Criterion B: Solution overview

Record of Tasks

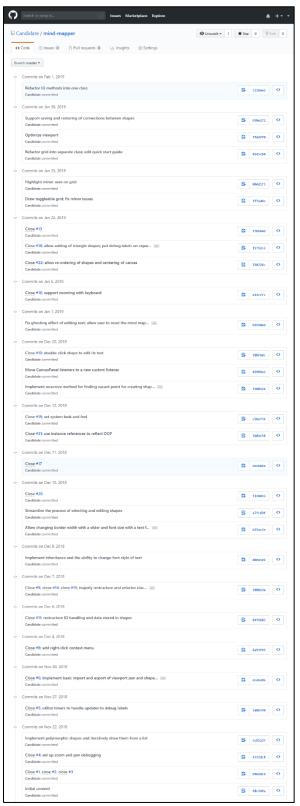
Task number	Planned action	Planned outcome	Time estimate	Target completion date	Criterion
1	Converse with Client about the product idea	Client agreed to start development and be the adviser	1 week	October 15, 2018	A
2	Present and discuss idea to class and teacher	Product idea was clarified and approved	1 day	October 22, 2018	A
3	First interview with Client	Conversation compiled in Appendix; needs of Client and success criteria finalized	3 days	November 14, 2018	A
4	Obtain Client's visualization of the program's general layout	General appearance of program was received and compiled in Appendix	1 day	November 16, 2018	A
5	Determine Client's desired date for the prototype. Complete Criterion A	Completed Criterion A	2 days	November 19, 2018	A
6	Begin development of the program, aiming for the prototype deadline	Prototype for interim interview	2 months	January 8, 2019	С
7	Develop initial GUI layout and basic OOP class structures	Java Swing frame and panels were created to conform to Client's visualization	4 days	November 22, 2018	С
8	Implement functionality of zooming in/out and panning of the mind map canvas	Client is able to zoom in/out using the mouse wheel and pan by dragging on the canvas	4 days	November 29, 2018	С
9	Begin utilizing GitHub for version control to support Record of Tasks and progression through success criteria	Work completed on the program can be tracked via "commits", success criteria and issues can be tracked with "issues". This also allows the Client to view progress made. Please see the screenshots attached below	1 day	November 30, 2018	В

10	Research how to draw shapes with coordinates in Java Swing	Implement functionality of adding shapes	4 days	December 6, 2018	С
11	Construct picker panel, canvas panel, viewport, and menu bar	Align with Client's visualization of the program's layout	2 days	December 7, 2018	С
12	Resolve issue of high CPU usage when zooming and panning	Limit frames per second to allow program to run smoothly	2 days	December 7, 2018	С
13	Research methods of storing data with Java, such as JSON with the Google GSON library	Implement functionality of import and export (open and close file) of mind map data	5 days	December 14, 2018	С
14	Allow the editing of text within shapes	Client is able to edit the text within shapes by double-clicking	4 days	December 13, 2018	С
15	Allow for shapes to be dragged around	Client is able to drag shapes wherever desired	2 days	December 10, 2018	С
16	Allow for shape border width, font size, style, colour to be changed	Client is able to edit these attributes via the right-click context menu	3 days	December 14, 2018	С
17	Implement functionality of exporting the mind map to an image	Client is able to select a location to save a PNG or JPG image and also select the desired quality	4 days	December 14, 2018	С
18	Allow for the mind map to be reset	Client is able to click on "New" to create a new mind map document	1 day	December 18, 2018	С
19	Implement functionality of connecting shapes with lines	Client is able to connect shapes in mind map fashion via right-click	1 week	January 1, 2019	С
20	Beta version of program provided to Client for testing	Client provided advice in second interview	1 week	January 8, 2019	С
21	Second interview with Client	Client, as the Adviser, has requested more features and requirements for the program	1 day	January 8, 2019	С
22	Support zooming with keyboard	Client is able to zoom in and out of the canvas with Ctrl + and -	2 days	January 18, 2019	С
23	Allow for the re- ordering of shapes	Overlapping shapes can be re-ordered if desired	4 days	January 18, 2019	С

24	Implement a function for centering the canvas	Client is able to re-center the canvas if he lost his position within the canvas	3 days	January 20, 2019	С
25	Draw a grid in the canvas	Grid is drawn in canvas and is able to be toggled by the Client	3 days	January 22, 2019	С
26	Create a help menu	Client is able to access the quick start guide via the menu bar	4 days	January 25, 2019	С
27	Fix issue of mind map connections not saving	Lines are now able to be saved and restored	2 days	January 30, 2019	С
28	Package entire program as a JAR file and provide Client with final product for feedback	Client provided feedback and recommendations in third interview	2 weeks	February 13, 2019	E
29	Third interview with Client	Client provided significant feedback and comments on program functionality, as well as recommendations for development	2 days	February 15, 2019	E
30	Obtain recommendations for improving the product	Written ideas for improvement of the product	1 day	February 16, 2019	Е
31	Record video for demonstration of product functionality	Finished recording	4 days	February 21, 2019	D

Supporting screenshots of "commits" and "issues" on GitHub:

List of commits:



List of issues:

