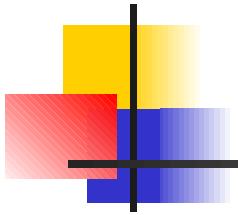
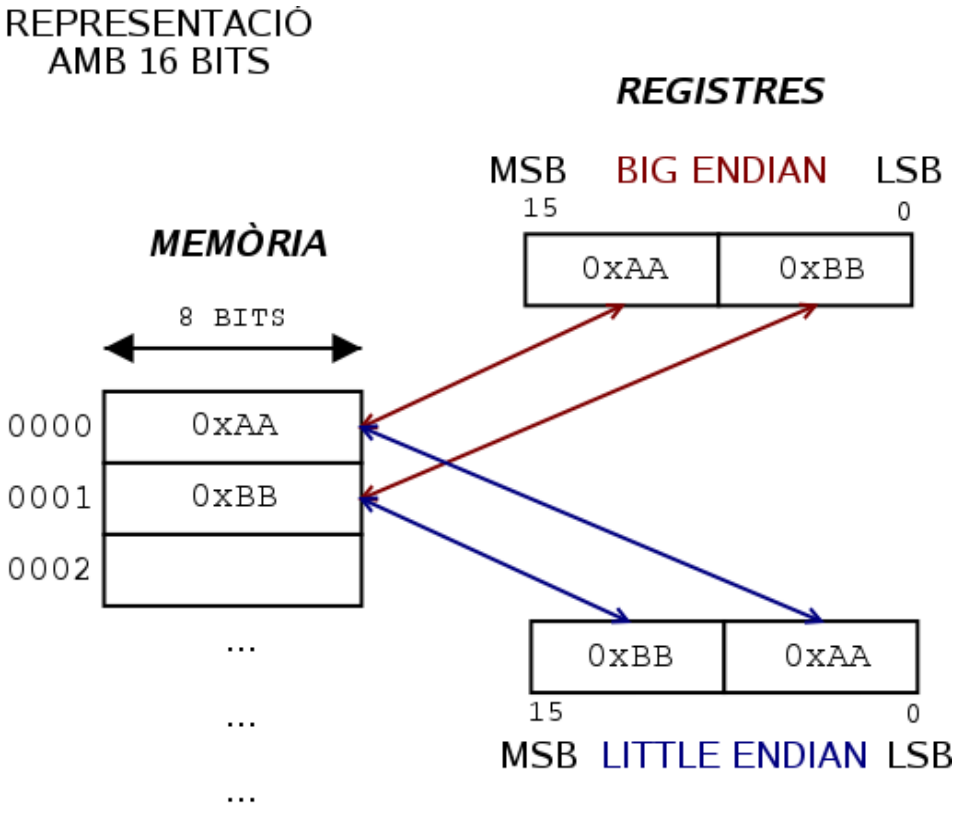


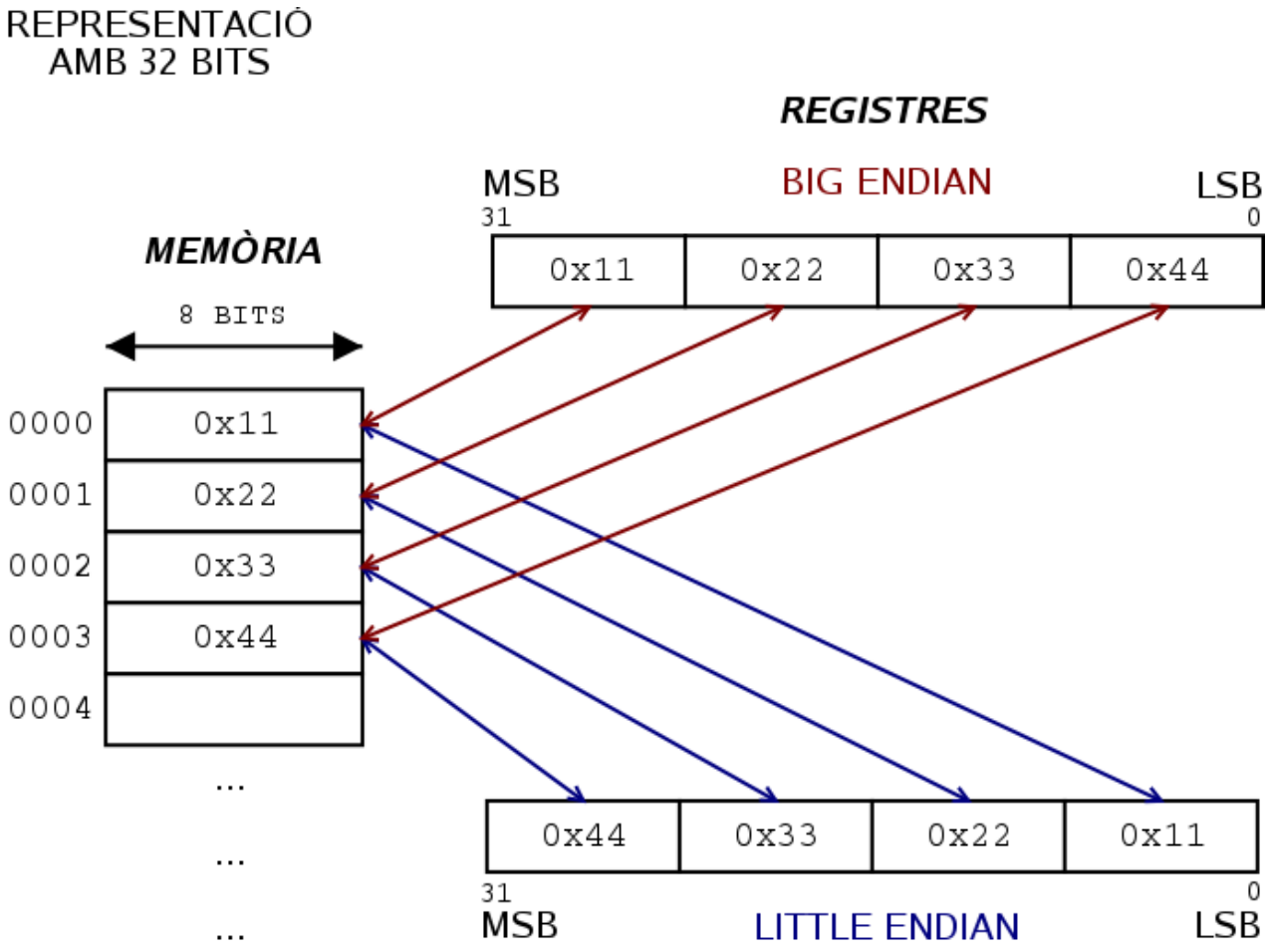
LITTLE ENDIAN vs. BIG ENDIAN

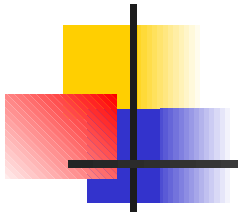
- Dues formes diferents d'accedir a memòria a blocs més grans d'1 byte
  - LITTLE: Posicions baixes, bytes de menys pes
  - BIG: Posicions baixes, bytes de més pes
- Cada arquitectura utilitza la seva pròpia representació
- Pot causar problemes en la compartició de dades entre diferents arquitectures

BIG vs. LITTLE ENDIAN - 16 BITS



BIG vs. LITTLE ENDIAN - 32 BITS

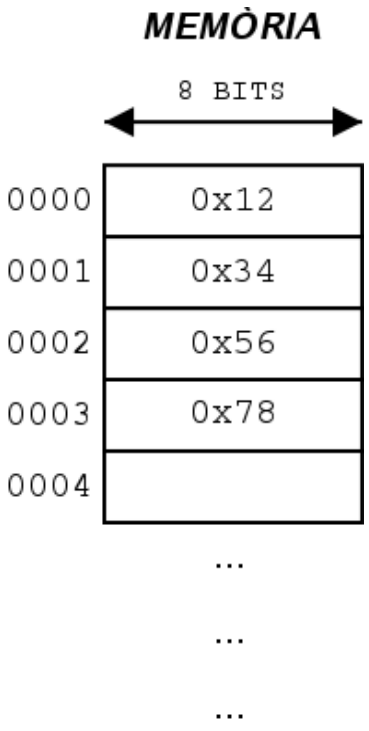




PLATAFORMES

- **BIG ENDIAN**
  - SPARC
  - Motorola 68000
  - MIPS
  - SGI
  - SUN
- **LITTLE ENDIAN**
  - VAX
  - Intel x86
  - Intel Pentium

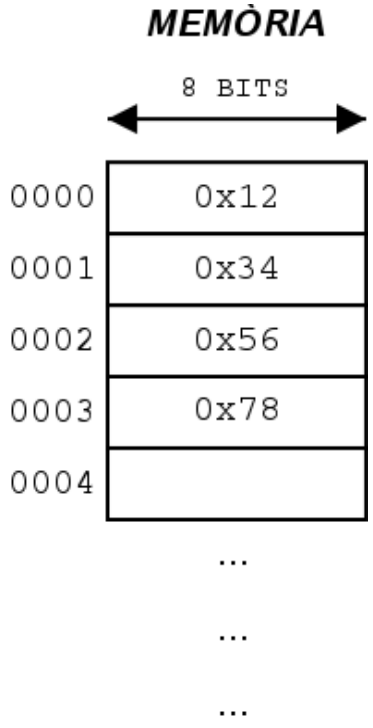
COM GUARDAR *0x12345678* ?



AMB:

1. Accessos a 8 bits
2. Accessos a 16 bits Little Endian
3. Accessos a 16 bits Big Endian
4. Accessos a 32 bits Little Endian
5. Accessos a 32 bits Big Endian

SOLUCIÓ



8 BITS

```
MOV [0000], 0x12
MOV [0001], 0x34
MOV [0002], 0x56
MOV [0003], 0x78
```

	16 BITS	32 BITS
BIG	MOV [0000], 0x1234 MOV [0002], 0x5678	MOV [0000], 0x12345678
LITTLE	MOV [0000], 0x3412 MOV [0002], 0x7856	MOV [0000], 0x78563412