## HALF COURT HOOPS



## Safety Instructions:

Repair and mantenance requires trained service personel.
Depending on the potentially hazardous degrees, the terms of NOTICE, WARNING GAUTION, etc. are used. Be sure to understand the content of the displays before reading the text.


## High Voltage Warning:

High voltage can cause an electric shock.
Turn off power before servicing.


## No Touching Warning:

This part may cause an electric shock or the surface is overheating. Do not touch this part.


I'his part may caused by scalding if somebody inadvertent to do something.

## CONTENTS

1. Specifications ..... 3.
2. Package contents ..... 4.
3. Assembling instruction .....  6.
4. Intallation ..... 19.
5. Package ..... 21.
6. Game descripiton ..... 22.
7. Switches control signal ..... 23
8. Parameter setting ..... 27
9. Game installation and service ..... 33
10. Game maintenance ..... 34.
11. Overall structure ..... 35.
12. I/Ochart ..... 49
13.Wiring Diagram

## 1. Specifiactions:



Rated power supply: AC220V $\pm 10 \quad 50 \mathrm{~Hz}$ or $110 \mathrm{~V} \pm 10 \quad 60 \mathrm{~Hz}$
(1) Power consumption: Min power consumption: 90 W

Max power consumption: 200W
(2) Dimensions: W1030×D2200×H2243 (mm)
(3) Weight: about 260 Kg
(4) Environment condition: (indoor) temperature : $-10^{\circ} \mathrm{C} \sim+40^{\circ} \mathrm{C}$

$$
\text { Humidity : } \leqslant 90 \%
$$

Atmospheric pressure : 86P $\mathrm{P}_{\mathrm{a}} \sim 106 \mathrm{P}_{\mathrm{a}}$
※Note : Game parameters are subject change without notice.

## 2 Package contents

2.1 Make sure that all the parts shown below are included in the product package: :

| NO | Part No. | Name | Qty | Illustartion |
| :---: | :---: | :---: | :---: | :---: |
| 1 | R102-001-000 | Main cabinet | 1 |  |
| 2 | R102-002-000 | Control panel | 1 |  |
| 3 | R102-003-000 | Header | 1 | H00p |
| 4 | R102-004-000 | Ball Gate Assy. | 1 |  |
| 5 | R102-005-000 | Playfield | 1 |  |
| 6 | R102-006-000 | Beam \& back 1 | 1 |  |
| 7 | R102-007-000 | Beam \& back 2 | 1 |  |
| 8 | R102-101-000 | Control panel fix board | 2 | $\square$ |
| 9 |  | Spare parts 1 | 1 | See below table for detail |

### 2.2 Spare parts 1:

| No | Part No. | Name | Spec. | Qty | Illustration | Note |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | R102-810-000 | Power cord | 15A/220V 3.5 m | 1 | ces |  |
| 2 | R102-429-000 | Fuse | $\begin{gathered} 5 \mathrm{~A} / 250(10 \mathrm{~A} / 125 \mathrm{~V}) \\ \phi 5-20 \end{gathered}$ | 2 |  |  |
| 3 | R102-730-000 | Manual | English | 1 |  |  |
| 4 | R102-423-000 | Key | 171 | 4 |  |  |
| 5 | R102-422-000 | Key | 2222 | 2 |  |  |
| 6 | R102-442-000 | Bearing | 6002 Z | 2 |  |  |
| 7 | R102-303-000 | Circlip | $\mathrm{GB} / \mathrm{T} 894.2-1986 / \mathrm{d}_{\mathrm{o}}$ $=16$ | 2 |  |  |
| 8 | R102-443-000 | Air pin |  | 2 | 0 (0) $=$ |  |
| 9 | R102-444-000 | Basketball | \#5 | 8 |  |  |
| 10 | R102-445-000 | Pump |  | 1 |  |  |
| 11 |  | Hexagonal socket flat round head screw | M $8 \times 25$ BLK | 12 |  |  |
| 12 |  | Hexagonal socket flat round head screw | M6×80 BLK | 4 |  |  |
| 13 |  | Hexagonal socket flat round head screw | M6×40 BLK | 8 |  |  |
| 14 |  | Cross hexagon head kit bolt | M $8 \times 20$ BLK | 8 |  |  |
| 15 |  | Cross hexagon head kit bolt | M6×16 BLK | 4 |  |  |
| 16 |  | Hex lock net | M8 BLK | 12 |  |  |
| 17 |  | Hex lock net | M6 BLK | 4 |  |  |
| 18 |  | Flat washer | M8 BLK | 12 |  |  |
| 19 |  | Flat washer | M6 BLK | 4 |  |  |
| 20 | R102-409-000 | Reflect paper | $50 \times 55$ | 1 |  |  |
| 21 |  | Spare screws |  | 1 |  |  |

## 3. Assemble instruction:

### 3.1 Assemble screws part list:

| No. | Name | Spec. |  | Qty | Illustration | Note |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | Hexagonal socket flat round head screw | M $8 \times 25$ | BLK | 12 |  |  |
| 2 | Hexagonal socket flat round head screw | M6× 80 | BLK | 4 |  |  |
| 3 | Hexagonal socket flat round head screw | M6× 40 | BLK | 8 |  |  |
| 4 | Cross hexagon head kit bolt | M $8 \times 20$ | BLK | 8 |  |  |
| 5 | Cross hexagon head kit bolt | M6× 16 | BLK | 4 |  |  |
| 6 | Hex lock nut | M8 | BLK | 12 |  |  |
| 7 | Hex lock nut | M6 | BLK | 4 |  |  |
| 8 | Flat washer | M8 | BLK | 12 |  |  |
| 9 | Flat washer | M6 | BLK | 4 |  |  |

### 3.2 Assemble steps:



Step 1


Step 2



Remove bolts and take the front panel assembly.

## Step 4



Step 5


## Step 6



Step 7

3.3 Layout on control panel:

Control panel:


Step 1: Connecting


Connect the wires to the PBC as per the numbers marked on the PBC.
3.4 Link game:
$\diamond$ There are two buttons on the control panel:


Link game button: Press this button to compete with others.
Start button: Press this button to start the game.
Link game schematic:


How to link games: Connect Link 2 (in Game (1)) to Link 1(in Game (2)). Then connect Link 2(in Game (2)) to Link 1(in Game (3)). The rest of the connections are the same. [For more detail, please refer to page 28]

Connection illustration:

! Notice :
\& 1. When linking the game, there should be one game set as game \#1. Any of the games can be set as game \#1. The rest of the games can be \#2 to \#30 but you cannot repeat.
» 2.30 games can compete with each other in groups.
> 3. The first time to start the game, it will show "1IP01 V1.02". The first " 1 " means the group form. "IP01" means the NO1 machine.
४ 4 . NO1 machine will send it's setting (excluding SW4) to the linking games after a few seconds when game starts. It will reset when turned off.
« 5. The DIP SWITCH setting in other games should be the same as the game NO1 setting except the Game NO.
$\diamond 6$. To set the JP value, you need to set on the game NO1.
3.5 Wiring layout:

In order to clear the layout in the machine, below is the instruction for you reference:


Left side layout



The extra Light Belt is wrapped with Nylon tape.
3.6 Connecting the power cord:

$>$ Do not put heavy items on power cord.

$>$ Do not touch the power plug with a wet hand.

$>$ Do not draw or twist the cord.


$>$ Do not place the cord near a heat source.
$>$ Do not place the cord where the player can easily touch or kick it.

$>$ Run this machine with the correct power configuration.

## 4. Installation:


4.1 Locations to avoid installing:


This machine is designed for indoor use only. Never install this machine outdoors or any of the following:

- Places where dew may develop due to temperature differences;
- Locations close to hazardous article;
- Locations close to a heating instrument;
- Close to instruments that can easily catch fire;
- Unstable or vibrating places;


### 4.2 Game leveling:

Install this machine on a flat surface. Adjust levelers to lift casters off the ground and level game.


Move
Fix

## 5. Package :

For moving the game a short distance, just adjust the leveler and then move the game. For moving the game a long distance, it should be packed. Before operating the game, it should be assembled.
$\diamond$ Remove the control panel:

Step 1: Unplug the connectors from the PBC.


Step 2: Unplug the high voltage and low voltage connectors pictured.

Step 3: Pull the wires out of the hole carefully. Please do not break the wire.


Step 4: Remove screws on the two side of the control panel.

Step 5: Pull the control panel in the front.


Step 6: The package should be the same as the factory original packing.

## 6. Game Description:

$\checkmark$ Insert coin(s). Press "single player" button or "link game" button to strat the game.
$\checkmark$ Start shooting. The big display will show some relative information. The default setting is: points for stage 1.60 points for stage 2.100 points for stage 3 . If the player cannot get that score, the game is over.
$\checkmark$ Tickets will be paid according to the score.
(Notice: It is suggested that 6 balls for each game to play.)

## 7. Switches control signal

7.1 Refer to the attached I/O chart and the schematic.
7.2 To adjust DIP SWITCH, please refer the I/O chart. The initial setting is in capitalization.
7.3 Main board:

7.4 Main board connecting


Test : Press" test" to this mode, go into 0 , press "test" after 1 second to go to 1 . The oter is the same. Test 0: Jack number Led_J33 2-1 flash and display "-0" to Test 0 . the rest will display LED numbers, Led J-33, Led $-\mathrm{J}-32$ is c. Dox martrix display each number.
Test 1: LED Led J33 2-1 flash and display "-2", Led J33 3-6
Test 2: DIP SW LED_J33 2-1 flash and display,'-2', LED_J33 3-6 display each DIP state.
Test3: Input LED_J33 2-1 flash and display, '-3', LED_J33 4-3 display 1 st GND input signal ,LED_J33 6-5 display $2^{\text {nd }}$, an so on. LED_J32 8-7display $7^{\text {th }}$. Each input has coin sound .
Test 4: Output LED_J33 2-1 flash and display,'-4', I1-I8 and I9-I16control Out1-Out48
Test 5: Output LED_J33 2-1 flash and display,'-5', I1-I48control Out1-Out48.
Test 6: Output LED_J33 2-1 flash and display,'-6', Out1-Out48, 8numbers as one group for output..
Test 7: Music LED_J33 2-1 flash and display, '-7', LED_J33 5-3 display present music number, I1 for play, I2 for +1 , I3for set to 0, I4plus 10 .
7.5 Signal detections:

Sensor detection board

Sensor light:
To detect if the rim is in the center or not. If the sensor detects the rim, it will light up.


7.6 Relay board and the ticket drive board location:

The relay board is
located at the right corner of the service door.


Open the ticket door to find the ticket drive board.

Relay board:


Ticket drive board:


Ticket drive board sketch map:

7.7 DIP Setting (Default setting)


Notice
The above are subject change without notice.

## 8. Parameter Setting:

(1) Coin per game:

SW1-1 and SW1-2 are the switches to adjust how many coins to start the game. There are 4 options.

| Item | Content | DIP SW1 |  | Note |
| :---: | :---: | :---: | :---: | :---: |
|  |  | 1 | 2 |  |
| Coin per <br> game | 0 | on | On | ( |
|  | 1 | off | on | 1 coin for one game |
|  | $\mathbf{2}$ | ON | OFF | 2 coin for one game |
|  | $\mathbf{3}$ | off | off | coin for one game |

(2) Score per ticket:

SW1-3 and SW1-5 are the switches to adjust the payout. There are 8 options.

| Item | Content | DIP SW1 |  |  | Note |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | 3 | 4 | 5 |  |
| Score per <br> ticket | 10 | on | on | on | Every 10 points for 1 ticket |
|  | $\mathbf{2 0}$ | OFF | ON | ON | Every 20 points for 1 ticket |
|  | 30 | on | off | on | Every 30 points for 1 ticket |
|  | 40 | off | off | on | Every 40 points for 1 ticket |
|  | 50 | on | on | off | Every 50 points for 1 ticket |
|  | 60 | off | on | off | Every 60 points for 1 ticket |
|  | 80 | on | off | off | Every 80 points for 1 ticket |
|  | No ticket | off | off | off | No tickets payout |

(3) Mercy ticket

SW1-6~SW1-7are switches to adjust the minimum ticket payout. There are 4 options.

| Item | Content | DIP SW1 |  | Note |
| :---: | :---: | :---: | :---: | :---: |
|  |  | 6 | 7 |  |
| Mercy | 0 | on | on | On least dispense 1 tickets |
|  | $\mathbf{1}$ | OFF | ON | At |
|  | 2 | on | off | At least dispense 2 tickets |
|  | 3 | off | off | At least dispense 3 tickets |

(4) High score memory

SW1-8 is switch to keep the high score or not. There are 2 options.

| Item | Content | DIP SW1 | Note |
| :---: | :---: | :---: | :---: |
|  |  |  |  |
| High score <br> menory | Able | on |  |
|  | Unable | OFF |  |

(5) Round per game

SW2- 1~ SW2-2 are the switches to adjust how many rounds for one play. There are 4 options.

| Item | Content | DIP SW2 |  | Note |
| :---: | :---: | :---: | :---: | :---: |
|  |  | 2 | 1 round for 1 game |  |
| Round per <br> game | 1 | on | on | 2 round for 1 game |
|  | 2 | off | on | 2 |
|  | 3 | on | off | 3 round for 1 game |
|  | $\mathbf{4}$ | OFF | OFF | 4 round for 1 game |

(6) Game time

SW2-3~ SW2-4 are the switches to adjust the play time for each round. There are 4 options.

| Item | Content | DIP SW2 |  | Note |
| :---: | :---: | :---: | :---: | :---: |
|  |  | 3 | 4 |  |
| Game time | A | on | on | Select project A |
|  | B | off | on | Select project B |
|  | C | ON | OFF | Select project C |
|  | D | off | off | Select project D |

(7) High score initial value

SW2-5~ SW2-6 are the switches to adjust the initial value of the high score setting. There are 4 options

| Item | Content | DIP SW2 |  | Note |
| :---: | :---: | :---: | :---: | :---: |
|  |  | 5 | 6 |  |
| High score <br> initial value | 150 | on | on | High |
|  | $\mathbf{2 0 0}$ | OFF | ON | High score setting is 200 |
|  | 250 | on | off | High score setting is 250 |
|  | 300 | off | off | High score setting is 300 |

(8) DBV (Round per bill)

SW2-7~ SW2-8 are the switches to adjust the bill for each round. There are 4 options.

| Item | Content | DIP SW2 |  | Note |
| :---: | :---: | :---: | :---: | :---: |
|  |  | 7 | 8 |  |
| DBV <br> ( Round per <br> bill) | 1 | on | on | 1 bill for 1 round |
|  | 2 | OFF | ON | $\mathbf{1}$ bill for 2 round |
|  | 3 | on | off | 1 bill for 3 round |
|  | 4 | off | off | 1 bill for 4 round |

(9) Score for pass

SW3-1~ SW3-2 are the switches to adjust the score for passing each stage. There are 4 options.

| Item | Content | DIP SW3 |  | Note |
| :---: | :---: | :---: | :---: | :---: |
|  |  | 1 | 2 |  |
| Score for <br> pass | A | on | on | Select project A |
|  | B | OFF | ON | Select project B |
|  | C | on | off | Select project C |
|  | D | off | off | Select project D |

## (10) JP score

SW3-3~ SW3-4 are the switches to adjust the JP score. There are 4 options.(Only enabled when using the JP marquee)

| Item | Content | DIP SW3 |  | Note |
| :---: | :---: | :---: | :---: | :---: |
|  |  | 3 | 4 |  |
| JP score | 200 | on | on | Reach 200 score for JP ticket |
|  | 250 | off | on | Reach 250 score for JP ticket |
|  | 300 | on | off | Reach 300 score for JP ticket |
|  | $\mathbf{3 5 0}$ | OFF | OFF | Reach 350 score for JP ticket |

(11) 3 Point time

SW3-5 is the switch to adjust the time during 3 point shooting, There are 2 options.

| Item | Content | DIP SW1 | Note |
| :---: | :---: | :---: | :---: |
|  |  | 5 |  |
|  | $\mathbf{B}$ | OFF | Select project A |

(12) Win JP ticket

SW3-6~SW3-7 are the switches to adjust tickets on JP. There are 4 options. (It is enabled when using JP marquee.)

| Item | Content | DIP SW3 |  | Note |
| :---: | :---: | :---: | :---: | :--- |
|  |  | 6 | 7 |  |
| Win JP <br> ticket | $\mathbf{1 0}$ | ON | ON | Get 10 extra tickets when JP is won |
|  | 30 | off | on | Get 20 extra tickets when JP is won |
|  | 50 | on | off | Get 30 extra tickets when JP is won |
|  | off | off | Get 50 extra tickets when JP is won |  |

(13) JP ticket

SW3-8 is the switch to adjust if getting the JP ticket or not when you reach the JP score. There are 2 options.(It is enabled when using JP marquee)

| Item | Content | DIP SW1 | Note |
| :---: | :---: | :---: | :---: |
|  |  | 8 |  |
| JP ticket | Yes | on | No JP ticket JP |
|  | No | OFF | No |

(14) Game time, score for pass, 3 point time table.

| Version | NO | Game time |  |  |  | 3 Point time |  |  |  | Score for pass |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Version |  | Stg 1 | Stg 2 | Stg 3 | Stg 4 | Stg 1 | Stg 2 | Stg 3 | $\operatorname{Stg} 4$ | Stg 1 | Stg 2 | Stg 3 | $\operatorname{Stg} 4$ |
| CEC | A | 30 | 25 | 20 | 20 | 25 | 20 | 20 | 20 | 30 | 60 | 100 | 150 |
|  | B | 30 | 30 | 25 | 20 | 25 | 25 | 20 | 20 | 40 | 80 | 150 | 200 |
|  | C | 40 | 35 | 30 | 25 |  |  |  |  | 50 | 100 | 160 | 250 |
|  | D | 45 | 40 | 35 | 30 |  |  |  |  | 60 | 130 | 200 | 300 |

(15) Game NO. , Group and Demo

SW4-1~ SW4-8 are the switch to show the game No., the group way and demo switch.

| Item | Content | DIP SW |  |  |  |  |  |  |  | Note |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | 41 | 42 | 43 | 44 | 45 | 46 | 47 | 48 |  |
| Main | NO 1 | OFF | ON | ON | ON | ON |  |  |  |  |
| Game No. | NO 2 | on | off | on | on | on |  |  |  |  |
|  | NO 3 | off | off | on | on | on |  |  |  |  |
|  | NO 4 | on | on | off | on | on |  |  |  |  |
|  | NO 5 | off | on | off | on | on |  |  |  |  |
|  | NO 6 | on | off | off | on | on |  |  |  |  |
|  | NO 7 | off | off | off | on | on |  |  |  |  |
|  | NO 8 | on | on | on | off | on |  |  |  |  |
|  | NO 9 | off | on | on | off | on |  |  |  |  |
|  | NO 10 | on | off | on | off | on |  |  |  |  |
|  | NO 11 | off | off | on | off | on |  |  |  |  |
|  | NO 12 | on | on | off | off | on |  |  |  |  |
|  | NO 13 | off | on | off | off | on |  |  |  |  |
|  | NO 14 | on | off | off | off | on |  |  |  |  |
|  | NO 15 | off | off | off | off | on |  |  |  |  |
|  | NO 16 | on | on | on | on | off |  |  |  |  |
|  | NO 17 | off | on | on | on | off |  |  |  |  |
|  | NO 18 | on | off | on | on | off |  |  |  |  |
|  | NO 19 | off | off | on | on | off |  |  |  |  |
|  | NO 20 | on | on | off | on | off |  |  |  |  |
|  | NO 21 | off | on | off | on | off |  |  |  |  |
|  | NO 22 | on | off | off | on | off |  |  |  |  |
|  | NO 23 | off | off | off | on | off |  |  |  |  |



## Meter panel :

$\diamond$

$\diamond$ 1. Coin counter: Display the amount of the coins put in.
$\diamond 2$. Ticket counter: Display the amount of the tickets dispensed.
$\diamond$ 3. Ticket reset: Reset the tickets when refill the tickets.
$\diamond$ 4. Option: No function for the moment.
$\diamond 5$. Setup: No function for the moment.
$\diamond$ 6. Option: No function for the moment
$\diamond$ 7. Setup: No function for the moment
9. Game installation and service

### 9.1 Installation

(1) Firstly check the assembling instructions and assemble the game.
(2) Secondly, adjust the leveler of the game on even ground.
(3) After installation, plug in. check the game operation. If there is a problem, stop the game and please check the trouble shooting section of this manual.

### 9.2 Game maintenance

(1) Try to run the game first before operation every day.
(2) Check every component after running the game for a month.
(3) Check the machine regularly.

## 10. Game maintenance:

| No. | Problem | Cause | Possible solution |
| :---: | :---: | :---: | :---: |
| 1 | No ticket dispensed | 1. No tickets in the game; <br> 2. Tickets are jammed; <br> 3. Poor connection on the ticket dispenser. | 1. Refill and press reset button; <br> 2. Take the jammed tickets out and then press the reset button; <br> 3. Replace with a better connector。 |
| 2 | Does not score when ball goes in | 1. Reflective paper is worn or old; <br> 2. Poor connection; <br> 3. Ball sensor is damaged. | 1. Replace the reflective paper; <br> 2. Make sure the connection is good; <br> 3. Replace with new sensor. |
| 3 | Rim in wrong position | 1. Sensors disconnection <br> 2. Rim detected sensor is damaged; | 1. connect the sensor; <br> 2. Replace the sensor board. |
| 4 | Rim doesn't move | 1. Relay is not working; <br> 2. Motor is not working; <br> 3. Faulty connectors | 1. Check the power voltage to see if it is the same as motor voltage; <br> 2. Insure wire is connected properly; <br> 3. Replace with new sensor. |
| 5 | Ball gate faulty | 1. sensor connector is loose; <br> 2. sensor is no t working. | 1. Connect the wire properly; <br> 2. Replace the new sensor. |
| 6 | Ball gate not open or not closed | 1. Drive board sensor is not working; <br> 2. Motor is not working; <br> 3. Poor connection. | 1. check the ball sensor input signal; <br> 2. make sure power voltage is the same as motor voltage; <br> 3. make sure every connetor is connected. |

## 11. Overall structure

### 11.1 Main part 1:



| No. | Part No. | Name | Qty | Spec. | Note |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | R102-003-000 | Header Assy. | 1 |  |  |
| 2 | R102-102-000 | Rear frame_L | 1 | Square tube |  |
| 3 | R102-103-000 | Rear frame_R | 1 | Square tube |  |
| 4 | R102-008-000 | Motion Assy. | 1 |  |  |
| 5 | R102-104-000 | Rear side panel | 3 | Square tube |  |
| 6 | R102-105-000 | Shield ring | 1 | Square tube |  |
| 7 | R102-106-000 | Rear side panel | 2 | Q235 |  |
| 8 | R102-301-000 | Shield ring | 1 | Q235 |  |
| 9 | R102-302-000 | Frame fix cover | 1 | Q235 |  |
| 10 | R102-107-000 | Front side panel | 2 | Q235 |  |
| 11 | R102-501-000 | Playfield 3 | 1 | Plywood |  |
| 12 | R102-004-000 | Ball gate assy. | 1 |  |  |
| 13 | R102-009-000 | Speaker_L rack | 1 | Q235 |  |
| 14 | R102-010-000 | Speaker_L rack | 1 | Q235 |  |
| 15 | R102-401-000 | Speaker | 2 | FEILO $8 \Omega / 10 \mathrm{~W}$ |  |
| 16 | R102-502-000 | Playfield 1 | 1 | Plywood |  |
| 17 | R102-002-000 | Control panel assy. | 1 |  |  |
| 18 | R102-108-000 | Front door | 1 | Q235 |  |
| 19 | R102-402-000 | Triple door | 1 | Standard (with coin mech frame ) |  |
| 20 | R102-109-000 | Big speaker net | 1 |  |  |
| 21 | R102-110-000 | Front low right door | 1 | Q235 |  |

11.2 Main part 2


| Operation Manual'‘ |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| No. | Part No. | Name | Q'ty | Spec. | Note |  |
| 1 | R102-111-000 | Rear frame rack | 1 | Square tube |  |  |
| 2 | R102-112-000 | Rear side_R net | 1 | Q235 |  |  |
| 3 | R102-113-000 | Front frame | 1 | Q235 |  |  |
| 4 | R102-114-000 | Front net | 1 | Q235 |  |  |
| 5 | R102-115-000 | Front side_R rack | 1 | Square tube |  |  |
| 6 | R102-116-000 | Beam rack 2 | 1 | Q235 |  |  |
| 7 | R102-117-000 | Beam 2 | 2 | Square tube |  |  |
| 8 | R102-118-000 | Beam rack 1 | 1 | Q235 |  |  |
| 9 | R102-119-000 | Beam rack 4 | 1 | Q235 |  |  |
| 10 | R102-120-000 | Damping board | 2 |  |  |  |
| 11 | R102-121-000 | Beam 1 | 2 | Square tube |  |  |
| 12 | R102-122-000 | Rear side_L net | 1 | Q235 |  |  |
| 13 | R102-123-000 | Beam rack 3 | 1 | Q235 |  |  |
| 14 | R102-124-000 | Front side_L rack | 1 | Q235 |  |  |
| 15 | R102-403-000 | Leveller | 8 |  |  |  |
| 16 | R102-404-000 | Castor | 8 | $2 "$ | Q235 |  |
| 17 | R102-125-000 | Botton net | 4 |  |  |  |

11.3 Motion Assy.


| No. | Part No. | Name | Q'ty | Spec. | note |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | R102-405-000 | Rim | 1 | $\phi 20$ |  |
| 2 | R102-503-000 | Back board | 1 | 15 mm |  |
| 3 | R102-126-000 | Bearing rack | 1 | 3 mm |  |
| 4 | R102-303-000 | Shield ring | 1 | $\mathrm{~d}_{0}=16$ |  |
| 5 | R102-304-000 | Bearing axis | 13 |  |  |
| 6 | R102-127-000 | Bearing track | 1 | 1.5 mm |  |
| 7 | R102-128-000 | Sensor rack | 1 | 1.5 mm |  |
| 8 | R102-129-000 | Reinforce_L | 1 |  |  |
| 9 | R102-130-000 | Reinforce_R | 1 |  |  |
| 10 | R102-131-000 | Attached board | 1 | 1.5 mm |  |
| 11 | R102-132-000 | Sensor board | 1 |  |  |
| 12 | R102-133-000 | Sensor block |  |  |  |
| 13 | R102-134-000 | Main frame | 1 | 3 mm |  |
| 14 | R102-135-000 | Guide I | 2 | 2 mm |  |
| 15 | R102-136-000 | Guide $\Pi$ | 2 | 2 mm |  |
| 16 | R102-137-000 | Bracket | 2 | 3 mm |  |
| 17 | R102-406-000 | Bearing | 11 | 6002 |  |
| 18 | R102-138-000 | Connected rod | 1 | 2 mm |  |
| 19 | R102-139-000 | Motor rack | 1 | 2 mm |  |
| 20 | R102-407-000 | Start up capacitor | 1 |  |  |
| 21 | R102-408-000 | Motor | 1 | YN70-15Z/70JB100 |  |
| 22 | R102-140-000 | Light tube | 1 | bracket | 1 |
| Q235 |  |  |  |  |  |
| 23 | R102-141-000 | Light tube cover | 1 | Q235 |  |
| 24 | R102-409-000 | Reflect paper | 1 | $50 \times 55$ |  |
| 25 | R102-410-000 | Ball detected | 2 | E3F-R2N1 |  |
| 26 | R102-142-000 | Chain jacket | 1 | BLK PE |  |

11.4 Ball gate Assy


| No. |  |  |  | Part No. | Name |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Q'ty | Speration Manual '‘ |  |  |  |  |
| 1 | R102-143-000 | Ball | 1 | 1.5 mm | Note |
| 2 | R102-144-000 | Hinge | 1 |  |  |
| 3 | R102-504-000 | Bed plate | 1 | 15 mm |  |
| 4 | R102-145-000 | Fix board | 1 | 3 mm |  |
| 5 | R102-411-000 | Motor | 1 | YN60-6Z/60JB100G10 |  |
| 6 | R102-412-000 | Capacito | 1 |  |  |
| 7 | R102-146-000 | Motor <br> bracket | 1 | 3 mm |  |
| 8 | R102-147-000 | Encoder <br> wheel | 1 |  |  |
| 9 | R102-148-000 | Connection | 1 | 3 mm |  |
| 10 | R102-305-000 | Axle sleeve | 2 |  |  |
| 11 | R102-306-000 | Shield ring | 1 | $\mathrm{~d}_{0}=5$ |  |
| 12 | R102-413-000 | Sensor | 1 | NC(YIIN-5V) |  |

11.5 Control panel Assy.


| No. | Part No. | Name | Qty | Spec. | Note |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | R102-414-000 | Bulb | 4 | 12V 3W |  |
| 2 | R102-415-000 | Coin mech | 2 | CEC |  |
| 3 | R102-416-000 | Coin SW | 2 | ZIPPYCNR-055-03-Z |  |
| 4 | R102-417-000 | Bulb clamp | 2 | For coin lamp |  |
| 5 | R102-418-000 | Counter | 1 | 12V |  |
| 6 | R102-419-000 | Test button | 3 | 1 RED ,1GRN,1 BLK |  |
| 7 | R102-420-000 | Dual POT | 1 | 1K |  |
| 8 | R102-421-000 | Single POT | 1 | 10K |  |
| 9 | R102-149-000 | Coin box | 1 |  |  |
| 10 | R102-422-000 | Coin box lock | 1 | 2222 |  |
| 11 | R102-150-000 | Ticket box | 1 | Q235 |  |
| 12 | R102-801-000 | Ticket conversion board | 1 | TICK-CH.PCB |  |
| 13 | R102-424-000 | Ticket mech | 1 | TD-963CR |  |
| 14 | R102-423-000 | Ticket lock | 1 | 171 |  |
| 15 | R102-802-000 | Main board | 1 | V8 |  |
| 16 | R102-803-000 | Relay board | 1 | JDQ-LY2J-12V |  |
| 17 | R102-423-000 | Service door lock | 1 | 171 |  |
| 18 | R102-425-000 | Power box | 1 | EPM-S-250D12+24 |  |
| 19 | R102-426-000 | Power swithe | 1 | $12 \mathrm{~A} / 125 \mathrm{~V} 1 / 4 \mathrm{HP}$ |  |
| 20 | R102-427-000 | Fuse | 1 | 10A/125V \$ 5-20 |  |
| 21 | R102-428-000 | Fuse socket | 1 | 10A/250V R3-11 |  |
| 22 | R102-429-000 | Filter |  | 10GENG3E-R |  |
| 23 | R102-430-000 | Sound box hole | 1 |  |  |
| 24 | R102-431-000 | Speaker | 1 |  |  |
| 25 | R102-423-000 | Speaker door lock | 1 | 171 |  |
| 26 | R102-804-000 | Power cord | 1 | 3. 5 M |  |

11.6 Other electroinc component:


| No. | Part No. | Name | Q'ty | Spec. | Note |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | R102-805-000 | Dot matrix | 1 | DZ-1120.PCB |  |
| 2 | R102-806-000 | 2 Digit display | 1 | LED86*65-2U.PCB |  |
| 3 | R102-807-000 | 3 Digit display | 2 | LED86*65-3U.PCB |  |
| 4 | R102-432-000 | Sensor | 1 | Fanse.PCB |  |
| 5 | R102-433-000 | Fuorescent lamp1 | 1 | T5 14W |  |
| 6 | R102-434-000 | Insulated cable $\phi 50$ | 2 | Caliber $\phi 50$ |  |
| 7 | R102-435-000 | Insulated cable $\phi 24$ | 5 | Caliber $\phi 24$ |  |
| 8 | R102-808-000 | 3 Core connector | 1 | 1 male, 1 female |  |

11.7 Game decal:



| NO. | PART NO. | NAME | Spec. | QTY(pes) |
| :---: | :---: | :---: | :---: | :---: |
| 1 | JTQS-HM-01 | Rear side-L decal | $810 \times 622$ (PVC) | 1 |
| 2 | JTQS-HM-02 | Rear side-R decal | $810 \times 622(\mathrm{PVC})$ | 1 |
| 3 | JTQS-HM-03 | Front side-L decal | $804 \times 464$ (PVC) | 1 |
| 4 | JTQS-HM-04 | Front side-R decal | $804 \times 464$ (PVC) | 1 |
| 5 | JTQS-HM-05 | Playfield 1 | $930 \times 560$ ( $\delta 0.3$ PVC) | 1 |
| 6 | JTQS-HM-06 | Playfield 2 | $930 \times 582$ ( $\delta 0.3$ PVC) | 1 |
| 7 | JTQS-HM-07 | Playfield 3 | $928 \times 705$ ( 80.3 PVC) | 1 |
| 8 | JTQS-HM-08 | Header Decal | $1006 \times 181$ ( 85 PET ) | 1 |
| 9 | JTQS-HM-09 | Control panel decal | $1006 \times 206$ ( 85 PET ) | 1 |
| 10 | JTQS-HM-10 | Back board decal | $928 \times 1161$ ( 85 PET ) | 1 |
| 11 | JTQS-HM-11 | Front door decal | $367 \times 639$ (PVC) | 1 |
| 12 | JTQS-HM-12 | Playfield gate decal | $655 \times 150$ (PVC) | 1 |
| 13 | JTQS-HM-13 | Motor gate sticker decal | $100 \times 70$ (PVC) | 1 |
| 14 | JTQS-HM-14 | High voltage decal | $60 \times 90$ (PVC) | 3 |
| 15 | JTQS-HM-15 | No touching decal | $66 \times 66$ (PVC) | 2 |
| 16 | JTQS-HM-16 | Play manual decal | $120 \times 70$ (PVC) | 1 |
| 17 | JTQS-HM-17 | Cable screw instruction | $360 \times 302$ (PVC) | 1 |
| 18 | JTQS-HM-18 | Coin mech. decal | $18 \times 26$ (PVC) | 2 |
| 19 | JTQS-HM-19 | Fork man notice decal | $180 \times 270$ (PVC) | 1 |
| 20 | JTQS-HM-20 | Coin counter decal | $30 \times 6$ (PVC) | 1 |
| 21 | JTQS-HM-21 | Ticket counter decal | $30 \times 6$ (PVC) | 1 |
| 22 | JTQS-HM-22 | Ticket reset decal | $50 \times 6$ (PVC) | 1 |
| 23 | JTQS-HM-23 | Ticket dispenser decal | $60 \times 20$ (PVC) | 1 |
| 24 | JTQS-HM-24 | Button decal | $76 \times 50$ (PVC) | 2 |
| 25 | JTQS-HM-25 | Serial ID decal | $48 \times 48$ (PVC) | 1 |
| 26 | JTQS-HM-26 | 220 V high voltage decal | $128 \times 68$ | 1 |
| 27 | JTQS-HM-27 | 110 V high voltage decal | $248 \times 68$ | 1 |

