HTML5 local storage

Objects need to be stringified (JSON.stringify(object)) before set

Objects need to be parsed (JSON.parse(string)) after get

Game Design

Questions need to have an ID attribute

JQuery

Use jQuery to handle DOM elements. Prefix all jquery objects with ‘$’ character.

Maintain active dom elements as variables for fast reference.

BUGS

1. Exercise data does not maintain order of blanks or questions. Fix by assigning a list data type instead of set.
2. Choices that are not of the current blank are null
3. Animate new answers in blank
4. Animate intro and outro of questions
5. Animate insertion of answers to blank, and wait 2- seconds or so before moving to next question. Even less than 2 seconds.
6. Show question after choices are loaded
7. On mistake decrement frequency of dummies that belong to current blank
8. On mistake show feedback after choice explodes (show where choice exists)
9. On correct show text feedback in incrementing order (by current combo) GOOD, GREAT, X2 COMBO etc. show also points received before multiplier (if relevant).
10. Animate health bar
11. Animate score bar
12. Animate clock. Show minutes until last one - then change to seconds, count down from 60.
13. Exercise Failed screen undefined
14. Retain the state of answers associated with each blank independently. This is to fix a bug where an answer is not available
15. Create game over screen
16. Create top score boards
17. Decide how to calculate time for exercises
18. Writing new levels (exercises) – likely to induce small modifications in design and code.
19. Implementing feedback on mistakes
20. Final tweaks in game logic
21. Implementing the welcome and level selection screen
22. Game Over Screen
23. Implementing persistent score boards
24. Integrating screens
25. Testing
26. UI refinement – animations, etc..
27. Refining server side code
28. Implementing Servlet in a production container (University)
29. Closed Beta testing (real ESL students)

TODO:

1. Set responsibility of the progress bar to the exercise
2. Set responsibility of hint to question
   1. Api: setHint, displayHint, hideHint
3. Set responsibility of exercise title and subject matter to exercise (done)
4. Set responsibility over pausedScreen, gameover screens to GAME
   1. Expose game events: quit
5. Add a “completed” state to the question
6. Set responsibility over next question to exercise
   1. Expose event: onNextQuestion, exerciseComplete
7. Add a “completed” state to exercise
8. Add clock or configuration to add a timed game
9. On game pause, do not hide game so that elements are not redrawn on screen
10. Define an animation to question appearance
11. Set levels of correctness for answers – the last remaining answer should not display “awesome”
12. Put subject name in exercise selection screen
13. Expose api to exercise cleared screen:
    1. putExerciseTitle
    2. putSubjectName
    3. putScore
    4. putTotalScore
    5. putTimeBonus
    6. etc
14. Make blank placeholder more visible
15. Add back buttons to screens
16. Support display of answers by question
    1. Api: procedure showMultiChoices()
    2. The blank sets the isCorrect attribute and hint attribute of a multichoice accordingly. If choice is contained in blank, sets the hint of the answer, else sets the hint of the blank. Otherwise sets null
17. Subject and Exercise List plugin
18. Game intro screen