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Coding Arena

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Problem : Data Decryption

Data is encrypted in order to maintain security. Encrypted data format and corresponding decryption procedure is described below.

A Data *Record* consists of exactly two lines. Each *Record* has exactly two 'F' characters. The first 'F' character acts as field delimiter. The second 'F' character marks the end of the *Record*. First 'F' characters can be present in either of the two lines. However, the second 'F' is always present only in the first line. Also, since the second 'F' character marks end of the record, it is always the last character of the first line.

The decryption procedure is explained using an example *Record*
13F6803F
2457959

Note the following things

- The *Record* is comprised of two lines
- The *Record* has 2 'F' characters
- The second 'F' character appears as the last character in first line
- The length of the first line is one character more than the length of the second line
- Other than 'F's, the lines can contain only numeric characters

Data has to be read in following order from left to right

1. Read first character of first line
2. Then, read first character of second line
3. Then, read second character of first line
4. Then read second character of second line
5. So on and so forth in zig-zag manner until the first 'F' character is encountered
6. Replace the first 'F' by | (pipe) symbol
7. So the first field which is now decrypted is 1234, based on the example above
8. Continue reading rest of the record by following steps 1 - 4
9. When second 'F' character is encountered, the record is said to be completely read and we have obtained our second field value as 567890539

Your task is to decrypt set of records. The Input and Output sections below specify how the input has to be read and how the output has to be written.

Input Format:

File Name, where file contains records (recollect that each Record is comprised of 2 lines)

Output Format:

Print the decrypted data delimited by pipe symbol ('|')

Constraints:

There can be maximum 100 records in the input file

The Record length including characters in both lines may not exceed 25

Sample Input and Output

SNo.	Input	Output
1	file1.txt	1230|08525 4921|563 1230|08508 49210|63905575 49210|63

Time Left

00 **03** **00**
hr   min   sec

Rules & Regulations

Explanation:

To understand the input and the output, following example content of the file are depicted along with output for better understanding.

File Name	Contents of file	Output	Explanation
file1.txt	13F82F 20055 42F6F 9153 13F80F 20058 4206957F 91F3055 4206F 91F3	1230|08525 4921|563 1230|08508 49210|63905575 49210|63	There are 10 lines in the file. Hence there are 5 records in the file. Now take first 2 lines, which is the First Record. Refer procedure as mentioned in problem text above to read the record. Based on the Record reading procedure we get For first record, First field is 1230 and Second field is 08525 For second record, First field is 4921 and second field is 563 For third record, First field is 1230 and second field is 08508 For fourth record, First field is 49210 and second field is 63905575 For fifth record, First field is 49210 and second field is 63 The decrypted text is printed in output format as depicted in adjacent section.

Note:

Please do not use package and namespace in your code. For object oriented languages your code should be written in one class.

Note:

Participants submitting solutions in C language should not use functions from <conio.h> / <process.h> as these files do not exist in gcc

Note:

For C and C++, return type of main() function should be int.

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