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CSC 235 PROJECT 3(duplicate files)

GITHUB LINK: <https://github.com/drixesxs>

PSEUDOCODE

1. Open the files.txt file in read-only mode.
2. Read the number of test cases (T) from the file.
3. Loop over the test cases:
   1. Read the number of files (N) for the current test case.
   2. Create an array of File structs to store the files.
   3. Read the file names and IDs from the file and store them in the array.
   4. Sort the array of files using the qsort and compare\_files functions.
   5. Loop over the sorted array of files and print the IDs of the files that have unique names.
4. Exit the program.

ALGORITHM

INCLUDE stdio.h, stdlib.h, string.h

DEFINE MAX\_FILENAME\_LENGTH 10

DEFINE MAX\_FILES 100000

DEFINE struct File {

name[MAX\_FILENAME\_LENGTH + 1]

id

}

DEFINE compare\_files(a, b)

RETURN a.id - b.id

DEFINE main()

files\_in = fopen("files.txt", "r")

IF files\_in == NULL

PRINT "Error! File cannot be opened..."

EXIT

READ T

FOR t = 1 TO T

READ N

CREATE files[MAX\_FILES]

FOR i = 0 TO N

READ files[i].name, files[i].id

SORT files USING qsort and compare\_files

FOR i = 0 TO N

IF i == 0 OR files[i].name != files[i - 1].name

PRINT files[i].id

CALL main() function