

Capstone Project Weekly Progress Report

Project Title	MEALBUDDY
Group Name	GROUP_G
Student names/Student IDs	ELVIN IYPE MATHEW C0769974 ELDA VARGHESE C0769741 TOM JOSEPH C0760915 JEENA HELEN FRANCIS C0764493 CHINJU BABY C0769912
Reporting Week	12 JULY 2020 - 18 JULY 2020
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1. Tasks Outlined in Previous Weekly Progress Report

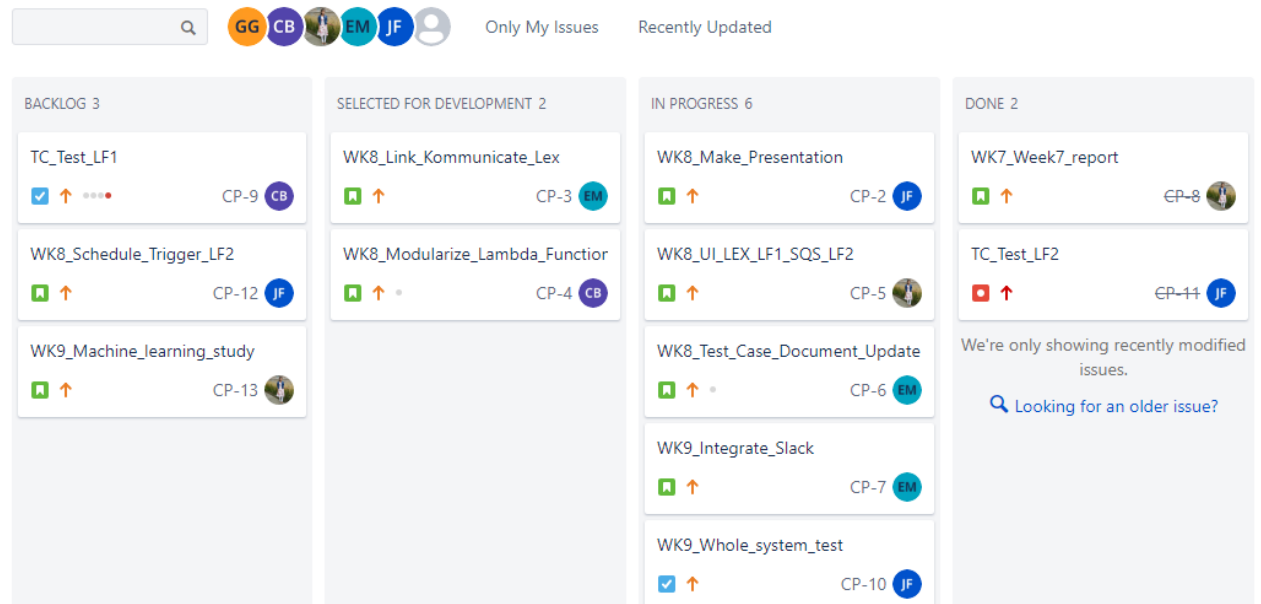
- Use <https://www.kommunicate.io/> and link AWS LEX
- modularize lambda function LF1&LF2 for easy upgrades
- UI - LEX - LF1 - SQS- LF2 flow check and resolve issues if any
- Test Case Document Update and add new scenarios

2. Progress Made in Reporting Week

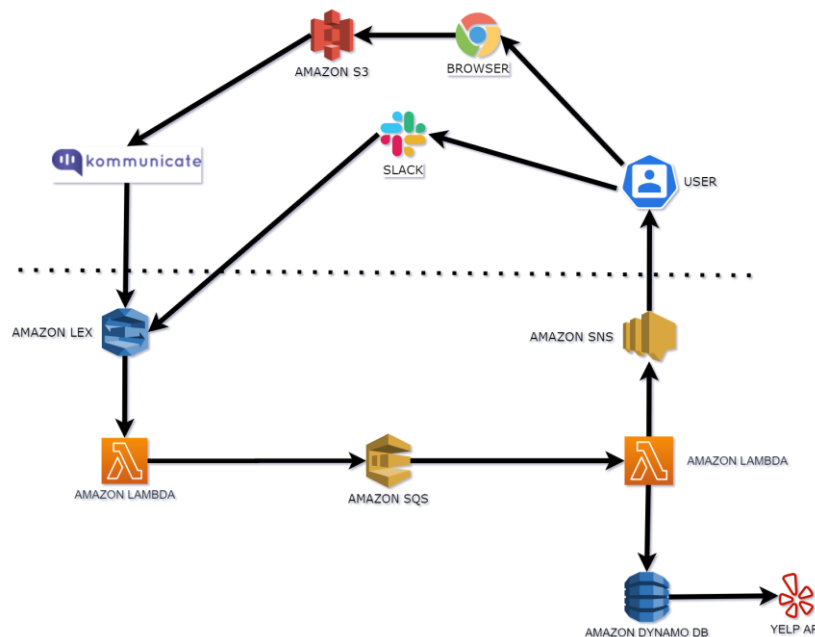
- Test Case Document Update and add new scenarios has been moved to Jira Online.
- A Kanban board is one of the tools that can be used to implement Kanban to manage work at a personal or organizational level.
- Kanban boards visually depict work at various stages of a process using cards to represent work items and columns to represent each stage of the process. Cards are moved from left to right to show progress and to help coordinate teams performing the work. A Kanban board may be divided into horizontal "swimlanes" representing different kinds of work or different teams performing the work.
- Simple boards have columns for "waiting", "in progress" and "completed" or "to-do", "doing", and "done". Complex Kanban boards can be created that subdivide "in progress" work into multiple columns to visualise the flow of work across a whole value stream map.

Projects / capstone_project / CP board

Kanban board



- **Architecture Diagram Updated - Using draw.io (Pretty useful for cloud architectures)**



- **Made a UI design (welcome page) using html,css,js for chatbot, this is the link (<https://s3.amazonaws.com/www.mealbuddy.xyz/index.html>)**
- **Step 1: Create a free Kommunicate account - You can create a free account in Kommunicate. Head to the signup section to start.**

- **Step 2: Connect your Amazon Lex bot - Post signup, navigate to the bot integration section and select the Amazon Lex platform.** Kommunicate requires the below detail in order to query your bot on your behalf. You just need to fill a few details to connect your Lex bot. You can get these details in your AWS Management Console -> Security credentials section.
 - Access key ID & Secret access key
 - Bot name in Lex platform
 - Bot alias
 - Region
- Once you have the above information follow the below steps, click Save and Proceed.
- **Step 3: Give your bot an identity - You can give your bot a name and a profile picture.** The name and the profile picture will be visible to your users while they interact with your bot. Give your bot a name. This name will be visible to your users who interact with your bot. Click Save and Proceed.
- **Step 4: Enable/Disable human handoff - Your bot is as smart as you can make it. But at times, it may fail to understand the questions of a user. In that case, you can trigger a chatbot to human handoff.** This helps you make the overall user experience better and handle edge cases. Choose whether to enable or disable this feature and click on Finish bot integration setup.
- **Step 5: Assign all the incoming conversations to your Lex bot - To let your user chat with the new bot, you need to assign all the conversation to the bot. Just after finishing the bot setup, click on Let this bot handle all the incoming conversations.** Now, all new Conversation initiated after the integration will be assigned to this bot and your bot will start answering them.
- **Step 6: Install the Kommunicate on your website**



Breakfast



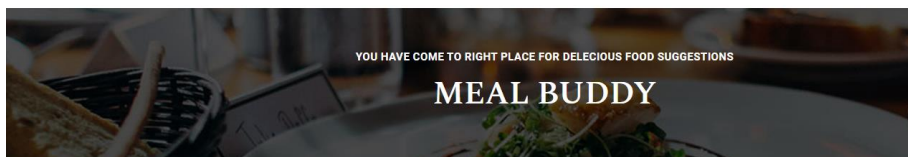
Lunch



Dinner



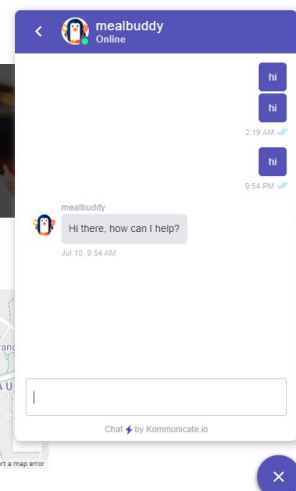
Desserts



CONTACT INFO

Feeling Hungry? If you are busy tied up with work don't have time to manually sit and search for lunch options. Where should I have lunch? Your Meal Buddy is the tool you'll turn to answer this question. Meal Buddy is like a friend who can suggest you food options to choose from.

Meal Buddy is a chatbot which provides restaurant suggestions based on the preferences provided to it through conversations. A real time chat with your buddy powered by AWS cloud services can provide you with excellent suggestions. Pulling in data from Yelp-API by taking into account: location, price, and type of cuisine.



- modularize lambda function LF1&LF2 for easy upgrades

Function code [Info](#)

File Edit Find View Go Tools Window Save Test

Environment

LF1 - /

- greet_intent.py
- helper_function.py
- lambda_function.py
- suggest_intent.py
- thank_you_intent.py
- validate_dining.py

lambda_function x

```

1
2 LF1
3
4 import os
5 import time
6 import helper_function
7 import thank_you_intent
8 import suggest_intent
9 import greet_intent
10
11 import logging
12 logger = logging.getLogger()
13 logger.setLevel(logging.DEBUG)
14
15
16 ...
17 Fulfill intents
18 ...
19 def dispatch(intent_request):
20     """
21     Called when the user specifies an intent for this bot.
22     """

```

LF2 - /

- deleteSQSMessage.py
- lambda_function.py
- saveUserRequest.py
- searchYelpRestaurant.py
- sendSNS.py

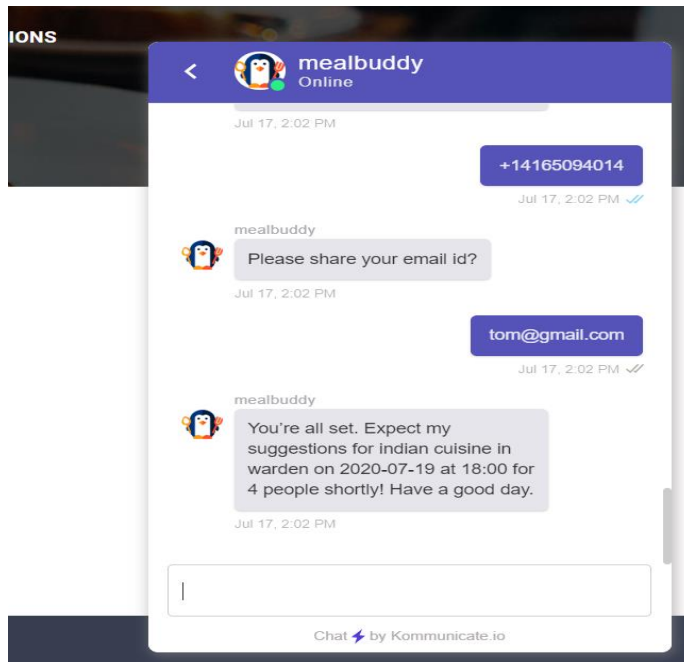
lambda_function x

```

1 import json
2 import boto3
3 import logging
4 import searchYelpRestaurant
5 import saveUserRequest
6 import sendSNS
7 import deleteSQSMessage
8 logger = logging.getLogger()
9 logger.setLevel(logging.DEBUG)
10
11 def lambda_handler(event, context):
12     sqs = boto3.client('sqs')
13
14     # Get URL for SQS queue
15     response = sqs.get_queue_url(QueueName='LF1SQSLF2.fifo')
16     queue_url = response['QueueUrl']
17

```

- UI - LEX - LF1 - SQS- LF2 flow checked and got the confirmation replay in chatbot.



3. Difficulties Encountered in Reporting Week

- We had trouble familiarizing with Kanban terminologies and its setup.
- We came across many errors while modularizing the lambda functions.

4. Tasks to Be Completed in Next Week

- Slack integration study
- Slack integration
- Whole system Test Scenarios
- Machine Learning study