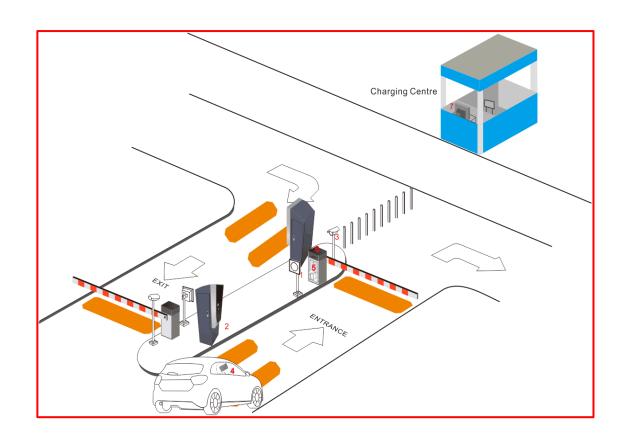
# JUTAI Barcode Ticket Parking System Solution





Add: 5F, Mingjinhai Park, Shiyan Town, Bao'an District Shenzhen City, China.

# **Description:**

### Does your Shopping Mall have parking problems as follows:

- A capacity crowed at parking lot and often blocked, it is very difficult for customers to find a parking space?
- Often have to queue in the passageway, lead to customers very agitated, often get lots of complains?
- The queuing time is too long before the mall closed, often cause the charge dispute, even need to release vehicles for free to ease long lines and complaints?
  - System vulnerability, results a lot of fraud and cash losing?
  - System break down, cannot offer comfortable and quick service for customers?

Large Shopping Mall is a place where many shops and brands gathered, provide comfortable and quick parking lot experience is a very important aspect of improving service and increasing passenger flow volume of shops, and the spending power of motorists are stronger than other customers, so how to provide a high efficiency, security and stability parking lot is very important for the customer, and the parking lot is the place where gives them first impression and last impression, so choosing what kind of parking equipment for the operation of the whole Shopping Mall has the extremely important influence.

In the process of selection, some customers will choose low-cost domestic equipment, and does not take into account the stability of post-stage operation; Some of our clients understand the importance of stability, but they flinch from the expensive imported equipment. Can't we have it both ways, no high stability and highly cost-effective equipment? Absolutely not! JUTAI is your best choice, it is the perfect combination of domestic enterprises with international top technology, We have a wealth of practical experience in the parking industry.



# 1. Entry Terminal:

**PM-900TEN** is an Entry Terminal used in JUTAI Center Charge parking system. It supports a barcode ticket as parking tickets and provides a fast and easy entrance control of a parking facility. In case of network disconnection, it can still be operated under stand-alone mode; offline data will be saved and then sent back to Central Management Server after network reconnected.

A 8 `inch DGUS serial port display and a multimedia speaker provide a user friendly interface. While a presence of a car is detected at an Entry Terminal, a display and a vocal message will both prompt the driver to push a ticket button for a barcode ticket. And the barcode printed on the ticket is encoded with the ticket number, entry time, terminal ID and site ID. After the barcode ticket is taken by the driver, the gate will be opened for entering. For those card tickets dispensed but not taken by the driver are recycled and blacklisted, while back-out card tickets are also blacklisted by the parking system.



#### **Standard specs:**

- Barcode ticket reader/writer/dispenser/collector
- Barcode ticket dispenser Capacity: 4000 tickets with 85\*54\*0.2mm (available for roll type or fanfold)
- Ticket thickness application:0.06-0.1mm
- Embedded Linux system control board.
- Isolated digital I/O control board.
- 8 'inch DGUS serial port display, screen saver design, prolong LCD life's cycle
- Multimedia speaker.
- Sub-intercom device.
- Flexible application and compatible with IC card and ID card;
- Work with RFID Long range parking reader for hands free and fast entry/exit:
- Cabinet: cold rolled steel :2.0mm, Panel:5.0mm
- Surface treatment: Unoil-Rust remove-Acid wash- Polish- dust removal- Polyester powder coating- Baking paint for metal in high temperature.
- Alarm monitoring and control: Real time alarm monitoring and alert to the Central Management Server.
- Alarm types: cabinet intrusion/collision, ticket Back-out and stolen tickets information are sent to Central Management Server as blacklist.
- ■Working Temperature : -25 ~70° C.
- Relative Humidity: 10%-95%.
- Electrical: 220VAC,,0.8/0.4A,50/60Hz.
- Power: 60W.
- Mifare card reader (wall mount type) for season card (subscriber) system.
- Customized cabinet material and color.

- The front panel adopting the new technology of toughened glass and organic glass, collision avoidance, scratch proof, waterproof design.
- Cabinet size:48.2\*128.2\*cm (W\*H, front surface size)
- Side surface size:41.65\*79.1(T\*H, thickness\*panel height)
- ●40.000 event transaction in Max.
- ■Total weight:about 90kg

#### 2. Cashier Station:

PM-900TEN Cashier Station is a PC based POS computer in JUTAI parking system. It supports the barcode tickets and provides a manned payment service for a parking facility. In case of network disconnection, it can still be operated under stand-alone mode; off-line data will be saved and then sent back to Central Management Server after network reconnected.



**PM-900TEN Cashier Station** is used for central payment application - it reads the data encoded in a barcode ticket received; calculates and displays the required amount of parking fee on the fee display. Once a payment is made, a new barcode with payment completed data is printed on the same ticket for exit validation at any exit terminal

**PM-900TEN Cashier Station** is used for pay-at-exit application it should locate at an exit point of a parking facility. It reads the data encoded in a barcode ticket received; calculates and displays the required amount of parking fee on the fee display. Once payment is completed, the system will automatically open the gate for exit.

## Standard specs:

#### **POS Computer:**

♦ Resolution: 1024×768
 ♦ Luminance: 250cd/m²

♦ Color: 16.7M

♦ Contrast ratio; 600:1

→ Touch Systems: Military resistance touch screen (Single point of up to 35 million times) (USB/RS232 Optional touch card)

♦ Main control broad:QC-1037

♦ CPU: Intel Cedar Trail series CPU 1037 1.8G

♦ Memory:2GB DDR3-1333 SDRAM (MAX 8G)

♦ Storage:2.5" SATA II SSD-32G/HDD-500G

#### **System Parameter:**

♦ Main board:QC-1037

♦ CPU: Intel® 1037 Dual Core♦ Memory: DDR3 1333MHz

♦ Chip Group: Intel® N10 Express Chipset

- ♦ SATA
- ♦ SATA II 3GB/s HDD/SDD
- ♦ SATA III 6GB/s HDD/SDD
- ♦ M-SATA
- → Audio: Realtek ALC887 HD Audio Codec integrated
- ♦ Storage: 1\*2.5 " SATA II HDD-500G/SSD-32G

#### I/O Interface

- ♦ Interface:2×RS232 connection line(4 in Max)
- ♦ Printer interface:1×LPT
- ♦ Audio output:1×Audio\1×Mic
- ♦ Video output:1×VGA、
- ♦ Network port:1×LAN
- ♦ PS2 port
- → Expansion bus:1\*PClex1 Expansion slots
- ♦ 1\*Mini PCI-E Expansion slots

#### Work Environment

- ♦ Operating temperature:-10~60°C
- ♦ Save temperature:-30~80°C
- ♦ Operation humidity:20~85%
- ♦ Earthquake-proof characteristics: 3 Grms/5~450Hz

## **Software Configuration**

- ♦ Mifare IC card validator:
- ♦ Mifare IC card reader/writer
- ♦ Receipt Printer:
- ♦ Print method: direct thermal.
- ♦ Print speed: 25 RPM (6-inch per minute). Paper width: 60 mm.
- ♦ Cashier Drawer: 4 trays for bills, 8 trays for coins.
- ♦ Electrical: 110 or 220VAC, 50/60Hz.
- ♦ POS Application Software : Administration login : Username/Password login or authorization card required; Multiple authority levels can be applied for configuring different group of system functions.
- ♦ Parking rate configuration downloaded from the server:
- --Time zone:
- --week days,
- --Holidays.
- -- Complimentary time
- --Grace time.
- ♦ Fee calculation on lost tickets. Discount selection:
- --Amount.
- --Percentage.
- --Hours.
- ♦ Mifare card reader (wall mount type) for season card (subscriber) system.
- ♦ Color TFT LCD touch screen for operator display.
- ♦ Operator shift report.

#### 3. Exit Terminal:

**PM-900TEX** is an Exit Terminal used in JUTAI parking system. It supports the barcode tickets and provides a fast and easy exit control of a parking facility. In case of network disconnection, it can still be operated under stand-alone mode; off-line data will be saved and then sent back to Central Management Server after network reconnected.

An 8 inch DGUS serial port display and a multimedia speaker provide a user friendly interface. While a presence of a car is detected at the Exit Terminal, a display and a vocal message will both prompt the driver to insert a barcode ticket for exit verification. The terminal will open the barrier gate and recycle the ticket if it is valid for exiting. In case of parking fee not paid or grace time exceeded, the ticket is then rejected back out to the ticket insert slot and the driver is prompted to retrieve the ticket, and make payment at an Auto Pay or a Cashier Station.



### Standard specs:

- Barcode ticket reader/writer/dispenser/collector
- Embedded Linux system control board.
- Isolated digital I/O control board.
- 8 `inch DGUS serial port display, screen saver design, prolong LCD life`s cycle
- Multimedia speaker.
- Sub-intercom device.
- Flexible application and compatible with IC card and ID card,
- Work with RFID Long range parking reader for hands free and fast entry/exit;
- Cabinet: Cabinet: cold rolled steel :2.0mm, Panel:5.0mm.
- Surface treatment: Unoil-Rust remove-Acid wash- Polish- dust removal- Polyester powder coating- Baking paint for metal in high temperature.
- Alarm monitoring and control:

Real time alarm monitoring and alert to the Central Management Server. Alarm types: cabinet intrusion/collision, ticket low/empty, device/ communication errors ...etc.

- Working temperature: -25 ~70°C.
- Electrical: 100/220VAC, 0.8/0.4A, 50/60Hz.
- Power: 60W.
- Mifare card reader (wall mount type) for season card (subscriber) system.
- Customized cabinet material and color.
- The front panel adopting the new technology of toughened glass and organic glass, collision avoidance, scratch proof, waterproof design
- Cabient size: 48.2\*128.2\*cm (W\*H, front surface size)
- Side surface size:41.65\*79.1(T\*H, thickness\*panel height)
- 40.000 event transaction in Max.
- Total weight: about 90kg

# 4. System working rules:

#### Central charging mode working rules:

**Entrance:** The vehicle will activate card button and ballot boxes reader after entering the parking lot. The monthly card or value card users can open the barrier with card directly and the value card user can press receipt button directly to print the receipt to check the information of consumption. The temporary card users need to press button to take ticket, and it would print different types of ticket according the feedback signal from loop detector.

**Charge:** Temporary card holder need come to central charging location, the staff will insert the ticket into all-in-one machine or use the scanning gun scanning bar code directly, the terminal will display the charging information and print bar code to record charging information after confirming payment.

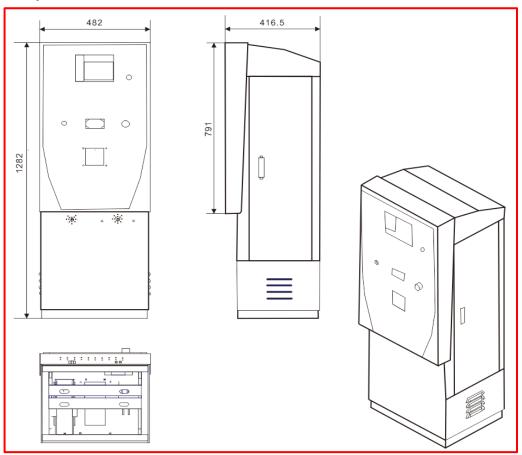
**Exit:** The vehicle will activate card collecting machine and ballot boxes reader when car is going to leave the parking lot. The monthly card or value card users can leave with card directly and the value card user can press receipt button directly to print the receipt to check the information of consumption. The temporary card users need to insert ticket into ticket collecting machine, the system will read the tickets charging information, take the ticket and open barrier after confirming payment, if you didn't pay or over time then it would remind you make a supplementary payment (It will judge the vehicle type according to the feedback signal from loop detector, you can't exit if the type is inconsistent).

#### **Export charging working rules:**

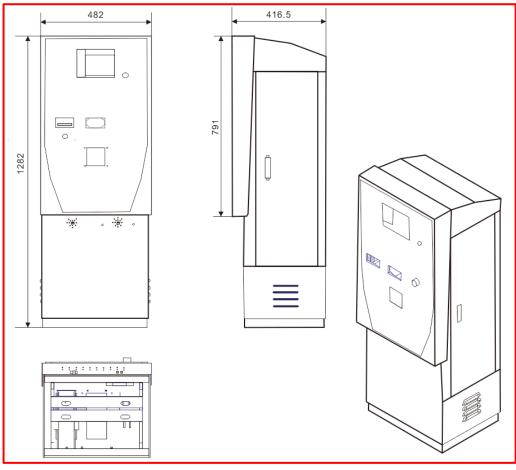
**Entrance:** The vehicle will activate card button and ballot boxes reader after entering the parking lot. The monthly card or value card users can open the barrier with card directly and the value card user can press receipt button directly to print the receipt to check the information of consumption. The temporary card users need to press button to take ticket, and it would print different types of ticket according the feedback signal from loop detector.

**Exit (Including charge):** The vehicle will activate card collecting machine and ballot boxes reader when car is going to leave the parking lot. The monthly card or value card users can leave with card directly and the value card user can press receipt button directly to print the receipt to check the information of consumption. The temporary card users need to insert ticket into ticket collecting machine, the system will read the tickets charging information, and display on the charging terminal, staff will click the release button after charging (It will judge the vehicle type according to the feedback signal from loop detector, you can't exit if the type is inconsistent).

# **Entry Terminal Size:**



# **Exit Terminal Size:**



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JUTAI Barcode Ticket Parking System Solution

# 5. Intelligent Parking Management Software

Select JUTAI Intelligent Parking Management system, you can only with just a few clicks from anywhere of the world.

#### JTPM-800 is now having a web based interface!

Simply login to parking software via a web browser to monitor and control the enter parking facility. All setups the configuration of system, the revenue or other reports inquire can be easily operated with a few finger clicks even from the other side of the world.

#### Main page:

- --Apie chart of occupancy status
- --An alarm table of instant alarms
- -- A system tree chart to monitor individual device status

Remote Control

--hardware reset or software

#### Setup:

- --System: device variable configuration
- -All device
- -Auto Pay Station/Cashier Station
- -Entry/Exit Terminals
- --Parking Area.
- --Parking Rate
- --Holiday
- --Discount
- --Operator account

**Authorization Level** 

#### Ticket:

- --Blacklist management
- --Season card management

#### Report

- -- Daily revenue
- --Operator shifts
- --Monthly revenue
- --Traffic
- --Other reports

## 6. Program Features

- User friendly interface;
- --Main functions with graphic icon button for an easy use.
- Continuous system monitoring;
- --JUTAI parking software can continuously monitors all the linked device and reports alarms if any.
- Real time status acquiring;
- --A real-time detailed status of all the linked device can be easily acquired from the device tree chart at main page.
- Alarm reporting
- --Instant alarms are prompted listed in the alarm table on the screen and also saved in database.
- Universal parking fee configuration
- -- Designed to easily setup various kinds of parking fee charging scheme
- --Muitiple rates, time zones, day types, daily/weekly maximum charges, discounts,holidays,complimentary and grace time are all configurable;
- Remote control of all linked system device
- --Hardware reset or software restarted of all linked device;
- --Open/close automatic gate remotely
- --Programmable timing output contracts to control peripheral device.
- Parking space counting system
- --Hourly& subscribed space counted respectively.
- --Vacant number can be sent to a numeric led information display; Integrated season card system;
- --Time zone configurable
- --Anti-Passback control included
- System database with a configurable backup schedule and location;
  Reports:
- --Revenue report for Auto-pay stations
- --Shift report for cashier stations
- --Transaction report for auditing
- --Traffic flow report
- -- Daily/weekly/monthly revenue report
- --Parking duration report
  - Multi-level administrative authorization implemented:
- --Each administration level authorized with selected software functions.
- --Different operator account can be assigned with different administration level.

# 7. The system highlight:

- It can store, modify or guery information by Chinese or English version.
- The software also can be edit to customers own language.
- ➤ Connecting the controller to PC directly, execute control commands and transmit parameter by the keyboard and mouse, it's easy for management staff to grasp all the information.
- Easy for setting system time, buffer time and parking rates, and it can be transmitted to devices through the network.
- Monitoring equipment status and the condition of parking space remaining through network.
- After receiving the alarm of abnormal state from vehicle barrier, it can display and print the malfunction.
- After receiving the alarm signal from a shortage of cards and tickets, it will show on the screen and start warning, and it can receive the invalid ticket information from invoice machinery and transfer it to data bank for managing.
- ➤ It will receive alarm signal from the full-automatic toll gate: signal of a shortage of cards, coin box filled up, banknote box filled up and equipment be moved or damaged.
- When the connection of machine and system malfunction, the system will send a warning signal immediately, in order to rule out malfunction as soon as possible.
- It can display the situation of remaining parking space.
- When the operator querying the information, the subtitles will display successively, the conversion of page to page can be controlled by buttons.
- You can set the traffic light manually or automatically.
- Transmitting the stall data to the information center by data link.
- You can set publicity words and the display time, which will be displayed by a super high screen.

# 8. Configuration List

JUTAI TCP/IP Parking System Device Details								
Entry Part								
No.	Products Name	Qty		Details				
1	Entry Terminal							
	Main control broad	1	English speaking, network intercome,auto-charging system					
			supporting					
	LED Display	1	Installed inside of entry terminal					
	Air switch	1						
	Power supply	1	12/24v and with two channel output					
	Power supply	1	5v output (Optional),for lighting control					
	Barcode ticket	1	Main control broad with printer					
	dispenser							
	loudspeaker	1	Optional					
	sound pickup	1	High fidelity					
	Push Button	1	with indicator, and turn on normally					
	Intercome button	1	with indicator, flash after vehicle on loop					
	Ticket Issuer mouth	1	flash with card be issued					
	vehicle detector	1	120-240	V,UK type				
	Cabinet	1	2mm co	ld steel,tempered glass of pront part				
Exit	Exit Part							
No.	Products Name	Qty	Details					
2	Exit Terminal							
	Main control broad	1	English speaking, network intercome,auto-charging system					
			supporting					
	LED Display	1	Installed inside of exit Terminal					
	Power supply	1	5v output (Optional),for lighting control					
	Power supply	1	12/24v and with two channel output					
	Air switch	1						
	Intercome button	1	with indicator, flash after vehicle on loop					
	loudspeaker	1						
	sound pickup	1	High fidelity					
	Ticket collect mouth	1	Collecting card remind after vehicle on the inductive loop					
	Vehicle detector	1	120-240V,UK type					
	Ticket scanner	1	For center charging application					
	Barcode ticket	1	For center charging application					
	collector		_					
-	Cabinet	1	2mm cold steel,tempered glass of pront part					
	ging Station							
NO.	Products Name		Qty	Details				
1	PC Server		1	Customers prepare(quotation not included)				
2	Centre ticket printer		1	Charging center application				
3	Handhold scanner		1	Charging center application				
4	LAN Switch		1	TP-LINK, customer prepare(quotation not included)				
5	Server watch dog		1	Charging computer application				

6	Server watch dog	1	Server computer application
7	Charging software	1	English version
8	Server software	1	English version, support auto-charging pay station
9	Charging device+ receipt	1	POS machine for center charging application, Quotation
	printer+cashbox+keyboard		not included
10	Database software	1	English version

# **Barrier Control and CCTV System**

NO.	Products Name	Qty	Details
1	Gate barrier	2	Entry need one unit barrier gate, and exit need one also.
2	Loop detector	2	Each unit barrier need 1 unit vehicle loop detector
3	IP Camera	1	Work with HIK and @hua this two brand, suggest that
			customers buy from local place, Quotation not included