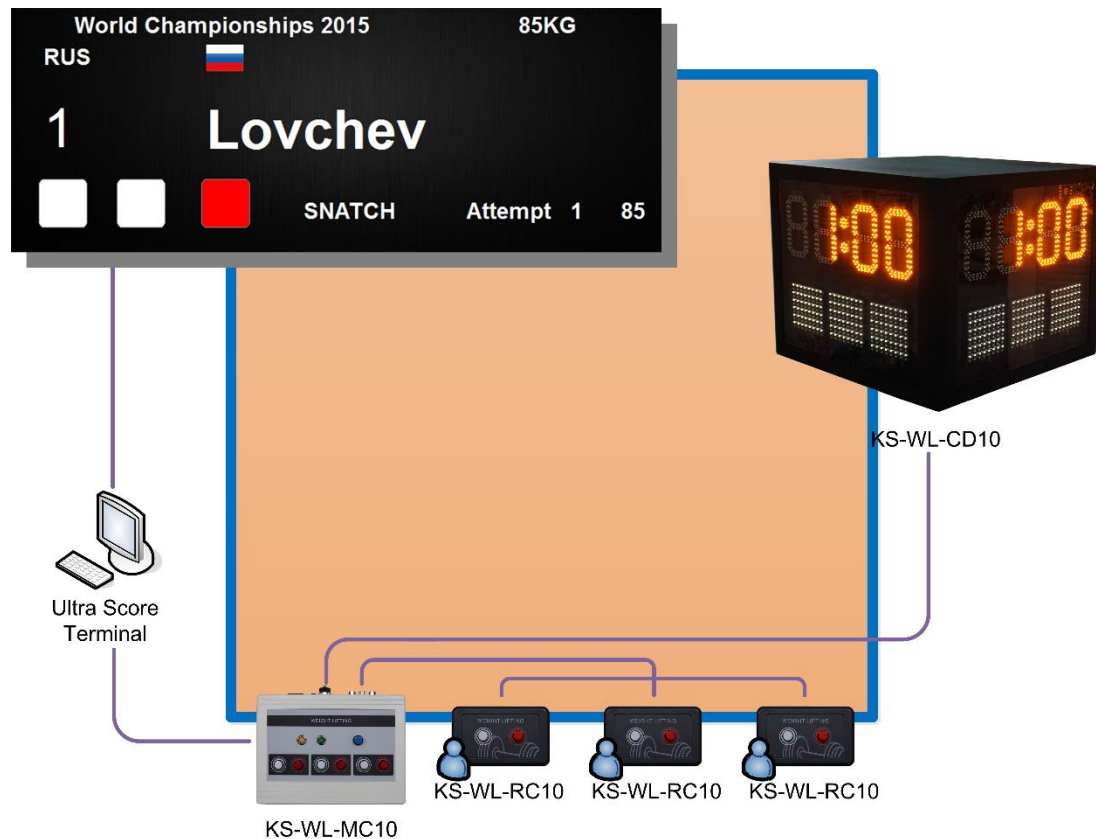


# Scoring & Timing Solution For Weightlifting

This is a general solution for LED display in weightlifting stadium. It has the functions of timing, scoring, arranging the match, displaying advertisement, notification, the information of players and teams. It is an ideal choice for most of stadiums.

## 1. System Chart



### 1.1 Connection Description

- 1) Support for Wrestling referee scoring.
- 2) Display various scoring information.
- 3) Auto generate, export and print the order form.
- 4) Record results, and generate reports.

## 1.2 Product Configuration (for one court)

Product	Type	Number
<b>Match Scoring System</b>		
Ultra Score Software	Standalone Edition	1
Weightlifting Main Controller	KS-WL-MC10	1
Weightlifting Referee Controller	KS-WL-RC10	3
Weightlifting Timer	KS-WL-CD10	1
Meet Management Server	KS-MMS-MINI	1
Score Display Controller	KS-DPC-G	1
PC	/	2
LCD Display	/	1
Printer	/	1
<b>Video Arbitration System</b>		
Video Arbitration Server	KS-PARROT-2C	1
Control Panel	KS-PARROT-CP	1
HD Camera	KS-PARROT-CAMERA	2
Tripod for HD Camera	TRIPOD STANDARD	2
SDI Cable	15m	2
LCD Monitor	21.5 inch	1

## 2. Specification for products

### 2.1 Ultra Score Software

Products	Details
Standalone edition	<ul style="list-style-type: none"><li>◆ Installed on one PC.</li><li>◆ Supports: Weightlifting</li><li>◆ English version</li><li>◆ Including 1 dongle</li></ul>
Network standard edition	<ul style="list-style-type: none"><li>◆ Terminal + 1 Display</li><li>◆ Supports: Weightlifting</li><li>◆ English version</li><li>◆ Including 1 dongle</li></ul>
Network professional edition	<ul style="list-style-type: none"><li>◆ Terminal + Referee + 2 Display</li><li>◆ Supports: Weightlifting</li><li>◆ English version</li><li>◆ Including 1 dongle</li></ul>

#### **Difference:**

##### **Standalone Edition:**

Match management, Scoring, and Media display functions, all in one installed on a PC. Referee must do operation on the PC for display directly.

It is suitable for the stadium where has just one screen, which doesn't have strict needs of the scoring and timing accuracy.

##### **Network Standard Edition:**

Score terminal and media player functions can be installed on 2 PCs respectively. So that one independent PC can be setup on the courtside special for referee's operation, the other PC running as media player to manage the LED display.

It is suitable for the stadium where has one screen, needs to do the scoring and timing on the courtside.

##### **Network Professional Edition:**

Except the function of score terminal, 1-3 media players can be equipped on PCs separately, in order to display different contents on several LED screens.

It is suitable for the stadium where has more than 2 screens where referee need to do scoring on the courtside and LED screens need to display different contents separately. (For example, one LED screen is for scoreboard and another is for advertising or player info).

Scoring interface for weightlifting:

World Championships 2015 85KG

RUS 

1 **Lovchev**

   SNATCH Attempt 1 85

## 2.2 Weightlifting Main Controller

Product	Detail
Weightlifting Main Controller	Type: KS-WL-MC10    Size: 275x210x65(mm) <ul style="list-style-type: none"><li>◆ Support: Weightlifting</li><li>◆ Support 3 referee controllers.</li><li>◆ Support connecting with Weightlifting Timer.</li><li>◆ Synchronize with Weightlifting Scoring Software.</li></ul>



### 2.3 Weightlifting Referee Controller

Product	Detail
Weightlifting Referee Controller	Type: KS-WL-RC10      Size: 140x120x30(mm) <ul style="list-style-type: none"><li>◆ Support: Weightlifting</li><li>◆ Cabinet: Plastic.</li><li>◆ Synchronize with Weightlifting Scoring Software.</li></ul>



## 2.4 Weightlifting Judge Controller

Product	Detail
Weightlifting Timer	Type: KS-WL-CD10      Size: 650x650x510(mm) <ul style="list-style-type: none"><li>◆ Support: Weightlifting</li><li>◆ Cabinet: Iron</li><li>◆ Display the match timer.</li><li>◆ Display white or red light according to the operation of judges.</li></ul>



## 2.5 Meet Management Server

Products	Details
<b>Meet Management Server</b>	<p>Type: KS-MMS-MINI</p> <p>Size: 182x178x36(mm)</p> <p>Weight: 1.2 KG</p> <p>Features:</p> <ul style="list-style-type: none"><li>● Multi-court arrangement, auto generate the order form.</li><li>● Multi-project arrangement, make the schedule more smoothly.</li><li>● Monitor the status of each court in real time, including the current field, rotation and player info.</li><li>● Court adjustment, can manually modify the match court and session info.</li><li>● Summary and print integrated report.</li></ul>



## 2.6 Score Display Controller

Products	Details
Score Display Controller	<p>Type: KS-DPC-G    Size: 142*87*62(mm)</p> <ul style="list-style-type: none"><li>◆ In multi-court mode, used to display the information of the score, players and set for each court.</li><li>◆ Output: 1024×768</li><li>◆ Output score display to one LCD monitor.</li><li>◆ Screen will be updated in real time based on the referee's operation.</li></ul>



## Display interface



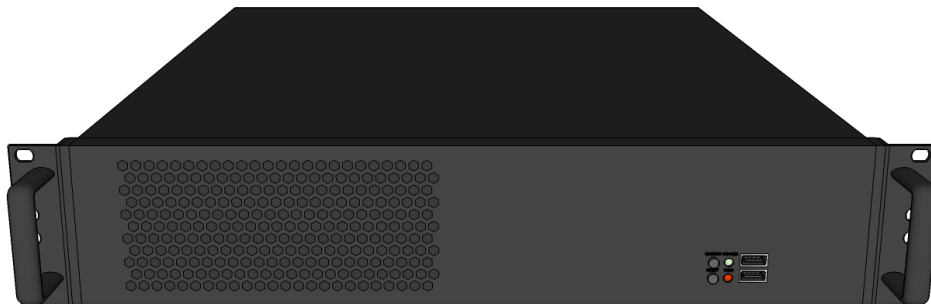
## Device parameters

Model	KS-DPC-G
Platform	Freescale
Chassis	
Color	Black
Dimension	142mm × 87mm × 62mm (W×D×H)
Material	Aluminium alloy
CPU	Freescale Cortex™-A9 i.MX 6 series (Single-core/dual-core/ Quad Core CPUs)
Memory	Onboard 1GB/2GB DDR3 800MHz RAM
Storage	
Flash	Onboard 4GB/8GB iNAND flash
TF/HDD	1x SATA2,1x Micro SD(determined by the CPU model, optional)
System	
LAN	10/100/1000Mbps ,1x LAN,1x USB-WIFI, 3G (optional)
USB2.0	2x USB2.0 on front panel ,1x USB OTG
Serial Port	5X 4 -wire serial port, COM2: RS422/485
Display	1x HDMI, 1x VGA
Audio	1x Mic, 1x Headphone
Power	
Power Supply	DC +12V Power Adapter
Reliability	
Installation	Desktop Installation or Wall mount

Operating Temperature	-20°C~60°C
Storage Temperature	-40°C~80°C
Relative Humidity	5%~95%, relative humidity, non-condensing
Vibration Test	0.5grms/5~500Hz/random operating
EMC	CE/FCC Class B

## 2.7 Video Arbitration Server

Products	Details
Video Arbitration Server	Type: KS-PARROT-2C/4C/6C/8C Video Input: 2/4/6/8 channels input synchronously; Input port: SDI; Output port: DP*2; Video Format: 1080P; Recording capacity: ≥ 10 hours; Multi-screen monitoring: supported; Weight: 8kg.



### Software interface



## Device Specification

Type	KS-PARROT-2C/4C/6C/8C
Size	485x480x90(mm)
Net Weight	8 KG
Color	Black
Cabinet	Iron
Interface	
Input	SDI*2/4/6/8
Output	DP*2
Environmental	
Operating Temp	-5°C~45°C
Storage Temp	-40°C~80°C
Relative Humidity	5%~95%, non-condensing
Input Voltage	AC 100V~240V
Functions	
<ul style="list-style-type: none"><li>● <b>Nonstop video recording in the background:</b> 2/4/6/8 channels of HD video are recorded simultaneously in the background, nonstop for 10 hours. Video retrieval and playback is unaffected.</li><li>● <b>Synch-playback of multi-channel video:</b> Supports playback mode of single channel video in full screen and multi-angle video in 2/4/6/8 windows.</li><li>● <b>Speed change in slow motion:</b> support 50 frame/s video playback and capture motion in a grid of 0.02s.</li><li>● <b>Video event query:</b> video stream can be divided into several video events, storing in the event list, which can be renamed for retrieve easily.</li><li>● <b>Video segment marker:</b> Important or controversial moments can be marked in video stream which will be replayed quickly when clicking the marked records.</li><li>● <b>Video signal output:</b> provides 2 video output signals, one of which is for preview, the other of which can be connected to LED/LCD display for live slow motion replay.</li></ul>	

## 2.8 Control Panel

Products	Details
Control Panel	<p>Type: KS-PARROT-CP</p> <p>Function:</p> <ul style="list-style-type: none"> <li>◆ Support one touch replay, deferred replay, in/out replay.</li> <li>◆ Preset speed button.</li> <li>◆ T-Bar for dynamic slow motion.</li> <li>◆ Professional dynamic jog wheel.</li> <li>◆ Key to mark the last 10s/20s of the video content.</li> <li>◆ Flexible select the marked video and playback.</li> </ul>



**Device Specification**

Type	KS-PARROT-CP
Size	365 x 200 x 98 (mm)
Net Weight	1 KG
Cabinet	Iron
Display	Color LCD(4.3Inch)
Sound	None
Communication	
USB	≤5m
RS232	≤10m
Environmental	
Operating Temp	-5~45°C
Relative Humidity	5~95 %, non-condensing
Storage Temp	-40~80°C
Input Voltage	AC 100V-240V
Total Power	15W

## 2.9 HD Camera

Products	Details
HD Camera	Type: KS-PARROT-CAMERA



### Device Specification

Product Type	KS-PARROT-CAMERA
Image sensor	SONY 1/2.8 inch Progressive CMOS
Effective pixels	3.1 million pixels
Signal System HD	1080p60/50, 1080p30/25, 1080i60/50, 720p60/50
Signal system	PAL/NTSC
Lens	12x optical zoom, f=3.9mm (wide angle) ~46.8mm (distal)
Horizontal view angle	72.5° (wide angle) ~7.4° (distal)
Aggregation mode	Auto / Manual
Minimum illumination	0.1Lux

Shutter speed	1/1~1/10000S
Gain	Auto / Manual
White balance	Auto / Manual / Indoor / Outdoor
Image effect	Color / Black & White / Electron flip
S/N ratio	≥50dB
Horizontal shaking	355° (Maximum velocity 80°/s)
Pitching shaking	-30°~30° (Maximum velocity 60°/s)
Presetting bit	9 remote control and keyboard can set up to 200
Video output HD	HDMI、 3G-SDI、 USB2.0、 USB3.0、 RJ-45
Audio input	3.5mm LINE-IN
Power	12V DC (10.8~13.0V DC)
Operating temp	0°C~40°C
Storage temp	-20°C~60°C
Size	164x148x173mm
Power consumption	12W (DC 12V)
Weight	1050g
Color	Silver