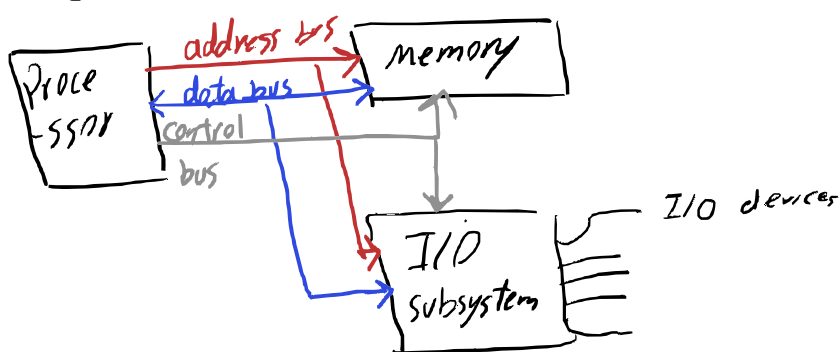


Computer system



System bus

- address: Limit Memory Capacity
- data: each data transfer size
- Control: it has set of control signals, memory Read - I/O write, interrupt, bus request.

Ex. 20-bit address $\rightarrow 2^{20}$ Byte memory (1MB) capacity

16-bit data \rightarrow 16 bit of data in each transfer

★ data transfers is called "Transactions". the initiator is "Master" and the target is "Slave"

★ in a bus cycle there could be 1 transaction or burst of transactions if supported

In most cases there are multiple masters therefore there is bus protocols in which they have to send ^{request to} bus request control line and wait for bus grant control line to respond.