

AmigaSprite

COLLABORATORS

	<i>TITLE :</i> AmigaSprite		
<i>ACTION</i>	<i>NAME</i>	<i>DATE</i>	<i>SIGNATURE</i>
WRITTEN BY		July 31, 2024	

REVISION HISTORY

NUMBER	DATE	DESCRIPTION	NAME

Contents

1	AmigaSprite	1
1.1	AmigaSprite	1
1.2	amigaspritescreen	1
1.3	changeamigaspriteresolution	2
1.4	displayamigasprite	2
1.5	freeamigasprite	2
1.6	initamigasprite	2
1.7	loadamigasprite	3

Chapter 1

AmigaSprite

1.1 AmigaSprite

PureBasic - AmigaSprite library

AmigaSprites are kind of 'Sprites' (see the Sprites chapter) with some particularities. First, the AmigaSprites are fully handled by the Amiga hardware, so they are very fast, much faster than normal sprites. But it could have only 8 AmigaSprites displayed at the same time. The number of colours for each sprite is limited to 4. In other hand, each sprite can have an unlimited height and upto 64 pixels width (on AGA Amiga).

Commands summary in alphabetical order:

```
AmigaSpriteScreen
ChangeAmigaSpriteResolution
DisplayAmigaSprite
FreeAmigaSprite
InitAmigaSprite
LoadAmigaSprite
```

Example:

```
AmigaSprite demo
```

1.2 amigaspritescreen

SYNTAX

```
AmigaSpriteScreen(ScreenID)
```

COMMAND

Set the screen on which the AmigaSprites will be displayed. You can easely get the ScreenID value by using the 'ScreenID()' command.

1.3 changeamigaspriteresolution

SYNTAX

ChangeAmigaSpriteResolution(NewResolution)

FUNCTION

One of the great feature of the AmigaSprites is the possibility to change theirs resolutions, independantly of the screen mode. For example, you can display an 'Hi-Res' sprite (640 pixels width like screen) on a standard PAL (320 pixels width) screen. You can call this command only if you have called the command 'AmigaSpriteScreen()'. This command only affect the sprite width, not the sprite height.

Possible 'NewResolution' values:

- 1: Low-Resolution sprite width (320*x screen like)
- 2: Hi-Resolution sprite width (640*x screen like)
- 3: Super Hi-Resolution sprite width (1280*x screen like)

1.4 displayamigasprite

SYNTAX

DisplayAmigaSprite(#AmigaSprite, Channel, x, y)

FUNCTION

Display the specified AmigaSprite on the given position on the current AmigaSprite screen (set with the 'AmigaSpriteScreen()' command). There is 8 channels and each channel can display 1 AmigaSprite. You can not display 2 Sprites on the same channel at the same time. Channels values are from 0 to 7.

Note: AmigaSprites are always displayed over the graphics without destroy them. There is no need to save/restore the background like in regular sprites.

1.5 freeamigasprite

SYNTAX

FreeAmigaSprite(#AmigaSprite)

FUNCTION

Remove the specified AmigaSprite from memory. You can no more use it.

1.6 initamigasprite

SYNTAX

Result = InitAmigaSpriteFile(#MaxAmigaSprites)

FUNCTION

Init all the AmigaSprite environments for later use. You must put this

function at the top of your source code if you want to use the AmigaSprite commands. You can test the result to see if the AmigaSprite environment has been correctly initialized. If not, quit the program or disable all the calls to the AmigaSprite related commands.

1.7 loadamigasprite

SYNTAX

```
Result = LoadAmigaSprite(#AmigaSprite, FileName$)
```

STATEMENT

Load the specified AmigaSprite into the memory for immediate use. The ↵
AmigaSprite
must be in IFF/ILBM format (compressed or not, both cases are supported).
The AmigaSprites are always stored in Chip-Ram, in uncompressed form.
The sprite width is limited to 16 (on OCS/ECS chipset) or to 64 (on AGA chipset) ↵
.

If the loaded sprite is too large, it will be automatically cutted to 64 pixels.
The sprite height is not limited.

If something wrong happens, a negative or null value is returned. Here are all the possible errors values:

- 0 : Not enough memory
- 1 : File not found or can't be opened.
- 2 : This file is not an IFF/ILBM file
- 3 : Corrupted IFF/ILBM file