

Table 3-4: OS Signature

Bits	Description
63:48	OS Signature
47:32	FS Signature
31:16	Partition usage. OS/FS specific/defined.
15:00	OS specified: partition order/cleanup

All fields in any portion of the eMBR are in little-endian format, LSB written first. The reserved fields should be written as zeros when creating new entries. However, when reading an existing partition entry, all reserved fields should be written back as they were read. If a reserved field is non-zero, it should be written back as the same non-zero value.

## The Boot Menu

At boot time, once the MBR has loaded the first sector of our code, then that code loaded the remaining sectors and parsed the partition entries, it should display all non-hidden entries and allow the user to choose one to boot. The code that I have included on the disc produces a menu similar to the following figure.

Figure 3-2: Boot Menu Example

```

FYS OS (aka Konan) Multi-boot EMBR v0.92.10
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This is the description for #3.
  Base LBA: 0000000000001234h Sectors: 0000000000005678h
This is the description for #4.
  Base LBA: 0000000123456789h Sectors: 0000000987654321h
This is the description for #5.
  Base LBA: 0123456789ABCDEFh Sectors: FEDCBA9876543210h
This is the description for #6.
  Base LBA: 00000000DF9A465h Sectors: 00000005744EBB1Ch
This is the description for #7.
  Base LBA: 1111111111111111h Sectors: 2222222222222222h
This is the description for #8.
  Base LBA: 3333333333333333h Sectors: 4444444444444444h
This is the description for #9.
  Base LBA: 5555555555555555h Sectors: 6666666666666666h

Will boot entry 7 in 18 seconds.
```