Note: This API calls are shared between DOS and Win16 personality.

DPMI is a shared interface for DOS applications to access Intel 80286+ CPUs services. DOS DMPI host provides core services for protected mode applications. Multitasking OS with DOS support also provides DMPI in most cases. Windows standard and extended mode kernel is a DPMI client app. Standard and extended mode kernel differs minimally and shares common codebase. Standard Windows kernel works under DOSX extender. DOSX is a specialized version of 16-bit DPMI Extender (but it is standard DPMI host). Standard mode is just DPMI client, exnhanced mode is DPMI client running under Virtual Machime Manager (really, multitasker which allow to run many DOS sessions). Both modes shares DPMI interface for kernel communication. The OS/2 virtual DOS Protected Mode Interface (VDPMI) device driver provides Version 0.9 DPMI support for virtual DOS machines. Win16 (up to Windows ME) provides Version 0.9 DPMI support. Windows in Standard Mode provides DPMI services only for Windows Applications, not DOS sessions.

DPMI host often merged with DPMI extender. Usually DPMI extender provide DPMI host standard services and DOS translation or True DPMI services.

2021/08/05 10:15 · prokushev · 0 Comments

Int 31H, AH=05H, AL=03H

Version

0.9

Brief

Resize Memory Block

Input

```
AX = 0503H
BX:CX = new size of block (bytes, must be nonzero)
SI:DI = memory block handle
```

Return

```
if function successful
Carry flag = clear
BX:CX = new linear address of memory block
```

```
SI:DI = new handle for memory block

if function unsuccessful
Carry flag = set
AX = error code
8012H   linear memory unavailable
8013H   physical memory unavailable
8014H   backing store unavailable
8016H   handle unavailable
8021H   invalid value (BX:CX = 0)
8023H   invalid handle (in SI:DI)
```

Notes

Changes the size of a memory block that was previously allocated with either the Allocate Memory Block function (Int 31H Function 0501H) or the Allocate Linear Memory Block function (Int 31H Function 0504H).

After this function returns, the previous handle for the memory block is invalid and should not be used.

When increasing the size of a block, this function always creates committed pages. When decreasing the block size, this call will correctly free all possible page types (committed pages, uncommitted pages, and mapped pages). The linear address and handle of the memory block may change as a result of this call.

It is the client's responsibility to update any descriptors that map the memory block with the new linear address after resizing the block.

This function returns an error if the client attempts to resize a memory block to zero bytes.

See also

Note

Text based on http://www.delorie.com/djgpp/doc/dpmi/

DPMI		
Process manager	**INT 2FH** 1680H, 1687H	
Signals		
Memory manager		
Misc	**INT 2FH** 1686H, 168AH	
Devices		

2021/08/13 14:23 · prokushev · 0 Comments

From:
http://osfree.org/doku/ - **osFree wiki**

Permanent link:
http://osfree.org/doku/doku.php?id=en:docs:dpmi:api:int31:05:03

Last update: **2021/08/27 04:18**