Der blev tilføjet et skærbillede til din Dropbox.

ServiceNow Common Service Management System

Welcome: Linda Hyytel

Incident - INCATEA0486829

Actual Times

Opened by: Carsten Jensen
 Opened: 2016-11-21 10:19:34
 In progress by: Mikkel Johnsen
 Actual in progress: 2016-11-21 10:26:30

Estimated hours:
 Registered hours:

Invoicing

Partial invoice: -- None --
 Next invoice date:


Related Links

Third party
 Add time card
 Add mileage
 Add expenses
 Add Fixed price item
 Send SMS
 Spare Part look-up

Task SLAs

SLA	Type	Stage	Start time	End time	Actual elapsed time	Actual elapsed percentage	SLA breach reason	SLA breach comments
Denmark Pri 4 Response INC (4H)	SLA	Completed	2016-11-21 10:19:34	2016-11-21 10:26:30	6 Minutes	2.89		
Denmark Pri 3 Response INC (2H)	SLA	Completed	2016-11-21 10:19:34	2016-11-21 10:26:30	6 Minutes	5.78		

Blue Water Shipping



CLIENT INFORMATION

PROFILE DATA

NUMBER SEQUENCES

USER

PREVIOUS

Test customer

Client > Test Customer > Webbrowser configuration

Add activities

Activity configuration

NEW ACTIVITIES

Transport:

Roam

Notify email:

cont@blue.dk

Book to Client:

No Yes

From:

- Denmark
- Denmark (Green) (DK)
- Brazil (Brazilian) (BR)
- Bulgaria (BG)
- Canada (Canada) (CA)
- China (China) (CN)
- Denmark (DK)
- Denmark (DK)
- Canada (CA)

To:

- Cayman Islands (KY)
- Central African Republic (CF)
- Czech (CZ)
- Denmark (DK)
- China (CN)
- Dominican Republic (DO)
- Congo (Congo) (CG)
- Denmark (DK)

Route:

Ramp

Scandinavia

Goods type:

European Goods (E)


Unit type:

Scandinavia

Cancel
Save activities

Activities

TYPE	FROM	TO	GOODS TYPES	UNIT TYPES	NO NOTIFY EMAIL
Roam	DK	AD	Dung, Gas, Oils	ALL, OIL	local@blue.dk



QUOTATIONS

CONTACTS

REPORTS

SETUP

USER

PREVIOUS

New booking

Booking members Contact

1. Shipper details

SHIPPER ADDRESS

Company name:

Test

Street:

Test Street

Country:

Denmark (DK)

ZIP: **City:**

Add more information

Show in and web book

I think I see the address already

Available by:

2. Delivery details

CONSIGNEE ADDRESS

Delete Edit

NAME	STREET	COUNTRY	ZIP	CITY	EMAIL	PHONE
<input checked="" type="checkbox"/> W. Jensen 1	Ta. F. Jensen, 2	DK	6700	Esbjerg		
<input checked="" type="checkbox"/> Theilhave	Denmark, Theilhavevej 2 (Theilhave) Theil	DK	6700	Esbjerg	theil@pbnet.com	
<input type="checkbox"/> Theil Theil	Theilhave 2	DK	6710	Theilhave	theil@pbnet.dk	+45 4511 15 14 00
<input type="checkbox"/> Theilhave 2	000	DK	7440	Sor	theil@pbnet.dk	+45 4511 15 14 00
<input type="checkbox"/> Theil	Theilhave 1	DK	6704	Theil		
<input type="checkbox"/> Theilhave 2	Street 2	DK	6700	Esbjerg		+45 4511 15 14 00
<input type="checkbox"/> Jensen	1	DK	6700	Esbjerg		
<input type="checkbox"/> Jensen	Bluewatervej	DK	6700	gd	gd	gd
<input type="checkbox"/> AddressName2	Street	DK	6700			
<input type="checkbox"/> Theilhave 2	Street 1	DK	6700	Esbjerg		+45 4511 15 14 00

View all

23/11/2016

BOOKING NUMBER	REFERENCE	SHIPPER	CONSIGNEE	SERVICE	STATUS	
<input type="checkbox"/> 4007717000000000000		Theil	Theil		Booked	<input type="checkbox"/> <input type="checkbox"/>

18/11/2016

BOOKING NUMBER	REFERENCE	SHIPPER	CONSIGNEE	SERVICE	STATUS	
<input type="checkbox"/> Booking 1810700000000000					Booked	<input type="checkbox"/> <input type="checkbox"/>
<input type="checkbox"/> Booking 1810700000000000					Booked	<input type="checkbox"/> <input type="checkbox"/>
<input type="checkbox"/> Booking 1810700000000000					Booked	<input type="checkbox"/> <input type="checkbox"/>
<input type="checkbox"/> 4007717000000000000					Booked	<input type="checkbox"/> <input type="checkbox"/>

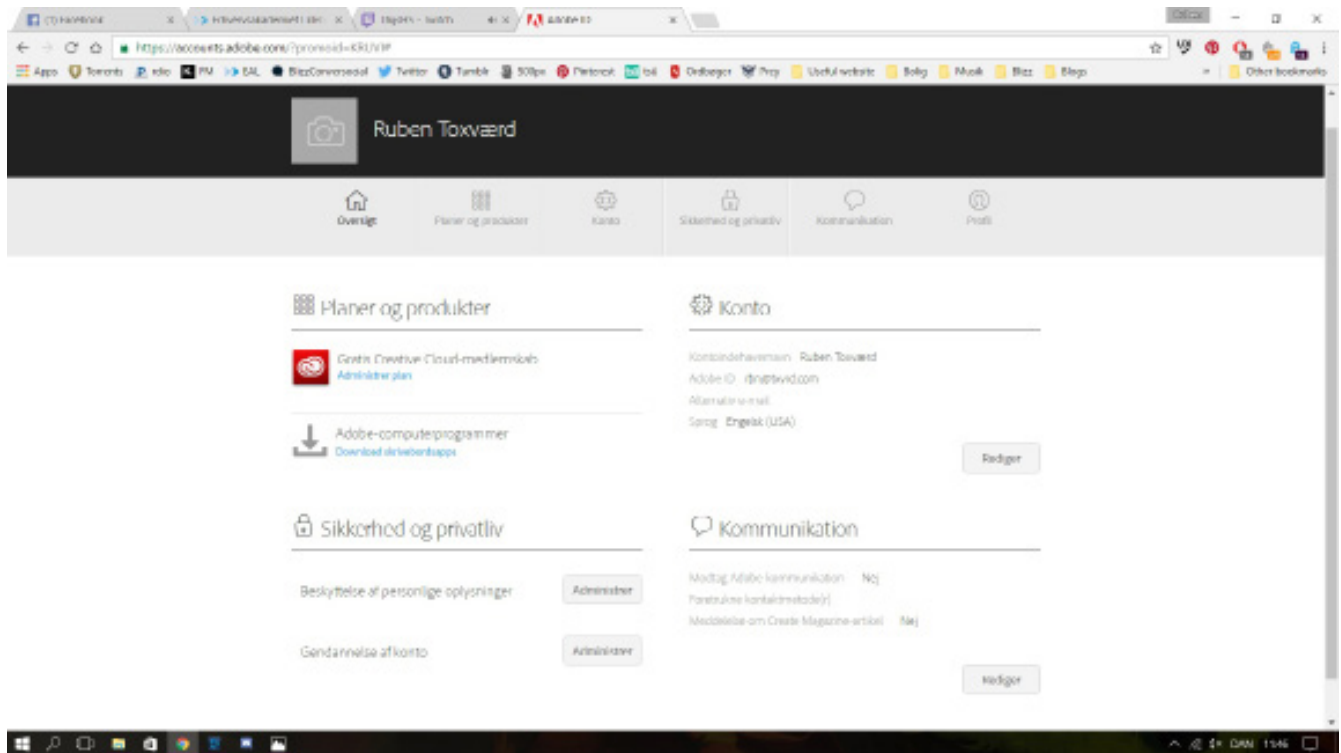
17/11/2016

BOOKING NUMBER	REFERENCE	SHIPPER	CONSIGNEE	SERVICE	STATUS	
<input type="checkbox"/> Booking 1710000000000000		Theil	Theil		Booked	<input type="checkbox"/> <input type="checkbox"/>

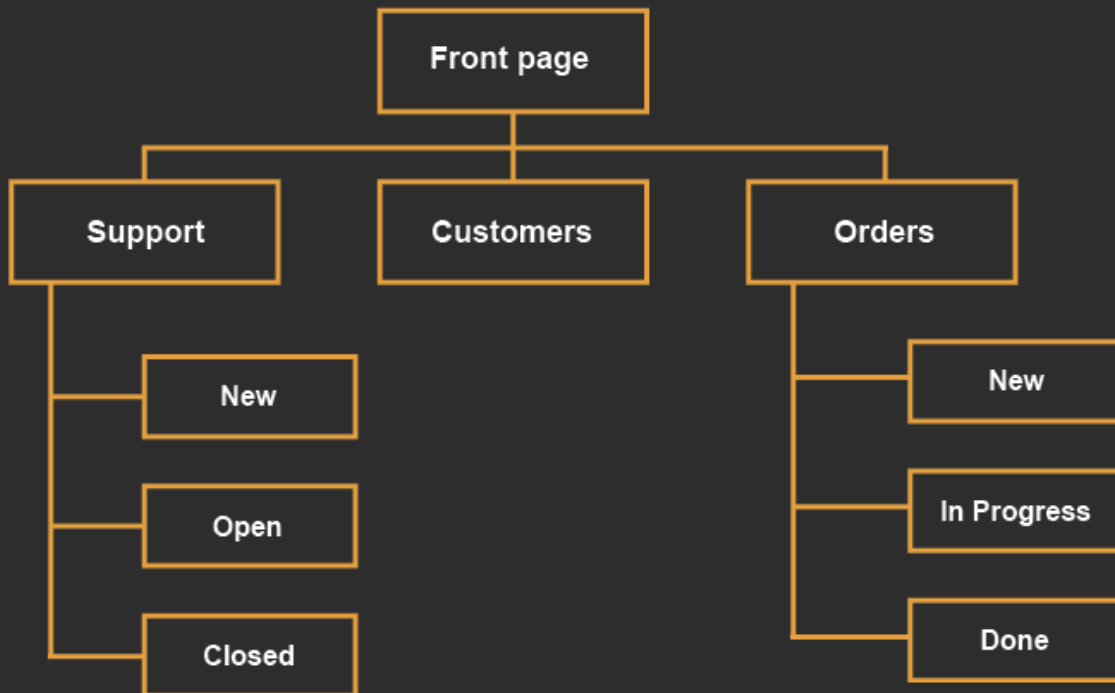
11/11/2016

BOOKING NUMBER	REFERENCE	SHIPPER	CONSIGNEE	SERVICE	STATUS	
<input type="checkbox"/> 5900000000	1234	LKP	UFGSUDEUTSCHLAND		Booked	<input type="checkbox"/> <input type="checkbox"/>
<input type="checkbox"/> 6000000000	4567	LKP	UFGSUDEUTSCHLAND		Booked	<input type="checkbox"/> <input type="checkbox"/>

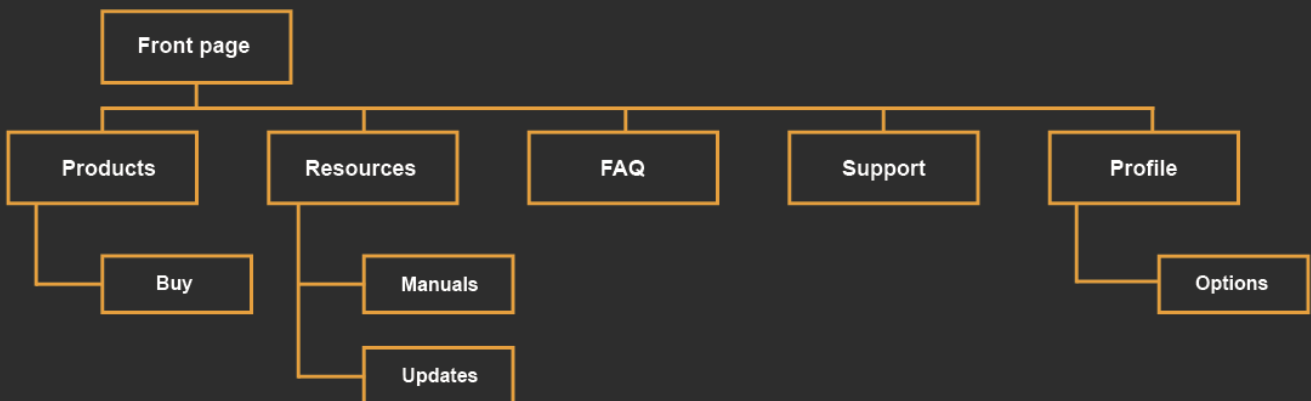
Adobe




Sitemap: CP Robotics view point



Sitemap: Resellers view point




CP Robotics



Home
Home

- [Products](#)
- [Resources](#)
- [FAQ](#)
- [Support](#)

Plan & Product




Pathfinder Cloud (Annual payment)
[Manage Plan](#)



Pathfinder Cloud
[Download Application](#)

Update

Updates Available ²
[Change log](#)



Update # xx.xx.xx
[Download Update](#)

Profile

Account holder Name	EAL
Address	Seebbladsgade 1
Contact e-mail	EAL@eal.dk
Phone	+45 12345678
Language	Danish

[Manage Profile](#)

Support

Unanswered Tickets ¹


- Problem with download	01/12-16
-------------------------	----------

Aswered Tickets

- Robot had feelings	01/12-16
----------------------	----------


[All Tickets](#)

- [Profile](#)
- [Settings](#)
- [Logout](#)


Products
Home > Products

- [Products](#)
- [Resources](#)
- [FAQ](#)
- [Support](#)

Pathfinder Cloud




PathFinder Cloud license is renewed annually and covers one application process on one robot system. This gives you the flexibility to invest incrementally and customize your Path-Finder solution with the number of licenses you need. With the Pathfinder Cloud license you get.

- + 100 times the performance through parallel processing.
- + Free software updates when available.
- + Remote support
- + Industry 4.0 readiness through IoT and clouding services.
- + Save value process knowledge inside your company.
- + Optional integration with third party systems:
- + Keep track of your production statistics:

PURCHASE

Pathfinder Light




PathFinder Light is a one-time-fee license that covers one application process on one robot system. This gives you the flexibility to invest incrementally and customize your Path-Finder solution with the number of licenses you need. With the Pathfinder Cloud license you get

- + 100 times the performance through parallel processing.
- + Free software updates when available.
- + Remote support
- + Industry 4.0 readiness through IoT and clouding services.
- Save value process knowledge inside your company.
- Optional integration with third party systems:
- Keep track of your production statistics:

PURCHASE

- [Profile](#)
- [Settings](#)
- [Logout](#)



Resources

Home > Resources

Products

Resources

FAQ

Support


Profile

Settings

Logout

Update

Updates Available 2




Update # xx.xx.xx


[Download Update](#)


Change Log


- 100 times the performance through parallel processing.
- New user interface
- Remote support now functional
- Bug fixes

DOWNLOAD FULL REPORT 


Pathfinder Cloud Manual




DOWNLOAD PDF 



LIGHT

DOWNLOAD PDF 



FAQ

Home > FAQ

Products

Resources

FAQ

Support

Profile

Settings

Logout

FAQ

Answers

How to download the program?

How to install/implement the software?

How to update the software?


How to use remote support?

How does the cloud work?

How to

How to track production statistics?

After you brought the product, you go to "Profile" where you will be able to find the download button, you then press the button and it should start downloading.



Support

Home > Support

- [Products](#)
- [Resouces](#)
- [FAQ](#)
- [Support](#)

[Profile](#)
[Settings](#)
[Logout](#)


Answered Tickets

- Problem with download	01/12-16
- How do we do this	01/12-16
- Problem with evrything	01/12-16
- How do we do that	01/12-16
- Is your download page down	01/12-16

Unanswered Tickets

- Problem with download	01/12-16
- Problem with download	01/12-16
- Problem with download	01/12-16
- Problem with download	01/12-16
- Problem with download	01/12-16
- Problem with download	01/12-16
- Problem with download	01/12-16
- Problem with download	01/12-16
- Problem with download	01/12-16
- Problem with download	01/12-16
- Problem with download	01/12-16

NEW TICKET +



Support

Home > Support > "New Ticket"

- [Products](#)
- [Resouces](#)
- [FAQ](#)
- [Support](#)


[Profile](#)
[Settings](#)
[Logout](#)

Category

Subject

Message

SEND



Manuals

Home > Resources > Manuals

Products

Resources

FAQ


Support

Profile

Settings

Logout

Pathfinder Cloud Manual




PathFinder Cloud license is renewed annually and covers one application process on one robot system. This gives you the flexibility to invest incrementally and customize your Path-Finder solution with the number of licenses you need. With the Pathfinder Cloud license you get.

- 100 times the performance through parallel processing.
- Free software updates when available.
- Remote support
- Industry 4.0 readiness through IoT and clouding services.
- Save value process knowledge inside your company.
- Optional integration with third party systems.
- Keep track of your production statistics

[DOWNLOAD PDF](#)


Pathfinder Light Manual



PathFinder Light is a one-time-fee license that covers one application process on one robot system. This gives you the flexibility to invest incrementally and customize your Path-Finder solution with the number of licenses you need. With the Pathfinder Cloud license you get

- 100 times the performance through parallel processing.
- Free software updates when available.
- Remote support
- Industry 4.0 readiness through IoT and clouding services.

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Profile

Home > Profile

Products

Resources

FAQ

Support

Profile

Settings

Logout

Profile

Account holder Name: EAL

Address: Seebbladsgade 1


Contact e-mail: EAL@eal.dk

Phone: +45 12345678

Language: Danish


[Edit](#)

Plan & Product



Pathfinder Cloud (Annual payment)

[Manage Plan](#)




Pathfinder Cloud

[Download Application](#)

Support

Answered Tickets	Unanswered Tickets
- Problem with download 01/12-16	- Robot had feelings 01/12-16
- Robot had feelings 01/12-16	- Robot had feelings 01/12-16
- Robot had feelings 01/12-16	- Robot had feelings 01/12-16
- Robot had feelings 01/12-16	- Robot had feelings 01/12-16
- Robot had feelings 01/12-16	- Robot had feelings 01/12-16



Products

Home > Products > Purchase

Products

Resouces

FAQ

Support

Profile

Settings

Logout

Billing address

Name

Company

Address

City

Province/State, Postal/ZIP


Country


Phone

[Check Out](#)

Chosen Product

PathFinder Cloud license is renewed annually and covers one application process on one robot system. This gives you the flexibility to invest incrementally and customize your Path-Finder solution with the number of licenses you need. With the Pathfinder Cloud license you get.





Updates

Home > Resources > Updates

Products

Resouces

FAQ

Support

Profile


Settings

Logout

Update

Updates Avavible 2

[Change log](#)




Update # xx.xx.xx


[Download Update](#)

Change Log

- 100 times the performance through parallel processing.
- New user interface
- Remote support now fuctional
- Bug fixes

DOWNLOAD FULL REPORT 

Resellers



Home

Home

Orders

Customers


Support

Profile


Settings

Logout


Customers




CP Robotics
Pathfinder Cloud (Annual payment) [Manage Plan](#)



Erhvervsakademiet Syd Vest
Pathfinder Cloud (Annual payment) [Manage Plan](#)



Erhvervsakademiet Lillebaelt
Pathfinder Light [Manage Plan](#)



BMW
Pathfinder Cloud (Annual payment) [Manage Plan](#)

[All Customers](#)

Support


Unanswered Tickets 6

- Problem with download 01/12-16
- Robot used huge amount of electricity 01/12-16
- Program crashed 01/12-16
- Robot started burning. 01/12-16
- Problem with download 01/12-16
- Problem with download 01/12-16

Answered Tickets

- Robot had feelings

[All Tickets](#)



Orders

Home > Orders

Orders

Customers

Support

Profile


Settings


Logout


Orders


Customer #No.	Booking Number	Customer	Status	Date
# 123	# 234567890	BMW		01/12 -2016
# 1345	# 87654334567	CP Robotics		10/12 -2016
# 12354	# 3456789876	Erhvervs Akademiet Lillebaelt		01/10 -2016
# 432	# 987654456778	Erhvervs Akademiet Syd Vest		09/12 -2016
# 564	# 567897656789	Flow-Botics		16/12 -2016
# 9876	# 123564345433	Gearbots		27/12 -2016


46



Customers
Home > Customers


 Orders

 Customers

 Support


 Profile


 Settings


 Logout


Customers


Name ▼	Street	Country	Zip	City	E-Mail	Phone
BMW	Am Olympiapark 1	DE	80809	München	BMW@Germancars.de	+49 56748392
CP Robotics	Street	DK	5000	Odense	CPRobotics@Robot.dk	+45 12345678
Erhvervs Akademiet Lillebælt	Seebbladgade 1	DK	5000	Odense	EAL@eal.dk	+45 98765432
Erhvervs Akademiet Syd Vest	Spangsbjergkirkevej 103	DK	6700	Esbjerg	EASV@easv.dk	+45 87654321
Flow-Botics	Flowgade 2	DK	7654	Flowstrup	Flow@Botics.dk	+45 87654321
Gearbots	Gertrudsgade 13	DK	8652	Ballerup	EASV@easv.dk	+45 87654321



Support
Home > Support


 Orders

 Customers

 Support

 Profile

 Settings

 Logout

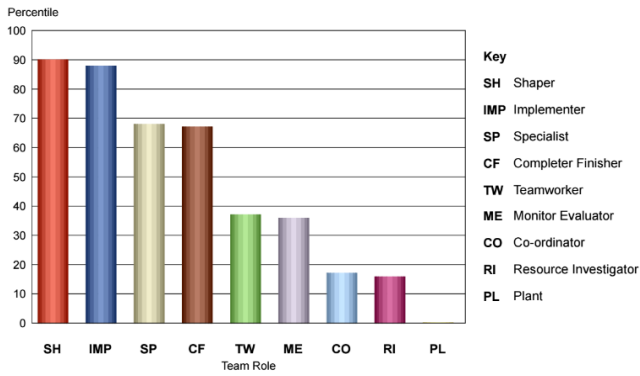
Support

Customer ▼	Category	Subject
● BMW	Robot Problems	Download Problem
● CP Robotics	Robot Problems	Bug
Erhvervs Akademiet Lillebælt	Questions	How to ?
Erhvervs Akademiet Syd Vest	Robot Problems	Something
Flow-Botics	Problems	Fictional problem
Gearbots	Robot Problems	I dont know how

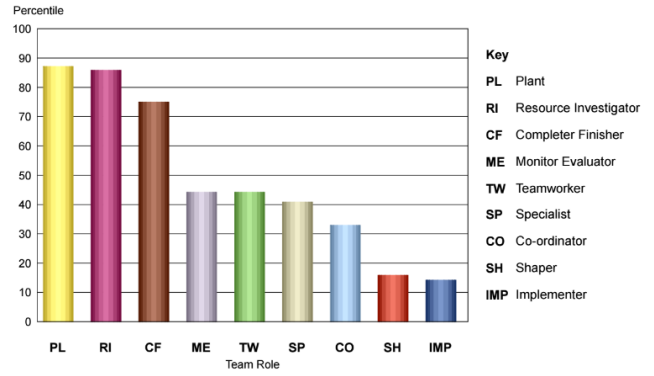
5

BELBIN DIAGRAM

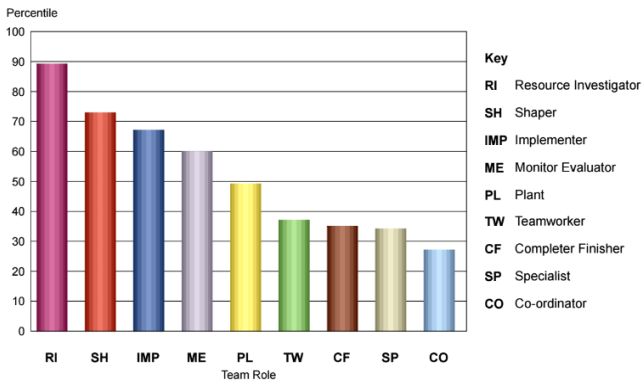
Amy Hoa



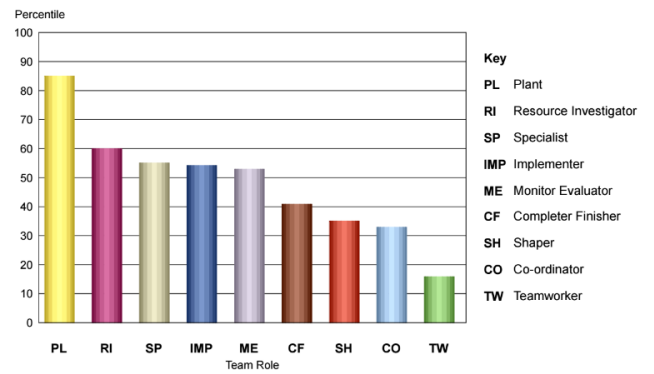
Morten Junker Skøtt



Ermin Inajetovic



Ruben Toxværd



Qualitative risk analysis (Part 1/2)

Quantitative Risk Analysis					
	Risk	Probability 1-5	Impact 1-5	Risk value Pxl	Risk response
Product risks	Number of projected changes to the requirement for the product.	4	4	16	Being aware and prepared to adapt to any giving changes.
	Limited knowledge about the product within the market.	3	3	9	Research other existing companies and their solutions.
Business impact risks	Lack of experience on the new market.	4	4	16	Desk research is needed to gain knowledge about the market.
Costumer related risks	Does the client understand your product?	3	3	9	Inform the client about the benefits about having an extranet and show successful examples.
	Client don't have experience with the given solution.	3	3	9	The focus lies a lot on selling the idea since the customer doesn't know about the benefits of what an extranet can offer to the company.
Development environment risks	Are local experts available to answer questions about the tools	4	5	20	The local experts are very limited since a lot of the information's are confidential. However other markets with similar experience can be researched.

Qualitative risk analysis (Part 2/2)

Process issue risks	Requirements being clear and defined for all steps.	3	3	9	A planning schedule is made to prevent confusion.
	Lack of qualified people to test product.	4	4	16	Being critical whether the data/research is reliable enough to continue process. List improvements and faults to have in consideration when delivering the product.
Staff size and experience	Team members not being committed for the entire duration of the project.	4	2	8	Having a structured plan and work delegation to maintain focus and delegate work after interest and skillset to keep interest.
Other potential risks	Are Schedule, resources, and product definition been dictated by the client and are they in balance?	4	4	16	Daily meetings with the client to ensure the best and most effective development process.
	Delays in one task causes delays in dependent tasks.	2	3	6	Use of a flexible project management method so delays can be taking in account for to minimize the delays and effect.

Quantitative risk analysis

Quantitative Risk Analysis								
Risk	Probability 1-5	Impact 1-5			Risk value Pxl			Risk response
		Q	T	R	Q	T	R	
Limited knowledge about the product within the market.	4	4	4	4	16	16	16	Research other existing companies and their solutions.
Are local experts available to answer questions about the tools	4	3	2	2	12	8	8	The local experts are very limited since a lot of the information's are confidential. However other markets with similar experience can be researched.
Lack of qualified people to test product.	4	4	4	3	16	16	12	Desk research is needed to gain knowledge about the market.
Number of projected changes to the requirement for the product.	4	4	4	4	16	16	16	Being aware and prepared to adapt to any giving changes.
Are Schedule, resources, and product definition been dictated by the client and are they in balance?	4	3	2	3	12	8	12	Daily meetings with the client to ensure the best and most effective development process.