

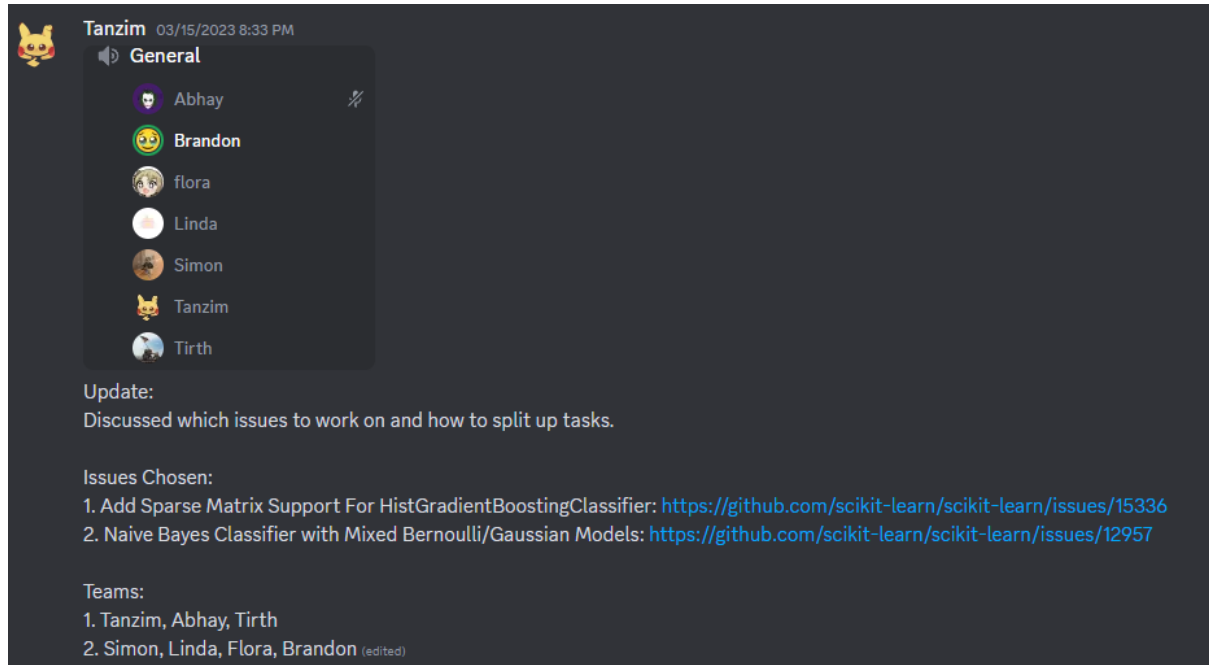
Development Process

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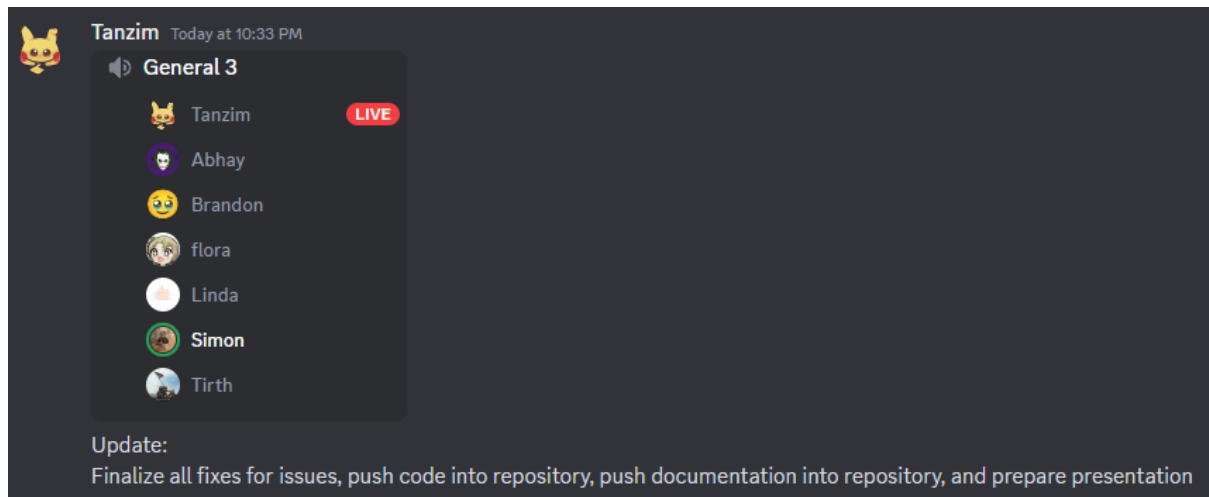
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Proof of Team Communication:

First team meeting: Break off team into smaller groups to work on individual issues



Last team meeting: Finalize Deliverable 4



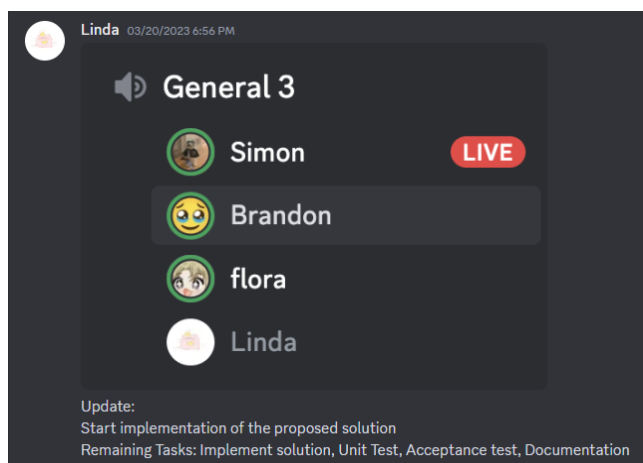
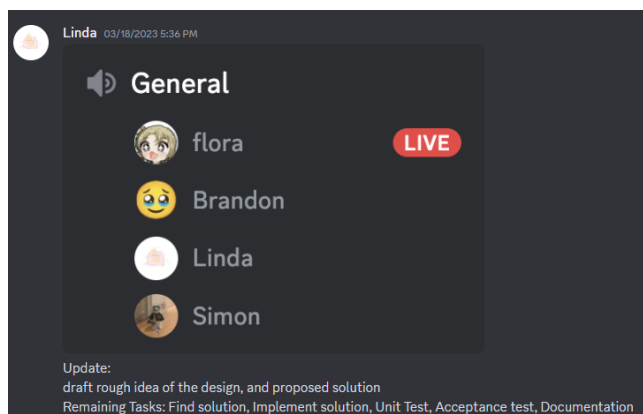
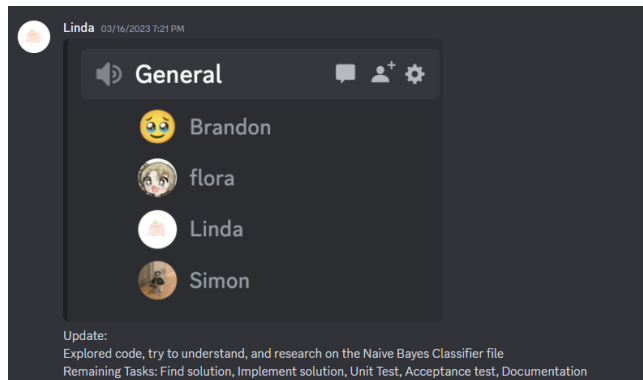
Individual Group Meetings:


Group: Naive Bayes Classifier with Mixed Bernoulli/Gaussian Models #12957


Team members involved:


- + Simon Chau (task implementation, testing, and documentation)
- + Linda Shi (task implementation, testing, and documentation)
- + Meiyi Xie (Flora) (task implementation, testing, and documentation)
- + Brandon Lo (task implementation, testing, and documentation)


Meetings:





 Linda 03/22/2023 5:19 PM

 **General 3**


 Brandon


 flora


 Linda


 Simon


Update:
Complete partial implementation without validation
Remaining Tasks: continue implement solution, Unit Test, Acceptance test, Documentation


 Linda 03/24/2023 7:15 PM

 **General 3**


 Brandon


 flora


 Linda


 Simon


Update:
Finish off basic implementation without validation
Remaining Tasks: Refactor implementation, cleanup code, add validation, Unit Test, Acceptance test, Documentation


 Linda 03/26/2023 6:02 PM

 **General 3**


 Brandon


 flora


 Linda


 Simon


Update:
Finalize functionality of implementation, refactored and cleaned code
Remaining Tasks: add validation, Unit Test, Acceptance test, Documentation


 Linda 03/28/2023 7:09 PM

 **General 3**


 Brandon





 flora


 Linda


 Simon


Update:
Finish off implementation with validation
Remaining Tasks: Unit Test, Acceptance test, Documentation


 Linda 03/30/2023 5:21 PM

 **General 3**   


 Brandon


 flora


 Linda


 Simon


Update:
Complete unit test for basic functionality
Remaining Tasks: Remaining Unit Test, Acceptance test, Documentation


 Linda 04/01/2023 6:39 PM

 **General 3**


 Brandon





 flora


 Linda


 Simon


Update:
Complete unit test for edge cases and error checking
Remaining Tasks: Acceptance test, Documentation


 Linda 04/05/2023 7:23 PM

 **General 3**   


 Brandon





 flora


 Linda


 Simon


Update:
Completed implementation design and explanation
Remaining Tasks: Complete documentation


 Linda 04/03/2023 4:05 PM

 **General 3**   


 Brandon


 flora


 Linda


 Simon


Update:
Opened PR for implementation and testing, complete Acceptance test
Remaining Tasks: Documentation


 Linda 04/07/2023 6:33 PM

 **General 3**

 Brandon

 flora

 Linda

 Simon


Update:
Completed user guide and testing overview
Remaining Tasks: Open PR for review


Group: Sparse Matrix #15336


Team members involved:


- + Abhay Patel (finding cause of issue and testing)
- + Tanzim Ahmed (testing and task implementation)
- + Tirth Patel (task implementation)


Meetings:

 **Tanzim** 03/17/2023 3:04 PM


 **General 2**


 Abhay


 Tanzim


 Tirth


Update:
Discussed cause of error by following traceback
Remaining Tasks: Find solution, Implement solution, Unit Test, Acceptance test

 **Tanzim** 03/20/2023 5:31 PM


 **General 2**


 Tanzim **LIVE**


 Abhay


 Tirth


Update:
Explore codebase and functions where traceback occurs and try to understand process
Remaining Tasks: Find solution, Implement solution, Unit Test, Acceptance test

 **Tanzim** 03/22/2023 3:52 PM


 **General 2**


 Abhay **LIVE**


 Tanzim


 Tirth


Update:
Use print statements and logs to determine how processed data looks and how they should be handled
Remaining Tasks: Find solution, Implement solution, Unit Test, Acceptance test (edited)

 **Tanzim** 03/24/2023 4:16 PM


 **General 2**


 Abhay


 Tanzim


 Tirth


Update:
Discuss ways to minimize errors on traceback by making minimal changes to code, such as updating validator functions to allow sparse matrices to be passed instead of automatically rejecting them
Remaining Tasks: Implement solution, Unit Test, Acceptance test (edited)

 **Tanzim** 03/27/2023 3:21 PM


 **General 3**


 Abhay



 Tanzim


 Tirth


Update:
Discuss ways to handle sparse matrices once they are passed in. Need functions that compress sparse matrices into dense dense matrices so that the program can apply existing code to sparse matrices which would normally be only exclusive to dense matrices.
Remaining Tasks: Implement solution, Unit Test, Acceptance test (edited)

 **Tanzim** 03/29/2023 5:02 PM

 **General 3**


 Tanzim 


 Abhay



 Tirth


Update:
Discussed implementation based on how we have decided to handle sparse matrices. implement the `convert_to_dense_matrix` that converts a sparse matrix into a dense representation and the `convert_to_sparse_matrix` that converts a dense representation of the sparse matrix back to the sparse matrix


Remaining Tasks: Unit Test, Acceptance test

 **Tanzim** 03/31/2023 4:08 PM

 **General 2**


 Tirth 


 Abhay


 Tanzim


Update:
Discussed Unit Tests to test all the modified functions/new functions that we have added


Remaining Tasks: Acceptance test, Finalize and push to repository (edited)

 **Tanzim** 04/03/2023 3:21 PM

 **General**

 Abhay

 Tanzim

 Tirth

Update:
Discussed Acceptance test, Finalize and push to repository






Remaining Tasks: None

Task time estimation, assignment of tasks

Group: Naive Bayes Classifier with Mixed Bernoulli/Gaussian Models #12957

Team members involved:







- + Simon Chau (task implementation, testing, and documentation)
- + Linda Shi (task implementation, testing, and documentation)
- + Flora Xie (task implementation, testing, and documentation)
- + Brandon Lo (task implementation, testing, and documentation)

Child issues		Order by		...	+
				100% Done	
	€D-24 Explore code and propose solution	4	MX	DONE ✓	
	€D-22 Implement solution and validations	8	LS	DONE ✓	
	€D-23 Unit testing	6	BL	DONE ✓	
	€D-26 Acceptance test	2	SC	DONE ✓	
	€D-25 Documentation	4	LS	DONE ✓	

Group: Sparse Matrix #15336

Team members involved:

- + Abhay Patel (finding cause of issue and testing)
- + Tanzim Ahmed (testing and task implementation)
- + Tirth Patel (task implementation)

Child issues		Order by		...	+
				100% Done	
	€D-27 Find causes of error by following traceback	4	AP	DONE ✓	
	€D-28 Explore codebase and functions where traceback occurs	6	AP	DONE ✓	
	€D-31 Determine how processed data looks and how they should be handled	4	TP	DONE ✓	
	€D-32 Propose fixes for handling sparse matrix inputs	8	TP	DONE ✓	
	€D-33 Implement changes based on discussed methods	8	TA	DONE ✓	
	€D-29 Create unit test	2	TA	DONE ✓	

Overall Task Management and Time Estimation:

T	Key	Summary	Assignee	P	Status	Resolution	Story point estimate
	CD-34	CD-20 / Create acceptance test	Tanzim Ahmed	=	DONE	Done	1
	CD-33	CD-20 / Implement changes based on discussed methods	Tanzim Ahmed	=	DONE	Done	8
	CD-32	CD-20 / Propose fixes for handling sparse matrix inputs	Tirth Patel	=	DONE	Done	8
	CD-31	CD-20 / Determine how processed data looks and how they should be handled	Tirth Patel	=	DONE	Done	4
	CD-29	CD-20 / Create unit test	Tanzim Ahmed	=	DONE	Done	2
	CD-28	CD-20 / Explore codebase and functions where traceback occurs	Abhay Patel	=	DONE	Done	6
	CD-27	CD-20 / Find causes of error by following traceback	Abhay Patel	=	DONE	Done	4
	CD-26	CD-21 / Acceptance test	Simon Chau	=	DONE	Done	2
	CD-25	CD-21 / Documentation	Linda Shi	=	DONE	Done	4
	CD-24	CD-21 / Explore code and propose solution	Meiyi Xie	=	DONE	Done	4
	CD-23	CD-21 / Unit testing	Brandon Lo	=	DONE	Done	6
	CD-22	CD-21 / Implement solution and validations	Linda Shi	=	DONE	Done	8
	CD-21	Mixed Bernoulli/Gaussian Models	Unassigned	=	DONE	Done	24
	CD-20	Sparse Matrix Support	Unassigned	=	DONE	Done	33

Task Tracking:

TO DO

IN PROGRESS

DONE 2 ISSUES ✓

Sparse Matrix Support

CD-20 ✓ 33

Mixed Bernoulli/Gaussian Models

CD-21 ✓ 24