

Task 5. Store notes in files [optional task]

Task description

In this task we will be using files to store and load nodes.

Time

1 hour

Detailed description

1) Add the variable to work with file system:

```
var fs = require('fs');
```

2) Implement storing notes in the file

```
app.post("/notes", function(req, res) {  
  var note = req.body;  
  var noteText = JSON.stringify(note)+"\n";  
  fs.appendFile("notes.json", noteText, function(err) {  
    if (err) console.log("something is wrong");  
    res.end();  
  });  
});
```

It will append notes.json file on each request

3) Implement loading all notes from the file

```
app.get("/notes", function(req,res) {  
  fs.readFile("notes.json", function(err, result) {  
    if (result) {  
      result = ""+result; // convert Object to String  
      //remove last \n in file  
      result = result.substring(0, result.length - 1);  
      result = "["+result+"]";  
      result = result.split("\n").join(",");  
      res.send(result);  
    } else {  
      res.end();  
    }  
  });  
});
```

Additional tasks

1) Implement removing notes from the file
For this:

- introduce the counter and keep it in the session
- set id for each note and increment the counter when adding the note (see task 4)
- add `app.delete("/notes")` path
- load the list of all notes to the array
- find the note by its id and remove it from the list of the notes
- rewrite the file by using `fs.writeFile(filename, data, callback)`
- see additional documentation for `fs.writeFile` at https://nodejs.org/api/fs.html#fs_fs_writefile_filename_data_options_callback

2) Implement support for multiple users

For this:

- introduce input field to enter the name of the user
- keep the user data in the file with the name of the user
- add Update button to load notes from the user's notes file