



User Guide

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Your Etisalat Travel Router



Congratulations on the purchase of your Etisalat Travel Router. Etisalat's Travel Router is a versatile and portable solution for wireless mobile broadband for the home, office or on the road. This device creates an instant Wireless N hotspot allowing you to share an Internet connection across multiple devices like smart phones, gaming consoles or other computers. With wireless data speeds of up to 150Mbps it is 300% faster than Wireless G technology.

Connection to the Internet is achieved through either a 3G USB modem or via a fixed line (DSL/Cable/Satellite) connection to the routers WAN port. The integrated Lithium-Ion battery delivers networking power for up to 5 hours in one power-charge-cycle, which means you can set up your • Creates instant Wireless hotspots to share the Internet own Wireless network without searching for a power point.

Featuring automatic Internet failover, this device will keep

• Supports Wireless N standard with data speeds up to you connected. In case the DSL/Cable/Satellite connection drops out, it activates the 3G connection. The WAN port can also be configured optionally as a LAN port for a wired connection to a network client.

The device also features advanced security such as VPN passthrough, a full complement of wireless security options and a built in firewall. The setup is simple via a web browser interface. The Etisalat Travel Router is compatible with Mac OS X, Windows OS and Linux.

Package Contents

- 1. Etisalat Travel Router
- 2. 5VDC~2A Power Adapter
- 3. Ethernet CAT5E Crossover Cable
- 4. Quick Install Guide
- 5. CD-ROM (User's Manual)
- 6. Li-Ion Battery

Key Features

- Stylish and compact Travel Router with internal Wi-Fi antenna and battery
- connection of a 3G USB modem or DSL/Cable modem
- 150Mbps
- 1 USB 2.0 host port supports 3G modems
- 1 WAN port for alternate wired Internet connection (DSL/Cable/Satellite via Ethernet)
- Ensures connectivity and business continuity with auto-Internet-failover from WAN port to 3G USB modem
- Mains-operated or up to 5 hours battery power if no power point is available
- Hassle-free internal Wi-Fi antenna (1Transmit/1Receive)
- Easy Wireless Protected Setup (WPS) by the single touch of a button to establish a secure wireless connection
- Full Wireless security WEP, WPA, WPA2
- Browser based interface for configuration and management: OS independent and easy to use





Placement

PLACEMENT

Just like your mobile phone, a 3G USB Modem's location will affect its signal strength to the 3G Mobile Base Station (Cell Tower). The data speed achievable from a 3G USB modem is relative to this signal strength, which is affected by many environmental factors. Please keep in mind that the 3G USB Modem will need adequate signal strength in order to provide Internet connectivity whilst choosing a location to place your Travel Router.

Similarly to the 3G USB Modem, the wireless connection between the Router and your Wi-Fi devices will be stronger the closer your connected devices are to your Router. Your wireless connection and performance will degrade as the distance between your Router and connected devices increases. This may or may not be directly noticeable, and is greatly affected by the individual installation environment.

If you have concerns about your network's performance that might be related to range or obstruction factors, try moving the computer to a position between three to five meters from the Router in order to see if distance is the problem. If difficulties persist even at close range, please contact Etisalat Technical Support.

Note: While some of the items listed can affect network performance, they will not prohibit your wireless network from functioning; if you are concerned that your network is not operating at its maximum effectiveness, please contact Etisalat Technical Support.

Router Placement

Place your Router as close as possible to the centre of your wireless network devices. To achieve the best wireless network coverage for your "wireless clients" (i.e., computers with built-in or USB Wireless Adapters, Laptops with built-in Wireless, Wireless PDA / iPhone. etc):

- In multi-storey homes, place the Router on a floor that is as close to the centre of the home as possible. This may mean placing the Router on an upper floor.
- Avoid placing the Router near a cordless telephone that operates at the same radio frequency (2.4GHz).

Avoid obstacles and interference

Avoid placing your Router near devices that may emit radio "noise," such as microwave ovens. Dense objects that can inhibit wireless communication include:

- Refrigerators
- Washers and/or dryers
- Metal cabinets
- Large aquariums
- Metallic-based, UV-tinted windows

If your wireless signal seems weak in some spots, make sure that objects such as these are not blocking the signal's path (between your devices and the Router).



Cordless Phones

If the performance of your wireless network is impaired after considering the above issues, and you have a cordless phone:

- Try moving cordless phones away from your Travel Router and your wireless-enabled computers.
- Unplug and remove the battery from any cordless phone that operates on the 2.4GHz band (check manufacturer's information). If this fixes the problem, your phone may be interfering with the Wi-Fi Router.
- If your phone supports channel selection, change the channel on the phone to the
 farthest channel from your wireless network. For example, change the phone to channel
 1 and move your Travel Router to channel 11. See your phones user manual for detailed
 instructions.
- If necessary, consider switching to a 900MHz or 5GHz cordless phone.

Choose the "Quietest" Channel for your Wireless Network

In locations where homes or offices are close together, such as apartment buildings or office complexes, there may be wireless networks nearby that can conflict with your wireless network.

Use the Site Survey capabilities found in the Wireless Utility of your wireless adapter to locate any other wireless networks that are available (see your wireless adapter's user manual), and switch your Router and computers to a channel as far away from other networks as possible.

 Experiment with more than one of the available channels, in order to find the clearest connection and avoid interference from neighbouring cordless phones or other wireless devices.





Getting Started

GETTING STARTED

The LED Indicators of the 3G Travel Router

The Travel Router has been designed to be placed on a desktop. The LED indicators are easily visible on the top of the Router to provide you with information about network activity and status. See below for an explanation of each of the features.



LED	Icon	Description	
Power	<u>ம</u>	Lights up when powered ON.	
3G	<i>3G</i> ∳	Lights up when the router is connected via 3G.	
Wireless	(((9))	Lights up when WLAN is enabled. Blinks on traffic.	
WAN / LAN	모	Light up when specific Ethernet connection is established, Blinks on WAN / LAN traffic and Blinks on Temporarily overridden to LAN mode.	

The Power LED - Displaying Power and Battery Status		
When Router is switched on and battery inside		
Green:	power adapter is plugged in and battery is fully charged	
Green in flashing:	power is provided by battery	
Amber:	power adapter is plugged in and charging the battery	
RED:	Battery power is low	
When device is on without battery inside		
Amber:	Power adapter is plugged in	
When device is off and with battery inside		
Amber:	power adapter is plugged in and charging the battery	

The Connectors and Buttons of the 3G Travel Router



Side Ports	
Reset	Press once to initiate LAN port function. Hold this button down for 10 seconds to reset to factory defaults.
WPS Button	Press once to initiate Wireless Protected Setup
3G USB Modem	USB port for connecting a compatible 3G USB Modem
WAN / LAN	RJ45 WAN Ethernet port for a Fixed Line (ADSL/Cable/ Satellite) network connection (factory default) or LAN port for wired Ethernet clients (computers, laptops etc.)
Power	Power connector, connects to DC 5V 2A Power Adapter

Network and System Requirements

Before continuing with the installation of your Travel Router, please confirm that you comply with the minimum system requirements below.

 Compatible 3G USB Modem with an Active SIM/Data Service if you want to use 3G Broadband service.

Note: Subject to terms and conditions from your 3G Mobile Broadband
Service Provider.

- Computer with Windows, Macintosh, or Linux-based operating systems with a working Ethernet network adapter with TCP/IP Protocol installed.
- A web browser such as Internet Explorer, Netscape Navigator, Mozilla Firefox, Opera, Safari etc.

Wireless Computer System Requirements

• Computer with a working IEEE 802.11b, 802.11g or 802.11n wireless adapter.

Modem Requirements

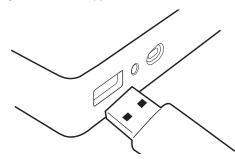
In order to use the WAN Ethernet port for Internet connectivity your fixed line service (Cable/xDSL/Satellite) modem must be equipped with an RJ45 Ethernet port. Many modems have both an RJ45 Ethernet port and a USB port. If you have a modem with both Ethernet and USB, and are using the USB port at this time, you will be instructed to use the RJ45 Ethernet port during the installation procedure. If your modem only has a USB port, you can request a different type of modem from your Internet Service Provider, or you can purchase a modem that has an RJ45 Ethernet port on it.

Connecting your device to the Router

Follow the next steps to create a Wireless Local Area Network (WLAN) to provide Internet access to 802.11b, 802.11g and 802.11n wireless-equipped computers or smartphones.

Step 1 – Connect the 3G USB Modem.

Plug the Etisalat supplied 3G USB modem into the USB port.



Charging your battery

If you use the Travel Router until the battery has completely drained, it will power off. If this occurs, let the unit charge overnight.

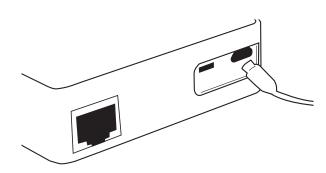
Note: The battery must be fully charged before using your Travel Router for the first time

To charge your battery please complete the following steps:

- With the battery inserted into your Travel Router connect the supplied power adapter to the wall power outlet and to the micro USB socket on the Travel Router.
- Leave it to charge until the power LED lights up solid Green.

Step 2 – Plug in the power

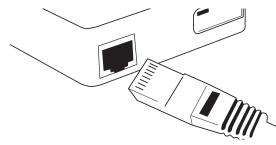
Connect the power adapter to the port on the back panel of your Travel Router. Then plug the other end of the power adapter into a wall outlet or power strip.



Step 3a – Connect a computer or smartphone via Wireless Using your wireless device, scan the wireless networks in your area and select the network called Etisalat Travel Router, then click connect. When the security key prompt is displayed enter the security key 3GT1WNEO

Step 3b - Connect a computer via Ethernet

Press the Reset button on the Router and connect one end of the Ethernet cable to the WAN/LAN Port on the back panel of the Travel Router, and the other end to the RJ45 Ethernet port of the laptop or desktop PC you would like to use.



Default Settings

LAN (Management)

Static IP Address: 192.168.20.1 Subnet Mask: 255.255.255.0 Default Gateway: 192.168.20.1

WAN (Internet)
WAN mode: DHCP

Wireless

SSID: Etisalat Travel Router

Channel: 11

Security: WPA-PSK
TKIP Key: 3GT1WNE0
Modem Access
Username: admin

Password: admin

Configuring your Router and setting up your computer

Having physically connected your Router, the next step is to configure the Router to establish a broadband connection. Depending on your computers current settings you may first need to reconfigure the TCP/IP (Network Settings) to access your Router. Follow the instructions for your operating system.

Windows Vista computers

- In the Windows task bar, click on Start and then click Control Panel.
- 2. Click on Network and Sharing Center. (Classic view only)
- 3. Click on Manage Network Connections on the left menu.
- 4. Right click on Local Area Connection and click on Properties
- 5. The Local Area Connection dialog box will display a list of currently installed network items. Ensure that the check box to the left of the item labelled Internet Protocol Version 4 (TCP/IPv4) is checked. Select Internet Protocol Version 4 (TCP/IPv4) and click on Properties.
- 6. In the Internet Protocol Version 4 (TCP/IPv4) properties dialog box, click the radio button labelled Obtain an IP address automatically. Also click the radio button labelled Obtain DNS server address automatically.
- Click OK twice to confirm your changes and close the Control Panel.

Windows® XP computers

- In the Windows task bar, click the Start button, and then click Control Panel.
- Click on Network & Internet Connections icon. (Category mode only).
- 3. Click the Network Connections icon.
- 4. In the LAN or High-Speed Internet window, right-click on the icon corresponding to your network interface card (NIC) and select Properties. (Often, this icon is labeled Local Area Connection).
- 5. The Local Area Connection dialog box displays with a list of currently installed network items. Ensure that the check box to the left of the item labelled Internet Protocol (TCP/IP) is checked. Select Internet Protocol TCP/IP and click on Properties.
- In the Internet Protocol (TCP/IP) Properties dialog box, click the radio button labelled Obtain an IP address automatically. Also click the radio button labelled Obtain DNS server address automatically.
- Click OK twice to confirm your changes, and close the Control Panel.

Mac OSX 10.4

- 1. Click the Apple icon and choose System Preferences.
- 2. Click on the Network icon.
- 3. Set Location to Automatic and Show to Built In Ethernet.
- 4. Click on the TCP/IP tab.
- In the Configure option, choose Use DHCP with automatic address.
- 6. Click on Apply Now.

Setting up your Travel Router

The next step is to establish the broadband connection to the Internet. Please follow the steps below to configure your router via the user interface.

- Open your web browser (e.g. Internet Explorer/Firefox/ Safari) on your computer or smartphone and navigate to http://192.168.20.1/
- Click Login and type "admin" (without quotes) in the Username and Password fields. Then click on Submit.



Note: Admin is the default username and password for the unit.

3. Set up your WAN connection as follows:

Using the Router with the Etisalat 3G Mobile Broadband Internet Service

Note: Before proceeding with this step, ensure that your 3G USB Dongle has been plugged into the USB port of your Travel Router

To configure a 3G WAN connection, please follow these steps:

- Mouseover Internet Settings and click on WWAN
- The appropriate Etisalat profile and APN are selected by default
- If you wish to enter a different APN to use, click on the "Profile Name" pull down menu and select an unused profile
- Click in the "APN" section and enter: etisalat.ae (or your provided APN if necessary)

Otherwise if:

- Your SIM card requires a PIN code
- Your 3G broadband service provider requires you to input the username/password for your 3G connection.
- You wish to use other alternate 3G connection details (such as a special APN)

Please enter any other relevant information on this screen as provided by Etisalat



- Click Apply to save the settings
- If everything is configured properly, the Status page will show that your 3G service is online and the WAN IP address that has been assigned.



Using the Travel Router with a fixed line Broadband Internet Service (DSL/Cable)

Note: Before proceeding with this step, ensure that your WAN connection has been plugged into the WAN port of your Travel Router

To configure a non WAN connection (Static, DHCP, PPPoE, PPTP), please follow these steps:

- Mouseover Internet Settings and click on WAN
- Select your WAN Connection type from the dropbox (Static, DHCP, PPPoE, PPTP)
- Enter the relevant information on this screen as supplied by your Broadband ISP
- Click Apply to save the settings
- If everything is configured properly, the Status page will show that your WAN service is online and the WAN IP address that has been assigned. Non-3G connection status page example:

Connected Type	PPPOE	
WAN IP Address	121.44.22.76	
Subnet Mask	255.255.255.255	
Default Gateway		
Primary Domain Name Server	192.231.203.132	
Secondary Domain Name Server	192.231.203.3	
MAC Address	00:60:64:29:44:B3	



Advanced

ADVANCED FEATURES

This section explains other features that you may want to enable depending on your application. Some features can add extra stability and error recovery. Other features are available to assist with integrating the Travel Router with your application.

Login Procedure

- 1. Open your web browser (e.g. Internet Explorer/Firefox/ Safari) and navigate to http://192.168.20.1/
- Click Login and type "admin" (without quotes) in the Username and Password fields. Then click on Submit.



Note: admin is the default username and password for the unit.

Status

The status page provides system related information. It is shown on login to the Router, and can also be accessed by selecting Status from the top menu.

By default, the status page will show System Info, Local Network, WWAN, Connection Status and Ethernet Status. To view either WAN, PPPoE or PPTP individually, click on their relevant buttons. To view them all, click on the All Status button



Ethernet Port Status

The default setting for the Router's Ethernet port is set to operate as a WAN port. But the Travel Router allows the Ethernet port to be changed from WAN to LAN or LAN to WAN.



Ethernet Port status	Description
Current	Current port status, either WAN or LAN
LAN	Change the current port status to LAN
WAN	Change the current port status to WAN

3G Internet Settings

This page allows you to setup your WWAN (Wireless Wide Area Network) connection. Enter the relevant settings as provided by Etisalat.



Note: The 3G connection fields may not be necessary for your connection
The information on this page will only be used when your service
provider requires you to enter a User Name and Password to connect
to the 3G network

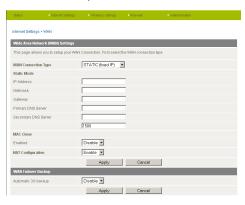
Name	Description		
APN:	Enter the APN as supplied by Etisalat		
User Name:	Enter your 3G username		
Password:	Enter your 3G password		
3G NAT:	Enables network address translation on your 3G connection		
WAN NAT:	Enables network address translation on your WAN connection		
Operation Mo	Operation Mode; There are 3 options:		
'Always On'	Keeps the Internet connection alive, does not disconnect.		
'OFF'	Does not connect to the Internet.		
'Automatic 3G Backup'	The Automatic 3G Backup feature of the Travel Router is designed to provide a backup 3G Internet connection in case your primary connection should fail. To use this feature, you will need both an Ethernet WAN connection (from an xDSL modem/ISDN/Satellite etc) and a 3G WAN connection.		
PIN:	Enter the Pin Code for your SIM card		

WAN

Select the WAN connection type suitable for your environment and configure parameters according to the selected connection type.

STATIC (FIXED IP)

If your WAN connection uses a static IP address, please select Static IP Address and fill in the required information in the fields provided.



Name	Description
IP Address: Type in the IP address assigned by your Internet Service Provider	
Subnet Mask:	Type in the Subnet mask assigned by your Internet Service Provider
Default Gateway:	Type in the WAN Gateway assigned by your Internet Service Provider
Primary/ Secondary DNS:	Type in the DNS address assigned by your Internet Service Provider
MAC Clone:	Please input the MAC address of your computer here if your service provider only permits computers with a certain MAC address to access the Internet. If you are using the computer which used to connect to the Internet via a cable modem, you can simply press the 'Default' button to fill the MAC address field with the MAC address of your computer.
NAT Configuration	Allows you to enable or disable network address translation (NAT) for this WAN connection type

Click Apply to save the settings.

DHCP (AUTO CONFIG)

This connection will get the IP address from the Internet service provider. Choose this connection if you are connecting the router to a Cable Modem service. Leave everything as default unless instructed by your Internet Service Provider.



Name	Description
Hostname	Please input the host name of your computer. This is optional, and only required if your service provider asks you to do so.
MAC Clone	Please input the MAC address of your computer here if your service provider only permits computers with a certain MAC address to access the Internet. If you are using the computer which used to connect to Internet via a cable modem, you can simply press the 'Default' button to fill the MAC address field with the MAC address of your computer.
NAT Configuration	Allows you to enable or disable network address translation (NAT) for this WAN connection type

PPPOE (ADSL)

Most ADSL services use the PPP over Ethernet protocol. Use this if you connect your Travel Router to a bridged ADSL modem.



Name	Description
Username/Password	Type in your PPPoE account username and password.
Operation Mode; There a	re 3 options:
'Keep Alive'	Keeps the Internet connection alive, does not disconnect.
'On Demand'	Only connects to the Internet when there's a connect attempt
'Manual'	Only connects to the Internet when the 'Connect' button on this page is pressed, and disconnects when the 'Disconnect' button is pressed.
MAC Clone	Please input the MAC address of your computer here if your service provider only permits computers with a certain MAC address to access the Internet. If you are using the computer which used to connect to the Internet via cable modem, you can simply press the 'Default' button to fill the MAC address field with the MAC address of your computer.
NAT Configuration	Allows you to enable or disable network address translation (NAT) for this WAN connection type

Click Apply to save the settings.

PPTP

PPTP (Point to Point Tunneling Protocol) allows for a secure connection over the Internet by simply dialing in a local point provided by your ISP. The following screen allows client PCs to establish a normal PPTP session and provides hassle-free configuration of the PPTP client on each client PC.



Name	Description
Server IP address:	Type in the server IP address assigned by your PPTP Provider.
PPTP Account/ Password:	Type in the username and password assigned by your PPTP provider.
Address Mode:	Select Dynamic if your service uses a DHCP server, or select Static and type in the IP address, Subnet Mask and Default Gateway assigned by your Internet Service Provider.
Operation Mode; There	e are 3 options:
'Keep Alive' -	Keeps the Internet connection alive, does not disconnect.
'On Demand' -	Only connects to the Internet when there's a connect attempt
'Manual' -	Only connects to the Internet when the 'Connect' button on this page is pressed, and disconnects when the 'Disconnect button is pressed.
MAC Clone:	Please input the MAC address of your computer here, if your service provider only permits computers with a certain MAC address to access Internet. If you're using the computer which used to connect to Internet via cable modem, you can simply press 'Fill My MAC' button to fill the MAC address field with the MAC address of your computer.
NAT Configuration	Allows you to enable or disable network address translation (NAT) for this WAN connection type

WAN FAILOVER BACKUP

The WAN Failover Backup feature of the Travel Router is designed to provide a backup 3G Internet connection in case your primary connection should fail. To use this feature, you will need both an Ethernet WAN connection (from an xDSL modem/ISDN/Satellite etc) and a 3G WAN connection.

To set up WAN failover on your Travel Router, first tick "Enable automatic 3G backup", then fill in the fields that appear.

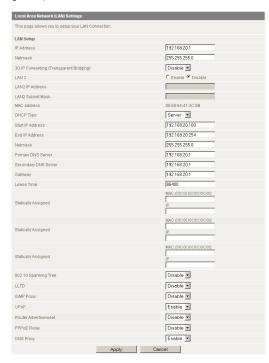


Name	Description
Internet Host:	Enter an Internet address here to check the Internet connection
APN:	Enter the APN for your 3G service
User Name:	Enter your 3G username
Password:	Enter your 3G password

Click Apply to save the settings.

LAN

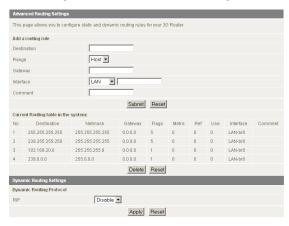
This Page allows you to change the LAN (Local Area Network) settings of your Travel Router.



Name	Description
IP Address:	The local IP address of this device.
Subnet Mask:	The subnet mask of the local IP address
LAN 2:	Used to configure a secondary LAN IP Address
MAC Address:	The LAN MAC address of your Travel Router
DHCP Type:	Please leave this set to 'Enable' unless you have another DHCP server on the same network.
Primary DNS/ Secondary DNS:	(Optional) This feature allows you to manually assign DNS Servers
Lease Time:	DHCP lease times of the DHCP clients of your Travel Router.

Advanced Routing

This page allows you to configure static and dynamic routing rules for your Travel Router.



ADVANCED ROUTING - STATIC

Static Routing allows computers that are connected to your Travel Router to communicate with computers on another LAN segment which are connected to it via another router. To set a rule, you need to specify the following:

- Destination
- Netmask (if applicable select the "Net" range as the route type)
- Gateway
- Interface

ADVANCED ROUTING - DYNAMIC

Dynamic Routing uses the RIP protocol to allow the Travel Router to adapt to changes in the network. RIP enables the device to determine the best route for each packet based on the "hop count" or number of hops between Source and Destination. To enable Dynamic Routing, select Enable from the dropbox and click Apply.

DHCP Client

This page allows you to view the current DHCP clients connected to your Travel Router.

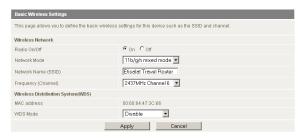
DHCP Client List		
This page allows you to view the current DHCP client of your 3G Router.		
DHCP Clients		
MAC address	IP Address	Expires in
00:00:00:00:00:00	192.168.20.100	00:13:57
00:60:64:24:0B:D3	192.168.20.101	00:00:00



Wireless

Basic

This page allows you to define the basic wireless settings for this device such as the SSID and channel.



Name	Description
Radio On/Off:	On by default. Changing this option to Off will turn off the wireless feature on the unit and you will not be able to connect to your Travel Router wirelessly.
Network Mode: You can selec	t which wireless standards are able to connect to your wireless network:
11b/g mixed mode:	Both 802.11b and 802.11g wireless devices are in your network.
11b only:	Select this if all of your wireless clients are 802.11b.
11g only:	Select this if all of your wireless clients are 802.11g.
11n only:	Select this if all of your wireless clients are 802.11n.
11/b/g/n mixed mode:	Select this if 802.11b and 802.11g and 802.11n wireless devices are in your network.
Network Name (SSID):	The SSID (Service Set Identifier) is the name of your wireless network. Use a unique name to identify your wireless network so that you can easily connect from your wireless clients. This field is case sensitive and can be up to 32 characters. You should change the default SSID for added security.
Frequency (Channel):	This setting configures the frequency that the Wireless Radio uses for wireless connectivity. Select one channel that you wish to use from the drop down list.
WDS Mode	Wireless Distribution System (WDS) enables you to connect multiple Wireless Access Points together to extend the range of your wireless network. You can enable this if needed

Click Apply to save the settings.

Advanced

This page allows you to modify the advanced wireless settings for your Travel Router. These settings should not be changed unless you are aware of what effect they will have.

Status Internet Settin	gs V/reless settings	Firewal	➤ Administration
Wireless settings > Advanced			
Advanced Wireless Settings			
	advanced wireless settings fi	or your 3G Router. Th	nese settings should not be changed unless yo
are aware of what effect they will ha	VB.		
Advanced Wireless			
BG Protection Mode	Auto 🕶		
Beacon Interval	100 ms (ange 20 - 999, defa	ult 100)
Data Beacon Rate (DTIM)		ange 1 - 255, defaul	
Fragment Threshold		e 256 - 2346, defaul	
RTS Threshold		e 1 - 2347, default 2	
TX Power	100 PBC		
Short Preamble	C Enable © D	isahle	
Short Slot	€ Enable C E		
Tx Burst	€ Enable C E		
Pkt_Aggregate	€ Enable CE	isable	
Country Code	UAE (United /	Arab Emirates)	
AP Isolation	C Enable @ E	isable	
MBSSID AP Isolation	C Enable C E	isable	
BSSID	00:60:64:47:30	:66	
Multiple SSID1			
Multiple SSID2			
Multiple SSID3			
Multiple SSID4			
Broadcast Network Name (SSID)	€ Enable C E	isable	
WiFi Multimedia			
VVMM Capable	€ Enable C E	isable	
APSD Capable	C Enable C E	isable	
DLS Capable	C Enable C	isable	
VVMM Parameters	WMM Configu	ration	
Multicast-to-Unicast Converter			
Multicast-to-Unicast	C Enable C E	isable	
HT TxStream	2		
HT RxStream	2 💌		
HT Physical Mode			
Operating Mode	Mixed Mode	C Green Field	
Channel BandWidth	C 20 € 20/4	0	
Guard Interval	C Long C Aub)	
MCS	Auto 💌		
Reverse Direction Grant(RDG)	€ Enable € Di	sable	
Extension Channel	2412MHz Cha	nnel 1 💌	
Aggregation MSDU(A-MSDU)	C Enable C D	isable	
Auto Block ACK	⊕ Enable C D		
Decline BA Request	C Enable C D	isable	

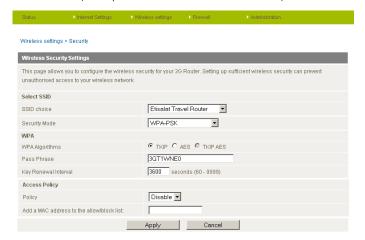


Name	Description
Beacon Interval:	Interval of time the wireless router broadcasts a beacon, used to synchronize the wireless network.
Data Beacon Rate (DTIM):	Enter a value between 1 and 255 for the Delivery Traffic Indication Message (DTIM). A DTIM is a countdown informing clients of the next window for listening to broadcast and multicast messages
Fragment Threshold:	This specifies the maximum size of a packet during the fragmentation of data to be transmitted. If you set this value too low, it will result in bad performance.
RTS Threshold:	When the packet size is smaller than the RTS threshold, the wireless router will not use the RTS/CTS mechanism to send this packet.
AP Isolation:	This feature allows you to isolate clients on your wireless network. To enable communication between the wireless clients connected to your Travel Router, select Disabled. To prevent the communication between the wireless clients, please choose Enabled.
TX Power:	This determines the output power of the antenna
WMM Capable:	WMM (Wi-Fi Multimedia) if enabled supports QoS (Quality of Service) for experiencing better audio, video and voice in applications
WMM Parameters:	Click on the WMM Configuration button to configure the WMM parameters
Broadcast Network Name (SSID):	Select 'Disabled' to hide the SSID of your Travel Router. If disabled, other people will not be able scan and detect this product's SSID.

Click Apply to save any changes made to the settings.

Security

This page allows you to configure the wireless security for your Travel Router. Setting up sufficient wireless security can prevent unauthorised access to your wireless network.



Name	Description
SSID Choice:	Select the SSID on which to configure the security settings
Security Mode:	Select the security mode for the wireless network. See below for more information
Access Policy:	This feature allows MAC Address Control, which prevents unauthorized clients from accessing your wireless network. Select whether to allow/block users on the policy list, and add their MAC addresses to the list on the format XX:XX:XX:XX:XXX



Security Mode

You may choose from the following wireless security options: Disabled, Open, Shared, WEP AUTO, WPA, WPA-PSK, WPA2, WPA2-PSK, WPA1-WPA2 or 802.1x.



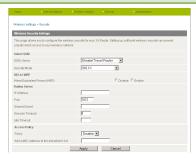
Name	Description
WEP:	WEP (Wired Equivalent Privacy) helps prevent against unwanted wireless users accessing your Travel Router. It has been superseded by WPA-PSK



Name	Description
WPA/WPA2:	WPA (Wi-Fi Protected Access) authentication is suitable for enterprises. It must be used in conjunction with an authentication server such as RADIUS to provide centralized access control and management. It can provide stronger encryption and authentication solution than non WPA modes.



Name	Description
WPA-PSK/WPA2-PSK:	WPA-PSK is enabled by default. WPA-PSK (TKIP) and WPA2-PSK (AES) are a newer type of security. This type of security gives a more secure network connection when compared to WEP. Use TKIP Encryption Type for WPA-PSK and AES for WPA2-PSK. After that, please enter the key in the Passphrase field. The key needs to be more than 8 characters and less than 63 characters and it can be any combination of letters and numbers. Please note that the configuration for WPA-PSK and WPA2-PSK is identical.



Name	Description
802.1x:	In order to use 802.1X security, you need to have a RADIUS server on your network that will act as the authentication server. Please type in the details for your RADIUS server in the fields required.

Note: After configuring wireless security, you also need to configure your wireless adapter to use the same security settings before you can connect wirelessly. Not all wireless adapters support WPA-PSK/WPA2-PSK/WPA/WPA2 security; please refer to your wireless adapter user guide for more details. It is strongly recommended to set up a simple wireless security such as WEP 64bit or WPA (when the wireless client supports WPA) in order to secure your network.



WPS

WPS is the simplest way to establish a connection between wireless clients and your Travel Router. This method removes the need to manually select the encryption mode and fill in the passphrase. You only need to press a button on both wireless client and wireless router, and WPS will do the rest for you. The wireless router supports two types of WPS:

Name	Description
WPS via Push Button	You have to push a specific button on the wireless client or in your wireless client utility to start the WPS mode, and switch the wireless router to WPS mode. You can simply push the WPS button of the wireless router, or click the 'Start Process' button in the web configuration interface
WPS via PIN code	You have to know the PIN code of the wireless client and switch it to WPS mode, then input the wireless client PIN to the wireless router web interface.



Name	Description
WPS:	Use the dropbox to either enable or disable the WPS function.
WPS Current Status:	If the wireless security (encryption) function of this wireless router is properly set, you will see a 'Success' message here. Otherwise, you will see 'Idle'.

WPS SSID:	This is the network broadcast name (SSID) of the router.
WPS Auth Mode:	It shows the active authentication mode for the wireless connection.
WPS PIN:	This is the WPS PIN code of the wireless router. You may need this information when connecting to other WPS-enabled wireless devices.
WPS Mode:	Select either PIN or PBC.

Station List

The Station List shows the wireless clients currently associated with your Travel Router.

Wireless Settings > Station List







Firewall

FIREWALL

MAC/IP/Port Filtering

This page allows you to setup MAC, IP and port filtering rules to protect your network from malicious activity. The filtering rules can be used to either allow or block certain users and/or ports from accessing the Internet.

Firewall > MAC/IP/Port Filtering This page allows you to setup MAC, IP and port filtering rules to protect your network from malicious activity. The filtering rules can be used to either allow or block certain users and/or ports from accessing the Internet. Basic Settings MAC/IP/Port Filtering Disable -Default Policy - The packet that don't match with any rules would be: Dropped. MAC/IP/Port Filter Settings MAC address Dest IP Address Source IP Address Protocol None 💌 Dest Port Range Source Port Range Action Accept ▼ Comment (The maximum rule count is 32.) Current MAC/IP/Port filtering rules in system: Protocol address Address Others would be dropped Delete Selected Reset

Basic Settings	asic Settings	
Name	Description	
MAC/IP/Port Filtering:	Select Enable to enable MAC/IP/Port Filtering	
Default Policy:	Select whether packets that do not match any rules are accepted or dropped	

MAC/IP/Port Filtering Settings	rt Filtering Settings		
Name	Description		
MAC Address:	MAC address of a local computer		
Dest IP Address:	Destination IP Address for the filter rule		
Source IP Address:	Source IP Address for the filter rule		
Protocol:	Select the port number protocol type (TCP, UDP or both). If you are unsure, then leave it to the default "TCP&UDP" setting		
Dest Port Range:	Destination Port Range of the filter rule		
Source Port Range:	Source Port Range of the filter rule		
Action:	Either accept or drop the packet that matches the rule		
Comment:	Add a comment to identify the rule (optional)		



Port Forwarding

Firewall > Port Forwarding

Current Virtual Servers in system:

IP Address

This page allows you to configure port forwarding rules to allow remote users to access services such as Web or FTP on your local computers. This allows you to redirect a particular port number (from the Internet/WAN port) to a particular LAN IP address.

Port Forwarding Settings This page allows you to configure port forwarding rules to allow remote users to access services such as Web or FTP on your local computers. This allows you to redirect a particular port number (from the InternetWAN port) to a particular LAN IP address. Virtual Server Settings IP Address Port Range Protocol TCP&UDP Comment (The maximum rule count is 32.)

Name	Description
Virtual Server Settings:	Enable/Disable port forwarding
IP Address:	The LAN IP address that the public port number packet will be sent to
Port Range:	The public port numbers to be sent to the specific LAN IP address
Protocol:	Select the port number protocol type (TCP, UDP or both). If you are unsure, then leave it as the default "TCP&UDP" setting
Comment:	Add a comment to identify the rule (optional)

Port Range

Delete Selected Reset

Click Apply to save the settings.

DMZ

If you have a client PC that cannot run an Internet application (e.g. Games) properly from behind the NAT firewall, then you can open up the firewall restrictions to allow unrestricted two-way Internet access by defining a DMZ Host.

The DMZ function allows you to re-direct all packets going to your WAN port IP address, to a particular IP address in your LAN. The difference between the virtual server and the DMZ function is that the virtual server re-directs a particular service/Internet application (e.g. FTP, websites) to a particular LAN client/server, whereas DMZ re-directs all packets (regardless of services) going to your WAN IP address to a particular LAN client/server.

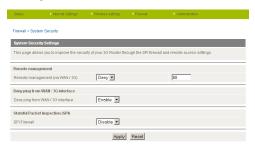


Name	Description
DMZ Settings:	Enable/disable DMZ.
DMZ IP Address:	Fill-in the IP address of a particular host in your LAN Network that will receive all the packets originally going to the WAN port/Public IP address of your Travel Router.



System Security

This page allows you to improve the security of your Travel Router through the SPI firewall and remote access settings.

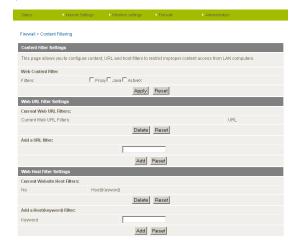


Name	Description
Remote Management (via WAN):	Enable/Disable remote management on the WAN interface.
Deny ping from WAN interface:	Select Enable to deny ICMP packets received on the WAN interface. Otherwise, select Disable to allow ICMP packets received on the WAN interface.
SPI Firewall:	Enable/Disable the SPI (Stateful Packet Inspection) firewall to improve the security of your Travel Router.

Click Apply to save the settings.

Content Filtering

This page allows you to configure content, URL and host filters to restrict improper content access from LAN computers



Name	Description
Web Content Filter:	Tick the boxes to enable Proxy, Java or ActiveX content filtering
URL Filter:	Block access to a website by entering its full URL address.
Host Filter:	Block access to block access to certain websites by entering a keyword



Administration

Management

This page allows you to configure administrator system settings including the administrator username and password, NTP settings, and DDNS settings.



Name	Description
Select Language:	Select a language for the web interface. English and Arabic are available
Administrator Settings (account/password):	Configure a new administrator username and password.
NTP Settings:	The NTP (Network Time Protocol) settings allow your router to synchronise its internal clock with the global Internet Time. These settings will affect functions such as System Log entries and Firewall settings.
DDNS:	DDNS (Dynamic Domain Name Service) allows you to map the static domain name to a dynamic IP address. To use this feature, you must sign up for an account from a DDNS service provider. This router supports DynDNS, TZO and other common DDNS service providers.

Click Apply to save the settings.

System Monitor



Periodic Ping Settings

The Periodic Ping Reset Monitor configures the Travel Router to transmit controlled ping packets to 1 or 2 user specified IP addresses. Should the router not receive responses to the pings the router will reboot.

This works as follows:

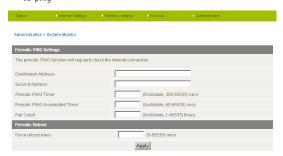
- A. After every "Periodic Ping Timer" configured interval, the router sends 3 consecutive pings to the "Destination Address".
- B. If all 3 pings fail the router sends 3 consecutive pings to the "Second Address".
- C. The router then sends 3 consecutive pings to the "Destination Address" and 3 consecutive pings to the "Second Address" every
- "Periodic Ping Accelerated Timer" configured interval.
- D. If all accelerated pings in step C above fail the number of times configured in "Fail Count", the router reboots.
- E. If any ping succeeds the router returns to step A and does not reboot.

Note: The "Periodic Ping Timer" should never be set to a value less than 300 seconds; this is to allow the router time to reconnect to the cellular network following a reboot.

Periodic Ping Disabled

To disable the Periodic Ping Reset Monitor simply leave the fields blank

NB: The traffic generated by the periodic ping feature is counted as chargeable usage. Please keep this in mind when selecting how often to ping



How to Configure a Periodic Reset Timer

The router can be configured to automatically reboot after a periodic interval specified in minutes. While this is not necessary, it does ensure that in the case of remote installations, it will reboot the router if some anomaly occurs.

The default value is 0 which disables the Periodic Reset Timer. The maximum value is 65535 minutes.

Periodic Reboot		
Force reboot every	(5-65535) mins	

Upload Firmware

This page allows you to upgrade the Router's firmware. To upgrade the firmware of your Travel Router, you need to download the firmware file to your local hard disk, and then click the Browse button to locate the firmware file you just downloaded.



Once you have selected the new firmware file, click Apply to start the upgrade process.

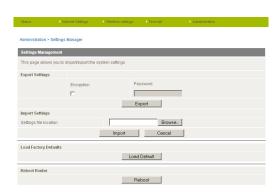
Setting Manager

This page allows you to import/export the system settings, reset your Travel Router to factory defaults, or reboot your Travel Router.

The export settings feature enables you to store a backup copy of the configuration currently being used the Travel Router. This can then be easily restored to the Travel Router at a later time if necessary.

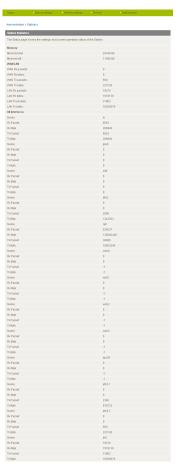
The configuration file contains the settings and account information used by the Travel Router. As such, it is recommended to use a password to encrypt this information and prevent any unauthorised use.

You will be prompted to enter the appropriate password when restoring the configuration.



Statistics

This page allows you to view the LAN, WAN and wireless statistics of your Travel Router.

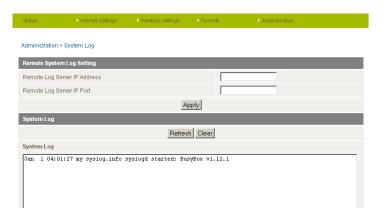


System Log

All system events are logged. You can use this function to check the event log of your Travel Router.

The System Log feature also offers the ability to send your system log information to a remote syslog computer. This means the system log information will be available even if the Travel Router is rebooted or the System Log page is cleared.

To use this feature, enter the appropriate IP address and port for the computer or device running the syslog server application.





Trouble Shooting

TROUBLE SHOOTING

This section provides an overview of common issues, and possible solutions for the installation and operation of your Travel Router.

1. Why your wireless client CAN NOT access the Internet?

When the Travel Router is configured to use Wireless encryption (WEP, WPA/WPA2 etc), you need to ensure your wireless adapter settings match your 3G Routers settings. Please refer to your wireless adapter manual for more information. Ensure that the wireless client is associated with your Travel Router.

To check this connection (Windows XP), follow these steps:

- Click on Start > Control Panel > Network Connection
- Right Click on Wireless Network connection
- Select View Available Wireless Networks. The "Connect to Wireless Network" screen appears. Ensure you have selected the correct wireless network.

Ensure the IP Address assigned to the wireless adapter is within the same subnet as your Travel Router. The Travel Router has a default IP Address of 192.168.20.1. Wireless adapters must have an IP Address in the same range (e.g., 192.168.20.x). Although the subnet mask must be the same for all the computers on the network, no two devices may have the same IP Address. Therefore, each device must have a unique IP Address.

To check the IP Address assigned to the wireless adapter,

follow the steps below:

- Click on Start > Run
- Type in CMD and press Enter.
- Type in "ipconfig /all" and press Enter
- Type in "ping 192.168.20.1" to check if you can access the Travel Router

Note: If you have changed the default IP Address, ensure you ping the correct IP Address assigned to the Travel Router.

2. Why does your wireless connection keep dropping?

Please try the following steps to improve the wireless signal quality. Ensure the battery of your Travel Router is fully charged.

- Try to keep the Travel Router at least 6 inches away from the wall or other objects.
- Try changing the channel on the Router to a different channel to avoid interference. Please refer to the Basic Wireless settings section of this manual
- Keep your product away (at least 3-6 feet) from electrical devices that generate RF noise, like microwaves, monitors, electric motors, etc.
- 3. Cannot establish a wireless connection?

Note: An Ethernet connection is required to troubleshoot the Travel Router.

When the Travel Router is configured to use Wireless encryption (WEP, WPA/WPA2 or any encryption), you need to ensure that your wireless adapter settings match. Please refer to your wireless adapter manual for additional information.

 Move the Travel Router and the wireless client into the same room, and then test the wireless connection.

- Try to disable all security settings such as WEP, and MAC Address Control.
- Turn off the Travel Router and the client. Then turn the Travel Router back on again, and then turn on the client.
- Ensure that all devices are set to Infrastructure mode.
- Ensure that the LED indicators are indicating normal activity. If not, ensure that the AC power adapter is firmly connected or the battery of the Travel Router is charged.
- Ensure that the IP Address, subnet mask, gateway and DNS settings are correctly entered on the computer.
- If you are using 2.4GHz cordless phones, X-10 equipment, or other home security systems, ceiling fans, or lights, your wireless connection may degrade dramatically, or drop altogether.
- To avoid interference, you can change the wireless Channel on your Travel Router.
- Keep your product at least 3-6 feet away from electrical devices that generate RF noise. Examples include: microwaves, monitors, electric motors, and so forth.

4. Can not remember your encryption key. What should you do?

If you forgot your encryption key, the Wireless device will not be able to establish a connection to your Travel Router.

To reset the encryption key(s), login to the Travel Router web configuration using an Ethernet connection.

5. How do you reset your Travel Router to its factory default settings?

To factory reset the Travel Router to its factory default settings, follow the steps listed below:

- Ensure that the router is powered on (for at least 1 minute).
- Press the reset button for at least ten seconds and release.
 At this point, the reset is in progress. Do not power off the unit at this point.
- After your Travel Router reboots, the default settings are now restored. This entire process takes several minutes to complete.
- Once you have reset the router to its default settings you will be able to access the device's web configuration using http://192.168.20.1 with username/password of "admin".
- 6. What you can do if the Ethernet cable does not work properly
- The Travel Router's Ethernet port is a WAN port by default, simply press the reset button down for one second for the WAN port to switch to become a LAN port.

- Ensure that there is a solid cable connection between the Ethernet port on the Travel Router, and your NIC (Network Interface Card).
- Check that the settings on your network adapter are "Enabled," and set to accept an IP address from the DHCP (Please refer to the Computer Hardware Configuration section in this manual for additional information).
- If all settings appear to be correct, ensure that you are not using a crossover Ethernet cable. Although the Travel Router is MDI/MDIX compatible, not all NIC are. Therefore, it is recommended that you use a straight through Ethernet cable when possible.
- 7. What you can do when your Travel Router has no power
- Plug in the power adapter provided to recharge your battery

Note: You can still use the Travel Router with no battery power, as long as the power adapter is plugged in.



Wireless Connection

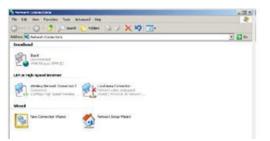
ESTABLISHING YOUR WIRELESS CONNECTION

The following examples use "Etisalat Travel Router" as the SSID and WPA-PSK with "3GT1WNE0" as the encryption key.

Windows XP

Follow these steps:

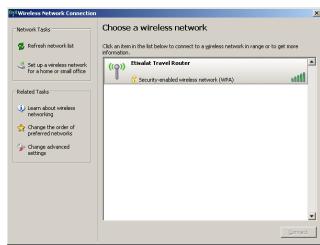
1. Open Network Connections (Start -> Control Panel -> Network Connections):



2. Right-click on your Wireless Network Connection and 4. Enter the network key ("3GT1WNEO") and click Connect: select View Available Wireless Networks:

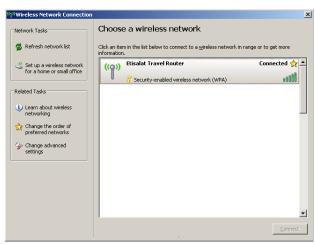


3. Select the wireless network you want to connect to ("Etisalat Travel Router") and click Connect:





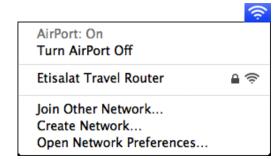
5. The connection will show Connected.



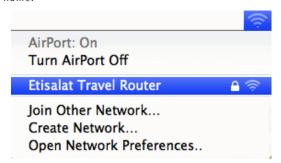
Mac OSX 10.6

Follow these steps:

1. Click on the Airport icon on the top right menu.



2. Click on the network name that you want to connect. This example uses "Etisalat Travel Router" as the network name.



3. On the new window, tick on Show Password and type in the network key in the Password field. This example uses "3GT1WNEO" as the key. After that, click on OK.



4. To check the connection, click on the Airport icon and there should be a tick next to the wireless name.



Windows Vista

Follow these steps:

 Open Network and Sharing Center (Start > Control Panel (Classic View) > Network and Sharing Center).



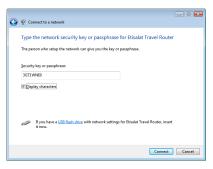
2. Click on "Connect to a network".



3. Choose "Etisalat Travel Router".



 Tick "Display Characters" and type in the network security key. This example uses "3GT1WNEO". Then click "Connect".



5. Tick on both "Save this network" and "Start this connection automatically" and click on "Close".

