

Deakin University

Chat Now-BProject Handover

29/09/2018

Project Sponsor
Project Analysis & Design

Project Team Chat Now-B

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Document Version 2

Purpose

This document defines the transfer of all relevant information and artefacts produced during the course of SIT782. With this document, a new member should be able to identify all key aspects and artefacts of the project and have access to key systems or configurations.

Project Description

The main objective of the project is to deliver a Chabot that captures the scenarios of requirement that has been provided by the client. This enhance the focused goal of the Now finance to deliver the needs of the customer through user friendly communicative Chatbot. The chatbot will have the end to end functionalities in delivering the efficient round the clock support to the clients accessing the Now Finance website. It would have the following key functionalities.

- The Overall project concentrates on increasing the customer experience and also to get the leads on the customer expectations.
- The multiplatform Integration capabilities through Facebook, slack etc.
- Multichannel Integration concentrating on addressing the Business to Business and Business to Consumer Needs.
- Marketing Channel Integration for getting the leads of customers visiting the website and to Increase the traffic.
- Core Brand values of the company needs to be articulated by the Bot while answering the queries.
- Providing the best of business value through all the windows of customer facing by the company

Artefacts List

Artefact Name	Artefact Type	Revision Number	Notes
Amazon lex platform	ChatBot Platform	2019-9-29 (V1)	Integrated to Chatnowb.now.sh for the demo purpose
Amazon Lex Api	Api Access	2019-9-29 (V1)	Api Access for Intents based on clients FAQ Questionnaire
Hosting Platform			
GitHub Account	Source Code and website Documents	2019-9-29	Source code of Intents and code snippets used for extracting FAQ's from website through code and Front end code

Business Features

Feature	Client Sign-Off State	State	Notes
Amazon Lex Integration to the demo website	No	Final	Amazon lex chatbot integration to the hosted website for demo. https:chatnowb.now.sh
Responsive design of chatbot	No	Final	Responsive design for the chatbot
New Requirement based intent creation and provide human like conversation	No	Final	Developing human like conversation for rich customer experience
Analyze Integration of Chatbot with Facebook or other platforms	No	Final	As of now, it is developed as a standalone chat widget, we have analyzed whether it can be integrated with Facebook or other social media platforms
Bot should have a fail over mechanism where the operator comes in if there are failures or the user requests for it	No	Final	The bot now has a fail over mechanism by replying with a generic message when it is not able to handle or answer it.
The user interface of the website and chatbot should match the style of the brand and also the tone of the voice	No	Final	The website follows the color guidelines given by the client and the voice of the text is similar to the text write in their website faq pages.

Authentication for the users to provide personalized experience	No	Final	We have developed a authentication system for the website, so in future we can provide a personalised experience if in case needed.
Chatbot should be capable of capturing lead's mobile number	No	In-progress	The chatbot should be able analyze the previously conversation with user and based on certain criteria if the user meets, the bot should capture the mobile number.

Trello Board



Planned Work

Please provide a list of features (user stories) that are planned to be implemented in the next phase given client feedback.

Please refer to project Trello board here.

Planned	State	Sprint	Notes
Feature			

Implementation of interactive dialogflow using Amazon Lez	In- Progress	3	Add the necessary interactive widgets to the chatbot for implementing personal loan calculator.
Eligibility criteria implementation in chatbot	In-Progress	3	There are certain criteria for an user to be eligible for the personal loan, these should be first initially analyzed and then only, we should show the dialog intents.
Capture Lead's Mobile number	In- Progress	3	When the a list of criterias are met, the mobile number of the user should obtained by the chatbot and save it as a potential lead.

Open Issues:

As the project currently focus on minimal features and team is working on integrating the new features based on the requirements provided by the client. Below are the few challenges and queries that the team is waiting for

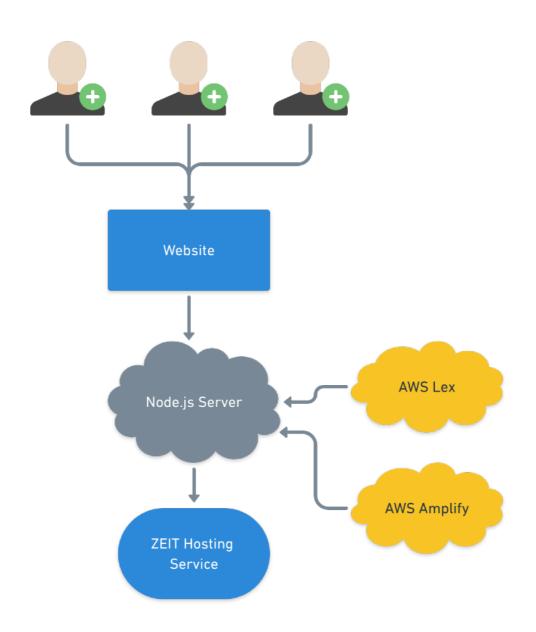
- Request has been raised for clear requirements on what are all the multichannel platform the clients are looking for.
- The back end team has developed and integrated the intents based on the company FAQ's so the team is looking out for new heads up on the answer theme for the gueries
- Waiting for clear understanding on how the client would like to handle the manual intervention for the customer support.
- The scenarios that the client would expect the bot to handover the query to the customer support team.
- The theme requirements for the chatbot as lack of customer data to train chatbot effectively
- Clear understanding on clients Q&A theme with fonts and the way of answering.
- Understanding the clear requirement based on the business model so to develop the chatbot effectively to reach out to Now Finance customers effectively.
- We have developed chatbot using Amazon Lex so would like to know the response from the client to effectively train the chatbot to the next level.

Lessons Learned

a) Team work handling of tasks based on the technical expertise and collaboration

- b) Understanding the requirement and trying out more than one technology of chatbot framework, so as to select the framework which aligns with client requirement
- c) Collectively building through collaboration and pitching of idea while implementing or selecting of key implementation
- d) Professional level of presentation and information brainstorming while handling the business level clients.
- e) Clear documentation of approaches and learning from the mistakes.
- f) Identifying Failure point and approaching it effectively to overcome it.
- g) Task handling and progress discussion to identify the roadblocks

High-level architecture of the product



- The key components of the project are the server and services provided by AWS. The major services which we have used are Lex, Amplify and hosting services.
- The working flow of the project is the end users from the website widget chats with bot with their queries, then the bot communicates with AWS Lex using API calls and the resulting response is constructed and replied to the user.
- The project is completely written in JavaScript programming language and uses Node.js on the server.
- We have used modern tools like ESLint for linting, Prettier for code formating, Babel for code transpilation, Bootstrap for client UI website etc..,
- The site is hosting using the free tier plan provided by the ZEIT Ltd., Since I have used my own personal account, I am little hesitant to share details.
 Moreover, it can be deployed anywhere using the code in the version control system Github.
- We have Sublime, Webstorm and VSCode as editors for development. We have used Yarn for maintaining third party packages. Yarn is a package manager tool for JavaScript.
- We have used packages like Puppeteer, Cheerio etc.., to scraping the client website's FAQ pages for creating the intents in Amazon Lex.
- We have used Github as version control system for this project.
- As a team, we followed the Pull Request based workflow model while developing the project.

User Manual

The chatbot developed having the key features been integrated into https://distribution.now.sh

- Please click on the link https:chatnowb.now.sh
- Chatbot FAQ of the website has been integrated using the intents creation.
- The chatbot is Responsive and can be accessed using the mobile phone using the above link
- Once the chat window is open please input your query to the bot and get response.

Other Documents

Please include any appendices or other relevant documents not covered in the above sections, for all artefacts delivered during the course of the project.

Sign-off

We Prajwal Kumar, Annamalai, Trushar, Arslan and Saicharan have included all relevant material which is agreed to be included in this handover. If an artefact is not included, it is stipulated in the Planned Work section, or artefacts list.

Date: 29/09/2018

Signed

Prajwal Kumar

Trushar Vekari

Annamalai Saravanan

Muhammad Arslan Asif

Saicharan chowdary