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Our Collaborative Documents of Who's Who, Vocabulary Words, Sample Projects, HW Checklist and Connections Amongst the 15 Participants of this Online Course

• *CA (2) DC (1) FL (1) HI (3) MA (1) MO (1) NY (2) TX (3) WI (1)* •

CODING

created by the Sept-Nov 2014
Online Coding class

TABLE OF CONTENTS (clickable links)

PART 1: WHO'S WHO IN OUR COURSE (15 PARTICIPANTS)

FIRST NAME	SCHOOL AND POSITION (feel free to modify)	PLEASE SHARE COMMENTS or QUESTIONS RE CODING AT YOUR SCHOOL, --WHAT YOU CURRENTLY DO RE CODING or WHAT YOU HOPE TO DO RE CODING IN THE FUTURE	SCRATCH USERNAME scratch.mit.edu/users/???
Amanda	Middle School Science teacher, Rodeph Sholom School, NYC	I teach 5-6 grade, and am looking to use coding as a way to enrich my science through project-based-learning.	mscarella
Cassie	Media Specialist -- Le Jardin Academy -- HI	I teach K-5 and would love to weave coding into our curriculum. I would like to introduce Scratch Jr. to grade K-2 and Scratch to grades 3-5 this year.	mscaldarone
Elizabeth	Librarian for Grades 2-4 -- Rodeph Sholom School -- NY		eatshaw
Gail	5th and 7th grade -- River Oaks Baptist School -- TX	I am teaching programming in 5th and 6th grade computer classes using the MoWay robot. We have a new 7th and 8th grade Robotic activity that meets twice a week using the new Lego robots. I will be using Scratch with my 7th graders for their programming unit.	gwatkins7
JoAnne	PK-4 Academic Technology -- University School of Milwaukee -- WI	We have participated in the Hour of Code, which we plan on doing again this year. There have been some after school opportunities for the lower school children to learn about coding. We would like to embed coding into the curriculum and try the First LEgo League	technewbie
Karen	Technology Integration Specialist -- Hockaday -- TX	Our third graders are participating in coding activities this fall, and our fourth graders have a new class called Invent to Learn this fall. One of the activities involves coding. I am helping with both classes.	krob27
Linda	Technology, grades 2-4 -- La Jolla Country Day School -- CA	Currently teach short lessons on coding with Scratch to 4th graders when time allows. Would like to design a cohesive and challenging unit for their weekly technology class, and set up an after-school club for those who want more.	torreylin
Loren	K-4 -- Curtis School -- CA	We have had no coding in our curriculum and are exploring ways to add it in. This year I will experiment iwth fourth grade classes, and Jason will work with students in 6th grade.	lasboes
Majken	Lower School Principal -- Le Jardin Academy, HI	We have Scratch as an after school club but I would like to integrate coding regularly and meaningfully in our curriculum. I have played a little with Scratch with my own daughter but really am a complete newbie to coding.	odatage
Marge	Pre-K to 8 Library, Grade 4 Reading -- Dedham Country Day School --	We would like to integrate coding into our tech curriculum, and I would like to get that going.	mjf2180

	MA		
Marti	Ed-tech, PreK - 8, occasionally HS, often parents' groups, sometimes seniors -- Georgetown Day School -- DC	Currently teaching a before school scratch session on Tuesdays-Fridays for 20-30 minutes -- drop-in.	MartiW
Natalie	5th and 6th -- The Hockaday School -- TX	We haven't used coding in Middle School technology classes yet, but would like to start	nbravo
Tricia	Elem. Curriculum Specialist -- Academy of the Holy Names -- FL		tdieck
Victoria	Chinese for Grades K-5 -- Le Jardin Academy -- HI	We are currently trying to use Scratch to record spoken language Mandarin Chinese as well as produce video games to assist in teaching stroke order. Personally, I am working on developing Chinese language video games using Python.	vschina2003
Wally	K-12 Innovation Lab -- Columbia Independent School -- MO	We just started and Innovation Center/Makerspace and I have no programming experience since HS in 1989	Orangepierre

PART 2: VOCAB WORDS IN CAPS AND ALPHA ORDER

Please use your first name (Steve) or initials (SB) after your entry as I did for SET PEN COLOR. If you edit someone else's, this is not necessary. Feel free to define/explain 1 word, no words or several words, just don't do too many so that you leave some for others! By the way, UPPERCASE is just for the TOPICS which are in alphabetical order.

ADD TO A LIST

ASK [ ] AND WAIT

ANSWER

BACKGROUND

BITMAPPED GRAPHIC

BLOCKS

BROADCAST command

BYOB

CHANGE [x] BY 1

CHANGE [T] BY [x]

CHARACTER

CLEAR COMMAND the command that will remove programming from the script and return to a clean screen - sprite remains at last position it held (ls)

CONTAINS

COSTUME the appearance characteristics of a sprite. Default is the cat. (ls)

DEFINE command

DELETE FROM A LIST -

EXTERIOR ANGLE

FOREVER LOOP **executes continuously until the end of a simulation is requested (JW)**

GO TO X: Y: COMMAND

HIDE LIST

INTERIOR ANGLE

IF [ ] THEN [ ]

INSERT INTO A LIST

ITEM OF A LIST

JOIN COMMAND

KEYPRESSED COMMAND

LARGE READOUT

LENGTH COMMAND

LETTER COMMAND

LENGTH OF LIST

LISTS

MAKE A VARIABLE

MOVE COMMAND

NEW COSTUME PROCEDURE

PEN DOWN COMMAND lowers the pen so that sprite can write (kr)

PEN SIZE COMMAND c

PLAY SOUND COMMAND

POINT TOWARD COMMAND

POLYGON

POINT IN DIRECTION (0^0 or 90^0 etc) (O

RANDOM

REPEAT COMMAND AND MOUTH OF THE REPEAT COMMAND - a

REPLACE AN ITEM OF A LIST

SAY COMMAND - allows you to add script/words to a sprite/character (NB)

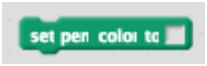
SCRATCH
A free coding program where you can create your own animation, stories and games (MajkenJ)

SCRIPT -

SET [X] to 0

SET [X] to answer

SET PEN COLOR COMMAND -

Click the square color box first in this command 

Now click anywhere on the screen on a spot that matches the color you want
The color box changes to that color. So this behaves like the EYEDROPPER in PHOTOSHOP. (SB)

SET PEN SIZE COMMAND allows you to change the width of the pen (kr)

SET [VARIABLE] TO ANSWER

SHOW [X]

SHOW LIST

STAGE the background area behind a sprite where all the action takes place (ls)

SPRITES

STACK This is the commands for the current program. (JW)

STOP OTHER SCRIPTS IN SPRITE

SWITCH COSTUME this command will change the appearance of the current sprite to the appearance of another sprite (Terri)

THINK COMMAND Creates a thought bubble for a Sprite on stage. (ls)

TURN COMMAND

VECTOR GRAPHIC

WAIT COMMAND Creates a designated hesitation time before continuing a script. (ls)

WHEN GREEN FLAG CLICKED *The Green Flag* is a programming feature that, when clicked, will start all scripts featured in that project. Note: It only runs the scripts that are “connected” to *The Green Flag Clicked* block.(cc)

WHEN I RECEIVE

PART 3: HW SECTION

Just write DONE when finished or any other word or two or comment next to your name if you want to convey satisfaction or frustration or any emotion!

HW Exercise 1.6 -- Pick an uppercase letter of the alphabet and write a Scratch program to create the letter so that it is 100 pixels tall and 50 pixels wide. Send me a screen snapshot via email of the code when done.

PUT THE LETTER(S) YOU DID NEXT TO YOUR NAME. ADD A COMMENT ABOUT HOW CHALLENGING THIS WAS FOR YOU AND WHETHER OR NOT YOU THINK THIS TYPE OF PROBLEM IS DOABLE BY YOUR STUDENTS

Amanda:
Cassie: Done! :)
Elizabeth: E Pretty easy! Did it using absolute positions, which is probably cheating.
Gail:
JoAnne: E It took me forever! One of the third graders came into my office and asked me why I was playing with Scratch. I bet he could have done this in about 5 minutes
Karen: K - challenging; I'm guessing the students could do it more easily than I did.
Linda:
Loren: **L** - With the day off from school, I decided to use the extra free time to go for my letter in script. I had to go wider than 50 pixels so I could include the "flourishes" at the start and finish. Sucked up a whole lot of time, but every minute was fun... I feel slightly more confident about coding now, though none of my script was based on math concepts...just trial and error, which is probably in direct correlation to the time spent! Students could definitely do it, but the restriction of class periods would make it more challenging since we don't meet that often.Working online would be great once they got the basic under their belts.
Majken: M - this was challenging but fun. The students could definitely do it. I am not sure if I was able to do it from some random guessing and trying but I will

continue to work on other letters to practice. LINK
Marjorie: This was very challenging for me because I'm learning the program from "scratch".
Marti:
Natalie: N - definitely challenging. I think the students would have fun with this exercise, and could do it. I still need to practice other letters.
Tricia:
Victoria:
Wally: W - Getting it the exact height and width with proportional angles took a bit

NAMES (future use)

Amanda:
Cassie:
Elizabeth:
Gail:
JoAnne:
Karen:
Linda:
Loren:
Majken:
Marjorie:
Marti:
Natalie:
Tricia:
Victoria:
Wally:

PART 4: HW 6.0 Each team picks one of programs from Jeff, Ian or Ruth

Your team picks one of these programs from teachers Jeff, Ian or Ruth written by kids and writes a one paragraph review/analysis of it on our Collaborative Document. You choose on the Collaborative Doc and each person contributes to the review/analysis. Please "be proactive" and choose one and then tell your partners, but please check to make sure it has not been taken yet. Do not wait for your partners to decide. Someone needs to be "be proactive" and take charge! Then you all review and analyze!

CHOICE 1: BEAUTY SPA chosen by Team __ ***Natalie, Loren and Majken***
http://scratch.mit.edu/projects/15076145/

Beauty Spa Link:

http://scratch.mit.edu/projects/15076145/

Beauty Spa review:
The way this Kinkaid student has three options in operating his program is excellent. Option 1: Click on numbers 1-8; you can use the numbers 1-8 to change the different parts of the picture. You also have the option to click on each item. I preferred using option 1, the numbers 1-8, because the program loops back to the first option of the changes made and loops through again. Option 2: Click on different parts of the picture - When I clicked on the object for example the eyes, I clicked through all the options of eye changes then the eyes disappear altogether and I couldn't get them back unless I started everything over again. The only item I could click through and get into a loop of options was the background. Option 3 - The random button was a clever addition. I liked that you could click on the random button and see the different picture combinations that would appear. The student's instructions are simple and clear which makes learning fun. The program commands for each item in the picture are clear and easy to follow. Overall great program – fun way for students/teachers to learn programming following this example.

CHOICE 2: CATCH THE ORANGE chosen by Team __
http://scratch.mit.edu/projects/15067170

CHOICE 3: THE MAZE chosen by Team __Joanne, Wally, Amanda
This Maze game is hard. I cannot pass midway down the first length without getting nailed by the flying dots!

http://scratch.mit.edu/projects/14997088
Joanne, Wally, Amanda

CHOICE 4: BASKETBALL SHOOTDOWN chosen by Team __
http://scratch.mit.edu/projects/15020980/

CHOICE 5: GIGA THE HORSE TAMER chosen by Team _Gail, Elizabeth, Marge
http://scratch.mit.edu/projects/14642647
Gail – I chose this program today – Nov. 10. It's been a busy week. I like the movement of the horses and the step by step instructions from the horse trainer.
Elizabeth- I liked the use of colors to designate ground and deadly objects! It reminded me of classic computer games like Chip's Challenge and Captain Comic. Although the intro to the game warned the player about glitches, I didn't encounter any. It was frustrating having to sit through the opening again after dying. I wonder how hard it would be to include further-back 'save points' that you are returned to after dying 5 times, or include one-ups to restore lives. The script annotations were extremely helpful.

CHOICE 6: ELECTRONIC MULTITASKING MOVIE chosen by Team __
http://scratch.mit.edu/projects/2860149/

CHOICE 7: MULTITASKING ASSIGNMENT chosen by Team __
http://scratch.mit.edu/projects/2860154/

CHOICE 8: RAINBOX MIX chosen by Team __

http://scratch.mit.edu/projects/18209193 (on my account)

http://scratch.mit.edu/projects/22635892/ (on Mimi's account)

PART 5: FIVE TEAMS of THREE

Linda	Technology, grades 2-4 -- La Jolla Country Day School -- CA	scratch.mit.edu/users/torreylin	ca
Cassie	Media Specialist -- Le Jardin Academy -- HI	scratch.mit.edu/users/mscaldarone	hi
Marti	Ed-tech, PreK - 8, HS, parents' groups Georgetown Day School -- DC	scratch.mit.edu/users/MartiW	dc
Loren	K-4 -- Curtis School -- CA	scratch.mit.edu/users/lasboes	ca
Majken	Lower School Principal -- Le Jardin Academy, HI	scratch.mit.edu/users/odatage	hi
Natalie	5th and 6th -- The Hockaday School -- TX	scratch.mit.edu/users/nbravo	tx
Victoria	Chinese for Grades K-5 -- Le Jardin Academy -- HI	scratch.mit.edu/users/vschina2003	hi
Karen	Technology Integration Specialist -- Hockaday -- TX	scratch.mit.edu/users/krob27	tx
Tricia	Elem. Curriculum Specialist -- Academy of the Holy Names -- FL	scratch.mit.edu/users/tdieck	fl
Elizabeth	Librarian for Grades 2-4 -- Rodeph Sholom School -- NY	scratch.mit.edu/users/eatshaw	ny
Gail	5th and 7th grade -- River Oaks Baptist School -- TX	scratch.mit.edu/users/gwatkins7	tx
Marge	Pre-K to 8 Library, Grade 4 Reading -- Dedham Country Day School -- MA	scratch.mit.edu/users/mjf2180	ma
Amanda	Middle School Science teacher, Rodeph Sholom School, NYC	scratch.mit.edu/users/mscarella	ny
Wally	K-12 Innovation Lab -- Columbia Independent School -- MO	scratch.mit.edu/users/Orangepierre	mo
JoAnne	PK-4 Academic Technology -- University School of Milwaukee -- WI	scratch.mit.edu/users/technewbie	wi