

StickC LCD Display

RGB565 Color

The following API uses the RGB565 color coding format

cpp

```
1 #define BLACK      0x0000 /*  0,   0,   0 */
2 #define NAVY       0x000F /*  0,   0,  128 */
3 #define DARKGREEN  0x03E0 /*  0, 128,   0 */
4 #define DARKCYAN   0x03EF /*  0, 128, 128 */
5 #define MAROON     0x7800 /* 128,   0,   0 */
6 #define PURPLE     0x780F /* 128,   0, 128 */
7 #define OLIVE      0x7BE0 /* 128, 128,   0 */
8 #define LIGHTGREY  0xC618 /* 192, 192, 192 */
9 #define DARKGREY   0x7BEF /* 128, 128, 128 */
10 #define BLUE       0x001F /*  0,   0, 255 */
11 #define GREEN      0x07E0 /*  0, 255,   0 */
12 #define CYAN       0x07FF /*  0, 255, 255 */
13 #define RED        0xF800 /* 255,   0,   0 */
14 #define MAGENTA    0xF81F /* 255,   0, 255 */
15 #define YELLOW     0xFFE0 /* 255, 255,   0 */
16 #define WHITE      0xFFFF /* 255, 255, 255 */
17 #define ORANGE     0xFDA0 /* 255, 180,   0 */
18 #define GREENYELLOW 0xB7E0 /* 180, 255,   0 */
19 #define PINK       0xFC9F /* 255, 255,  16 */
```

fillScreen

Syntax:

```
void fillScreen(uint32_t color);
```

Description:

- Fill the entire screen with the specified color

Parameters:

- uint32_t color:
 - color value

Return:

- null

Example:

cpp

```
1 #include <M5StickC.h>
2
3 void setup() {
4     M5.begin();
5     M5.Lcd.fillScreen(BLUE);
6 }
7 void loop() {}
```

| setTextColor

Syntax:

```
void setTextColor(uint16_t color, uint16_t backgroundcolor);
```

Description:

- Sets the foreground color and background color of the displayed text.

Parameters:

- uint16_t color:
 - The foreground color of the text
- uint16_t backgroundcolor:
 - Background color of the text

Return:

- null

Example:

cpp

```
1 #include <M5StickC.h>
2
3 void setup() {
4     M5.begin();
5     M5.Lcd.setTextColor(RED, WHITE);
6     M5.Lcd.println("Hello, M5Stack world!!");
7 }
8 void loop() {
9 }
```

| print

Syntax:

```
size_t print(const String &s);
```

Description:

Starts printing text at the current cursor position on the screen

Parameters:

- const String &s:
 - string

Return:

- size_t:
 - Length of printed text

Example:

cpp

```
1  #include <M5StickC.h>
2
3  void setup() {
4      M5.begin();
5      M5.Lcd.print("print text");
6  }
7  void loop() {}
```

| setCursor

Syntax:

```
void setCursor(int16_t x0, int16_t y0);
```

Description:

- Move the cursor position to (x0, y0).

Parameters:

- int16_t x0:
 - point x
- int16_t y0:
 - point y

Return:

- null

Example:

cpp

```
1  #include <M5StickC.h>
2
3  void setup() {
4      M5.begin();
5      M5.Lcd.setCursor(7, 20);
6      M5.Lcd.println("scan done");
7      M5.Lcd.setCursor(5, 60);
8      M5.Lcd.printf("50 AP");
9  }
10 void loop() {}
```

| drawPixel

Syntax:

```
void drawPixel(int16_t x, int16_t y, uint16_t color);
```

Description:

- Draw pixels at position (x,y)

Parameters:

- int16_t x:
 - x position
- int16_t y:
 - y position
- uint16_t color:
 - color value

Return:

- null

Example:

cpp

```
1  #include <M5StickC.h>
2
3  void setup() {
4      M5.begin();
5      M5.Lcd.drawPixel(22, 22, RED);
6  }
7  void loop() {}
```

| drawLine

Syntax:

```
void drawLine(int16_t x0, int16_t y0, int16_t x1, int16_t y1, uint16_t color);
```

Description:

- Draws a line from point (x0,y0) to point (x1,y1) in the specified color.

Parameters:

- int16_t x0:
 - point x0
- int16_t y0:
 - point y0
- int16_t x1:
 - point x1
- int16_t y1:
 - point y1
- uint16_t color
 - color value

Return:

- null

Example:

cpp

```
1 #include <M5StickC.h>
2
3 void setup() {
4     M5.begin();
5     M5.Lcd.drawLine(0, 0, 12, 12, BLUE);
6 }
7 void loop() {}
```

| drawTriangle

Syntax:

```
void drawTriangle(int16_t x0, int16_t y0, int16_t x1, int16_t y1, int16_t x2, int16_t y2, uint16_t colo
```

Description:

- Draw triangles in the specified colors with vertices (x0,y0), (x1,y1) and (x2,y2).

Parameters:

- int16_t x0:
 - triangle x0
- int16_t y0:
 - triangle y0

- int16_t x1:
 - triangle x1
- int16_t y1:
 - triangle y1
- int16_t x2:
 - triangle x2
- int16_t y2:
 - triangle y2
- uint16_t color
 - color value

Return:

- null

Example:

cpp

```
1  #include <M5StickC.h>
2
3  void setup() {
4      M5.begin();
5      M5.Lcd.drawTriangle(22, 22, 69, 98, 51, 22, RED);
6  }
7  void loop() {}
```

| fillTriangle

Syntax:

```
void fillTriangle(int16_t x0, int16_t y0, int16_t x1, int16_t y1, int16_t x2, int16_t y2, uint16_t colo
```

Description:

- Draw filled triangles in the specified colors with vertices (x0,y0), (x1,y1) and (x2,y2).

Parameters:

- int16_t x0:
 - triangle x0
- int16_t y0:
 - triangle y0
- int16_t x1:
 - triangle x1
- int16_t y1:
 - triangle y1
- int16_t x2:
 - triangle x2

- int16_t y2:
 - triangle y2
- uint16_t color
 - color value

Return:

- null

Example:

cpp

```
1  #include <M5StickC.h>
2
3  void setup() {
4      M5.begin();
5      M5.Lcd.fillTriangle(22, 22, 69, 98, 51, 22, RED);
6  }
7  void loop() {}
```

| drawRect

Syntax:

```
void drawRect(int16_t x, int16_t y, int16_t w, int16_t h, uint16_t color);
```

Description:

- Draw a rectangle in the specified color, where the coordinates of the upper left corner of the rectangle (x, y), width and height are width and height respectively

Parameters:

- int16_t x:
 - x-coordinate of the upper left corner of the rectangle
- int16_t y:
 - y-coordinate of the upper left corner of the rectangle
- int16_t w:
 - Rectangular width(px)
- int16_t h:
 - Rectangular height(px)
- uint16_t color:
 - color value

Return:

- null

Example:

cpp

```
1 #include <M5StickC.h>
2
3 void setup() {
4     M5.begin();
5     M5.Lcd.drawRect(50, 100, 30, 10, BLUE);
6 }
7 void loop() {}
```

fillRect

Description:

- Draws a 'filled' rectangle in the specified color, with the coordinates of the upper-left corner as (x,y) and the width and height as width and height, respectively.

Syntax:

```
void fillRect(int16_t x, int16_t y, int16_t w, int16_t h, uint16_t color);
```

Parameters:

- int16_t x:
 - x-coordinate of the upper left corner of the rectangle
- int16_t y:
 - y-coordinate of the upper left corner of the rectangle
- int16_t w:
 - Rectangular width(px)
- int16_t h:
 - Rectangular height(px)
- uint16_t color:
 - color value

Return:

- null

Example:

cpp

```
1 #include <M5StickC.h>
2
3 void setup() {
4     M5.begin();
5     M5.Lcd.fillRect(50, 100, 20, 10, BLUE);
6 }
7 void loop() {}
```


| drawRoundRect

Syntax:

```
void drawRoundRect(int16_t x0, int16_t y0, int16_t w, int16_t h, int16_t radius, uint16_t color);
```

Description:

- Draw a rectangle with rounded corners in the specified color, where the upper-left corner of the rectangle has the coordinates (x,y), the width and height are width and height respectively, and the radius of the rounded corners is radius.

Parameters:

- int16_t x:
 - x-coordinate of the upper left corner of the rectangle
- int16_t y:
 - y-coordinate of the upper left corner of the rectangle
- int16_t w:
 - Rectangular width(px)
- int16_t h:
 - Rectangular height(px)
- int16_t radius:
 - radius of a rounded corner
- uint16_t color:
 - color value

Return:

- null

Example:

cpp

```
1 #include <M5StickC.h>
2
3 void setup() {
4     M5.begin();
5     M5.Lcd.fillRoundRect(40, 70, 20, 10, 4, BLUE);
6 }
7 void loop() {}
```