Multimedia Services : Sprint retrospective 4

Group BeNine
TI2316 Context Project

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Sprint 4 reflection

User Story	Task	Responsible	E*	A**	Done	Notes	PR (link)
User story 1	Save preset image on creation	Naomi	4	4	Y		108
	Add preset creation, deletion button in user interface	Bryan	1	2	Y		116
	Add keywords to preset class	Dorian	1	2	Y		96
	Add preset keywords to database	Ege	2	1	Y		118
	Change preset endpoint to allow keyword querying	Dorian	1	4	Y		114
	Create separate user interface view for preset management	Jochem	5	2	Y	3	95
User story 2	Explore possibilities of stream compression	Jochem	1	1	Y	4	
	Distribute camera stream via backend, not directly via camera	Jochem	4	10	Y	6	105 112
User story 3	Load all data from the database on startup	Ege	2	4	N	7, 10	106
	Database support for camera address changes	Ege	2	2	N	7, 10	106
	Allow camera detection based on MAC address	Bryan	4	2	Y		107
	Update database if presets state changes occur	Ege	2	-	N	9	
	Add cameras to database on creation	Ege	2	1	N	7, 10	106
User story 4	Create a screencast of current product	Naomi	1	1	Y	1	-
	Correspond with PolyCast for feedback regarding the video	Naomi	1	1	Y	1	-
	Create mockup of camera view overlap idea shown by Alessio	Jochem	1	1	N	5	-
	Ask Alessio about documents and code regarding the overlap idea	Naomi	1	1	Y	1	-
User story 5	Limit amount of commands send to camera, so the camera is able to handle all requests without becoming flooded	Dorian	5	2	N	8	
	Limit amount of data sent by controls	Bryan	3	3	Y		98 104
	Change sliders for zoom and iris to 1d joystick	Dorian	2	2	Y		103
	Change pan and tilt do double, so it is consistent throughout the system	Naomi	1	1	Y	2	-
	Refactor response message methods to be used everywhere	Naomi	1	2	Y		101
	Create Logger.log(Exception e) method in logger	Dorian	1	1	Y		100
	Remove SQL dump junk from console	Ege	1	0.5	Y		92
User story 6	Update architecture to reflect sprint changes	Bryan	1	1	Y		115

** The estimated effort is measured in hours.*
*** The actual effort is measured in hours.*

Notes

Note	Description
1.	There is no pull request for these tasks because they only concerned communicating with PolyCast and Alessio.
2.	There is no pull request for this because the change was so small that it just disappeared in other parts.
3.	Less time was put in this task because the MJPEG Stream task took far more time than expected. Bryan compensated this time.
4.	Compression is not completely possible, since JPEG is already compressed. However, a step in reducing the amount of data which can be made is resizing the images on the server before sending them to the client.
5.	The team did brainstorm about this, but there is some confusion about the idea. The creation of the mockup is postponed until we know what is feasible for PolyCast and we have a better understanding of the idea.
6.	Since OpenCV required codecs, it could not be used to read the stream. Instead the stream had to be parsed manually. This took a high amount of time. Streaming is possible, but not merged into the develop branch because the server chosen at the beginning of the project used blocking I/O so it could not stream multiple MJPEG streams at a time. A solution has been found with Jetty, but the http endpoints need a refactor for this to be implemented in a clean way. Currently pull request 112 contains 2 servers, one of them can stream MJPEG by calling http://localhost:3725/camera/1/mjpeg.
7.	These tasks were all very alike, causing it to be done in one pull request.
8.	This has not been completed because of the little amount of time we had to test it with the Polycast camera's, and the VPN being unavailable for some time.
9.	Due to scheduling issues there was not enough time to implement this.
10.	Due to a large merge conflict there was not enough time to merge this.

Main Problems Encountered

Problem 1

Description:
Because some tasks were still depending on each other, branching went wrong creating a high amount of merge conflicts.
Reaction:
We need better communication between team members to make sure tasks which depend on each other are finished in the right order.

Adjustments for next Sprint

- Before starting on a task, team members will communicate the order in which tasks should be executed.