

BEC-21 Multi-sports Timer & Scorer Scoreboard



Display items:

1. Game time
2. Scores
3. Shot clock
4. Period
5. Team fouls
6. Possession
7. Time out indication.

Power supply:

1. From city power: 100~240Vac, <1A
2. Built-in rechargeable battery 7.2AH for about 6 hour's operation. (Option)

Control:

1. Back control panel.
2. Infrared keypad
3. Mobile phone or pad blue tooth control. (Free APP for Android & IOS)

Dimension: 57(W) x 36(H) x 18(D) cm, Carton: 70x41x27cm

Digit height: 13cm game time, 11cm scores, 7.5cm shot clock and fouls.

Weight: 4.8Kg, with battery 7.2Kg

with carton gross weight:6.8 Kg without battery

with carton gross weight:9.2 Kg with battery

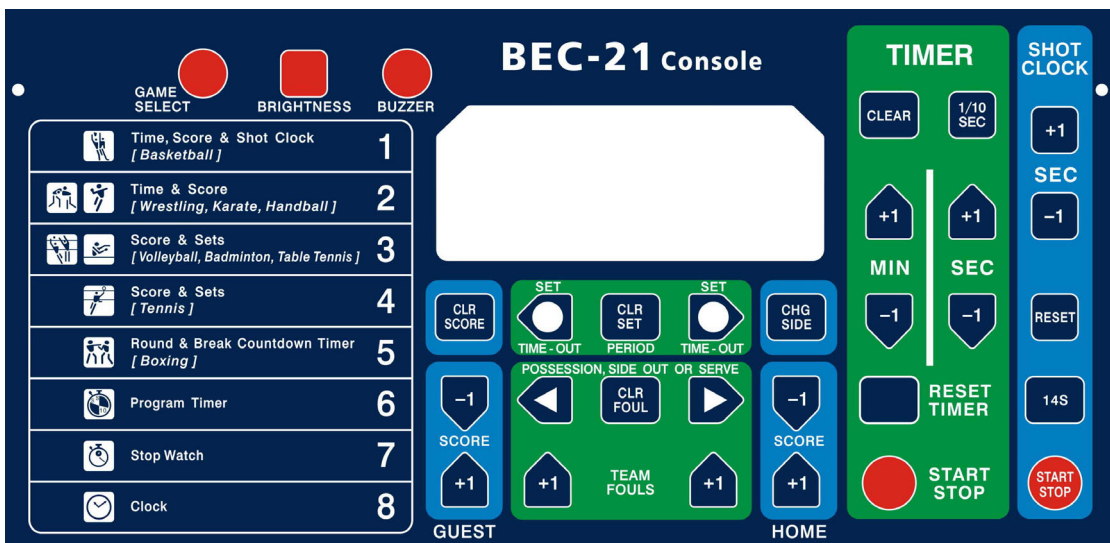
Back view

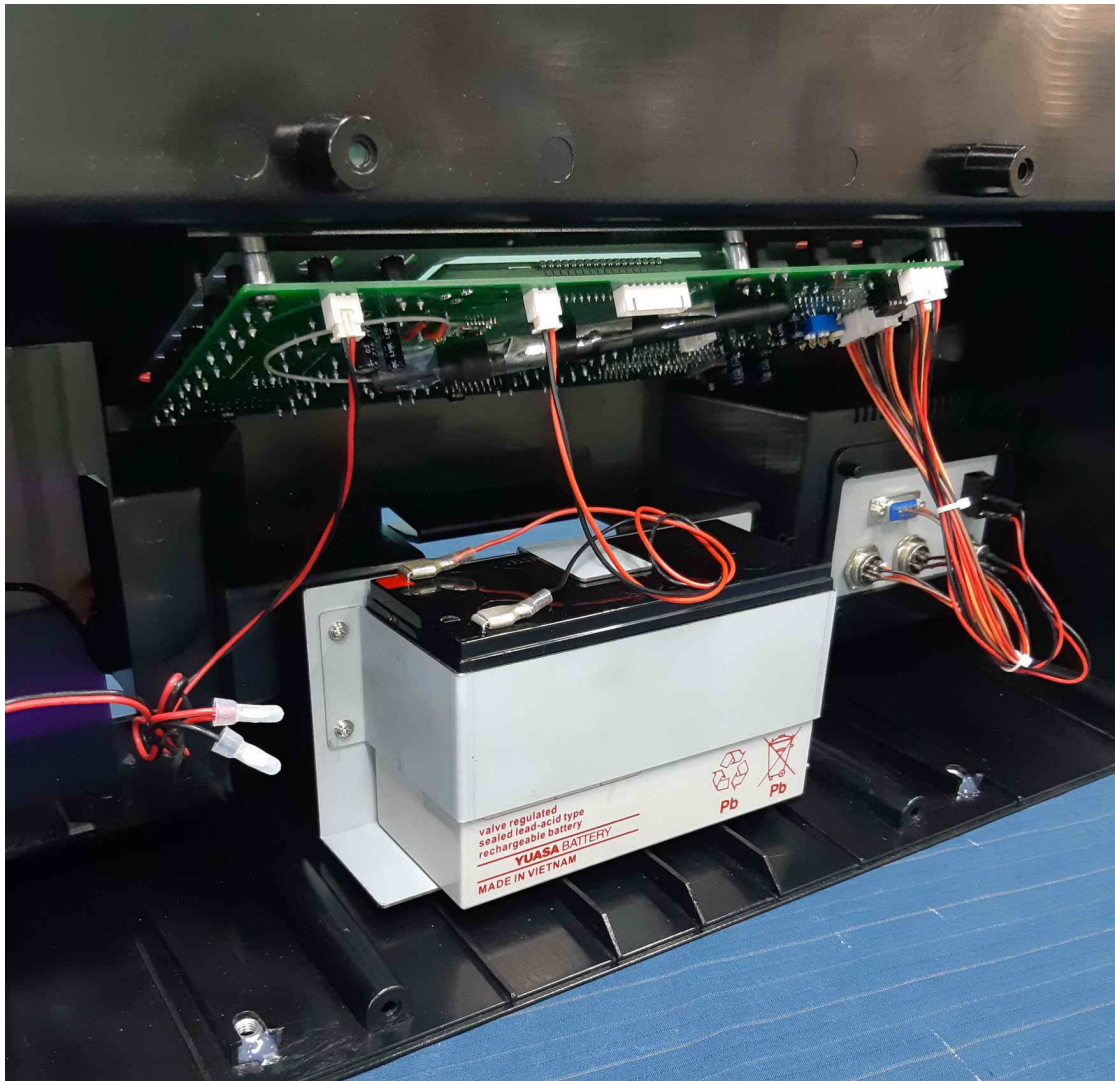


Connection panel, charger or adaptor remote keypad

Two 4 pins ports for shot clock connection

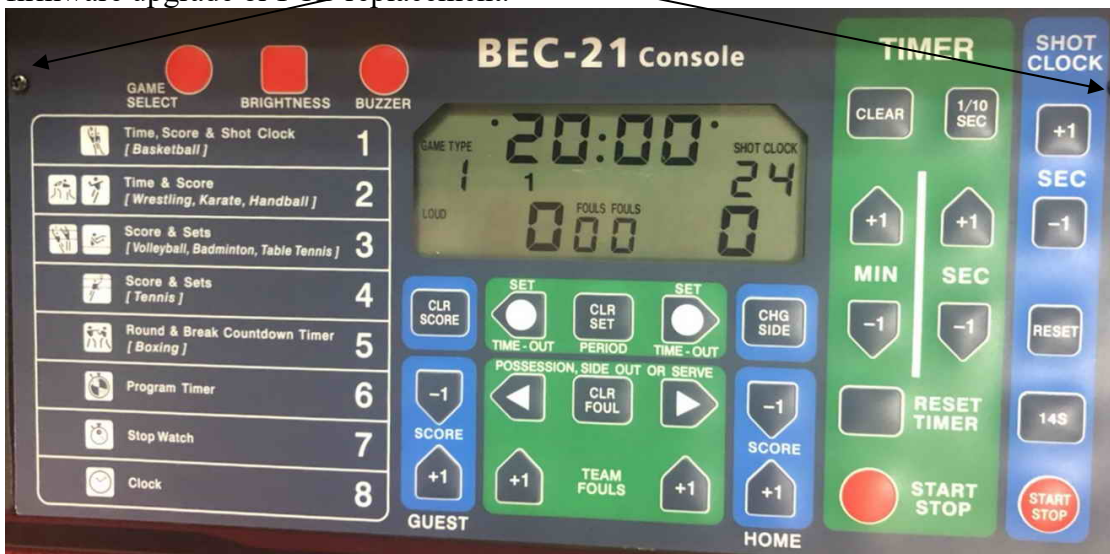
Shot clock control keypads.












Optional 7AH battery inside

Back maintenance by screw up two screws, you can take control CPU board out for firmware upgrade or PCB replacement.






Power on, default game time is 20minutes, shot clock is 24 seconds. If user want to change these value, follow the operation below:


Game Timer (count down)		
Operation	Key Operation	Display
	Timer	
1. Set game timer (ex: 10 minutes) Press Min -1 many times until it reach 10. (Power on default is 20 min)	 	10:00 24 0 0 0
2. When press START, this value (10 min) will be stored. Next time when STOP or end (0.00), press  it will show 10:00		9:59 24 0 0 0
3. Stop game at 9:00		9:00 24 0 0 0
4. Restart game		8:59 24 0 0 0
5. Game time expires(chirp)		0:00 24 0 0 0
6. Reset game time – clock returns to set time		10:00 24 25 2 0 30

- Game timer stopped too late:






Use  button to adjust difference.

- Changing game time:

Press  and set time as steps 1 and 2 noted above.

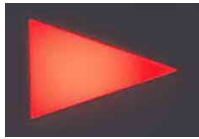
- Change count down timer to count up timer: For water polo


Press  and the  button

- If  is pressed, then when game time reaches last 1 minute, it will show 59.9 seconds

Possession, period, score and team fouls and change side operation.

Use  or  for possession indication.



Use  for period indication, extra game period 5 will show dot 1 & 4.




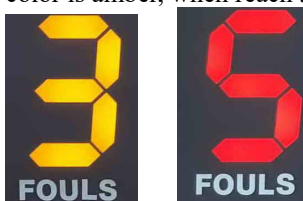
Period 1 & 2 have 2 times time out, while period 3 & 4 have 3 times time out.




The green dots shows the time out times left. It will show 2 dots when start period 1, and one time out used, it become 1 dot, when change to period 2, it will show 1 dot only. Until period 3, it will be 3 dots which means 3 times time out available.



Use  &  &  for score editing.  

Use  for team fouls editing, when fouls is less than 5 time, the LED color is amber, when reach 5 & above, its color turns red.



- Press  will swap above value for HOME and GUEST.
- Press  will activate buzzer sound.
- Press  will change the brightness of display.

Shot clock connection and operation







The BEC-21 scoreboard can connect 2 shot clocks via back connection panel. The power of shot clocks are come from the scoreboard, no extra AC cord required.

There is external shot clock control key pads(3 buttons) can be used for one additional operator.

Use right SHOT CLOCK area buttons to control.

Default RESET will be 24 seconds. If user want to change RESET to other value ex.30 seconds, he should do:

After power on, use  to add seconds until 30. Then press , the 30 seconds will be stored in memory, next time when press , it will be 30 seconds.

Press  will change shot clock timer to 14 seconds.

The operation for external shot clock keypads is the same as operation on the back membrane.

Infrared remote keypads operation:











	: Period
	: Game type selection
	: activate buzzer
	: Reset shot clock to 24 sec.
	: Reset shot clock to 14 sec.
	: Shot clock start/stop
	Time out
	Home & Guest
	Count up
	Count down
	Possession left
	Possession right
	Clear timer
	Team fouls
	Home & Guest
	Score editing
	Home & Guest
	Reset game timer
	Game timer start/stop

Basically the new remote operation is the same as present remote, except adding team fouls and time out operation buttons.


Game Timer (count up) For water polo game

Game timer display can be changed from displaying the remaining game time (count down) to the elapsed time (count up). Maximum setting: 99:59. In this mode the **upper colon between the minutes and seconds blinks**.



Operation	Key Operation		Display
	Timer		
1. Erase previous setting			0:00 24 0 0 0
2. Change display to count up mode (buzzer)			0:00 0 0 24 0 0
3. Set target time (ex: 20 minutes) Press MIN +1 many times until it reach 20			20:00 24 0 0 0 0
4. Rest time to 0:00			0:00 24 0 0 0 0
5. Start count up, the target time is stored into memory			0:01 24 0 0 0 0
6. Stop game			0:09 24 0 0 0 0
6. Restart game			0:10 24 0 0 0 0
7. Game time expires (buzzer)			20:00 24 0 0 0 0
8. Return time to 0:0			0:00 24 0 0 0 0


- Game timer stopped too late:



Use  button to adjust difference.

- Returning to count down display:

Press the timer's  key, and then press the  key.
Upper colon between the minutes and seconds stop blinking.

Press  GAME SELECT after power on, it will change to game type 2

  Time & Score [Wrestling, Karate, Handball] 2



This game is the same as game type 1, but no shot clock.






Press from game type 2 it will change to game type 3


  **Score & Sets**
[Volleyball, Badminton, Table Tennis] **3**

**Volleyball
Badminton
Table Tennis**



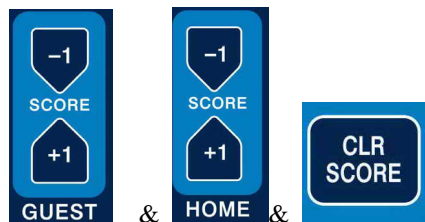
Use  &  &  for score editing.




Use  &  &  for sets editing.

Press  GAME SELECT from game type 3 it will change to game type 4.




For tennis only.














Use  &  &  for score editing.
 The score for tennis is 15, 30, 40 and when two teams are tight at 40:40, then
 It will show A for next win point, if win one point more, A will be flashing to indicate winning.

Use  &  &  for sets editing.





Press  from game type 4 it will change to game type 5.


 **Round & Break Countdown Timer** **5**
[Boxing]




Round & Break Countdown Timer			
Operation	Key Operation		Display
	Timer	Shot Clock	
1. Set round time (ex: 3 minutes)	Hold Down 		3:00 0
2. Enter round time into memory			0:00 0
3. Set break time (ex: 1 minute)	Hold Down 		1:00 0
4. Enter break time into memory			0:00 0
5. Set number of rounds for match (ex: 3 rounds)			0:00 3 3 TIMES
6. Return round time display			3:00 1
7. Begin match-Round number will appear in the lower left display.(chirp)			2:59 1
8. Stop round			1:35 1
9. Restart round			1:34 1
10. Knock-down-(chirp) every second			:35 1
11. Match continues -(chirp) will stop			:28 1

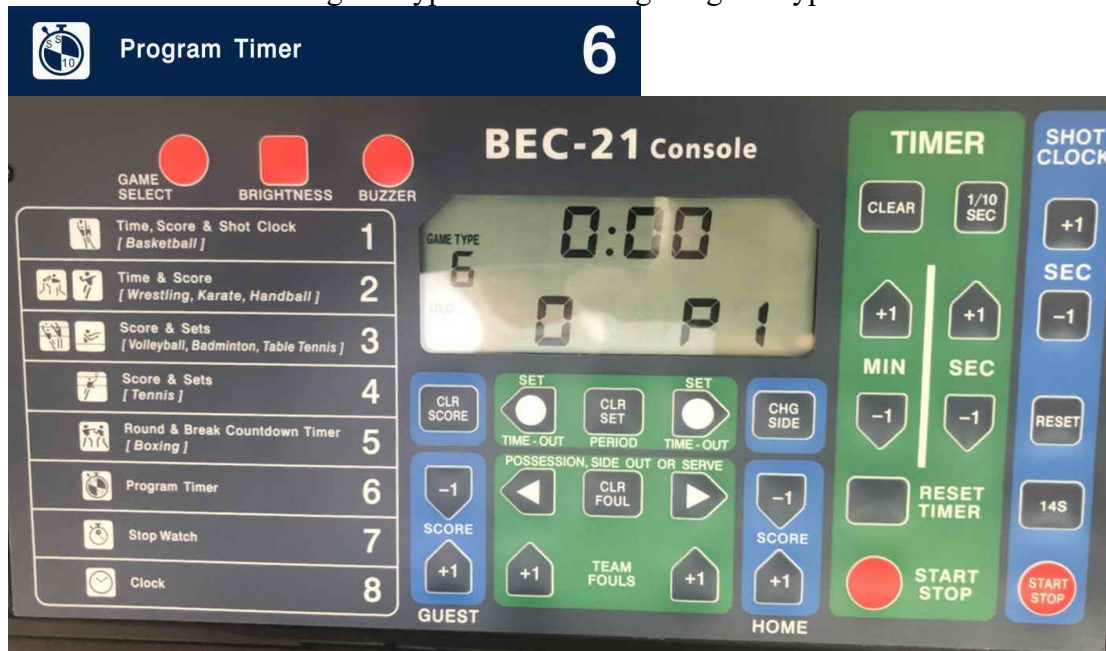









(1). Knocked down again (chirp) every second			1:20 1
(2). 10 seconds expires. Stop down count and round timer.			1:10 1
(3).Sound match – over (buzzer)			1:10 1

12.First round completed (buzzer)			0:00 1
13.Break time is displayed			0:59 1
14.Break time ends (buzzer)			0:00 1
15.Next round time is displayed. Round number changes to 2.			3:00 2
16.Designated number of rounds completed (buzzer)			0:00 3
17.Begin new match			3:00 1


- Round time reaches 0:00 during down count:
The match will continue without sounding the buzzer, so the down count will not be interrupted.
- Changing round/break times:
Press CLEAR key and set as needed using steps 1 through 6 as above.
- In the final round, the break time display will disappear.

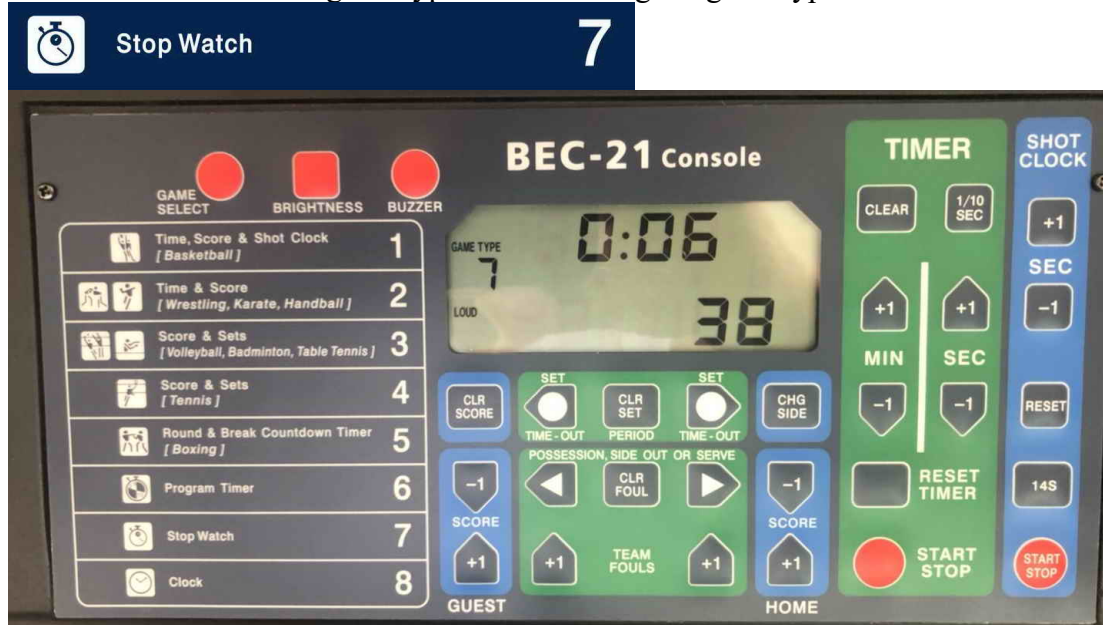
Press  from game type 5 it will change to game type 6.






Program Timer		
Operation	Key Operation	Display
	Program Timer	
1. Set program 1 (P1) to desired time (ex: 5 min)	5 TIMES 	5:00 0 P1
2. Enter time for program 1 into memory. Change program number to 2.		0:00 0 P2
3. Follow steps 1 & 2 above for desired number of programs (9 max).		5:00 1 P1
4. Complete program setting. Set the desired number of repetitions using the shot clock's SEC+1 key (max =99 times) and press REST TIMER. Current program round is displayed and timer will stop.	SHOT CLOCK  	5:00 1 P1
5. Start (chirp) Program 1(P1) will start counting down and buzzer will sound when it reaches 0:00 P2 will subsequently start. Completion of all programs is considered one round.		4:59 1 P1 0:00 1 P2 3:00 1 P2 0:00 1 P2 5:00 2 P2
6. Stop		2:28 11 P1
7. Return to beginning of program		5:00 0 P1

- changing set times:
Press timer CLEAR key and set as needed using steps 1 through 4 above.

Press  from game type 6 it will change to game type 7.








Stopwatch			
Operation	Key Operation		Display
	Stopwatch		
1.Start			0:00 01
2.Stop.			15:24 2 93
3.Reset to 00:00			00:00 00


• Split times:

Split times may be recorded by using the RESET key on the timer panel. The first time the button is pressed, the split time will be shown. The second will show the continuation of the timer and the split time will be erased. These steps may be repeated for additional split times.



• Measuring first and second place finishes:



Use of the RESET and Stop button on the timer panel to record first and second place finishers. Press the RESET button to capture the first place time (which will be shown on the display). Press the STOP button to capture the second place finisher and stop the clock. The first place time will be displayed until the RESET key is re-pressed at which time, the second place time will be displayed.



1. Start			0:00 01
2. RESET timer "UP" blink at left lower display, the display now shows the first finisher, while internal counter is still counting up for second finisher.			15:24 up 93
3. Stop : stop the timer of the second finisher "UP" remains at left lower display			15:24 up 93
4. Reset to see the time of the second finisher "UP" disappear and the time of the second finisher appears.			16:19 38
5. Reset to 00:00			00:00 00

Press  from game type 7 it will change to game type 8.



Use  and  for hours setting

Use  and  for minutes setting

Use  and  for seconds setting.

Press  to start clock counting in second.

Specifications

Input Power: AC90V~240V, 50Hz/60Hz.

Consuming Power: <25 Watts

Dimension: 57(W) x 36(H) x 18(D) cm, Carton: 70x41x27cm

Digit height: 13cm game time, 11cm scores, 7.5cm shot clock and fouls.

Weight: 4.8Kg, with battery 7.2Kg

Battery (12V7.2AH, car battery, lead acid sealed for about 6 hour's operation after fully charged.

The charger is equipped at back outside lot, it will stop charging automatically after full charged.

Mobile phone or pad blue tooth control. (Free APP for Android & IOS)

Please see another instructions.

NOTE:

This equipment has been tested and found to comply with the limits for Class A digital device, pursuant to Part 15 of the FCC Rules. Complied to CE EMI/EMC requirement as well.

BEC-21 Score board blue tooth control manual

Mobile phone / Pads blue tooth operation



Google Play (Android)

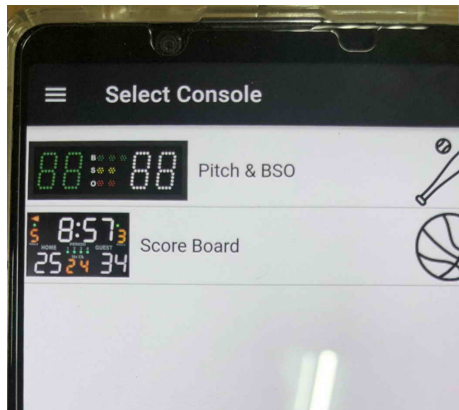


App Store (IOS)

Scan the QR code from your pads or mobile phone.



1. You will find out **UESAKA_BLE** and click this icon, you may see



Select this one

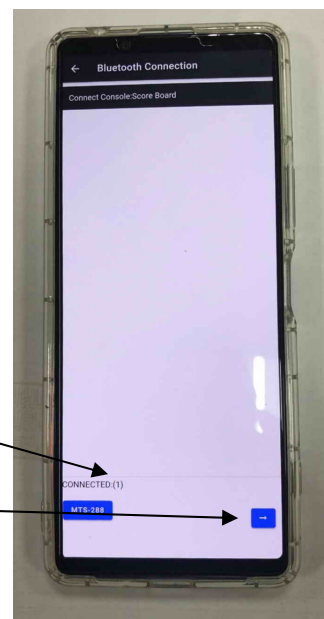
2. Click the one you want to control



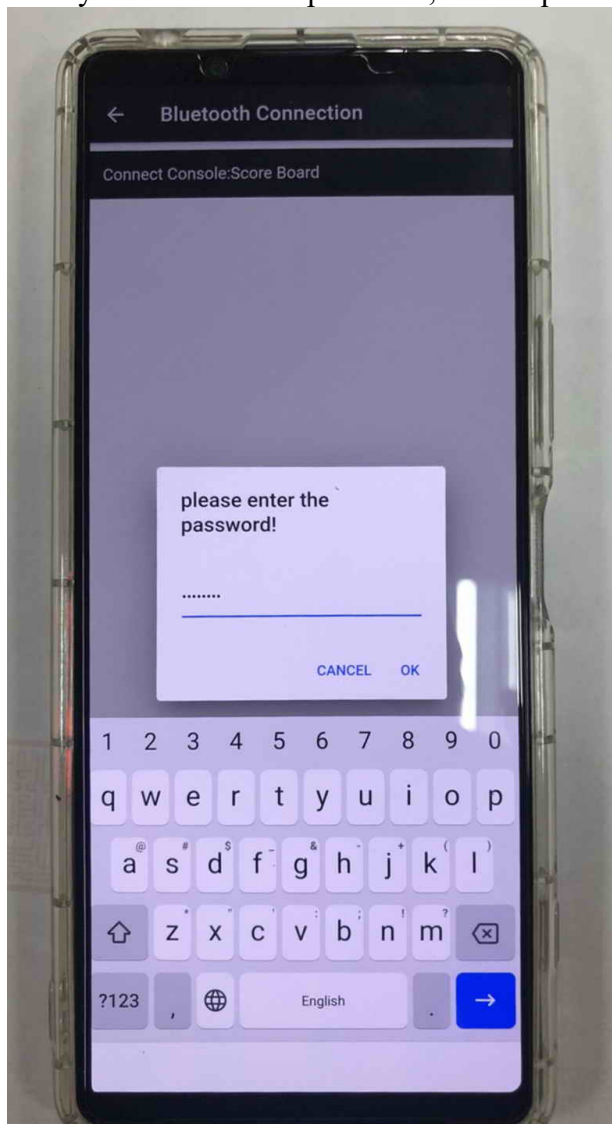
Click it
If there are two score board, you can click both of them. And they can be synchronize. No linkage cable required.

From connect (0) to (1)

Click -> to enter



Here you need to enter password, default password is 04792546



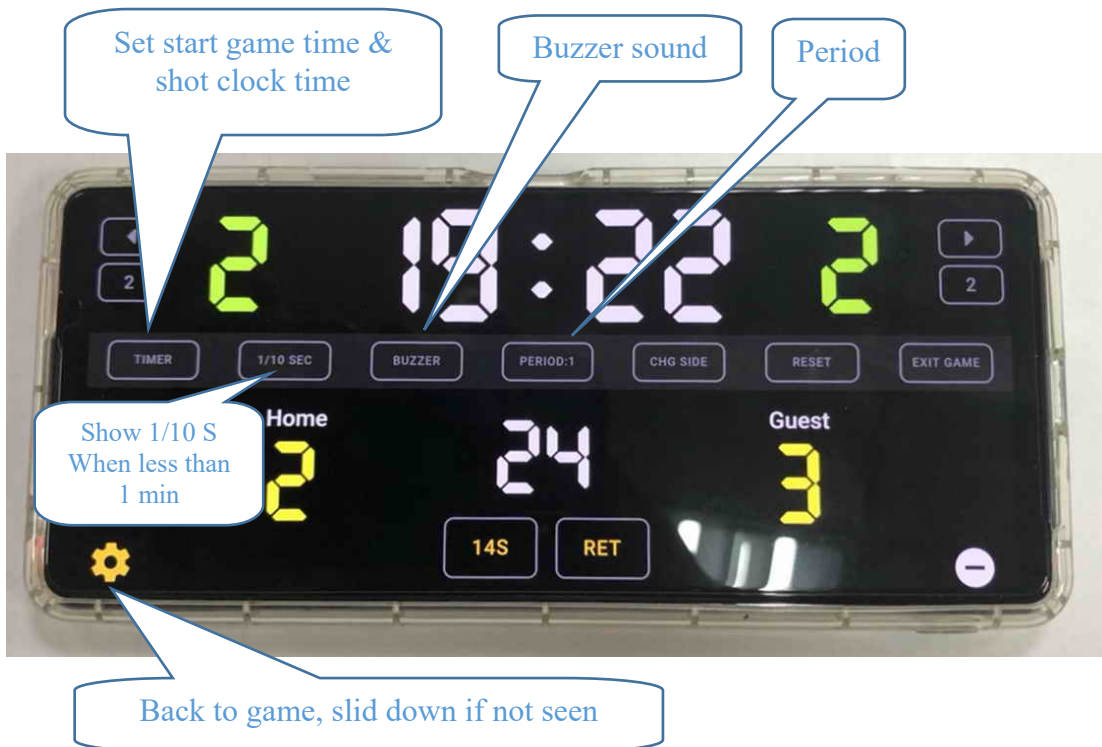
Press "OK" you will have



Most used is type 1 for basket ball game.
Just touch it, it will show



Setting

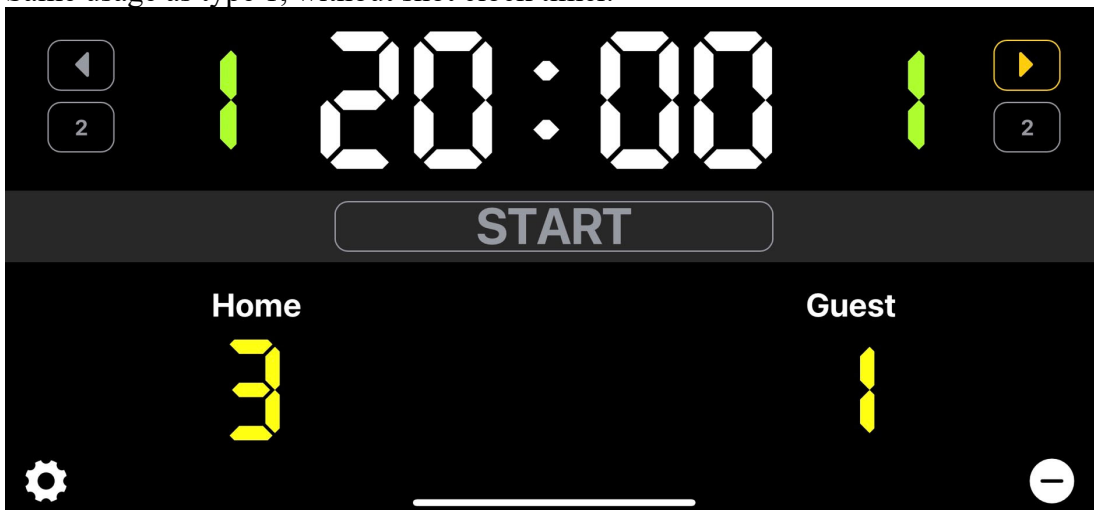


If game time stop too late or shot clock stop too late, you can use “-“ to adjust time
Also team fouls can be adjust.
After adjustment press “-“ to return.

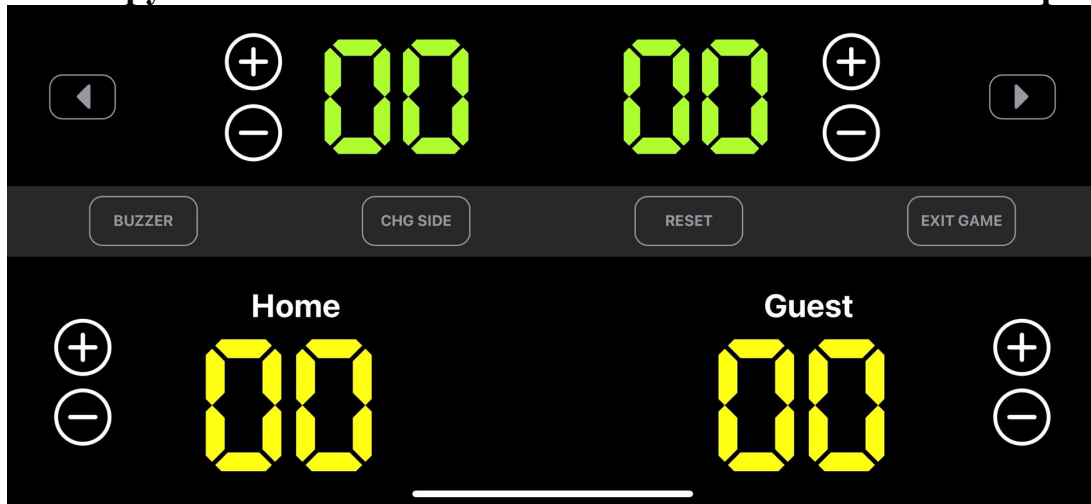


Game type 2 for wrestling and handball.

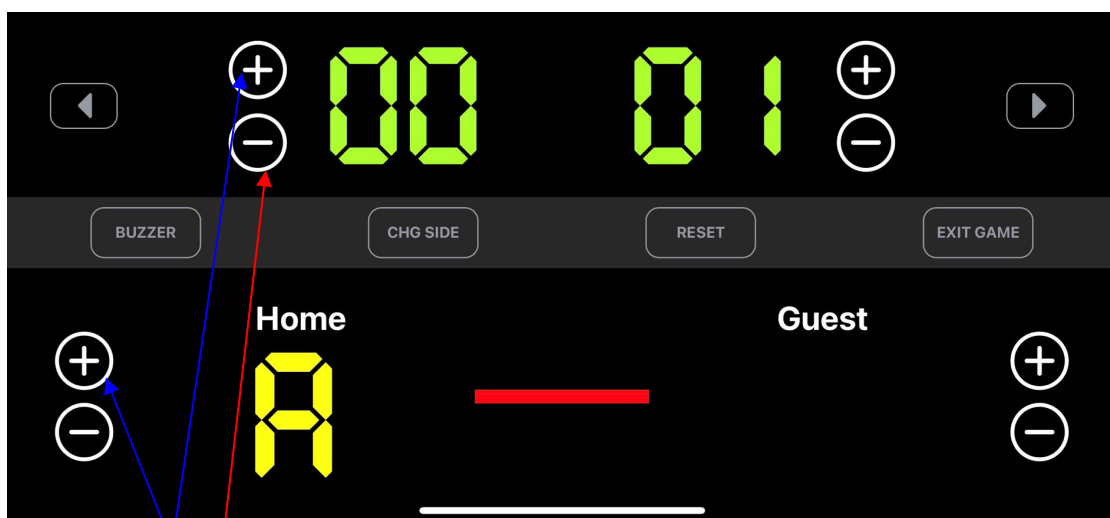
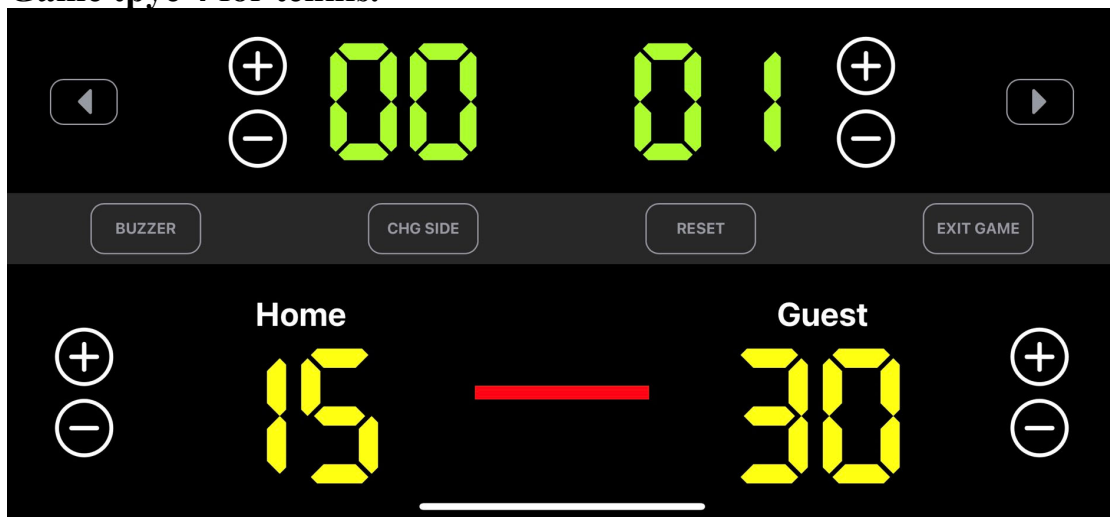
Same usage as type 1, without shot clock timer.



Game type 3 for table tennis or badminton for scores and sets display.

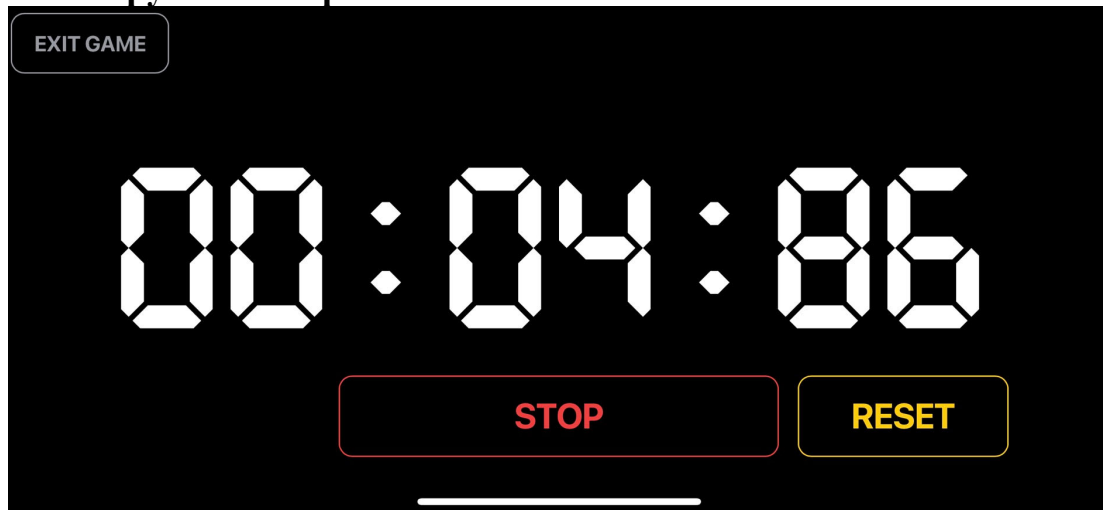


Game type 4 for tennis.



Use + or - to edit.

Game tpye 5 for stop watch.



Game tpye 6 for clock showing present time.



The mobile phone time will be displayed on the clock.

Should be correct current time.