File	Operation Manual of the HD2014 LED Control System
Version	English
Page	1-35

HD2014 Operation Manual

Contents

Contents	2
Appendix 1 Types of Control Card	4
Appendix 1.1 Types of control card	4
Chapter 1 Overview	6
1.1 Features	6
1.2 Operating environment	6
Chapter 2 Installation and Uninstallation	7
2.2 Uninstallation	7
Chapter 3 Tools Help	8
3.2 Title bar	8
3.3 Menu bar	9
3.3.4 Tool	14
3.3.5 View	14
3.3.6 Language menu	14
3.3.7 Help menu	15
3.4 Toolbar	
3.5 Analog display	15
3.6 Display attribute column	16
3.7 The use of remote control	17
Chapter 4 Creation Process of Screen Program	17
4.1 Create new screen (the first-level content)	
4.2 Create new program (the second level content, a screen can create 200 progra	ms.) 19
4.3 Create new area (the third-level content, each program can be set to 8 areas.)	
4.4 Finished programs	
Chapter 5 Display Different Content	20
5.1 Single-line text display	20
5.2 Multiline text display	22

5.3 Hypertext display	22
5.4 SWF	23
5.5 Time display (calendar time)	
5.6 Clock display (analog clock)	24
5.6 Clockwise / counter-clockwise count display	25
5.7 Temperature display (Sensor is required to buy.)	25
5.8 Animated character display	
Chapter 6 Communication Settings	27
6.1 Production of Serial line	27
6.2 Communication settings (serial port)	
6.3 Production of network line	
6.4 Communication settings (network interface)	29
6.5 Communication settings (WIFI)	
Appendix 2 Common Settings during Use	
Appendix 2.1 How to remotely upgrade the control card?	
Appendix 2.2 How to restore the controller card to factory settings?	31
Appendix 2.3 How to test screen with the control card?	
Appendix 2.4 Time switch for screen	32
Appendix 2.5 Play screen at a specified time	
Appendix 2.6 How to set subtitles to be stationary?	
Appendix 2.7 Export to U disk	33
Appendix 2.8 Common solutions to uneven luminance on the screen	
Appendix 2.9 Operation of buttons on the control board	34

Appendix 1 Types of Control Card

Appendix 1.1 Types of control card

Serial port	HD-S3	Single color: 1024*32 Dual color: 512*32 1024*16	2 of HUB12 1 of HUB08
Controller	HD-M3	Single color: 768*64 1024*48 1536*32 Dual color: 384*64 512*48 768*32 1536*16	4 of HUB12 2 of HUB08
	HD-A40	Single color: 768*32 1024*16 Dual color: 384*32 768*16	2 of HUB12 1 of HUB08
USB port Controller	HD-Q40	Single color: 512*64 1024*32 1536*16 Dual color: 256*64 512*32 768*16 Tri color: 128*64 256*32	4 of HUB12 2 of HUB08
	HD-U40	Single color: 640*128 1280*64 2048*32 Dual color: 320*128 640*64 1280*32 Tri color: 416*64 832*32	8 of HUB12 4 of HUB08
	HD-A41	Single color:1024*32 Dual color: 512*32 1024*16	2 of HUB12 1 of HUB08
USB+Serial port Controller	HD-Q41	Single color:768*64 1024*48 1536*32 Dual color: 384*64 512*48 768*32 Tri color : 512*32 512*16	4 of HUB12 2 of HUB08
4 / 35	HD-U41	Single color:1280*128 1696*96 2048*64 Dual color: 640*128 848*96 1280*64 Tri color : 800*64 1600*32	8 of HUB12 4 of HUB08

	HD-X40	Single color:640*256 1280*128 Dual color: 320*256 640*128 Tri color: 416*128 832*64	1 of 50PIN
	HD-X41	Single color:1024*256 2048*128 Dual color: 512*256 1024*128 Tri color: 672*128 1344*64	1 of 50PIN
	HD-G3	Single color:1024*512 2048*256 4096*128 Dual color: 512*512 1024*256 2048*128 Tri color: 680*256 1360*128	2 of 50PIN
	HD-E40	Single color:2048*64 2048*32 Dual color: 1024*64 640*32 Tri color: 1360*32	4 of HUB12 2 of HUB08
USB+Ethernet	HD-E41	Single color:2048*128 2048*64 Dual color: 1024*128 1024*64 Tri color: 1360*64	8 of HUB12 4 of HUB08
port Controller	HD-E42	Single color:1024*256 3072*128 Dual color: 512*256 1536*128 Tri color: 672*128	1 of 50PIN
	HD-E43	Single color:1024*512 2048*256 4096*128 Dual color: 512*512 1024*256 2048*128 Tri color: 672*256 1344*128	2 of 50PIN
	HD-E53	Single color:2048*512 4096*256 8192*128 Dual color: 1024*512 4096*128 8192*64	2 of 50PIN

		Tri color: 1344*256 2720*128	
WIFI	HD-W40	Single color: 640*64 832*48 1280*32 Dual color: 320*64 416*48 640*32 Tri color: 416*64 848*32	4 of HUB12 2 of HUB08
Controller	HD-W42	Single color:416*256 832*128 2048 *48 Dual color: 208*256 128*416 832*64 Tri color: 272*128 544*64	1 of 50PIN

HD2014 add new functions:

- 1. The controller recognized serial port automatically
- 2.Support animation font,hollow font,describe font border(stroke)
- 3.District boarder and background
- 4.Time,Clock,Count,Temperature font of free size
- 5.Add Time zone, show different country time
- 6.Abundant Clock functions and back ground
- 7.Add Remote control funtions of the controller
- 8. The controller itself have single dual color and tricolor firmware
- 9.Add larger Ethernet port controller and WIFi Controller and USB port

Chapter 1 Overview

1.1 Features

"HD2014" Control System is a larger adjustment made by Huidu Comp any to strip screen market in 2014. For the convenience of customers' c hoices, some of the repetitive controllers are integrated, and the control r anges are updated more flexibly besides, prices are more reasonable. S o it is enough to meet the trend of higher and longer strip screen.

The overall software interface is simple, powerful, easy to learn and use. it Support Single color and dual color led modules, also full color mo dules (showing 7 color effects)

Support functions as single-line text, multi-line text, Excel.hypertext (JPG /JPEG/BMP/GIF/PNG etc.),swf, time、clock、count (count down / count up), temperature, temperature and humidity, animated characters,Excel.

1.2 Operating environment

HD2014 software support all language showing Operating system:

Chinese/English (multi-lingual) Windows2000/XP/Win7/Vista/WIN8, etc.;

6 / 35

Hardware configuration: no special requirements.

Chapter 2 Installation and Uninstallation

2.1 Installation

Software Name HD2014 (HD2014_V1.01.891.zip). Double click the software and install as below steps:



Click the prompt (Next) on the screen to complete the installation.

After the "HD2014" software is successfully installed, the "HD2014" pro gram group will be shown in the [Start] / [Programs], then click "HD201 4" to run it, you can also click the HD2014.exe shortcut on the desktop to enter the operating interface.

2.2 Uninstallation

"HD2014" software package provides a complete uninstallation function,

so that users can easily delete all documents, program groups and sho rtcuts in the "HD2014". Users can select "Uninstall HD2014" in the [Start] / [Programs] / HD2014 program groups to completely remove HD2014 a nd all of its components.

HD2014 Ur	ninstall	1.000		×
?	Are you sure you wa components?	ant to completely ren	nove HD2014	4 and all of its
			Yes	No

Chapter 3 Tools Help

3.1 The main interface of software

Open the main interface of the "HD2014" software, see below:

∞ - HD2014 Title Bar File(f) Settings(S) ew(V) Language(L) Help(H) □ Program Text ▼ Mypertext ØTime ▼ Temp @ Animated characters	Menu Bar
Screen-1: 1280 X 320 Single Color	
Screen-1	
Program Area	Analog Screen
i logiali i viod	Preview Window
Screen Parameters	function navigator
Width: 1280	Screen Settings Communication Se Clear disples
Height: 320	Time Setting Luminance Setting Time Switch
Color: Single Color	
Communication mode:COM Port,UDisk	Screen test OpenScreen CloseScreen
Communication settin	gs port, double-click it to open t
COM5 57600 Open	ttings
The communication se	aunys.

3.2 Title bar

It is used to display the name of the software.

3.3 Menu bar

It includes these options: File, Settings, Operation, Tools, View,, Langu age and Help.

3.3.1 File menu

The file menu consists of five options: New Screen, Open, Save, Save As, Exit, as follows:

22 HD 2014	
File(F) Settings(S)	Operation(O) Tools(T) View(V)
New Screen(N)	
Example 🕨	Example-1.hd3
🛀 Open(0) Ctrl+0	Example-2.hd3
🔚 Save (S)	Example-Cross Screen-1.hd3
🔍 Save As	
🔀 Exit(E)	

New Screen (Ctrl + N): It is used to create a new screen, HD2014 soft ware could set up more screens and do not permit the quantity. **Example:** You can set up as examples.

Open (Ctrl + O): It is used to open the recently used documents;

Save (Ctrl + S): It is used to save the current file and save it in the Pr oject file under the installation path by default;

Save As ...: The current file can be saved in another specified position; **Exit (E)**: Close HD2014.

3.3.2 Settings menu

This menu includes Screen Settings, Communication Settings, System Settings, Readback, local IP Settings, as follows:



Screen Settings: It used to set the basic parameters of the control card and Select the led control card types, Date and OE Polarity, Scan, Wi dth and Height of led display, importing and exporting parameters , Adva nced setting etc) see below photo:



Note: If user do not know the led control card types, just select HD-E43 it is ok(our software default types HD-E43,do not need select types) First, select the module type, which one you used ;

The second step, the basic settings, select the parameters for the LED screen, color screen, data polarity, OE polarity, screen size, scan mode;

-Basic Settings -	Basic Settings	1		Help
Unit board			Color	
φ 3. 75 (φ 5) Width 128	Monochrome in	Height	Single Color 🛛 👻	1234
Addition 🕈	al se			

Basic Settings	
Unit board	Color
64 X 32	Single Color
Width Height	
128 X 32	Send parameters
Additional settings	
Scan Mode	OE Polarity Data Polarity
[A1]Scop(1/16) General interior s	🗸 Low Enable 👻 Low Enable 💟
[Arjbean(I) IO) General Interior 3.	
Automatically search the scan mode	Communication Sett
Automatically search the scan mode	Communication Sett
Automatically search the scan mode	Communication Sett Advanced Settings Readback

Communication Settings: he below used Serial port of RS232 communication . The communication distance it is 70meters.

After connected the serial lines ,the software itself recognized the port a utomatically, no need by hand

rial Port Settings E	thernet		
СОМ	C0M5 -	Search	
Baudrat	115200		
Alter Baudr:	Settings	115200 💌	
		OK	Cancel

:

Communication Setting Ethernet	
Send broadcast message	Customize Various IPs of the control card can be s
Similify mode s and update firmware	will autom et in this mode, but they are controlled r
	espectively; firmware cannot be updated.
	OK Cancel
Communication Setting	
WIFI	
Detect su	ccessfully after the wireless network emitt
etecting ed by WII ssly.	FI card is connected and transmits wirele

System Settings: They are used to set the system parameters (not recommended to change).

System Settings	
Text Processing Scan 30 -	Filter Color 🔳 Black 👻
Picture Processing Scan 127 -	Filter Color 🔳 Black 👻
Adsorb	Exchange blue and green is contrary, you can choos e this to change
Text Direction Unspecified	☑ Open the Ad
Password Settings Enable the password authenticat	When communication is go od,software calibrate time f or five minutes
	OK Cancel

Readback: If you need to alter the parameters to those of the control c ard, these parameters can be directly read back, so convenient and dire

ct.

Local IP Settings: Users can alter the system's local IP.

3.3.3 Operation menu

It contains Send Project, Multiple Send, Clear display data, Export to U disk, IP Management tools, Time Setting, Luminance Setting, Time Swi tch, Screen Test, Firmware Update, See below:



Multiple Send: It's for network card's exclusive use, and used for sendin g multiple screen files. X Firstly, set the parameters of each screen to c ustom IP, then associate with the corresponding screen. Please refer to t he operation of IP management tools:

After finishing the association, users can send the content of multiple s creens to control card through multiple send, see below:

Multi-screen mode: communication must use a custom setting mode, an d associated with each IP address on a display screen;

Copy mode: Select to send the display, the display is sent to all the control card, requires current IP address PING is good.

e selection	Copy mode	▼ Screen-1	•
Screen	Multi-screen mode Copy mode	Schedule	Status

Clear display data: Clear the programs inside the control card (restore t o factory settings);

IP Management tools: They are for network card's exclusive use, and u sed for distributing the IP addresses of different network cards and asso ciating with the related screens:

Import screen params from U disk:

First, U disk on a good LED display

Second, U disk on the computer

Finally, the operation "Import screen parameters from the U disk." **Time Setting**: You can set the time of control card according to your re quirement or, to the system time by default.

Luminance Setting: You can set the luminance of screen through serial port or network port, Luminance can also be updated by U disk ;

Time Switch: Set the time to power on and power off the screen; **Screen Test**: Testing screen by software;

Firmware Update: (First need got the firmware information, if need upda ted new version, it could be, we suggest do not updated

3.3.4 Tool

It includes notepad, calculator, drawing tools, which are used to open t he practical tools on the system. The newly added drawing tool can sav e the data by printscreen more conveniently.

3.3.5 View

It contains analog screen's Zoom out, Zoom in, Center, Output and Ap ply the program's appearance.

Output Window: When opening the output window, you can view the ty pe of the current connected control card and the screen size, color par ameters of the program in the control card; during sending, you can vie w the process and know whether the sending is success. It cannot oper ate normally until you update the firmware that is required to be update d; when you are indicated that the sending is overtime, please check w hether the line is normal.

3.3.6 Language menu

This menu includes ten languages: Simplified Chinese, Traditional Chinese, English, Russian, Turkish, Iranian, Polish, Spanish, Japanese, Mongolian, etc.. It is used for switching among different languages.

3.3.7 Help menu

It is used for viewing the version number of HD2014 software;

3.4 Toolbar

Toolbar includes Programs, Text, Hypertext, Time, Temperature, Animat ed characters, Send, Adjust Time, U disk and Preview tools, as follows: Program Text * TyperText * Traperature and Characters K Excel Send Adjust Time of U Disk O Preview

Program: It is used to create a new program (This program is the subdi rectory of the screen.);

Text: It is used to create a single-line area or a multi-line text area; only pure texts can be edited in the single-line text area, while in the multi-line text area both texts and tables can be edited;

Hypertext: It is used to create an image-text area (Pictures and hypertexts can be inserted.)or swf area;

Time: Create a new time area or clock area, count area. Time area is u sed to display the system time (calendar mode); clock area is also used to display the system time (multiple round clock forms); count area is u sed to display the clockwise/ counter-clockwise count;

Temperature: Create a temperature area or temperature and humidity ar ea, and use it to display the current environment temperature (Temperature re sensor module is needed.);

Animation characters: Create an animated character area, where you c an build hollow characters, stroke font, and set various special effects, s uch as waves, swing, vertical/horizontal rotation, zooming, character rotati on, scrolling, flying to left/right, flash, output character by character, swin g from one side to the other, elastic characters.

Send: It is used to send the current screen file;

Export: It's for U disk card's exclusive use, save the currently displayed file and time into U disk (U disk is updated.);

Adjust Time: Adjust the system time (adjust the time of control card to be synchronized with that of computer);

Preview: Preview the current program (Note: You can preview only when one program is selected.).

3.5 Analog display

Screen-1	Screen-1: 640 X 256 Full	Color - Program-1		
⊡ I O Program-1			Name	Email
	· ·		Almee	Almee, huidu@vahoo.c
Excel-1 SWF-1 Time-1 Multiline text-1	2014/09/15 Thursday	T TANK	Bunny	<u>Bunny, huidu@vahoo.c</u>
Screen-2	2014/05/15 Thursday 15:26:17		New s leatun lo use card o	oftware , new es , welcome the control f Huidu1
۲ (III) ۲	ि ि २ २ २ २	↓ ⊕ 1/30 → ∰ ✓ Adsorb		

Note: the rational use of analog tools can help you edit screen file more conveniently, including zoom in/out the analog window, move around the current area, turn page of the screen content, etc..

3.6 Display attribute column

In this column, you can set the screen parameters, communication, tim e, luminance, time switch and clear display data, , test screen, turn on/o ff the screen and so on.

Creen Parameters Module:HD-A40	function navigator
Width: 32 Height: 16 Current screen p	Functional navigation
Communication mode:	Screen test OpenScreen CloseScreen

Current screen parameters: They are changed according to screen par ameter settings;

Functional navigation: It includes screen parameter settings, communica tion settings, clear display data, time settings, luminance settings, time s witch, screen test, turning on/off the screen, etc..

3.7 The use of remote control



An infrared probe needs to be welded, please operate the remote cont rol as follows:

Power: Switch display Down:next program Right: Increase brightness 1-99: Choose program

UP: Previous program Left: Decrease brightness Play:Screen test

Chapter 4 Creation Process of Screen Prog

ram

4.1 Create new screen (the first-level content)

Methods: Click File - New screen (The password is 168 or 188.), the pop-up settings page is as below:

	Basic Settings				
Iodule					
🔵 Default	💿 Gen4	HD-U41	O Gen3	HD-S3	~
Maximum ra	inge:Single Color->1	28*1280px Dual Color->12	3*640px		
4aximum re	gion:8				
∕laximum w	idth:2048 Maximum I	height:128			
Communicat	tion Mode:COM Port	U Disk			
ET M		the first state and and			

Module Selection: Select the type of your control card, and c lick "Next";

Basic Settings: They are mainly used to set data polarity, col or, OE polarity, screen width, screen height, scan mode and w hether to use the 138 decoder;

Before setting, you need to know the correct attributes of eac h parameter, or the error will cause wrong display;

Troubleshooting:

Incorrect setting of data polarity will lead to black characters o n a red background;

Incorrect setting of the 138 decoder will cause non-display or wrong display:

Incorrect setting of color may cause the value of screen heigh t or screen width return to the previous one;

Incorrect setting of OE polarity will lead to uneven luminance, namely, some lines are bright, while some lines are dark;

Incorrect setting of scan mode will cause messy codes;

Advanced Settings: They are used to fine-tune parameters, b ut no change is recommended under normal conditions;

а

Screen-2	
The new screen	
Screen Parameters Module:HD-G3 Width: 1280 Height: 320 Color: FullColor Communication mode:COM Port;UDisk	function navigator Screen Settings Communication Se Clear display data Time Setting Luminance Setting Time Switch Screen test OpenScreen CloseScreen

4.2 Create new program (the second level content, a scr een can create 200 programs.)

Methods: Click the "program" on the shortcut bar (Premise: select a sc reen first), as below:

🛄 Program 📲 Text 👻 Hypertext 🖉 Time 🗸 🚦 Temp 🔞 Animated characters 💿 Send 💥 Adjust Time 😈 U Disk 💻 Preview

New program is as below, including the border - sub-period settings.

×						
	Creen-1		_			
ē 🌆 S	creen-2					_
	Program-	At	most 200	new programs car	be created h	
		ere	Э.			
Play Mode	Play Time			Border Setting		
Fixed Time	2014/ 5/15	To 2014	4/ 5/22 □ →	E Border		
600 Sec	Specified Time			(a) Solid α	- Rei - O Tridolr	1
	0:00:00	To 23:5	9:59			
Play at a	Monday	Tuesday	Wednesday	🔿 Parti-o 🛛 ———————————————————————————————————	- Custom	
	Thursday	Friday	V Saturday			Cladavisa ratatis
tixed time				Speed	Effect	Clockwise rotatic *

Note: Each of the 200 programs can set different attributes, which includ e play mode, border settings (over 200 kinds) and play time (specified ti me period).

4.3 Create new area (the third-level content, each progra

m can be set to 8 areas.)

Sunday

fixed time

Methods: First, select the program, click text, hypertext, time, clock, co 19 / 35



unt, temperature, etc., then create different types of areas, see below:

4.4 Finished programs

After the three steps above, we've created a screen file, if we need to create more programs, just repeat the second and third steps above (s everal programs can be played on a same screen); If you need a softw are to control multiple screens, you will have to create more screen files, then just repeat these three steps;

Save the programs into disk after completing them (They are stored in the Project file under the installation path by default, or in the specified directory through the file menu.). By previewing, you can view the dyna mic image of each program at real-time and set the display mode; if sati sfied, you can send it to screen through the "Send" button.

Chapter 5 Display Different Content

5.1 Single-line text display

For pure text display, we can simply use the single-line text areas, but this area does not support the Enter key.

Steps: Please refer to 4.1 and 4.2 to create screen program;

Click "Text", then select "single-line text", a single-line text area will ap pear (The coordinates, length and width can be set freely.)

		Text - Single-I	HyperTex ine text e text	x t			
Program	hoose program n-1 n-2 Program-1	creen-2: 384 X	32 Full Color -	Program-1	Animated Ch	naracters	
Region Position Origin X: 0	Effect Settings	Border: 1	Arial	• = = = = =	17 • Red B I U 0	▼ 🚖 🔳 Bla	ck ▼
Origin Y: 0 Width:	☐ Display Static Display: Speed: Display Static → 30 →	Random Stop over: 3	1234	567890231	54647897	'46	
Height: 32	Clear screen: Speed: Do not dear ▼ 20 ▼	Additional set	ttings->				

Note: For pure text, we suggest editing it in the single-line text area (Th is is the simplest setting.). HD2014's software editor is so powerful that you can alter single text and adjust it to center, and edit the character s pacing as well as line spacing.

If the display mode is "Continuous move to left", and the option "End t o end" is selected, the content displayed on the screen will be kept mo ving to left; if you don't select "End to end", the content will be output; it will display continuously if there is a blank key.

Region Position Origin X:	Effect Settings	Border:
410	Continuous move	¥.
Origin Y:	Display Static	Random
128	Display: Speed:	Stop over:
Width:	Display Static V 30	▼ 3 sec
230		
Height:	Clear screen: Speed:	_
128	Do not dear 🔻 20	Additional settings->

The following shortcuts are added in the text edit box, all of single-line texts, multiline texts and animated characters are supported:

- Ctrl + A: Select All
- Ctrl + Z: Cancel the current operation
- Ctrl + C: Copy
- Ctrl + V: Paste

5.2 Multiline text display

In the multiline text area, you can use the Enter key to switch to a ne wline, open the *.hf file and add pictures, tables are also supported her e.



Stroke is unavailable when it is the single color.

As the green arrow in the figure above shows, you can add pictures, create tables and open the *. hf file by clicking the edit box.



Insert: All of TXT documents, LOGO or picture (only JPG, BMP, PNG a nd GIF formats), *. HF and RTF files can be inserted.

5.3 Hypertext display

If you want LOGO or picture (only JPG, BMP, PNG and GIF formats) to be displayed on the screen, how to set? Steps are as follows: Steps: Please refer to 4.1 and 4.2 to create screen- program;

After clicking the "Hypertext", a hypertext area (The coordinates, length and width can be set freely.) will appear, then you can add the pictures to be displayed to the bottom file list, see below:

	• P • • • •	rogram Te Choose Screen-1	nxt ▼ 🎦 Hyr progra 🖉 H Ø S\	vperText VF	
Region Position Origin X: 0	Effect Settings	Border:	File List	C:\Users\Administrator\AppData\Roaming\HD2	1014\ProjFile\Hypertext\hypertext126.hf
Origin Y: 0	Display Static Display: Speed:	Random Stop over:	Delete		
Width: 192 Height:	Display Static Jospia Streen: Speed:	3 sec	Move Up		
16	Do not dear 🔹 20 💌		Move Down		

5.4 SWF

Steps: Please refer to 4.1 and 4.2 to create screen program;

Click "HyperText", then select "SWF", a SWF area will appear (The co ordinates, length and width can be set freely.)

	224			
	File(F)	Settings(S) Op	eration(O) Tools(T)	
	🔵 Progra	am 🚺 Text 🕶	💶 HyperText 👻 🥑	
	× 🔎 🛽	Choose progra	HyperText	
		reen-1	SWF SWF	
Region Position				
Origin X	🕅 Border		Path	
138		Play	E:\ \flash\flash2376.swf Add file	
Origin Y	Speed	Filter red		
128	4 🔹			
Width	Total frames	Filter green		
272	50% 🔻		Note: If you can not get the correct image, check the recording option	15.
Height	Record	Filter blue	Hotel 11 you can not get the concerninger check the recording op to	
128	3 * sec			

5.5 Time display (calendar time)

Time display of screen is similar to text and hypertext display, just clic k the time area, steps are as follows:

Steps: Please refer to 4.1 and 4.2 to create screen-program;

After clicking "Time", the time area (The coordinates, length and width can be freely set.) will appear. Just set the position, so easy! See belo w:



	Screen-1 Preview calenda time	ar Scree	en-1: 128 X 64 Ful	IColor	
Region Position	Time Parameters			F	ont
Region Position Origin X	Time Parameters Display	Spacing	Border	F	iont
Region Position Origin X 0	Time Parameters Display Multiline display	Spacing	Border		ont 宋体 •
Region Position Origin X 0 Origin Y	Time Parameters Display Multiline display V Show Date	Spacing 1	Border		ont 宋体 ▼
Region Position Origin X 0 Origin Y 128	Time Parameters Display Multiline display Show Date YYYY/MM/DD	Spacing	☐ Border Time lag 0 ▼	Hour	ont 宋体 ·
Region Position Origin X 0 Origin Y 128 Width	Time Parameters Display Multiline display Show Date YYYY/MM/DD Show Week	Spacing ▼ 1 ▼ Red ▼	☐ Border Time lag 	Hour f	ont 宋体 ▼ B U Font Size
Region Position Origin X Origin Y 128 Width 138	Time Parameters Display Multiline display Show Date YYYY/MM/DD Show Week Monday	Spacing 1 Red •	☐ Border Time lag 0	Hour f	iont 未体 B Eont Size 21
Region Position Origin X 0 Origin Y 128 Width 138 Height	Time Parameters Display Multiline display Show Date YYYY/MM/DD Show Week Monday Show Time	Spacing 1 Red • Cyan •	☐ Border Time lag 0 0	Hour (iont 宋体 ・ B <u>U</u> Font Size 21 ・

5.6 Clock display (analog clock)

The clock display is similar to text and hypertext display, just click the clock area, the steps are as follows:

Steps: Please refer to 4.1 and 4.2 to create screen-program;

After clicking the clock, a clock area (The coordinates, length and widt h can be freely set.) will appear. It's very simple to set, just set the position, as below:





5.6 Clockwise / counter-clockwise count display

The screen displays clockwise / counter-clockwise count.

Steps: Please refer to 4.1 and 4.2 to create screen-program;

After clicking "Count", a count area (The coordinates, length and width can be freely set.) will appear, as below:

	🗂 Program 📲 Text	👻 🍱 Hyper	text 🕗 Time	👻 👃 Temp	
	×		Tim	e	
	C Scroop 1		🖸 🖸 Clo	ck 🛛	
	e-V C Program	n-1	Cou	Int	
🛄 Program 🗱 Text 🖷	🕶 🏧 Hypertext 🕖 Time 👻 🜡 T	emp 🔞 Animated charac	ters 😋 Send 💥 Adj	just Time 🛛 U, V Disk	Preview
×	Screen-1: 256 X 128 FullCo	lor			
Preview col	untdown	23 Hour	54 Min	ute 14	second
Region Position	Timing Set			- 10	
Origin X	Target Time	Font		Border	
0	2014/ 5/16 - 9:39	:17 🊔 🗼 宋体	▼ 9 ▼		
Origin Y	Timekeeping Mede	Clock co	lor.	Earoaround	
Origin Y 0	Timekeeping Mode	Clock co	lor	Foreground	A v. 0
Origin Y 0 Width	Timekeeping Mode Count down		i 👻	X: 0	▲ Y: 0 ▲
Origin Y 0 Width 192	Timekeeping Mode Count down Display Mode	Clock co	ior i 🗸 🗸	Foreground X: 0 Background	× Y: 0 ×
Origin Y 0 Width 192 Height	Timekeeping Mode Count down Display Mode English	Clock co Rec Text Col	lor 1 1	Foreground X: 0 Background X: 0	× Y: 0 ×

5.7 Temperature display (Sensor is required to buy.)

The screen displays the current environment temperature.

Steps: Please refer to the content of 4.1 and 4.2 to create screen-pro gram;

After clicking the "Temperature", a temperature area (The coordinates, I ength and width can be freely set.) will appear, see below:



Pro:	gram 📲	Text 👻 🍱	Hypert	ext 🤇	Time 🔻	👃 Temp	🔞 Animate	d character	s 📀 Sei
×	Screen-1	ogram-1							
± 😱	Screen-2	emp-1							
			#						
Region Rect	t	parameter							
Region Rect	0	parameter Temp unit	ĩc	•	White 🗸	Arial	• 12 •		Black -
Region Rect Origin X Origin Y	0	parameter Temp unit Font Data	で (((((((((((((((((((▼ ▼ 13 ▼ ▲ Y	_ White ▼ _ Yellow ▼ 20	Arial		B Z U 0	Black -
Region Rect Origin X Origin Y Width	0	parameter Temp unit Font Data) Background)	で	▼ ▼ 13 ▼ ▲ Y ▼ Y	Vhite V Vellow V 20 v 0 v	Arial		B Z U 0	Black V

Through the 5.1-5.6 above, you can know that our software can set m ulti-functional as well as multi-regional content, so that it can be enough to meet the applications in various scenes.

5.8 Animated character display



Animated background support SWF, JPG, GIF and BMP. Image package is one or more still images, multi-frame image is a picture with animatio n, SWF is flash files. Multi-frame images and SWF type can only add a picture, image package can add multiple pictures.

Gequ	Path			ОК
				Preview Cancel
				Add
				Delete

Chapter 6 Communication Settings

6.1 Production of Serial line

Our system uses the direct RS232 communication line, see below for the finished line:



6.2 Communication settings (serial port)

Methods: Settings - Communication Settings (Please confirm the drive installed correctly when using a USB instead of the serial port.), see be low:

HD2014 LED Operation Manual of the LED Control System.

			_ Click "Search" to search COM port,
Communication Settin	g		if the line keeps normal for a certai
Serial Fort COM Baudrat	0	Search	n time, the search will automatically succeed.
When the communication line is over 15 meters, please change the baud rate to 1920 0.	udr: Setting		
			OK Cancel

If the communication is free of trouble, the characters "Finish search" will appear; if it breaks down, the characters "Sending is overtime" will be shown on the output window (check whether the communication line i s normal, re-plug the serial line and search again if normal.).

6.3 Production of network line

Network line consists of two kinds: overlapping line (Control card con nects with computer.) and direct line (Control card connects with router.). **Overlapping line:**

The production of two crystal ends is different, one takes TIA/EIA-568 B as standard, the other TIA/EIA-568A standard. It is generally used for the same device, such as PC network card and PC network card, HUB common port and HUB common port.

Direct line:

The production of two crystal ends is the same, both of them take th e accordant standard, for example, both use the TIA/EIA-568B standard or TIA/EIA-568A standard. It is used between PC network card and HUB common port, and HUB common port and HUB cascading port. Direct li ne is used so widely that it can applies to all common purposes. Please use the direct line if the control card connects with a switch.

Use direct line when the control	
card connects with a router or	
switch.	Direct
Use overlapping line when the	
control card connects with P	Cross
C network card.	
198 I A REAL DAY OF A REAL PLACE IN THE REAL PLACE AND A	

6.4 Communication settings (network interface)

6.4.1 Single network communication in LAN

Methods: Settings - Communication settings, please use the Simplify M ode when only one control card is connected to LAN, see below:



6.4.2 Multiple network card communication in LAN

Methods: Settings - Communication settings, when there are multiple n etwork cards to communicate, please use the Customize Mode, as below:

	Deccings	I I						
)Simple m Scan	ode (VDP)				🖲 Custo	mize((TCP)	
Assoc	MAC Add	ress	IP Ad	dress	Subnet M	lask	Default	
								Associate
Advanced :	Settings-		e.				D. 6]	2
192 . 16	aress 8.2.	200		ibnet	50 -	0	. 0 .	0.0
MAC Ad	lre	00-00-00)-00-00	-00			8	
Note: 1. The add succeed. 2. When m	lresses of nultiple de	software ar	nd devid	e will b d simuli	e changed aneously,	toge pleas	ther after se make s	settings ure the MAC
							Setting	s Scan

After completing this setting is, you need to reset the IP of each contr ol card in LAN, the methods are as follows: Click the Operation menu-IP Management tools, see below:

6.5 Communication settings (WIFI)

Methods: Connect to wireless network emitted by WIFI card, and set the screen parameter to W40/W42, then detect wireless network through communication settings; if the detecting is successful, you can communi cate with control card. See below:

	Currently connected to:		
	HD-W42_1002017 Internet access		
	Dial-up and VPN	~	
	HD-W42_1002017	connected	
	TP-LINK_682BB4	Sati	
	circo 915C	itee.	
	zeliang	L Liter	
	Open Network and S	haring Center	
the second	Settings		
mmunication			
IFI			
IFI			
mmunication IFI etecti	ing		
IFI etecti	ing		
mmunication IFI etecti	ing		
mmunication IFI etecti	ing		

Appendix 2 Common Settings during Use

Appendix 2.1 How to remotely upgrade the control c

ard?

Remote upgrade of control card is mainly used for updating the produ ct's features, or dealing with major bugs, while normal use does not nee d to be updated, the specific methods are as follows:

Download the corresponding control card firmware (Each product has a

```
corresponding. Bin file.);
```

Click Operation> Update Firmware (The code is 168.) >Operation Interf ace, see below:

Update	Firmware				×
	View the				
	version of		Update t		
	control c		he contr		
	ard		ol card		
8	\rightarrow		\searrow	1	
Get	firmware vers	ion U	pdate Firmwa	re	Close

Click "Update Firmware" on the interface, select the corresponding bin file, now the operation is completed (Firmware upgrade only can be carri ed out via RS232 or network port, U disk cannot be updated in this wa y.).

Note: Keep the power on and do not pull out the serial line during th e upgrade.

Appendix 2.2 How to restore the controller card to f

actory settings?

There are two ways to restore the control card to factory settings: har dware recovery and software recovery.

Hardware Recovery: Firstly power off > manually press the TEST butt on (do not let go) > power on (do not let go) > hold for six seconds > I et go to finish rebooting.

Software Recovery: Software operation > Clear display data (This ste p is required to be done in the normal communication state.);

Appendix 2.3 How to test screen with the control ca

rd?

There are two ways to test screen: hardware test and software test. **Hardware Test**: Adjust the parameters firstly, press the TEST button of the control card (power-on) and hold it for seven seconds, let go after entering test status, then click eight times for eight different test modes.

Software Test: Software operation> Screen Test> Interface for testing,

as below:			
Operation(C) Tools(T) Vi	ew(Screen test
 Send Ite Multiple Clear Di Export t IP Mana Time Se Brightne Time Sw Screen Update 	m Sending splayed Data o U disk gement Tools ttings ess Settings vitch Fest Firmware		Eight test modes

Appendix 2.4 Time switch for screen

Please refer to 4.1 for screen's time switch settings.

Appendix 2.5 Play screen at a specified time

Please refer to 4.2 for playing screen in a specified period and at a fi xed time.

Appendix 2.6 How to set subtitles to be stationary?

Setting the subtitles to be stationary must be done in the Text windo w, see below:

Screen-1	m-1 elinetext-1		
Region Position	Effect Settings	Border:	Arial
Origin X:	Continuous move	- border.	
192			
Origin Y:	Display Static	Random	
0	Display: Speed:	Stop over:	
Width:	Display Static 👻 30 👻	3 sec	
192			
Height:	Clear screen: Speed:		
80	Do not clear 👻 20 👻	Additional settings->	

Appendix 2.7 Export to U disk

Export Content: After the program is completed, plug the U disk, then j ust select the "Export to U disk"; if the program contains a time area, y ou need to adjust the time before exporting in order to ensure the accur ate time. See below:

		•	Cocal Disk
🖉 Adjust Time	2014/ 5/16 👻	10:40:39	Get system time

Adjust the time for U disk: Select the "Adjust time" before exporting, y ou can use the system time, or set it by yourself.

Luminance Settings: Set the luminance according to your own requirem ent, the current luminance will be displayed when you re-export the cont ent.

Appendix 2.8 Common solutions to uneven luminanc

e on the screen

1, Change the frequency to 100% or other values under the advanced s ettings of screen parameter settings, see below:

Use default setting:	s			
Memory	2M	•		Use 138 decoder
Data Mirror	Low Enable	•		Disable brightness adjust
Button 1	Test	•	Scan Frequency	Auto 👻
Button 2	Infrared ray	•	Latch Polarity	Auto 60Hz 80Hz 100Hz
Line blanking				120Hz 140Hz
System optimization		-	Equilibrium	180Hz 200Hz
Speed first		Ų,	a rational rational rational	Brightness first

2, Set the value of speed and luminance to 5,6,7,8, that is to say, drag the progress bar to the right, as the bottom red box in the picture abov e shows.

3, Modify the value of latch polarity.

Iodule Selection	Basic Settings	Advanced Se	ettings	Readback&Import and Export		
🔲 Use defau	It settings					
Memory	21	1	•		V Use 13	8 decoder
Data Mirror	Lo	w Enable	•		📃 Disable	brightness adjust
Button 1	Te	st	•	Scan Frequency	Auto	•
Button 2	In	frared ray	•	Latch Polarity	Low Enab	le 🔻
Line blanking		0			High Enal Send p	ole Darameters
System optim	ization		_	Equilibrium		
Speed first		65 91 33	Ų		Brightness	first
				8		
				Previous	xt	Finish

4, Switch the value of OE polarity.

Module Selection	Basic Settings	Advanced Settings	Readback&Import and	Export	
Color	Unitb	oard			
Single Color	© Co	ommon unit board	P5 full color Interfac	e 08 32 * 32 👻	
O Dual Color				250	
Full Color	Cu	istom unit board	8 X 8	•	
Screen Paramet	ers	Lt_i_bt			
Number of scre	ens: 48	X 20	<u>▲</u> = 960	Data Polarity:	High Enable 👻
Screen Points:	384	× χ 160	★ = 61440	OE Polarity:	Low Enable 🔻
Scan Mode:		Scan (1/	(16) Full color	*	High Enable Benu parameters
Automatical	ly search the sca	an			ile:
© P10	© P16	P3.75(Φ5)	© P10(08)		
			Providence	Nunt	Finish

Appendix 2.9 Operation of buttons on the control bo

ard

Button S1 / test: 1, Test screen. Press this button for about 3 seconds when the screen is bright, all the lights will turn red, it has entered scre en test at this moment; if you press it again, the red, green, blue and w hite lights will be bright at the same time, see below:



2, Press this button and hold it for about 5 seconds after the control car d is power on, all the contents in the control card will be cleared.

Button S2 / RGB: 1, Switch to previous program:

AQ0 card needs to set the button 2 to "Switch to previous program" und er the advanced settings, and send the content to the control card, now it can be switched normally. See below:

Iodule Selection	Basic Settings	Advanced Set	ttings	Readback&Import and Export		
🔲 Use defau	ult settings					
Memory	21	1	•]		Use 138 deco	oder
Data Mirror	Lo	w Enable	•		Disable brigh	tness adjust
Button 1	Te	st	•]	Scan Frequency	Auto	•
Button 2	In	frared ray	-	Latch Polarity	Low Enable	•
Line blanking	Pr	vitch to previou ogram control	s prog		Send parame	eters
System optim	nization			Equilibrium		
Speed first	1	1 I I I	Ò		Brightness first	
				Previous Next	Fi	nish

E43/G3 cards cannot switch to the previous program normally unless set the button 1 is set to "Program Switching" under the advanced settings, see below:

Nodule Selection	Basic Settings	Advanced Sett	ings	Readback&Import and Export		
🔲 Use defa	ult settings					
Memory	21	1	•]		🔽 Use 138 deco	der
Data Mirror	Lo	w Enable	•		Disable bright	mess adjust
Button 1	Te	est	-	Scan Frequency	Auto	•]
Button 2	Pro	ogram Switching ogram control		Latch Polarity	Low Enable	•]
Line blanking	-	0			Send parame	ters
System optin	nization			Equilibrium	3	
Speed first	Ť.	54 40 SK 40	Q		Brightness first	
				Pressions	The second se	

2, If the S2 button can switch programs normally, please turn the control card off, press and hold this button to turn the power on, three lights o f the control card will be bright and one is dark, now the firmware has been cleared. If you want to use the control card again, you must updat e the latest firmware.

AQ0 card can use this function only when the button 2 is set to "Swit ch to previous program", while E43/ G3 cards must set the button 1 to "Program Switching", see above.