



# HS-584 User Manual

## Label command

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## 1.Introduction

## ① HS-584\_ V2.1

HS-K563 is a scale Label printer with peer off. It has good printing quality and high stability, which is widely used in POS system, food service industry and many other fields.

HS-K563 connects other devices via Serial or USB port. It offers drivers for WINDOWS and LINUX operating systems.

The supported operating systems are as below:

WINDOWS XP

WINDOWS 7 32/64

WINDOWS 8

WINDOWS10/11

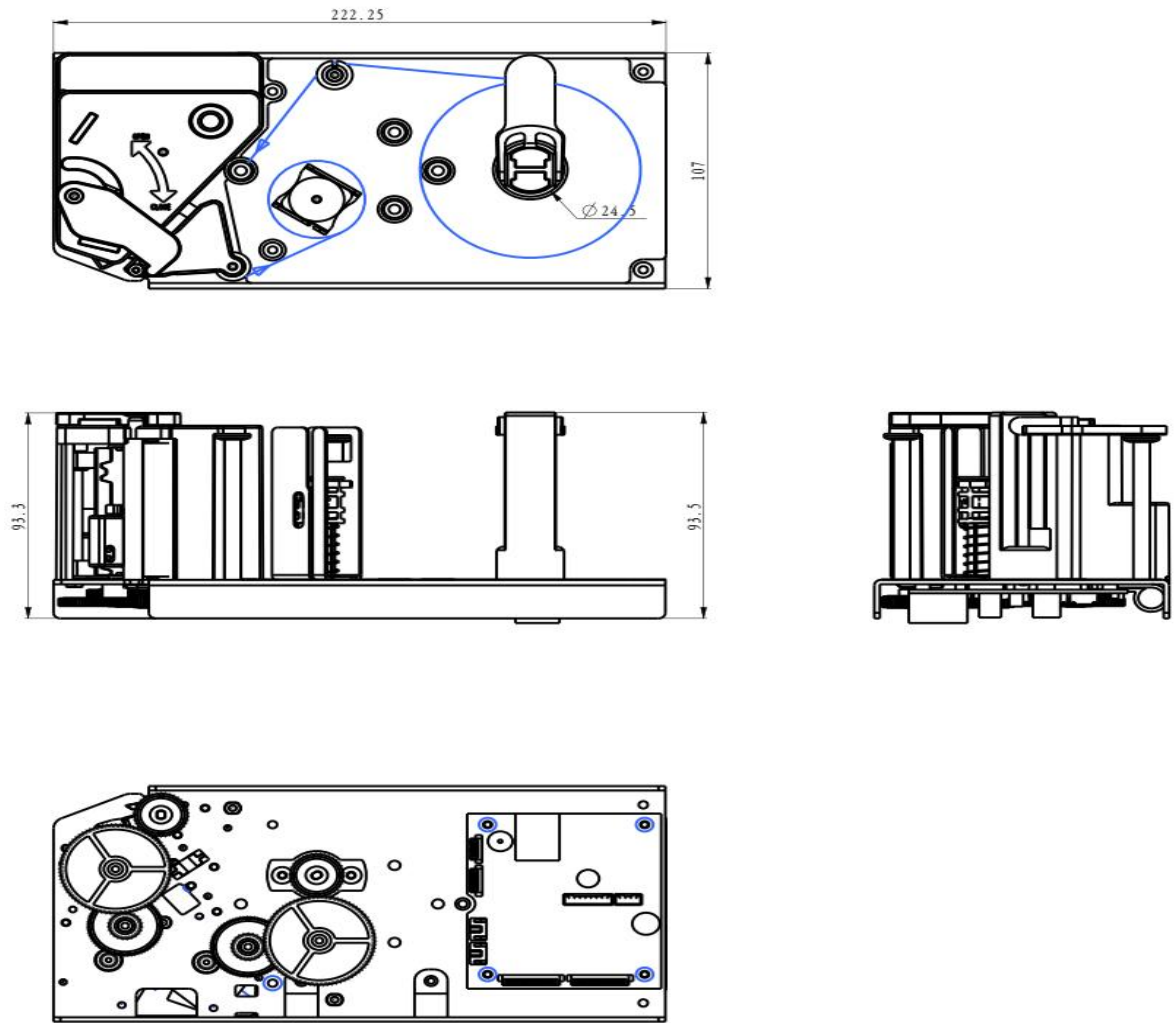
UBUNTU 12.04 32/64

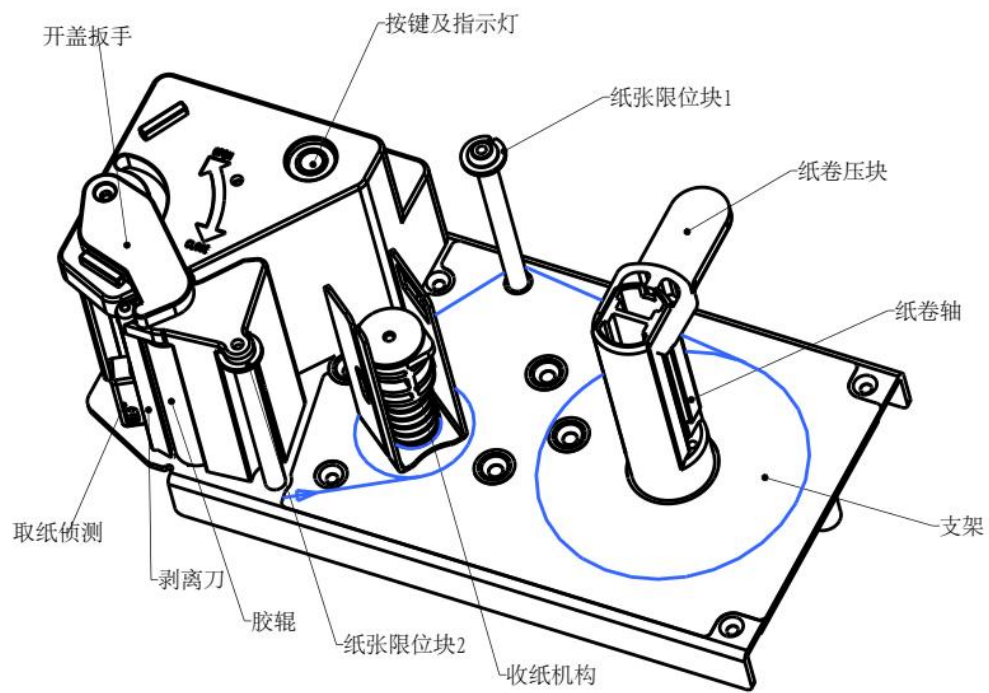
UBUNTU 14.04 32/64

## ② Main features

- 2) Good printing quality
- 3) Support USB、serial port, Ethernet port (optional)
- 4) Support continuous paper printing
- 5) Support Label Paper Printing
- 6) Support paper removal, cover opening and closing, and near-end detection
- 7) Support multiple label widths

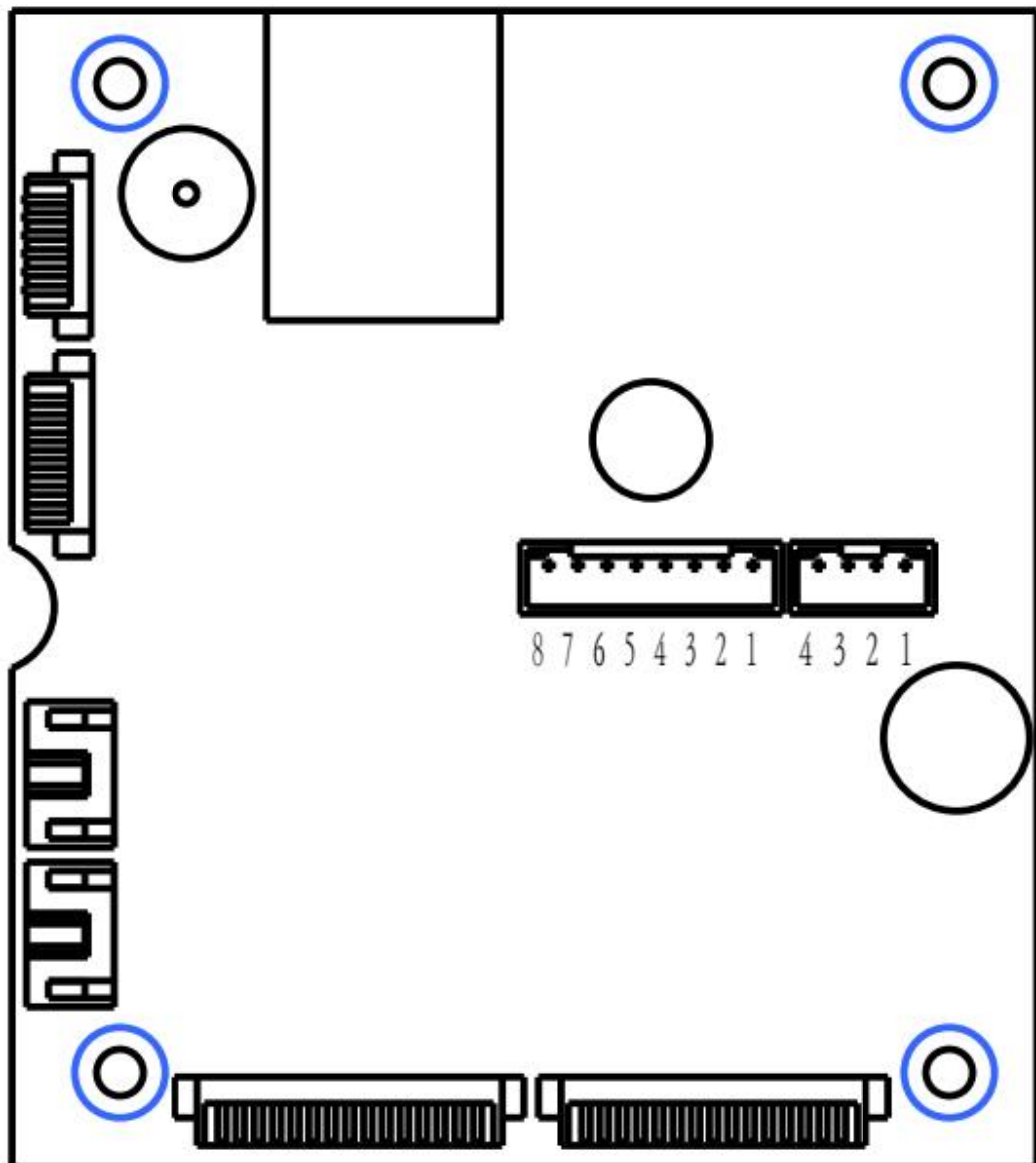
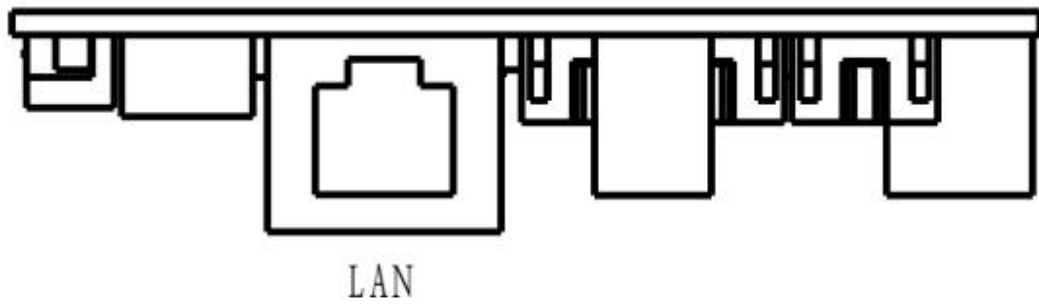
Size:







## 2. PIN definition



### 3.1 USB

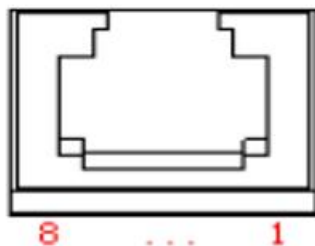
Pin number	Name	function
1	VUSB	+5V
2	D-	Data-
3	D+	Date+
4	GND	GND

### 3.2 POWER+RS232

Pin number	Signal name	function
1	VH	DC24 2.5A
2	VH	DC24 2.5A
3	GND	GND
4	GND	GND
5	GND	GND
6	RX	Signal input
7	TX	Signal output
2	DTR	The data terminal is ready

### 3.4 Ethernet

Ethernet interface socket is standard RJ45-8P





## 4 Specifications

Printing	Printing Method	Thermal Line
	Printing Speed	Max150mm/s
	Resolution	8 dots/mm, 203DPI
	Effective Printing Width	56mm
Character	Character Set	ASCII, GB18030(Chinese), BIG5 (24*24)
	Print Font	Codepage, ASCII 12×24, 24×24
Paper Spec	Paper Type	Thermal label paper ,Black Papepr
	Paper Thickness	0.08~0.2mm
	Paper Width	60mm
	Paper roll diameter	Max 100mm
	Paper core inner diameter	MIN.25mm
Barcode		1D: UPC-A, UPC-EEAN-13, EAN-8, CODE39, ITF25, CODEBAR, CODE93, CODE128 2D: QR CODE, PDF417, DATAMATRIX
Emulation		ESC/POS (Receipt)、CPCL、TSPL、JPL (Label)
Driver		Win11/Win10/2000/NT/XP/Vista/Win7/Win8/Linux/Android
Interface		RS-232/USB. OR USB AND LAN
RAM		FLASH 4M
Paper Supply Method		Manual loading
Power Supply		DC24V±10%, 3A or DC12v 3A
size		107*222*93.3mm
Weight		1.05kg
Environment	Operating Temp	0~ 50 °C
	Operating Humidity	10%~80%

## Label command

### Appoint

Name	Appoint
Code	[COMMAND]+[Parameter]
description	<p>COMMAND: command header identifying the action instruction, hexadecimal number, blue bold, such as: 1A 54 00. Parameter: Instruction input parameter.</p> <p>Parameter definition:</p> <p>Single-byte parameters: A specific character represents a single byte, such as Rotate, which represents a rotation and occupies one byte.</p> <p>Double-byte parameters: A specific character is combined with _L and _H, which in turn indicates the lower and upper bytes of the parameter. For example, x_L and x_H sequentially indicate the lower byte and upper byte of the 2-byte parameter X.</p> <p>Unit: Point. 1 point = 0.125mm.</p> <p>Range definition:</p> <p>x range of values:</p> <p>{a, b} :x = a or x = b;</p> <p>[a, b] :a ≤ x ≤ b;</p> <p>(a, b) :a &lt; x &lt; b;</p>
Range of parameters	
Defaults	
Support model	
Notice	
examples	

## Page Control command

### Page start command

Name	Page start
Code	<p>Hexadecimal : a: 1A 5B 00</p> <p>b: 1A 5B 01 x_L x_H</p> <p>y_L y_H</p> <p>Width_L width_H</p> <p>Height_L Height_H</p> <p>Rotate</p>
description	Indicates the beginning of a Page, and sets the Page size, reference point coordinates, and page rotation angle.

	<p>a:</p> <p>Input Parameters: None      Return Value: None</p> <p>Remarks: This instruction sets the page to 576 points wide and 1200 points high, and the reference point coordinate position is the upper left corner of the current position. The page does not rotate.</p> <p>b: input parameters:</p> <p>x</p> <p>Page Page Reference Origin Offset The x-axis offset of the upper left corner of the current position of the label sheet.</p> <p>y</p> <p>Page Page Reference Origin Offset The y-axis offset of the upper left corner of the current position of the label sheet.</p> <p>Width</p> <p>Page Page width. The range of x+Width is: [1,576].</p> <p>Height</p> <p>Page Page height. The range of Height is: [1, 1200].</p> <p>Rotate</p> <p>Page rotation angle, Rotate value range: {0,1}. When Rotate is 0, the page does not rotate. When Rotate is 1, the page is rotated 90° to print.</p> <p>Return value: None.</p>
Range of parameters	
Defaults	
Support model	
Notice	
examples	1A 5B 01 00 00 00 00 80 01 40 01 00

## Page end command

Name	Page end command
Code	Hexadecimal : 1A 5D 00
description	<p>Identifies the end of a Page data.</p> <p>Input parameters:</p> <p>no.</p> <p>return value:</p> <p>no.</p>
Range of parameters	
Defaults	
Support model	
Notice	
examples	

## Page Print Command

Name	Page print command
Code	Hexadecimal : a: 1A 4F 00 b: 1A 4F 01 PrintNum
description	<p>Print the contents of the Page onto the label sheet.</p> <p>a:</p> <p>Input parameters:</p> <p>no</p> <p>Return value: None</p> <p>Note: This command only prints the page content once.</p> <p>b:</p> <p>Input parameters:</p> <p>PrintNum</p> <p>Page Page content will print PrintNum times.</p> <p>return value:</p> <p>no.</p>
Range of parameters	
Defaults	
Support model	
Notice	
examples	

## Feed Command

Name	Feed Command
Code	<p>Hexadecimal : a:</p> <p>1A 0C 00</p> <p>b:</p> <p>1A 0C 01 Stop Position</p> <p>Offset_L Offset_H</p>
description	<p>a;</p> <p>Input parameters:</p> <p>no.</p> <p>return value:</p>

	<p>no.</p> <p>Remarks:</p> <p>After receiving this command, the printer feeds paper, and when the label seam is flush with the paper cutting port, the paper feed is stopped. At this time, the printer</p> <p>Current cursor position, 8mm below the label head</p> <p>b:</p> <p>Input parameters:</p> <p>StopPosition</p> <p>Mark the stop position of the paper, the value range: {0, 3}.</p> <p>StopType = 0, stop paper feed at the position where the paper cutting port is flush with the label seam;</p> <p>StopType = 1, the cursor and the label head are at the same level to stop the paper feeding;</p> <p>StopType = 2, stop the paper feed at the position where the paper cutting port is flush with the black mark;</p> <p>StopType = 3, the cursor stops at the same place as the black label is flush with;</p> <p>Offset</p> <p>Identifies the stop position offset. When the printer detects the label head or label, it continues to feed the length of Offset points.</p> <p>return value:</p> <p>no.</p>
Range of parameters	
Defaults	
Support model	
Notice	
examples	1A 0C 01 00 00 01

## Page drawing command

In the following command, all coordinate points whose reference origin is the reference point defined in the Page Start command. The command descriptions Page\_Width and Page\_Height represent the page width and height defined in the respectively.

## Text drawing Command

Name	Text Drawing Command
Code	Hexadecimal :

	<p>a.</p> <p>1A 54 00 x_L x_H y_L y_H String00</p> <p>b :</p> <p>1A 54 01 x_L x_H y_L y_H FontHeight_L FontHeight_H FontType_L FontType_H String00</p>						
description	<p>a.</p> <p>Input parameters:</p> <p>x Defines the x coordinate of the starting position of the text. Value range: [0, Page_Width-1];</p> <p>y Define the starting position of the text y-coordinate, value range: [0, Page_Height-1];</p> <p>String00 The stream of text string data to be terminated at 0x00 for printing.</p> <p>return value:</p> <p>no</p> <p>Note: Text is cut off and printed when the sum of the text width and the text start coordinate x is greater than the page width.</p> <p>b.</p> <p>Input parameters:</p> <p>X Defines the x coordinate of the starting position of the text. Value range: [0, Page_Width-1];</p> <p>y Define the starting position of the text y-coordinate, value range: [0, Page_Height-1];</p> <p>FontHeight Text character font height, valid values range {16, 24, 32, 48, 64, 80, 96} (individual models {16, 17, 18, 24}).</p> <p>FontType Text character effects, you define as follows::</p> <table border="1"> <tr> <th>Data bits</th><th>definition</th></tr> <tr> <td>0</td><td>Bold flag: set 1 font bold, clear font is not bold.</td></tr> <tr> <td>1</td><td>Underline flag: Set to 1 underlined text, clear to zero underlined.</td></tr> </table>	Data bits	definition	0	Bold flag: set 1 font bold, clear font is not bold.	1	Underline flag: Set to 1 underlined text, clear to zero underlined.
Data bits	definition						
0	Bold flag: set 1 font bold, clear font is not bold.						
1	Underline flag: Set to 1 underlined text, clear to zero underlined.						

	2	Reverse white flag: Set 1 text against white (white on black), clear is not inverted.
	3	Delete line flag: set 1 text with strikeouts, clear without delete line.
	[5,4]	Rotation flag: 00 Rotation 0°; 01 Rotate 90°; 10 Rotate 180°; 11 Rotate 270°. (When the need to rotate is the need to pay attention to the starting point coordinates)
	[11,8]	Font width magnification;
	[15,12]	Font height magnification;
<p>The stream of text string data to be terminated at 0x00 for printing.</p> <p>Return value: None.</p> <p>Remarks:</p> <p>When the sum of the text width and the text start coordinate x is greater than the page width, the text is truncated and printed.</p>		
Range of parameters		
Defaults		
Support model		
Notice		
examples	<p><b>A:</b></p> <p>1B 40 1a 5B 01 00 00 00 00 80 01 40 01 00</p> <p>1A 54 00 00 00 00 00 B0 AE CE D2 D6 D0 BB AA 00</p> <p>1a 5d 00</p> <p>1a 4f 00</p> <p><b>B:</b></p> <p>1a 5B 01 00 00 00 00 80 01 00 01 00</p> <p>1A 54 01</p> <p>00 00</p> <p>00 00</p> <p>60 00 00 00</p> <p>C4E3BAC3 00</p> <p>1A 54 01</p> <p>18 00</p> <p>00 00</p> <p>60 00 00 00</p> <p>C4E3BAC3 00</p> <p>1A 54 01</p> <p>a0 00</p>	

	<b>00 00</b> <b>60 00 10 33</b> <b>C4E3BAC3 00</b> <b>1a 5d 00</b> <b>1a 4f 00</b>
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## Line drawing Command

Name	Line Drawing Command
Code	<p>Hexadecimal : a.</p> <p>1A 5C 00 StartX_L StartX_H  StartY_L StartY_H  EndX_L EndX_H  EndY_L EndY_L</p> <p>b.</p> <p>1A 5C 01 StartX_L StartX_H  StartY_L StartY_H  EndX_L EndX_H  EndY_L EndY_H  Width_L Width_H  Color</p>
description	<p>Draw a line segment between two points specified on the Page.</p> <p>a.</p> <p>Input parameters:</p> <p>StartX  The x coordinate value of the starting point of the straight line segment. The value range is [0, Page_Width-1].</p> <p>StartY  The y coordinate value of the starting point of the straight line segment. The value range is [0,Page_Height-1].</p> <p>EndX  The x-coordinate value of the end point of the straight line segment. The value range is [0, Page_Width-1].</p> <p>EndY  The y coordinate value of the end point of the straight line segment. The range of values is [0, Page_Height-1].</p> <p>return value:</p> <p>no.</p>



	<p>b.</p> <p>Input parameters:</p> <p>StartX The x coordinate value of the starting point of the straight line segment. The value range is [0, Page_Width-1].</p> <p>StartY The y coordinate value of the starting point of the straight line segment. The value range is [0,Page_Height-1].</p> <p>EndX The x-coordinate value of the end point of the straight line segment. The value range is [0, Page_Width-1].</p> <p>EndY The y coordinate value of the end point of the straight line segment. The range of values is [0, Page_Height-1].</p> <p>Width Line segment width, value range: [1, Page_Height-1].</p> <p>Color Line segment color, value range: {0, 1}. When Color is 1, the line segment is black. When Color is 0, the line segment is white.</p> <p>Output parameters:</p> <p>no.</p>
Range of parameters	
Defaults	
Support model	
Notice	
examples	<p>1B 40 1a 5B 01 00 00 00 00 80 01 40 01 00</p> <p>1A 5C 01 00 00 00 00 00 01 00 00 30 00 01</p> <p>1a 4f 00</p>

Draw a rectangle with a segment instruction

1B 40 1a 5B 01 00 00 00 00 80 01 00 01 00

1A 5C 01 10 00 10 00 00 01 10 00 04 00 01

1A 5C 01 10 00 10 00 10 00 c0 00 04 00 01

1A 5C 01 10 00 c0 00 00 01 c0 00 04 00 01

1A 5C 01 00 01 10 00 00 01 c0 00 04 00 01

1a 4f 00

## Rectangular box drawing Command

Name	Rectangular Box Drawing Command
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