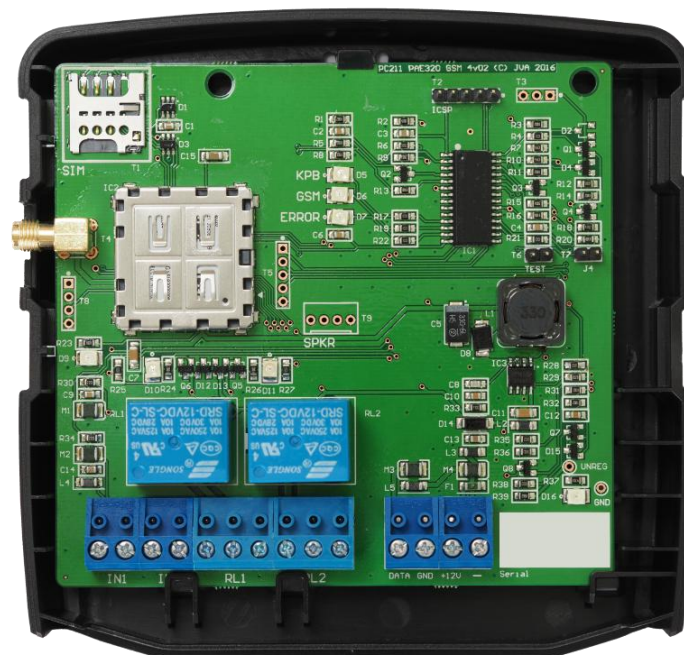




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JVA Cellular Gateway Quick Start Guide

PTE0320



Introduction

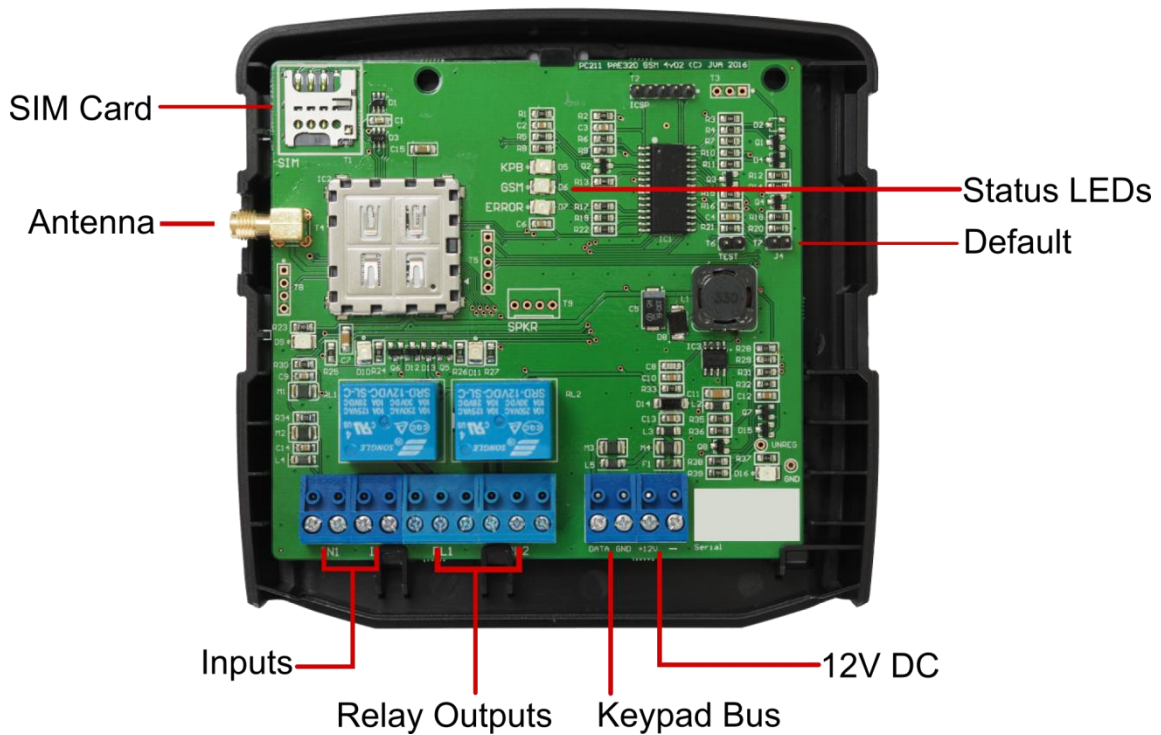
The PTE0320 JVA Cellular Gateway connects a group of JVA Z Series devices to the Cloud Router system.

This quick-start guide tells you how to program the devices, and connect and configure the PTE0320 Cellular Gateway.

Specifications

Power supply	12 V DC 1A Separate power supply recommended
Communications	Keypad Bus Up to 15 Z Series devices can be connected Unit nominally uses Keypad ID 8
Inputs (2)	Dry contact or active pull-down Responds to terminals being shorted OR connect the right-hand terminal to 0V
Outputs (2)	30V DC 8A SPDT
SIM	Micro
Network	2G (PTE0320_2G) 850/900/1800/1900MHz 3G (PTE0320_3G) B1/2/5/6/8/19 + 2G as above
Antenna connector	Female SMA Ensure antenna is mounted away from sources of interference such as AC or high voltage cables. Antenna should be mounted external to any metal enclosures.

Overview



LED Indicators

KPB	Blink when the unit is communicating with Z series devices
GSM	Blinks when the unit can receive SMS Fully lit when connected to the Cloud Router server (can also receive SMS)
ERROR	Flashes an error code if there is a problem with the SIM or Cellular network

Before you start

Ensure the Z Series devices are programmed, and have a group master (unit with ID 1). Power up all devices and make sure they are disarmed. Refer to device manuals found at

<http://www.jva-fence.com/downloads.php>

Activate your SIM card and test it in a mobile phone. The gateway predominantly uses data, typically less than 1MB per day, so a long term pre-paid plan of >500MB per year is recommended.

Installation

Unclip the circuit board from the case back. Mount the case back using suitable screws.

The unit is not water-proof and must be mounted indoors or in an enclosure.

Insert the SIM card. Clip the PCB into the case back.



Connect the antenna.

Remove any pluggable screw terminals before wiring to them, then plug them in as needed. Connect inputs and outputs first, then keypad bus wiring (Data and Ground), then connect 12V DC.

This diagram shows a typical set-up.



Confirm the KPB is flashing, the ERROR light is not flashing, and the GSM light is fully lit. Clip on the case front. If the GSM light is on, your JVA Cellular Gateway is ready to use.

Cloud Router Configuration

Important - The GSM light must be fully lit before you can add devices to the Cloud Router system. If the light is off or flashing, it is not connected to the server. Refer to the Troubleshooting section for more information.

Ensure you have registered an account at <https://cloudrouter.pakton.net/register>. The activation email may have gone to your junk folder.

Log into your account at <https://cloudrouter.pakton.net/login>

Follow the instructions at <http://jva-fence.com/CloudRouterGuide.php> to set up your site and add your devices.

SMS Function

The PTE0320 Gateway can be controlled by SMS, and contact up to 10 numbers in case of an alarm, arm state change, or trouble. See <http://jva-fence.com/sms> for full instructions.

NB: This applies to PCB version 4v03 and later, or units fitted with a “Cloud Router + SMS” sticker.

Get signal information

During set-up, it may be useful to check signal strength and confirm unit details. If the GSM light is blinking or lit, you can send an SMS to the unit of

1234 g

to receive a signal strength report.

Set APN

In some countries it may be necessary to manually set the provider APN information. This information allows cellular devices to connect to the internet and is specific to each telecommunications company. The unit has been pre-programmed with the APN information of most major telecommunications providers so confirm with your local dealer if this step is necessary. You will need to contact your telecommunications provider to determine the correct APN settings.

To change the APN, first remove the default jumper **J4**. Now send an SMS to the unit of the format

Apn <apn> <username> <password>

where <apn> is the access point name, <username> and <password> are the login details. Both username and password may be blank. You will receive a confirmation SMS if the settings were successfully stored. Remember to re-fit **J4** when you are finished.

To clear custom APN settings and use the pre-programmed information, send the SMS

Apn

Factory settings

To restore a unit to factory settings, power off the device. Remove **J4**. Power the unit back on. After 5 seconds, the unit will have returned to factory default settings. Re-fit **J4**.

Warning: This will remove all memory of seen devices, reset the SMS pin, and clear the SMS report list. It will not clear custom APN settings.

Troubleshooting

Fault	Likely Cause	Remedy
No lights are on	Power is not connected Power wires are reversed	Check power connections Check voltage at power connections with a multimeter
KPB light not flashing	Keypad bus is not connected	Check the keypad bus DATA and GND connections
GSM light off or flashing	System is still initialising. If problems are detected, the ERROR light will give more information. If the GSM light is flashing it means the unit is not yet connected to Cloud Router but can receive SMS commands.	
ERROR light flashing	1 Flash: Problem with the SIM. SIM card faulty, not inserted, or PIN locked	Confirm SIM is activated by inserting into a mobile phone and sending and receiving texts
	2 Flashes: Cellular network problem SIM not activated, banned, or out of credit Poor signal strength	Check SIM plan and credit Check antenna connection Move antenna mounting place
	3 Flashes: Cellular internet problem Plan does not support data, or out of credit	Check SIM plan and credit
	4 Flashes: Unable to connect to internet Plan does not support data, or out of credit APN information incorrect	Check SIM plan and credit Contact local dealer for APN information
	5 Flashes: Hardware fault	Contact local dealer
Unit does not control energisers	Keypad ID clash	Disconnect the other keypad or change its ID
	Energiser malfunction	Confirm a JVA keypad can control the energiser using the same connections
	Group configured incorrectly	If there is more than one energiser, ensure one is configured as master (device ID 1) and the others have unique device IDs of 2 or more

If the unit is still not working correctly, contact your nearest JVA distributor for technical support.

JVA Distributors

If you have any questions or need further assistance, please email us at sales@jva-fence.com.au or call

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Australia	07 3103 0582
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For more information on our complete range of electric fencing products please see the JVA website at www.jva-fence.com