

# Host

Diagram A. Implementation of the General Model Using a Magic Object

Send a WRITE\_MAGIC\_BYTES message to the display module.

Send an acknowledgment byte (ACK) back to the host.

Get the size of the file and send it back to the host.

Take a screenshot of the display. Save the screenshot image to a file.

Get the filenames. Send the filenames data back to the host.

Is the message a WRITE\_MAGIC\_BYTES message?

Do nothing , exit.

yes

no

Is cmd equal to "MFILE\_READ"?

yes

no

Perform a file read operation. Send the read data back to the host.

Is cmd equal to "MFILE\_WRITE"?

yes

no

Perform a file write operation.

Is cmd equal to "MFILE\_APPEND"?

yes

no

Perform a file append operation.

Is cmd equal to "MFILE\_ERASE"?

yes

no

Perform a file erase operation.

X

X

X

X

X

yes

no

Is cmd equal to "MFILE\_SIZE"?

yes

no

Is cmd equal to "MFILE\_SCREEN\_CAPTURE"?

yes

no

Is cmd equal to "MFILE\_DIR"?

Parse the array pointed to by ptr for the filename.

Start constructing a reply. This is the REPORT\_MAGIC\_EVENT\_BYTES message. Send the first two bytes.

Extract the command byte from the array pointed to by ptr. Store the command byte into the variable "cmd".

# Host

Send a WRITE\_MAGIC\_BYTES message to the display module.

Is the message a  
WRITE\_MAGIC\_BYTES  
message?

no

Do nothing.

yes

## Diagram B. Implementation of the File Access Model Using a Magic Object

Send an acknowledgment byte (ACK) back to the host.

no

Is cmd equal to  
"MFILE\_APPEND"?

yes

Parse the array pointed to by ptr for the filename.

Start constructing a reply. This is the REPORT\_MAGIC\_EVENT\_BYTES message. Send the first two bytes.

Extract the command byte from the array pointed to by ptr. Store the command byte into the variable "cmd".

OUT

Perform a file append operation. Send a message back to the host.

IN

See next slide.

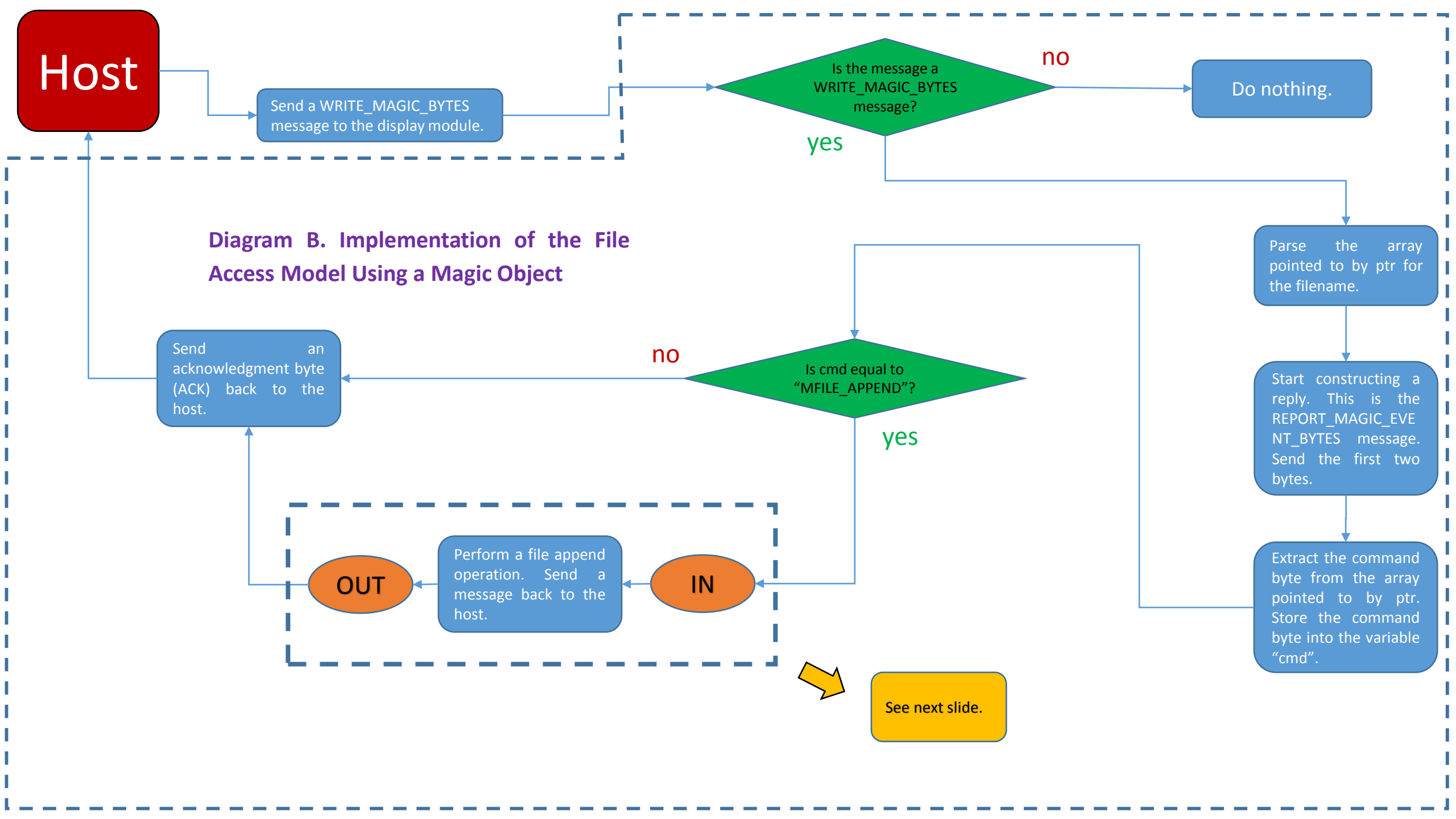


Diagram C. File Append Operation

