

May 15

# Assignment 1 - XM23p Loader and Memory

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This document describes the design of an XM23p emulator's loader module.

It reads the S-records from an XME file, and loads the result into the emulator's IMEM and DMEM.

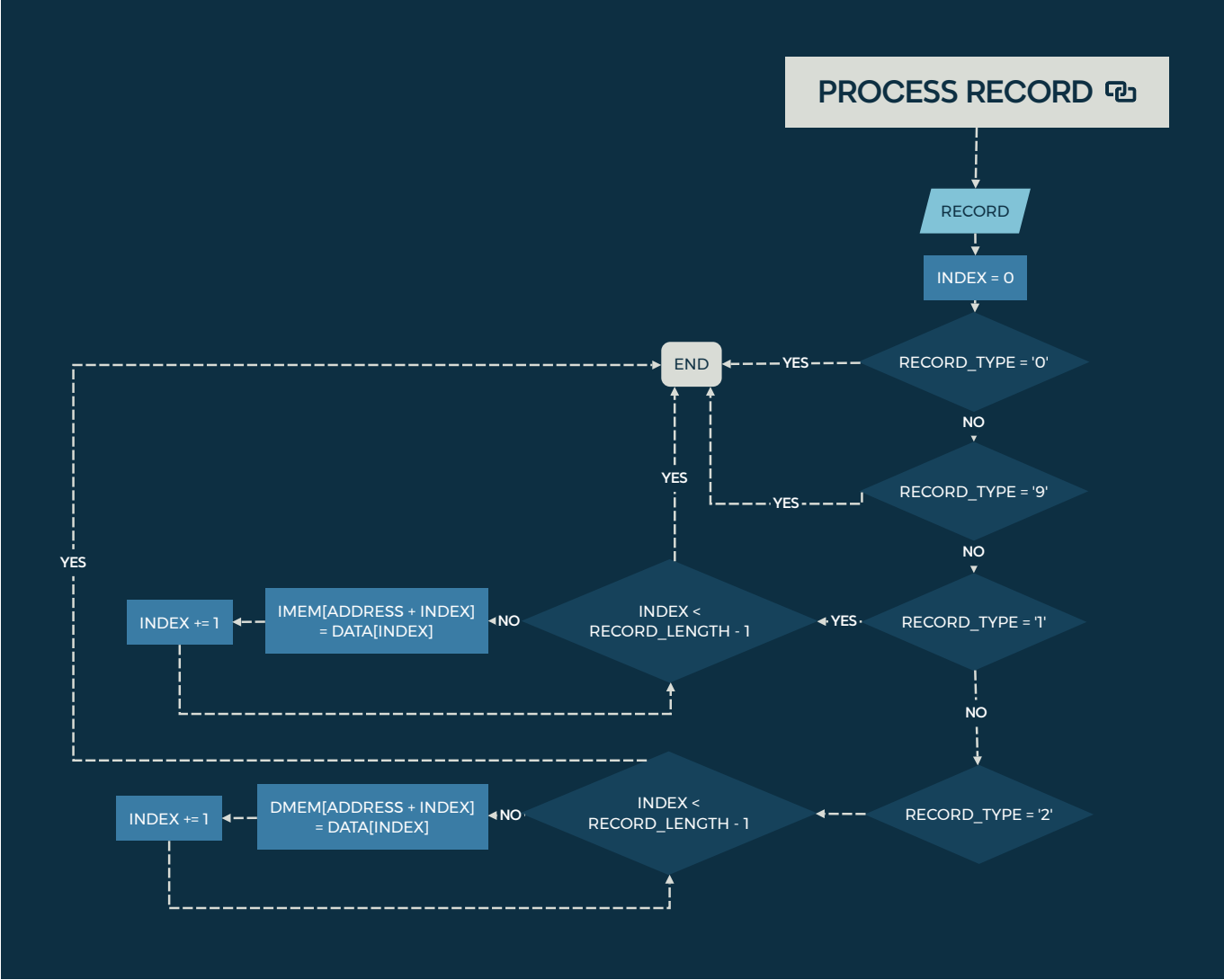
## Data Dictionary

```
S_REC = 'S' + REC_TYPE + LENGTH + ADDRESS + DATA
REC_TYPE = ['0'|'1'|'2'|'9']
LENGTH = BYTE_PAIR
ADDRESS = 2{BYTE_PAIR}2
DATA = 1{BYTE_PAIR}30
BYTE_PAIR = 2{CHAR}2
CHAR = ['0'-'F']
```

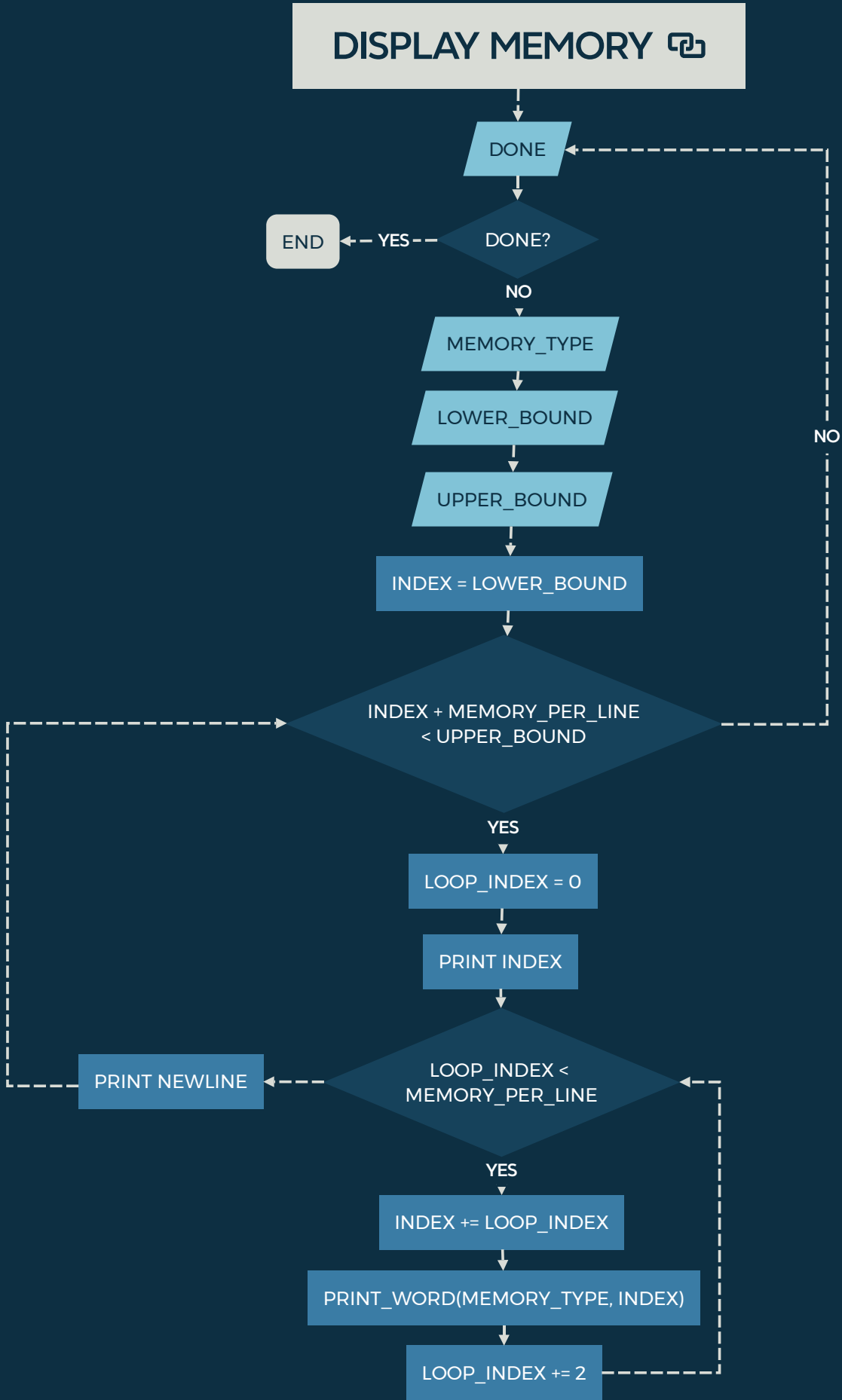
## Design



## Main Program Flowchart



Process Record Flowchart



Display Memory Flowchart