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## Getting Started

### Warnings and Precautions

	Fully charge your battery before using the unit for the first time.	<b>Should be effects rather then affects</b>	
	Do not disassemble or modify the unit.		Do not hold the antenna when the phone is in use. Holding the antenna affects call quality.
	Keep metallic objects such as necklaces, clip and coins away from battery terminals.		Do not use solvents such as benzine or thinner to clean the unit.
	Do not expose the unit to excessive vibration or cause shock to the unit as serious damage may occur.		Do not expose the unit to rain or liquids, irreparable damage may occur.

# Safety Information

## 1. 10 Driver Safety Tips

Your wireless telephone gives you the powerful ability to communicate by voice-almost anywhere, anytime. But an important responsibility accompanies the benefits of wireless phones, one that every user must uphold.

When driving a car, driving is your first responsibility. When using your wireless phone behind the wheel of a car, practice good common sense and remember the following tips:

**1. Get to know your wireless phone and its features such as speed dial and redial.** If available, these features help you to place your call without taking your attention off the road.

**2. When available, use a hands free device.** If possible, add an additional layer of convenience and safety to your wireless phone with one of the many hands free accessories available today.

**3. Position your wireless phone within easy reach.** Be able to access your wireless phone without removing your eyes from the road. If you get an incoming call at an inconvenient time, if possible, let your voice mail answer it for you.

**4. Let the person you are speaking with know you are driving; if necessary, suspend the call in heavy traffic or hazardous weather conditions.** Rain, sleet, snow, ice, and even heavy traffic can be hazardous.

**5. Do not take notes or look up phone numbers while driving.** Jotting down a “to do” list or flipping through your address book takes attention away from your primary responsibility, driving safely.

**6. Dial sensibly and assess the traffic; if possible, place calls when you are not moving or before pulling into traffic.** Try to plan calls when your car will be stationary. If you need to make a call while moving, dial only a few numbers, check the road and your mirrors, then continue.

**7. Do not engage in stressful or emotional conversations that may be distracting.** Make people you are talking with aware you are driving and suspend conversations that have the potential to divert your attention from the road.

**8. Use your wireless phone to call for help.** Dial 9-1-1 or other local emergency number in the case of fire, traffic accident or medical emergencies. *Remember, it is a free call on your wireless phone!*

**9. Use your wireless phone to help others in emergencies.** If you see an auto accident, crime in progress or other serious emergency where lives are in danger, call 9-1-1 or other local emergency number, as you would want others to do for you.

**10. Call roadside assistance or a special nonemergency wireless assistance number when necessary.** If you see a broken-down vehicle posing no serious hazard, a broken traffic signal, a minor traffic accident where no one appears injured, or a vehicle you know to be stolen, call roadside assistance or other special non-emergency wireless number.

*“The wireless industry reminds you to use your phone safely when driving.”*

For more information, please call 1-888-901 –  
SAFE, or visit our website [www.wowcom.com](http://www.wowcom.com)™

*Provided by the Cellular Telecommunications & Internet Association*

Safety – The most important call Logo ? ? ? ? ? !!!

## 2. Consumer Information on SAR

### THIS MODEL PHONE MEETS THE GOVERNMENT'S REQUIREMENTS FOR EXPOSURE TO RADIO WAVES.

Your wireless phone is a radio transmitter and receiver. It is designed and manufactured not to exceed the emission limits for exposure to radio frequency (RF) energy set by the Federal Communications Commission of the U.S. Government. These limits are part of comprehensive guidelines and establish permitted levels of RF energy for the general population. The guidelines are based on standards that were developed by independent scientific organizations through periodic and thorough evaluation of scientific studies. The standards include a substantial safety margin designed to assure the safety of all persons, regardless of age and health.

The exposure standard for wireless mobile phones employs a unit of measurement known as the Specific Absorption Rate, or SAR. The SAR limit set by the FCC is 1.6W/kg.\* Tests for SAR are conducted using standard operating positions specified by the FCC with the phone transmitting at its highest certified power level in all tested frequency bands. Although the SAR is determined at the highest certified power level, the actual SAR level of the phone while operating can be well below the maximum value. This is because the phone is designed to operate at multiple power levels so as to use only the power required to reach the network. In general, the closer you are to a wireless base station antenna, the lower the power output.

Before a phone model is available for sale to the public, it must be tested and certified to the FCC that it does not exceed the limit established by the government-adopted requirement for safe exposure. The tests are performed in positions and locations (e.g., at the ear and worn on the body) as required by the FCC for each model. The highest SAR value for this model phone when tested for use at the ear is 1.47W/kg and when worn on the body, as described in this user guide, is 1.14W/kg (Body-worn measurements differ among phone models, depending upon available accessories and FCC requirements). While there may be differences between the SAR levels of various phones and at various positions, they all meet the government requirement for safe exposure.

The FCC has granted an Equipment Authorization for this model phone with all reported SAR levels evaluated as in compliance with the FCC RF emission guidelines. SAR information on this model phone is on file with the FCC and can be found under the Display Grant section of <http://www.fcc.gov/oet/fccid> after searching on FCC ID POQWTE-300.

Additional information on Specific Absorption Rates (SAR) can be found on the Cellular Telecommunications & Internet Association (CTIA) web-site at <http://www.phonefacts.net>

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\* In the United States and Canada, the SAR limit for mobile phones used by the public is 1.6 watts/kg (W/kg) averaged over one gram of tissue. The standard incorporates a substantial margin of safety to give additional protection for the public and to account for any variations in measurements.

### FCC RF EXPOSURE INFORMATION

This device was tested for typical body-worn operations with the back of the phone kept 1.5 cm. from the body. To maintain compliance with FCC RF exposure requirements, use only belt-clips, holsters or similar accessories that maintain a 1.5 cm. separation distance between the user's body and the back of the phone, including the antenna, whether extended or retracted. The use of belt-clips, holsters and similar accessories should not contain metallic components in its assembly. The use of accessories that do not satisfy these requirements may not comply with FCC RF exposure requirements, and should be avoided.

### 3. **TIA Safety Information**

#### **EXPOSURE TO RADIO FREQUENCY SIGNALS**

Your wireless handheld portable telephone is a low power radio transmitter and receiver. When it is ON, it receives and also sends out radio frequency (RF) signals.

In August, 1996, the Federal Communications Commissions (FCC) adopted RF exposure guidelines with safety levels for hand-held wireless phones. Those guidelines are consistent with the safety standards previously set by both U.S. and international standards bodies:

ANSI C95.1 (1992)\*

NCRP Report 86 (1986)

ICNIRP (1996)

Those standards were based on comprehensive and periodic evaluations of the relevant scientific literature. For example, over 120 scientists, engineers, and physicians from universities, government health agencies, and industry reviewed the available body of research to develop the ANSI Standard (C95.1).

The design of your phone complies with the FCC guidelines (and those standards).

\* American National Standards Institute; National Council on Radiation Protection and Measurements; International Commission on Non-Ionizing Radiation Protection

#### **ANTENNA CARE**

Use only the supplied or an approved replacement antenna. Unauthorized antennas, modifications, or attachments could damage the phone and may violate FCC regulations.

#### **PHONE OPERATION**

**NORMAL POSITION:** Hold the phone as you would any other telephone with the antenna pointed up and over your shoulder.

#### **TIPS ON EFFICIENT OPERATION:**

- For your phone to operate most efficiently:
- Extend your antenna fully.

Do not touch the antenna unnecessarily when the phone is in use. Contact with the antenna affects call quality and may cause the phone to operate at a higher power level than otherwise needed.

#### **DRIVING**

Check the laws and regulations on the use of wireless telephones in the areas where you drive. Always obey them. Also, if using your phone while driving, please:

- Give full attention to driving -- driving safely is your first responsibility;
- Use hands-free operation, if available;
- Pull off the road and park before making or answering a call if driving conditions so

require.

## **ELECTRONIC DEVICES**

Most modern electronic equipment is shielded from RF signals. However, certain electronic equipment may not be shielded against the RF signals from your wireless phone.

### **Pacemakers**

The Health Industry Manufacturers Association recommends that a minimum separation of six (6") inches be maintained between a handheld wireless phone and a pacemaker to avoid potential interference with the pacemaker. These recommendations are consistent with the independent research by and recommendations of Wireless Technology Research.

Persons with pacemakers:

- Should ALWAYS keep the phone more than six inches from their pacemaker when the phone is turned ON;
- Should not carry the phone in a breast pocket;
- Should use the ear opposite the pacemaker to minimize the potential for interference .
- If you have any reason to suspect that interference is taking place, turn your phone OFF immediately

### **Hearing Aids**

Some digital wireless phones may interfere with some hearing aids. In the event of such interference, you may want to consult your service provider [or call the customer service line to discuss alternatives.] Optional for each phone manufacturer.

### **Other Medical Devices**

If you use any other personal medical device, consult the manufacturer of your device to determine if they are adequately shielded from external RF energy. Your physician may be able to assist you in obtaining this information.

Turn your phone OFF in health care facilities when any regulations posted in these areas instruct you to do so. Hospitals or health care facilities may be using equipment that could be sensitive to external RF energy.

### **Vehicles**

RF signals may affect improperly installed or inadequately shielded electronic systems in motor vehicles. Check with the manufacturer or its representative regarding your vehicle. You should also consult the manufacturer of any equipment that has been added to your vehicle.

### **Posted Facilities**

Turn your phone OFF in any facility where posted notices so require.

## **AIRCRAFT**

FCC regulations prohibit using your phone while in the air. Switch OFF your phone before boarding an aircraft.

## **BLASTING AREAS**

To avoid interfering with blasting operations, turn your phone OFF when in a “blasting area” or in areas posted: “Turn off two-way radio”. Obey all signs and instructions.

## **POTENTIALLY EXPLOSIVE ATMOSPHERES**

Turn your phone OFF when in any area with a potentially explosive atmosphere and obey all signs and instructions. Sparks in such areas could cause an explosion or fire resulting in bodily injury or even death.

Areas with a potentially explosive atmosphere are often, but not always marked clearly. Potential areas may include: fueling areas (such as gasoline stations); below deck on boats; fuel or chemical transfer or storage facilities; vehicles using liquefied petroleum gas (such as propane or butane); areas where the air contains chemicals or particles (such as grain, dust, or metal powders); and any other area where you would normally be advised to turn off your vehicle engine.

## **For Vehicles Equipped with an Air Bag**

An air bag inflates with great force. DO NOT place objects, including either installed or portable wireless equipment, in the area over the air bag or in the air bag deployment area. If in-vehicle wireless equipment is improperly installed and the air bag inflates, serious injury could result.

## 4. FDA Consumer Update

### The U.S. Food and Drug Administration's Center for Devices and Radiological Health Consumer Update on **Wireless Phones**

#### 1. Do wireless phones pose a health hazard?

The available scientific evidence does not show that any health problems are associated with using wireless phones. There is no proof, however, that wireless phones are absolutely safe. Wireless phones emit low levels of radio frequency energy (RF) in the microwave range while being used. They also emit very low levels of RF when in the stand-by mode. Whereas high levels of RF can produce health effects (by heating tissue), exposure to low level RF that does not produce heating effects causes no known adverse health effects. Many studies of low level RF exposures have not found any biological effects. Some studies have suggested that some biological effects may occur, but such findings have not been confirmed by additional research. In some cases, other researchers have had difficulty in reproducing those studies, or in determining the reasons for inconsistent results.

#### 2. What is FDA's role concerning the safety of wireless phones?

Under the law, FDA does not review the safety of radiation-emitting consumer products such as wireless phones before they can be sold, as it does with new drugs or medical devices. However, the agency has authority to take action if wireless phones are shown to emit radio frequency energy (RF) at a level that is hazardous to the user. In such a case, FDA could require the manufacturers of wireless phones to notify users of the health hazard and to repair, replace or recall the phones so that the hazard no longer exists.

Although the existing scientific data do not justify FDA regulatory actions, FDA has urged the wireless phone industry to take a number of steps, including the following:

- Support needed research into possible biological effects of RF of the type emitted by wireless phones;
- Design wireless phones in a way that minimizes any RF exposure to the user that is not necessary for device function; and
- Cooperate in providing users of wireless phones with the best possible information on possible effects of wireless phone use on human health.

FDA belongs to an interagency working group of the federal agencies that have responsibility for different aspects of RF safety to ensure coordinated efforts at the federal level. The following agencies belong to this working

group:

- National Institute for Occupational Safety and Health
- Environmental Protection Agency
- Federal Communications Commission
- Occupational Safety and Health Administration
- National Telecommunications and Information Administration

The National Institutes of Health participates in some interagency working group activities, as well.

FDA shares regulatory responsibilities for wireless phones with the Federal Communications Commission (FCC). All phones that are sold in the United States must comply with FCC safety guidelines that limit RF exposure. FCC relies on FDA and other health agencies for safety questions about wireless phones.

FCC also regulates the base stations that the wireless phone networks rely upon. While these base stations operate at higher power than do the wireless phones themselves, the RF exposures that people get from these base stations are typically thousands of times lower than those they can get from wireless phones. Base stations are thus not the subject of the safety questions discussed in this document.

### **3. What kinds of phones are the subject of this update?**

The term “wireless phone” refers here to hand-held wireless phones with built-in antennas, often called “cell,” “mobile,” or “PCS” phones. These types of wireless phones can expose the user to measurable radio frequency energy (RF) because of the short distance between the phone and the user’s head. These RF exposures are limited by Federal Communications Commission safety guidelines that were developed with the advice of FDA and other federal health and safety agencies. When the phone is located at greater distances from the user, the exposure to RF is drastically lower because a person’s RF exposure decreases rapidly with increasing distance from the source. The so-called “cordless phones,” which have a base unit connected to the telephone wiring in a house, typically operate at far lower power levels, and thus produce RF exposures far below the FCC safety limits.

### **4. What are the results of the research done already?**

The research done thus far has produced conflicting results, and many studies have suffered from flaws in their research methods. Animal experiments investigating the effects of radio frequency energy (RF) exposures characteristic of wireless phones have yielded conflicting results that often cannot be repeated in other laboratories. A few animal studies, however, have

suggested that low levels of RF could accelerate the development of cancer in laboratory animals. However, many of the studies that showed increased tumor development used animals that had been genetically engineered or treated with cancer-causing chemicals so as to be pre-disposed to develop cancer in the absence of RF exposure. Other studies exposed the animals to RF for up to 22 hours per day. These conditions are not similar to the conditions under which people use wireless phones, so we don't know with certainty what the results of such studies mean for human health.

Three large epidemiology studies have been published since December 2000. Between them, the studies investigated any possible association between the use of wireless phones and primary brain cancer, glioma, meningioma, or acoustic neuroma, tumors of the brain or salivary gland, leukemia, or other cancers. None of the studies demonstrated the existence of any harmful health effects from wireless phone RF exposures. However, none of the studies can answer questions about long-term exposures, since the average period of phone use in these studies was around three years.

## **5. What research is needed to decide whether RF exposure from wireless phones poses a health risk?**

A combination of laboratory studies and epidemiological studies of people actually using wireless phones would provide some of the data that are needed. Lifetime animal exposure studies could be completed in a few years. However, very large numbers of animals would be needed to provide reliable proof of a cancer promoting effect if one exists. Epidemiological studies can provide data that is directly applicable to human populations, but 10 or more years' follow-up may be needed to provide answers about some health effects, such as cancer. This is because the interval between the time of exposure to a cancer-causing agent and the time tumors develop - if they do - may be many, many years. The interpretation of epidemiological studies is hampered by difficulties in measuring actual RF exposure during day-to-day use of wireless phones. Many factors affect this measurement, such as the angle at which the phone is held, or which model of phone is used.

## **6. What is FDA doing to find out more about the possible health effects of wireless phone RF?**

FDA is working with the U.S. National Toxicology Program and with groups of investigators around the world to ensure that high priority animal studies are conducted to address important questions about the effects of exposure to radio frequency energy (RF).

FDA has been a leading participant in the World Health Organization International Electromagnetic Fields (EMF) Project since its inception in 1996. An influential result of this work has been the development of a detailed

agenda of research needs that has driven the establishment of new research programs around the world. The Project has also helped develop a series of public information documents on EMF issues.

FDA and the Cellular Telecommunications & Internet Association (CTIA) have a formal Cooperative Research and Development Agreement (CRADA) to do research on wireless phone safety. FDA provides the scientific oversight, obtaining input from experts in government, industry, and academic organizations. CTIA-funded research is conducted through contracts to independent investigators. The initial research will include both laboratory studies and studies of wireless phone users. The CRADA will also include a broad assessment of additional research needs in the context of the latest research developments around the world.

## **7. How can I find out how much radio frequency energy exposure I can get by using my wireless phone?**

All phones sold in the United States must comply with Federal Communications Commission (FCC) guidelines that limit radio frequency energy (RF) exposures. FCC established these guidelines in consultation with FDA and the other federal health and safety agencies. The FCC limit for RF exposure from wireless telephones is set at a Specific Absorption Rate (SAR) of 1.6 watts per kilogram (1.6 W/kg). The FCC limit is consistent with the safety standards developed by the Institute of Electrical and Electronic Engineering (IEEE) and the National Council on Radiation Protection and Measurement. The exposure limit takes into consideration the body's ability to remove heat from the tissues that absorb energy from the wireless phone and is set well below levels known to have effects.

Manufacturers of wireless phones must report the RF exposure level for each model of phone to the FCC. The FCC website (<http://www.fcc.gov/oet/rfsafety>) gives directions for locating the FCC identification number on your phone so you can find your phone's RF exposure level in the online listing.

## **8. What has FDA done to measure the radio frequency energy coming from wireless phones ?**

The Institute of Electrical and Electronic Engineers (IEEE) is developing a technical standard for measuring the radio frequency energy (RF) exposure from wireless phones and other wireless handsets with the participation and leadership of FDA scientists and engineers. The standard, "Recommended Practice for Determining the Spatial-Peak Specific Absorption Rate (SAR) in the Human Body Due to Wireless Communications Devices: Experimental Techniques," sets forth the first consistent test methodology for measuring the rate at which RF is deposited in the heads of wireless phone users. The test method uses a tissue-simulating model of the human head. Standardized SAR

test methodology is expected to greatly improve the consistency of measurements made at different laboratories on the same phone. SAR is the measurement of the amount of energy absorbed in tissue, either by the whole body or a small part of the body. It is measured in watts/kg (or milliwatts/g) of matter. This measurement is used to determine whether a wireless phone complies with safety guidelines.

## **9. What steps can I take to reduce my exposure to radio frequency energy from my wireless phone?**

If there is a risk from these products--and at this point we do not know that there is--it is probably very small. But if you are concerned about avoiding even potential risks, you can take a few simple steps to minimize your exposure to radio frequency energy (RF). Since time is a key factor in how much exposure a person receives, reducing the amount of time spent using a wireless phone will reduce RF exposure.

- If you must conduct extended conversations by wireless phone every day, you could place more distance between your body and the source of the RF, since the exposure level drops off dramatically with distance. For example, you could use a headset and carry the wireless phone away from your body or use a wireless phone connected to a remote antenna

Again, the scientific data do not demonstrate that wireless phones are harmful. But if you are concerned about the RF exposure from these products, you can use measures like those described above to reduce your RF exposure from wireless phone use.

## **10. What about children using wireless phones?**

The scientific evidence does not show a danger to users of wireless phones, including children and teenagers. If you want to take steps to lower exposure to radio frequency energy (RF), the measures described above would apply to children and teenagers using wireless phones. Reducing the time of wireless phone use and increasing the distance between the user and the RF source will reduce RF exposure.

Some groups sponsored by other national governments have advised that children be discouraged from using wireless phones at all. For example, the government in the United Kingdom distributed leaflets containing such a recommendation in December 2000. They noted that no evidence exists that using a wireless phone causes brain tumors or other ill effects. Their recommendation to limit wireless phone use by children was strictly precautionary; it was not based on scientific evidence that any health hazard exists.

## **11. What about wireless phone interference with medical equipment?**

Radio frequency energy (RF) from wireless phones can interact with some electronic devices. For this reason, FDA helped develop a detailed test method to measure electromagnetic interference (EMI) of implanted cardiac pacemakers and defibrillators from wireless telephones. This test method is now part of a standard sponsored by the Association for the Advancement of Medical instrumentation (AAMI). The final draft, a joint effort by FDA, medical device manufacturers, and many other groups, was completed in late 2000. This standard will allow manufacturers to ensure that cardiac pacemakers and defibrillators are safe from wireless phone EMI.

FDA has tested hearing aids for interference from handheld wireless phones and helped develop a voluntary standard sponsored by the Institute of Electrical and Electronic Engineers (IEEE). This standard specifies test methods and performance requirements for hearing aids and wireless phones so that no interference occurs when a person uses a “compatible” phone and a “compatible” hearing aid at the same time. This standard was approved by the IEEE in 2000.

FDA continues to monitor the use of wireless phones for possible interactions with other medical devices. Should harmful interference be found to occur, FDA will conduct testing to assess the interference and work to resolve the problem.

## **12. Where can I find additional information?**

For additional information, please refer to the following resources:

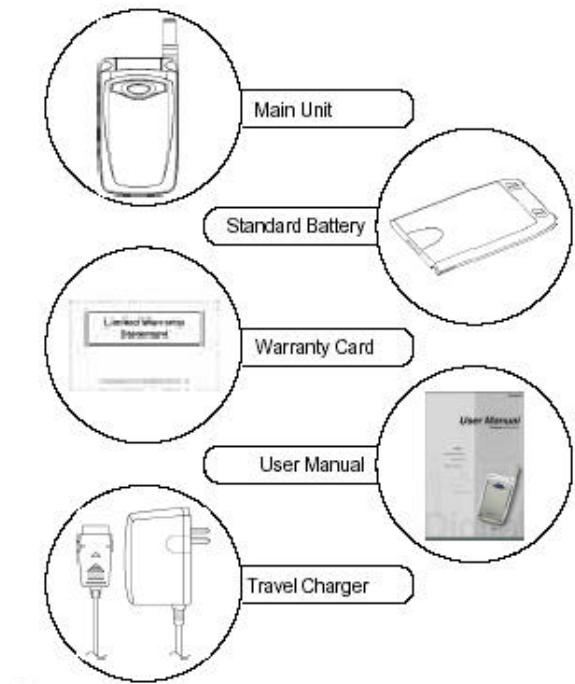
- FDA web page on wireless phones  
(<http://www.fda.gov/cdrh/phones/index.html>)
- Federal Communications Commission (FCC) RF Safety Program  
(<http://www.fcc.gov/oet/rfsafety>)
- International Commission on Non-Ionizing Radiation Protection  
(<http://www.icnirp.de>)
- World Health Organization (WHO) International EMF Project  
(<http://www.who.int/emf>)
- National Radiological Protection Board (UK)  
(<http://www.nrpb.org.uk/>)

## **Getting Started Cont'd**

### **What Is Supplied in the Box**

Thank you for purchasing this Modottel T300 cell phone. To ensure ease of use please make sure the following items are packaged in the box with your device.

► Extended Battery is an optional accessory.



## **Dictionary of Display Icons**

### **► Icons**

	Shows the current signal strength.
	Indicates the phone is outside of the service area.
	Flashes when a call is initiated and turns to steady when connection is made.
	Indicates the vibrate feature is activated.
	Indicates the alarm is set.
	Indicates a new message or messages have been received.
	Indicates the phone is roaming.
	Indicates the remaining battery life.

**Getting Started Cont'd**

**Identifying the Parts of your T300 Phone**

**Getting Started Cont'd**

## **How to Install, Remove and Charge the Battery**

Please make sure your battery has been fully charged before commencing to use your new phone.

### **▪ Installing your battery**

1. Place the battery into the groove at the bottom of the phone. The battery contacts should be facing the phone's back housing.
2. Snap the battery forward into place until it clicks, as illustrated.

### **▪ Removing your battery**

1. Push up on the battery release latch, located on the top of your phone. The battery will spring forward for easy removal.
2. Pull battery forward away from the phone's back housing to remove as illustrated

### **▪ Charging your battery**

1. Connect the charger to the accessory port of your phone. (The arrow side of the charger should be pointing at your keypad).
2. Plug the charger into a 220V or 110V wall outlet.
3. If the Red LED is lit on the charger that means that your phone is in the process of charging.
4. If the Green LED is lit on the charger your phone is fully charged and ready for use.
5. When your phone is ready to be recharged, it will begin to beep and the battery status icon will flash empty.

### **▪ Battery standby and talk time**

\*\*\*\* All battery standby and talk times shown here refer to the expected performance levels of your phone's battery in optimal service conditions. Certain network situations are known to decrease a phones standby and talk times. \*\*\*\*

## **Basic Phone Operation**

- **Powering the Phone On and Off**
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- **Missed Calls / Automatic Redial**
- **Pause Dialing**
- **Short-cut keys**
- **Powering the Phone on**
  1. To power your phone on, press and hold **the end key** until the display backlighting comes on.
  2. Your phone will emit wakeup chimes and the word searching will be displayed as the phone initiates with a cellular tower.
  3. The phone will then revert to Standby Mode  
(If the display shows a padlock icon when you power the phone on, you will be required to enter a four digit unlock code before the phone can be used. The factory unlock code is set to 0000.)
- **Powering your phone off**
  1. To power the phone off, press and hold **the end key**.

2. Your phone will emit shut down chimes and the display will go blank.

- **Standby Mode**

1. You are able to access your full feature menu, when your phone is in standby mode. Merely press **the button** located directly under the word [menu] at the bottom of your display to view the menu options.
2. Once inside your feature menu you can select from any of the displayed menu icons by navigating with the joystick until the desired menu option is bracketed then pushing straight down on the joystick.
3. While the phone is in standby mode the joystick can be used to access the following features:
  - SMS
  - Web Browser
  - Games
  - MyMenu

Push the joystick left to enter SMS, right to enter the Web Browser, down to enter the Games and up to enter MyMenu



- **Receiving a phone call**

When your phone receives an incoming call, it will either:

- Ring
- Blink (in lamp mode)
- Vibrate
- Ring and Vibrate
- Or Vibrate then Ring

1. You can press any key (except the END key) to answer an incoming call. Even when your phone is locked.
2. Pressing the END key will silence the ringer or stop the vibration when a call comes in.

- **Making a call**

In order to make a phone call your cell phone must be on, unlocked and have a network connection with adequate signal strength.

1. Dial the number that you wish to call
2. Press the green phone key on the left side of your key pad
3. Phone will display the word dialing until your call connects

## **Basic Phone Operation Cont'd**

- **Last Number Redial**

1. Press and hold the green phonekey.

2. The last dialed outgoing number will be displayed and an outgoing call will be made to the number.

Is this still correct? Cannot tell since the phone is not active.

- **Speed dialing**

All Memory Locations on this phone can be speed dialed.

1. To speed dial a number located in memory location 001-009, press and hold the third number of the memory location until the display shows that number and begins to dial.
2. To speed dial a number located in memory location 010 – 099, press the second digit of the memory location briefly then hold down the third digit of the memory location until the display shows the full number and begins to dial.
3. To speed dial a number located in memory location 100-200 press down the first two numbers of the three digit memory location briefly then hold the third number down until the display shows the full number and begins to dial.

- **Ending a call**

1. Press the red phone key to terminate a call.

- **Phone operation while a call is in progress**

**Please have the engineers double-verify everything I write here since my phone is not active I am making a lot of assumptions based on how the other Modottel phones worked. Let me know if any of these features have changed or been eliminated!!!!**

Sending my phone number

- When you are in the process of making a call you can send your phone number. This feature is a quick and easy way to leave your phone number on a pager or voice mail system.
- While you are on a call, you can send your phone number.

1. During the call, press Menu
2. Scroll to the option “Send Own Number”.
3. Select this option using [select key]
4. The notification message “Sending number...” will be displayed and your phones number in your phone will be sent.

- **Using your Memo feature**

The Memo feature functions as a scratch pad. You can use this feature to make a record of numbers that you receive during the course of a phone conversation. The numbers that you store while using your memo feature will be saved in your **Call Log** under the heading **Call Memo**.

1. To begin, while you are in the process of using the phone, enter the new phone number with the keypad.
2. When the complete number appears on the display, select **Menu** by pressing the **Menu** button located on the left hand side of your display.
3. **[ Call Memo]** will appear as an option listed on the pull down menu that will appear on the left side of your display.
4. Select the **Call Memo** feature using your joystick.
5. **[Save]** will appear above the left Soft Key, select this option by using your joystick

6. To view the numbers saved in your **Call Memo** list press **Menu**, select **Call Log** using your joystick, scroll down to **Call Memo** and select with the joystick. A complete list of all of your saved memo numbers will appear. You can dial these numbers from the **Call Memo** feature or save them to your phone book.

## **Basic Phone Operation Cont'd**

- **Phone operation while a call is in progress cont'd**

- **Adjusting your Call Volume**

You can adjust your speaker, and microphone volume during a call.

1. To increase phone volume find the up/down key on the left -hand side of your phone and press up. The display will show you a volume meter so you can keep track of how much you are raising the phone's volume.
2. To decrease phone volume locate the same key and press down. The display will show you a volume meter so you can keep track of how much you are lowering the phones volume.

- **Muting your Microphone for privacy**

The Mute feature temporarily prevents the person you are speaking to from hearing your voice. This feature will automatically disengage when you end the call.

1. During the call press your **Menu** Key located on the left side of your display.
2. Scroll to the word **Mute**.
3. Select the **Mute** feature using your joystick.
4. Scroll to **ON** to activate the Mute feature and select with your joystick.
5. Your **Mute** feature is now active.
6. When you are ready to resume your conversation repeat these steps and select **OFF** instead of on. The party you are talking to will now be able to hear your voice.

- **Missed Calls/ Auto Redial**

- **Missed Calls**

If one or more call is missed, the time, date and the number of calls missed will appear on your display (the time shown will reflect the exact time of your last missed call).

1. To clear your display and resume using the phone, select **OK** which will appear on the left side of your display.
2. If the caller allows his/her number to be transmitted the missed call will automatically be stored in the **Call Log** under the heading **Missed Calls**.
3. To dial a missed number: enter the **Call Log**, Select **Missed Calls** using the joystick , scroll to the number that you wish to call and press the green dial key located on the left hand side of your key pad.

- **Automatic Redial**

In a situation where you attempt to dial a call and the call fails an error message will appear on your display alerting you that the call was not completed properly. When this happens you will be able to redial the call with out entering the numbers a second time by using **Auto-Redial**.

1. The phone will first display the error message **Call Failed**.
2. A message will come up asking if you would like to automatically redial the last number attempted.

3. Select **YES** with your keypad.
4. When the call connects your phone will ring or vibrate to alert you that the call has properly completed.
5. You can change the redial intervals or turn this feature on or off using the phone's **Setup** menu.

## **Basic Phone Operation Cont'd**

### **Phone operation while a call is in progress cont'd**

### **Pause Dialing**

The **Pause Dialing** feature allows you to dial into automated phone systems with the least amount of effort. Normally when you dial into an automated system (for example, at a bank) a pre-recorded message prompts you for each subsequent set of numbers such as your account number then your PIN number. You can store these numbers at a single memory location separating the phone number, your account number and PIN number with pauses so the entire string of numbers can be recalled and sent at once.

1. To begin, enter the initial phone number to be dialed.
2. Press the dedicated pause key  
(*insert graphic of dedicated pause key here*) to insert a pause, then continue entering the next string of numbers.
3. Repeat these steps until you have completed the series of numbers and are ready to store your pause dialing number.

\* There are three different pause types that you can use when storing numbers for pause dialing:

Manual Pause	Indicated with a <b>P</b>
Timed Pause	Indicated with a <b>T</b>
Hyphenates Pause	Indicated with an <b>H</b>

\* A manual pause means that the initial string of the number stored with pause dialing will be sent, then the user will have to listen to the voice instructions in the automated message and then manually press send to dial the next string of numbers.

\*\* A timed pause means that following the initial string of stored numbers, the phone will automatically pause for 2 seconds, and then send out the next stored numbers in the series.

\*\*\*A hyphenated pause simply means that a hyphen will be inserted after each series of numbers

4. Once you have entered your full pause dial number, proceed to store this number as described in the Add Entry part of this manual.

### **Shortcut Keys**

There are two shortcut keys located on your phone's keypad which give you quick access to two commonly used features.

### **Vibrate mode**

Vibrate mode will alert you to an incoming call without having the phone ring. This feature is useful in meetings where you would not want to disturb the people around you.

- Press and hold the  key to set your phone to vibrate mode.
- To deactivate the vibrate mode press and hold the  key again.
-  is displayed when the phone is in vibrate mode.

- **Lock Mode**

This feature gives you security at the push of a button and prevents anyone else from using your phone.

1. To quickly lock your phone, press and hold the # key until the phrase "This phone is Locked, emergency calls only" appears on your display.
2. To deactivate your lock feature you will have to enter the phones Security menu. This will be discussed in the **Advanced Features** portion of this manual.

## **Advanced Features**

### **Advanced Features**

- **Call Log**

- Incoming Calls
- Outgoing Calls
- Missed Calls
- Call Timer
- Call Memo

- **Phone Book**

- Find Entry
- Add Entry
- Edit** Group
- My Phone #

- **Sounds**

- Ring tones
- Ring Settings
- Alerts
- Volume

- **PIM (Personal Information Manager)**
  - Schedule
  - Alarm Clock
  - World Time
  - Calculator
  - Stop Watch
  - Converter
  - Country Code
- **Display**
  - Display Setup
  - Wallpaper
  - Banner
  - Software Version**
- **Setup**
  - My Menu
  - Auto Redial
  - Auto Answer
  - Auto Hyphen
  - Area Code Rules
  - Language
  - TTY Settings
- **Security**
  - Lock
  - Change Lock Code**
  - Restrict
  - Emergency #'s
  - NAM
  - Clear Memory
  - Reset Phone
- **Data Service**
  - Data Rate
  - Incoming Mode
- **Location**
  - Location On
  - 911 Only
- **Roaming**
  - Roaming Setup
  - Select System
- **SMS**
  - Inbox
  - Outbox
  - Message Folder
  - SMS Setup
- **Web Browser**
  - Access Internet
  - Connection Timer
  - Browser Setup**
- **Games**
  - BrickHero
  - FireHexa
  - Snake

- **My Menu**

The **My Menu** feature must be configured through the use of the **Setup** feature before it can be used for short cuts.

- A brief explanation of the My Menu feature will be found here

- **Call Log**

This feature allows one to view a list of: Incoming Calls that have connected to this phone  
Outgoing Calls that have been dialed with this phone

Missed Calls - incoming numbers that did not manage to connect to this phone

The Call Timer, which shows the amount of time spent on each call

And the Call Memo, which makes record of phone numbers given to you while you are on a call.

- Incoming Calls:

1. Enter your feature menu by pressing the left soft key under the word **Menu** on your display
2. Use the joystick to scroll to the **Call Log** Feature
3. Select the **Call Log** feature by pushing the joystick straight down or pushing the number 1
4. Select **Incoming Calls** by scrolling with your joystick until that option is highlighted and pushing the joystick straight down, or by pressing the number 1
5. A list of the last 20 incoming calls will be displayed, if the phone has not received any incoming calls the message "No numbers on the call stack" will appear
6. To view detailed information regarding any of the incoming call numbers (date/time) use your joystick to scroll to the number in question and select **View** with the right soft key
7. To store any of the numbers saved to your **Incoming Call** list, press the left soft key under the word **Menu** and follow the steps explained later in this manual, under **Phone Book, Add Entry**.

- Outgoing Calls:

1. Enter your feature menu by pressing the left soft key under the word **Menu** on your display
2. Use the joystick to scroll to the **Call Log** Feature
3. Select the **Call Log** feature by pushing the joystick straight down, or by pressing the number 1
4. Select **Outgoing Calls** by scrolling with your joystick until that option is highlighted and pushing the joystick straight down, or by pressing the number 2
5. A list of the last 20 outgoing calls will be displayed, if the phone has not made any outgoing calls the message " No numbers on the call stack" will appear
6. To view detailed information regarding any of the outgoing call numbers (date/time) use your joystick to scroll to the number in question and select **View** with the right soft key
7. To store any of the numbers saved to your **Outgoing Call** list, press the left soft key under the word **Menu** and follow the steps explained later in this manual, under **Phone Book, Add Entry**.

- Missed Calls:

1. Enter your feature menu by pressing the left soft key under the word **Menu** on your display
2. Use the joystick to scroll to the **Call Log** Feature
3. Select the **Call Log** feature by pushing the joystick straight down, or by pressing the number 1
4. Select **Missed Calls** by scrolling with your joystick until that option is highlighted and pushing the joystick straight down, or by pressing the number 3

5. A list of the last 20 missed calls will be displayed, if the phone has not had any missed calls the message “ No numbers on the call stack” will appear
6. To view detailed information regarding any of the missed call numbers (date/time) use your joystick to scroll to the number in question and select **View** with the right soft key
7. To store any of the numbers saved to your **Missed Call** list, press the left soft key under the word **Menu** and follow the steps explained later in this manual, under **Phone Book, Add Entry**.

□ Call Timer:

1. Enter your feature menu by pressing the left soft key under the word **Menu** on your display
2. Use the joystick to scroll to the **Call Log** Feature
3. Select the **Call Log** feature by pushing the joystick straight down, or by pressing the number 1
4. Select **Call Timer** by scrolling with your joystick until that option is highlighted and pushing the joystick straight down, or by pressing the number 4
5. The duration of your last call, total incoming calls, total outgoing calls, and total of all calls will be displayed. If you have not yet made or received any calls the call timers will all show 00:00:00
6. To **Reset** any of your **Call Timers** press the Menu button with your left soft key, the words **Reset Timer** will be displayed and you will have the choice of scrolling with the joystick to select; **Incoming, Outgoing, Total** or **Reset All**.
7. To reset any of these timers highlight the desired option with your joystick and push the joystick straight down
8. The phone will display the message “ reset \_\_\_\_\_ call timer, yes or no”, choose **YES** to reset **NO** to exit
9. If you choose to reset any one of the individual timers it will bring that specific timer back to 00:00:00, If you choose **Reset All** it will bring all of your call timers back to 00:00:00

□ Call Memo:

1. Enter your feature menu by pressing the left soft key under the word **Menu** on your display
2. Use the joystick to scroll to the **Call Log** Feature
3. Select the **Call Log** feature by pushing the joystick straight down, or by pressing the number 1
4. Select **Call Memo** by scrolling with your joystick until that option is highlighted and pushing the joystick straight down, or by pressing the number 5
5. A list of numbers that were recorded and saved while the phone was engaged in a call will appear, if no numbers have been recorded your phone will display the message “ No numbers on the call memo pad”
6. To store any of the numbers saved to your **Call Memo** pad, press the left soft key under the word **Menu** and follow the steps explained later in this manual, under **Phone Book, Add Entry**.

#### ▪ **Phone Book**

This feature is designed so that you can store and retrieve phone numbers. Each name stored in your phone book can be categorized into a group (family, friend, co-worker, or one category of your own definition). Your phone book can store up to 200 entries. You can arrange your entries using your group feature and assign a different ring tone to each group.

The icons used in your phone book are:

□ Find Entry:

This feature allows you to find an entry in your Phone Book by name, location, phone number or group name.

1. Enter your feature menu by pressing the left soft key under the word **Menu** on your display
2. Use the joystick to scroll to the **Phone Book** Feature
3. Select the **Phone Book** feature by pushing the joystick straight down, or by pressing the number 2
4. Select **Find Entry** by scrolling with your joystick until that option is highlighted and pushing the joystick straight down, or by pressing the number 1
5. You will be able to choose from searching for your entry: **1. By Name, 2. By Location, 3. By Number, or 4. By Group**
6. Scroll with the joystick to your preferred search method and press straight down, or press the number next to your desired search option
7. If you choose to search **By Name**, you will have to enter the first few letters of the name you are looking for, then press the joystick straight down. All entries containing those letters will be displayed and you will have to scroll to the specific entry you are looking for. If there are no entries that match the text you entered a message will appear saying "No name matching in phone book"
8. If you choose to search **By Location** you will have to enter the location number where you think the entry is located and press the joystick straight down. The information stored at that location will be displayed. If there is nothing stored at the location you query a message will appear saying "No location matching in phone book"
9. If you choose to search **By Number** you will have to enter the first few numbers of the phone number you are looking for, then push the joystick straight down. All entries containing those numbers will be displayed and you will have to scroll to the specific entry you are searching for. If there are no entries that match the numbers you entered a message will appear saying "No number matching in phone book"
10. If you choose to search **By Group** name simply scroll to the name of the group where you think your entry is stored and push the joystick straight down. All entries that have been categorized into that group will be displayed, you will have to scroll to the specific entry you are searching for. If there are no entries categorized into the group you are querying a message will appear saying "No group matching in phone book"

**Add Entry:**

This feature allows you to store a new contact in your phone book.

1. Enter your feature menu by pressing the left soft key under the word **Menu** on your display
2. Use the joystick to scroll to the **Phone Book** Feature
3. Select the **Phone Book** feature by pushing the joystick straight down, or by pressing the number 2
4. Select **Add Entry** by scrolling with your joystick until that option is highlighted and pushing the joystick straight down, or by pressing the number 2
5. You will be prompted to add the name of your new contact. (for more information about adding text with your phone's keypad see the appendix of this manual)
6. Once you have added the name of your new contact, advance with the joystick to choose the location at which you wish to store this contact
7. Once the location is stored you can use your joystick to select what type of number you are storing for this contact. Choose from the following:
8. Once you have completed selecting what type of number you are storing for your new contact use the numerical keypad of your phone enter the new number
9. To add your new contact to your **Phone Book** press the left soft key under the word **Menu** on your display and choose the **Save** option
10. Scroll to the word **Save** and press straight down on your joystick

11. Once you have decided to save the number you will be prompted to categorize this contact into a **Group** or select that you do not want to group the contact
12. Each of your contact groups can have a distinctive ring or you can easily determine who is calling you by assigning each of your different types of contacts a different ring tone. You have 33 ring tones to chose from and you can store the distinctive tone at the same time you enter each new contact
13. Your phone will offer you the option of making your new contact number private (selecting that you want to make the number private will force you to enter the phone's four digit unlock code before being able to view this contact) If you want to make this number private select yes if you want it to be part of your regular phone book select no

➤ Deleting A Single Contact from your Phone Book

1. To delete a single contact press the left soft key under the word **Menu** on your display
2. Scroll to the word **Delete** and press straight down on the joystick

➤ Deleting all Contacts in the Phone Book

1. To delete all the contacts in your phone book at once press the left soft key under the word **Menu** on your display
2. Scroll to **Delete All** and press straight down with the joystick
1. Group:  
Select **Add Entry** by scrolling with your joystick until that option is highlighted and pushing the joystick straight down, or by pressing the number 2
  1. Enter your feature menu by pressing the left soft key under the word **Menu** on your display
  2. Use the joystick to scroll to the **Phone Book** Feature
  3. Select the **Phone Book** feature by pushing the joystick straight down, or by pressing the number 2
  4. Select the **Group** feature by scrolling with your joystick until the feature name is highlighted and pressing straight down or by pressing the number 3
  5. When you first enter the group feature you will see the group headings (family, friend, office, and other). If you want to view any of the contacts that were grouped into one of these categories scroll to the category with your joystick and press straight down
  6. A full list of contacts stored in to that group will appear.
  7. You also have the option of using your **Menu** key to do one of the following:

New Group	Allows you to categorize your contacts in to one of three pre-named groups or into one group that the user can name
Change Group	Allows you to change a group name from the preset names or user defined

	names.
Delete Group	Allows you to remove an entire group of contacts
Group Ring	Assigns a specific ring to all entries in a group

Scroll to the option you would like to select, press straight down with the joystick and the phone will step you through any of the above options

## 2. My Phone Number:

This feature will remind you of your phones carrier assigned phone number

1. Enter the feature menu by pressing the left soft key under the word **Menu** on your display
2. Us the joystick to scroll to the **Phone Book** feature
3. Select the **Phone Book** feature by pressing the joystick straight down or pressing the number 2
4. Select the **My Phone Number** feature by scrolling with the joystick until that feature is highlighted and pressing straight down or by pressing the number 4
5. The phone's carrier assigned number will flash across the display

## ▪ Sounds

Your sounds feature is designed so you can configure your volume (voice, keypad and ringer), choose your alerts, and designate your ringer types.

### Ringer Tones:

The ringer tones feature allows you to select from 11 Basic Tones, 22 Melodies or 5 bells to have as your phone's ringer to alert you to incoming calls or SMS messages

1. Enter the feature menu by pressing the left soft key under the word **Menu** on your display
2. Us the joystick to scroll to the **Sounds** feature
3. Select the **Sounds** feature by pressing the joystick straight down or pressing the number 3
4. Select the **Ringer Tones** feature by scrolling with the joystick until that feature is highlighted and pressing straight down or by pressing the number 1
5. You will have the choice of selecting from **Basic Tones, Melodies or Bells**
6. Highlight the option you wish to scan by scrolling to it with the joystick and pressing straight down
7. Scroll with the joystick until you hear the tone that you wish to select and press straight down
8. Exit the **Ringer Tones** feature by pressing the **Clear** key on the upper right side of your keypad and the selected tone will be saved

### Ring Settings:

This feature allows you to control how you would like to be alerted when your phone receives an incoming call

You can select from one of the following options:

- Ring
- Vibrate
- Vibrate + Ring
- Vibrate then Ring
- Lamp Only (silent alert mode)

To set your ring type:

1. Enter the feature menu by pressing the left soft key under the word **Menu** on your display

2. Use the joystick to scroll to the **Sounds** feature
3. Select the **Sounds** feature by pressing the joystick straight down or pressing the number 3
4. Select the **Ring Settings** feature by scrolling with the joystick until that feature is highlighted and pressing straight down or by pressing the number 2
5. Scroll to the alert of your choice with your joystick and press straight down to select
6. Exit the **Ring Settings** feature by pressing the **Clear** key on the upper right side of your keypad and the selected alert type will be saved

Alerts:

▪ **PIM (Personal Information Manager)**

The PIM feature is used as a personal scheduler and calendar, you can use this feature to set alerts to remind you of important dates or to set once a day alerts to be used as an alarm clock. This feature also contains accessories like a currency converter, a world time clock, and a calculator

▪ Schedule

**What is the difference between view and view all? Does one show more detail if so shouldn't it be called Detailed View?**

This feature will display your calendar for a chosen month, will allow you to add and edit calendar events and to choose and set alarm bells for each entered calendar event

1. Enter the feature menu by pressing the left soft key under the word **Menu** on your display
2. Use the joystick to scroll to the **PIM** feature

3. Select the **PIM** feature by pressing the joystick straight down or pressing the number 4
4. Select the **Schedule** feature by scrolling with the joystick until that feature is highlighted and pressing straight down or by pressing the number 1
5. A view of the current months calendar will be displayed, dates with events will be shaded.
6. To **View All** of the calendar events press the left soft key under the word **Menu** on the display, highlight **View All** and press straight down with the joy stick
7. To select from 1 of 5 musical **Alarm Bells** (which will alert you when an event is about to occur) press the left soft key under the word **Menu** on the display, highlight **Alarm Bell** and press straight down with the joystick. Scroll with the joystick and as each bell is highlighted it's tone will play, select your desired alarm bell by pressing the joystick straight down
8. A message will show on your display confirming that the bell you have chosen is set on
9. To add an event press the left soft key under the word **Menu** on the display, highlight **Add** and press straight down with the joystick, the display will then guide you through adding an event. (You will be able to add the time, date and some detail for each event you save)
10. To save an event press the left soft key under the word **Menu** on the display, highlight **Save** and press straight down with the joy stick if you chose not to save an event press the left soft key under the word **Menu** on the display, highlight **Cancel** and press straight down with the joy stick
11. You will see a message on your display confirming that your new event was either saved or canceled.
12. To see a detailed view of a specific calendar event press the left soft key under the word **Menu** on the display, highlight **View** and press straight down with the joy stick
13. The event you have selected will be shown along with all of its detail (time, date and information you have stored) from this view you can edit or delete this event.

- **Alarm Clock**

This feature allows you to set up to three daily alarms. These alarms can be set to go off once, daily, Monday through Friday or Monday through Saturday (**wouldn't it be more useful to have one alarm go off Saturday and Sunday?**)

1. Enter the feature menu by pressing the left soft key under the word **Menu** on your display
2. Use the joystick to scroll to the **PIM** feature
3. Select the **PIM** feature by pressing the joystick straight down or pressing the number 4
4. Select the **Alarm Clock** feature by scrolling with the joystick until that feature is highlighted and pressing straight down or by pressing the number 2
5. You will view three separate alarms, **Alarm 1**, **Alarm 2**, and **Alarm 3**. Highlight the alarm that you wish to set and press straight down with the joystick.
6. Enter the option Menu by pressing the left soft key under the word **Menu** on your display. You will be able to choose from **Edit** or **Set**
7. If you want to set the time, frequency of alerts and what days your alarm goes off select **Edit** by highlighting that option and pressing straight down with the joystick. If you want to turn your alarm on or off select **Set** by highlighting that option and pressing straight down on the joystick.
8. Once you have edited your alarm, press the left soft key under the word **Menu** on your display to save your entry. Then choose the **Set** option to turn your alarm on.
9. A clock icon will show on the main display of your phone indicating that the alarm clock is on and in use.

- **World Time**

This feature allows you set your location and time zone and to view the time in fifty major world cities. (**if you try to set your location and time zone it says World time Setting, should say Setting World Time.** Right now the world time on my phone is not accurate and there is no menu inside the feature to change it) Phone never shows the time on the main display, is it supposed to? Need more information!!!

1. Enter the feature menu by pressing the left soft key under the word **Menu** on your display
2. Use the joystick to scroll to the **PIM** feature
3. Select the **PIM** feature by pressing the joystick straight down or pressing the number 4
4. Select the **World Time** feature by scrolling with the joystick until that feature is highlighted and pressing straight down or by pressing the number 3
5. You will view two options: **View Time** and **Set up**. If you choose **View Time** you will be able to see the local time in up to 50 of the world's major cities. If you choose **Set Up** you can set your local time zone (which does not seem to do anything)
6. Should your local time appear on the display once it is set?

- **Calculator**

It is very hard to see which of your options is highlighted, you cannot tell what function you are asking the phone to perform. Also, the joystick does not easily select the equals sign. Nothing tells you how to exit out of this feature once you have started using the calculator. You do exit with the clear key but, it takes forever, works better if you press it multiple times rather than pressing and holding it.

The Calculator feature allows you to add, subtract, multiply or divide with your phone's keypad and joystick.

1. Enter the feature menu by pressing the left soft key under the word **Menu** on your display
2. Use the joystick to scroll to the **PIM** feature
3. Select the **PIM** feature by pressing the joystick straight down or pressing the number 4
4. Select the **Calculator** feature by scrolling with the joystick until that feature is highlighted and pressing straight down or by pressing the number 4
5. Begin by entering the first series of numbers that you wish to calculate, then use the joystick to highlight the multiply, add, subtract, or divide symbol and then press straight down to enter the next series of numbers and repeat until your calculation is fully entered, then select the equals sign to view your total (Press the **Clear** key to erase any numbers that were entered in error).
6. Press the **Clear** key multiple times to exit the calculator

- **Stop Watch**

Which button is supposed to correspond with the, ok option, indicated on the display? In this feature the **Menu** option seems to do nothing other than start the stop watch, is this correct? Judging by the Excel spread sheet it looks like your last three times are supposed to record on the main display under the stop watch, this does not work properly on my phone. Nothing records under options 1,2, and 3.

This feature allows you to time events accurately, down to the last second. The phone will display detailed times in hours, minutes and seconds. You can record the time of up to three separate events and store them in the phone.

1. Enter the feature menu by pressing the left soft key under the word **Menu** on your display
2. Use the joystick to scroll to the **PIM** feature
3. Select the **PIM** feature by pressing the joystick straight down or pressing the number 4
4. Select the **Stop Watch** feature by scrolling with the joystick until that feature is highlighted and pressing straight down or by pressing the number 5
5. To begin timing an event, press the left soft key under the word **Menu** on your display
6. To stop the timer press the **Menu** key once more
7. The time will automatically be recorded under the #1 on the Stop Watch's display

- **Converter**

The Excel spread sheet shows that this feature is supposed to convert:

Height – in feet, inches, centimeters, and meters

Weight – in pounds, grams or Kilograms

Volume – in ounces and liters

And Temperature – in Celsius or Fahrenheit

The actual phone shows Length instead of height, width instead of temperature (does not show anything like temperature at all) shows far more options which are actually a lot more confusing than the excel sheet has, and does not intuitively guide the user through how to change screens to view all of these options. This feature could be improved if it allowed you to enter in an actual measurement or weight and then performed the conversion for you, as in 100lbs = 47kg. Also I think something that calculated percentages would be far more useful to the average cell phone customer than something that converted volume. I also do not know if this feature should be called a converter since it does not perform any actual conversions. Is this the way this feature is actually supposed to work and look? I am confused!

1. Enter the feature menu by pressing the left soft key under the word **Menu** on your display
2. Use the joystick to scroll to the **PIM** feature
3. Select the **PIM** feature by pressing the joystick straight down or pressing the number 4
4. Select the **Converter** feature by scrolling with the joystick until that feature is highlighted and pressing straight down or by pressing the number 6

I will finish documenting this feature once I know for sure what it is supposed to do

- **Country Code**

This feature will tell you the country code for fifty of the world's major cities

1. Enter the feature menu by pressing the left soft key under the word **Menu** on your display
2. Use the joystick to scroll to the **PIM** feature
3. Select the **PIM** feature by pressing the joystick straight down or pressing the number 4
4. Select the **Country Code** feature by scrolling with the joystick until that feature is highlighted and pressing straight down or by pressing the number 7
5. A map of the world will be displayed with a major city marked and named. The country code for that city will show at the bottom of the display
6. To see the country code for a different city scroll to the right using your joystick, the cities will appear in alphabetical order
7. To exit this feature press the **Clear** key

- **Display:**

This Menu allows you to customize the display of your phone.

- **Display Setup:**

This feature allows you to select your LCD color, how long you would like your backlight to stay, and what level of contrast you would prefer for your display

1. Enter the feature menu by pressing the left soft key under the word **Menu** on your display
2. Use the joystick to scroll to the **Display** feature
3. Select the **Display** feature by pressing the joystick straight down or pressing the number 5
4. Select the **Display Setup** feature by scrolling with the joystick until that feature is highlighted and pressing straight down or by pressing the number 1
5. You will have the option of setting up your **Backlight**, your **Contrast**, or your **LCD Color**
6. To set up your **Backlight** choose option 1 or scroll to **Backlight** with your joystick and press straight down
7. Select from **Always On**, **Always Off**, **10 Seconds** (back light goes off after 10 seconds, and **Night** (What does night mean?)), scroll to your selection with your joystick and press straight down (these selections affect the backlight on your display and keypad)
8. Once you have made your selection, press the **Clear** key to back out of the feature and your Backlight preference will be saved
9. To set up your **Contrast** choose option 2 or scroll **Contrast** with your joystick and press straight down
10. A sliding gradient will appear which also tells you which level of contrast your display is currently set for. Scroll right or left with the joystick to adjust

11. Once your **Contrast** is set up to your preference, press the **Clear** key to back out of the feature and your selection will be saved
12. To set up your **LCD Color** choose option 3 or scroll to **LCD Color** with your joystick and press straight down
13. You can choose the color of your display's backlight with the **LCD Color** feature (this feature does not affect the color or the status of your keypad backlight)
  
14. Select from:
  - Red**
  - Blue**
  - Yellow**
  - Magenta**
  - Cyan**
  - White**
  - Or Off (no backlighting on your display at all)
15. Once you have set up your **LCD Color**, press the **Clear** key to back out of the feature and your selection will be saved

**Wallpaper:**

The Excel spreadsheet says that this feature is supposed to give the image names for the stores wallpaper and the phone does not show the image names, also you can choose from two images for each type of wallpaper the phone contains but there is nothing that indicates that choices are possible to the user.

This feature allows you to select from two images for each of the three types of wallpaper your phone can display

1. Enter the feature menu by pressing the left soft key under the word **Menu** on your display
2. Use the joystick to scroll to the **Display** feature
3. Select the **Display** feature by pressing the joystick straight down or pressing the number 5
4. Select the **Wallpaper** feature by scrolling with the joystick until that feature is highlighted and pressing straight down or by pressing the number 2
5. You will see three wallpaper image types: **Standby**, **Power on**, and **Power off**. If you scroll with your joystick to any of these wallpaper types and press straight down a preview of what that wallpaper type looks like will be displayed NOTE: YOUR STANDBY WALLPAPER WILL NOT DISPLAY IF YOU HAVE YOUR BANNER FEATURE TURNED ON!
6. Once you have viewed what each type of wallpaper looks like press the **Clear** key to back out of the **Wallpaper** feature

**Banner:**

This feature allows you to set up a personal text banner that will always show on the display of your phone in standby mode, once the phone is powered on. You can choose to have your banner fixed in place or sliding from right to left

1. Enter the feature menu by pressing the left soft key under the word **Menu** on your display
2. Use the joystick to scroll to the **Display** feature
3. Select the **Display** feature by pressing the joystick straight down or pressing the number 5
4. Select the **Banner** feature by scrolling with the joystick until that feature is highlighted and pressing straight down or by pressing the number 3
5. Three options will appear on the display: **Edit** – customizes the text that will display as your banner, **Set** – turns banner mode on or off, and **Text Slide** – sets banner to slide or stay fixed in place
6. To **Edit** your banner choose option 1 or scroll to the word **Edit** with your joystick and press straight down
7. You will see box titled text input where you can enter the banner message of your choice (text entry options are listed under Menu)

8. Once your message is complete press the left soft key under the word **Menu** and scroll with the joystick until you see the word **Save**, press straight down to store your banner
9. A message will appear asking banner save **Yes** or **NO**, if you choose **No** the phone will move you back to **Edit mode** so you can change the banner as you see fit, if you select **Yes** the phone will show a confirmation message stating that the banner has been saved
10. To make your selection highlight **Yes** or **No** with the joystick and press straight down
11. To set your banner on or off press 2 or highlight **Set** with the joystick and press straight down
12. The phone will display a message asking "Set banner mode? **Yes** or **No**" choose **No** to turn your banner off, choose **Yes** to set your banner to on. **YOU MUST HAVE THE BANNER TURNED OFF TO USE THE STANDBY WALLPAPER!**
13. If you choose **Yes** the phone will display a confirmation message saying "Banner mode **on**", if you choose **No** the phone will display a message saying "Banner mode **off**" (**phone actually says banner mode release, please change release to off and the word set to on**)
14. To have your banner text slide across the screen from right to left press 3 for **Text Slide** or highlight **Text Slide** with your joystick and press straight down
15. The phone will display a message asking "Set banner slide mode? **Yes** or **No**" choose **No** to set slide mode to off (this state is known as fixed mode), choose **Yes** to set slide mode to on
16. If you choose **Yes** the phone will display a confirmation message saying "Slide mode **on**" if you choose no the phone will display a message saying "Fixed mode **on**" (**please change the word set to on in the phone**)

□ **Software Version**

This feature displays the current software file that has been loaded into your phone

1. Enter the feature menu by pressing the left soft key under the word **Menu** on your display
2. Use the joystick to scroll to the **Display** feature
3. Select the **Display** feature by pressing the joystick straight down or pressing the number 5
4. Select the **Software Version** feature by scrolling with the joystick until that feature is highlighted and pressing straight down or by pressing the number 4
5. The display will show all of the necessary information regarding your phone's software
6. To exit this feature press the **Clear** key

▪ **Setup:**

The **Setup** feature allows you to customize the functionality of your phone to best suit your daily needs

□ **My Menu:**

This feature provides you with customizable shortcut menu. You can access your **My Menu** feature from the main screen of your phone by moving the joystick straight up. A list of the features that you have selected will be displayed

1. Enter the feature menu by pressing the left soft key under the word **Menu** on your display
2. Use the joystick to scroll to the **Setup** feature
3. Select the **Setup** feature by pressing the joystick straight down or pressing the number 6
4. Select the **My menu** feature by scrolling with the joystick until that feature is highlighted and pressing straight down or by pressing the number 1
5. You will see two options: **Set My Menu** and **Reset My Menu**, to customize your feature menu choose **Set My Menu** by pressing 1, or highlighting **Set My Menu** with the joystick and pressing straight down
6. A list of 31 features will be displayed, you can select all of them or from any of them by pressing the star key (\*) as each feature is highlighted

**This is inconsistent with the rest of the phone's performance, with all other features you have to make your selections with the joystick, with this feature you have to use the star key (\*), and there is nothing at all that indicates that you have to make these selections**

with that key, how will a user know? This should be made to perform consistently with the other features and selections should be made with the joystick

7. Once you have made your selections a confirmation message will appear saying "Saving the selected items as My Menu" (the phone actually says saving the selecting items, selecting should be selected)
8. The selected features will now appear in your **My Menu** shortcut list. To access this list begin at the main screen of your phone and move the straight up
9. To remove all items from your My Menu list choose **Reset My Menu** by pressing 2 or highlighting **Reset My Menu** with your joystick and pressing straight down
10. A message will appear asking "Reset My Menu? Yes or No" If you choose **No**, you will be taken back to your Setup menu with out affecting your My Menu selections
11. If you choose **Yes** your My Menu memory will be erased and a confirmation message will appear saying 'My Menu memory has been cleared" (the actual message says, prior setting will be reset, but this should read, my menu memory has been cleared)

**Auto Redial:**

This feature will automatically redial the last number you attempted to call if the call attempt failed. You can choose to have this feature attempt to redial after 10, 20, or 30 seconds

1. Enter the feature menu by pressing the left soft key under the word **Menu** on your display
2. Us the joystick to scroll to the **Setup** feature
3. Select the **Setup** feature by pressing the joystick straight down or pressing the number 6
4. Select the **Auto Redial** feature by scrolling with the joystick until that feature is highlighted and pressing straight down or by pressing the number 2
5. The display will offer the options of having Auto Redial feature set to **Off**, or to redial: **After 10 Sec, After 20 Sec, or After 30 Sec**
6. To make your selection highlight your preference with the joystick and press straight down
7. The phone will display a message confirming your choice or letting you know that Auto Redial has been turned off (please change phone message from saying auto redial release to Auto Redial Off)

**Auto Answer:**

This feature will allow you to set your phone to automatically answer calls for a pre-set amount of time. The Auto Answer feature is especially helpful while you are in the car. You can choose to have 5, 10, or 20 seconds elapse before an incoming call is allowed to connect

1. Enter the feature menu by pressing the left soft key under the word **Menu** on your display
2. Us the joystick to scroll to the **Setup** feature
3. Select the **Setup** feature by pressing the joystick straight down or pressing the number 6
4. Select the **Auto Answer** feature by scrolling with the joystick until that feature is highlighted and pressing straight down or by pressing the number 3
5. The display will offer the options of having the Auto Answer feature set to **Off** or to answer: **After 5 Sec, After 10 Sec, or After 20 Sec**
6. To make your selection highlight your preference with the joystick and press straight down
7. The phone will display a message confirming your choice or letting you know that Auto Answer has been turned off (please change phone message from saying auto answer release to Auto Answer Off)

**Auto Hyphen:**

This feature will automatically insert hyphens where appropriate, when you are storing or dialing a number

1. Enter the feature menu by pressing the left soft key under the word **Menu** on your display
2. Us the joystick to scroll to the **Setup** feature
3. Select the **Setup** feature by pressing the joystick straight down or pressing the number 6
4. Select the **Auto Hyphen** feature by scrolling with the joystick until that feature is highlighted and pressing straight down or by pressing the number 4

5. The phone will ask, Auto Hyphen **On** or **Off**? If you choose to turn this feature **Off** your stored and dialed numbers will appear as one uninterrupted series. If this feature is set to **On** hyphens will be inserted where appropriate (for example: 123-123-1234 in the USA)
6. The phone will display a message confirming that you have set this feature on or off (phone says auto hyphen release change this to Auto Hyphen off, phone says auto hyphen set chance this to Auto Hyphen On)

**Area Code Rules:**

This feature allows you to enter your area code, then to choose whether you want to activate 10-digit dialing. If you activate 10-digit dialing the area code you entered will be transmitted automatically every time you dial (this feature would be easier to use if you had underscores rather than zero's as your blank entry area, and since most area codes are only 3 digits you should only have three blank entry areas \_ \_ \_)

1. Enter the feature menu by pressing the left soft key under the word **Menu** on your display
2. Use the joystick to scroll to the **Setup** feature
3. Select the **Setup** feature by pressing the joystick straight down or pressing the number 6
4. Select the **Area Code Rules** feature by scrolling with the joystick until that feature is highlighted and pressing straight down or by pressing the number 5
5. You will see the command "Enter Area Code" followed by **0000000** if you choose to use area code rules enter your area code here
6. Once your area code is entered choose **Yes** and it will automatically be transmitted with each phone call made in your local calling area. This is convenient in cities that require 10 digit dialing

**Language:**

This feature allows you to choose the language displayed in your phones menus. You can select from English, Spanish, Portuguese, or French. Once you designate a language as active everything on your display reverts to that language

1. Enter the feature menu by pressing the left soft key under the word **Menu** on your display
2. Use the joystick to scroll to the **Setup** feature
3. Select the **Setup** feature by pressing the joystick straight down or pressing the number 6
4. Select the **Language** feature by scrolling with the joystick until that feature is highlighted and pressing straight down or by pressing the number 6
5. You will see a list of languages on your display, scroll with your joystick until the language of your choice is highlighted and press straight down
6. The phone will display a confirmation message letting you know what language was selected

Insert picture of display saying, "Language is set to English"

**TTY Setting(s):**

This feature enables this phone to be used with certain hearing aide devices (I notice there are 4 modes here, full talk hear and off it might make more sense to have just two modes, full and off since I do not know too many people who just want to listen or just want to talk when they make a call. Also it would be hard for someone who does select talk or hear to switch to a different mode in the middle of the call. For this feature to be used in America does it have to do through some kind of disability testing?? Does it only work with certain types of hearing aides or does it work with all of them. We have to be really careful about what we put here in writing so that we do not end up in the midst of a lawsuit when something does not work!!!!

1. Enter the feature menu by pressing the left soft key under the word **Menu** on your display
2. Use the joystick to scroll to the **Setup** feature
3. Select the **Setup** feature by pressing the joystick straight down or pressing the number 6

4. Select the **TTY Setting (S)** feature by scrolling with the joystick until that feature is highlighted and pressing straight down or by pressing the number 7
5. The display will offer several options, you can select to have TTY Settings set to: **TTY Full, TTY Talk, TTY Hear** or **TTY Off** to make your selection scroll to your preference with the joystick and press straight down
6. The phone will display a message confirming your choice or letting you know that TTY mode has been turned off (**the phone displays the message when TTY Off is selected that TTY has been released, please change the wording here to TTY mode has been turned off**)

**DTMF Length:**

This feature allows you to elongate your keypad tones so that they can be recognized by automated phone systems (**should this feature be located under the sounds menu?**)

1. Enter the feature menu by pressing the left soft key under the word **Menu** on your display
2. Use the joystick to scroll to the **Setup** feature
3. Select the **Setup** feature by pressing the joystick straight down or pressing the number 6
4. Select the **DTMF Length** feature by scrolling with the joystick until that feature is highlighted and pressing straight down or by pressing the number 8
5. You will see two options, **DTMF Length Long**, or **Normal** if you choose to have your DTMF Length set to long, your phone will work properly with automated phones systems (such as banking systems and voice mail systems) if you choose to have your tones set to normal your phone will work properly with all regular dialing, but you will not be able to access automated systems
6. Make your selection by scrolling with the joystick until your desired setting is highlighted and then pressing the joystick straight down

**(this feature does not return a confirmation message once you have made your selection, should it?)**

**Security:**

This feature menu allows you to restrict access to your phone by setting up and activating a special lock code, all of the features that can affect your phone's basic functionality are also located in this menu. You must know and enter your 4-digit lock code before being able to use your security menu. **Keep this code safe and do not share it, to ensure proper functionality and to prevent misuse/theft of your phone**

**Lock:**

This feature prevents the unauthorized use of your phone, once this feature is activated your phone will remain locked even if you power it off and back on. You will have to enter your phone's 4-digit lock code to be able to use your phone

1. Enter the feature menu by pressing the left soft key under the word **Menu** on your display
2. Use the joystick to scroll to the **Security** feature
3. Select the **Security** feature by pressing the joystick straight down or pressing the number 7
4. You will be asked to enter the phone's 4-digit lock code before being allowed access to your **Security** feature menu, **the factory default for your 4-digit lock code is 0000**, once this code is entered your phone will automatically advance to the **Security** menu
5. Select the **Lock** feature by scrolling with the joystick until that feature is highlighted and pressing straight down or by pressing the number 1
6. Your screen will show **Lock On** or **Lock Off**, if you select Lock On your phone will lock immediately
7. Make your selection by scrolling to your choice with your joystick and pressing straight down
8. If you activate the Lock feature your phone will display a confirmation message warning, "the phone is locked, emergency calls only" if you turn your lock off the phone will confirm that "phone lock is off"

**Lock Code:**

This feature allows you to change your lock code from the factory default of 0000.

Remember to write down your lock code somewhere safe, if you forget your lock code you will have to contact a local repair center to unlock your phone

1. Enter the feature menu by pressing the left soft key under the word **Menu** on your display
2. Use the joystick to scroll to the **Security** feature
3. Select the **Security** feature by pressing the joystick straight down or pressing the number 7
4. You will be asked to enter the phones 4-digit lock code before being allowed access to your **Security** feature menu, **the factory default for your 4-digit lock code is 0000**, once this code is entered your phone will automatically advance to the **Security** menu
5. Select the **Lock Code** feature by scrolling with the joystick until that feature is highlighted and pressing straight down or by pressing the number 2
6. You will be asked to enter your new password, select a 4-digit code that you will find easy to remember and enter it in the space provided **(my phone froze after I entered my new password, then after a few seconds brought me back to the main display screen it did not change the password to my new code, I can not finish writing about this feature since I do not know what it is supposed to do, could not get the password to change, also please change the word password on the phone to lock code)**

**Restrict:**

This feature allows you to restrict access to certain features of your phone. Once you turn a restriction on in reference to a certain feature you will have to enter your 4-digit lock code to be able to access that feature. You can restrict access to your SMS, Phonebook, Incoming Calls, Outgoing Calls, and WAP features

1. Enter the feature menu by pressing the left soft key under the word **Menu** on your display
2. Use the joystick to scroll to the **Security** feature
3. Select the **Security** feature by pressing the joystick straight down or pressing the number 7
4. You will be asked to enter the phones 4-digit lock code before being allowed access to your **Security** feature menu, **the factory default for your 4-digit lock code is 0000**, once this code is entered your phone will automatically advance to the **Security** menu
5. Select the **Restrict** feature by scrolling with the joystick until that feature is highlighted and pressing straight down or by pressing the number 3
6. You will have the choice of turning your restrictions **on** or **off** for the following features: **Incoming Call, Outgoing Call, SMS, WAP and Phonebook**
7. To set your restrictions on for any of the above features, scroll to the desired feature with your joystick and press straight down
8. Once you have activated the **Restrict** your phone will return a confirmation message letting you know that feature has been restricted
9. Keep in mind, once you have made a feature restricted you will not be able to access it with out knowing your lock code

**Emergency #:**

This feature allows you to store up to three emergency numbers. These numbers can always be dialed, even when your phone is locked or when your outgoing calls are restricted

1. Enter the feature menu by pressing the left soft key under the word **Menu** on your display
2. Use the joystick to scroll to the **Security** feature

3. Select the **Security** feature by pressing the joystick straight down or pressing the number 7
4. You will be asked to enter the phones 4-digit lock code before being allowed access to your **Security** feature menu, **the factory default for your 4-digit lock code is 0000**, once this code is entered your phone will automatically advance to the **Security** menu
5. Select the **Emergency #** feature by scrolling with the joystick until that feature is highlighted and pressing straight down or by pressing the number 4
6. You will see spaces on your display for three emergency numbers, to store your first emergency number scroll to **Emergency 1**, and press the joystick straight down or press the number 1
7. Enter the number that you wish to store, and press the left soft key under the word **Menu** on your display, select **Save** to store, **Cancel** to move back one level on your display or **Delete** to erase a number that was previously stored
8. To store your first emergency number highlight **Save** with your joystick and press straight down, a confirmation message will appear saying "Emergency number saved"
9. Repeat steps 6-8 to store Emergency numbers 2 and 3

**NAM:**

(It is suggested that this feature be under carrier programming or be hidden from the user somehow)

I am not sure how to describe this since the functionality will be somewhat carrier dependant, please have engineers give me a short description of how they envision this working for the user

**Clear Memory:**

This feature will delete all information stored in your call logs, phone book or your PIM (Personal Information Manager). **Be very careful using this feature. Once you have chose to delete all of a features memory you cannot resurrect it. Do not use this feature if you are only trying to erase one phone number**

1. Enter the feature menu by pressing the left soft key under the word **Menu** on your display
2. Use the joystick to scroll to the **Security** feature
3. Select the **Security** feature by pressing the joystick straight down or pressing the number 7
4. You will be asked to enter the phones 4-digit lock code before being allowed access to your **Security** feature menu, **the factory default for your 4-digit lock code is 0000**, once this code is entered your phone will automatically advance to the **Security** menu
5. Select the **Clear Memory** feature by scrolling with the joystick until that feature is highlighted and pressing straight down or by pressing the number 6
6. You will have the choice of clearing your **Call Log's**, **Phonebook's**, or **PIM's** memory, scroll to the feature you want to clear and press straight down with the joystick, you will receive a warning message stating "this will delete all date in the \_\_\_\_\_" select **Yes** to proceed and **No** to exit this menu option with out losing any information
7. Once you have selected **Yes** you will receive a confirmation message letting you know that the memory for your selected feature has been erased

**Reset Phone:**

This feature changes all of the settings on your phone back to the original factory defaults

**Use extreme caution with this feature, once activated all of your chosen settings are gone and not restorable** (When I chose to reset settings the phone said service required and powered itself off then back on, is this correct behavior? Also confirmation message

reads "resetting phone to settings' should be "resetting phone settings" When I chose reset all it still says reset phone to settings as the confirmation message, should say, resetting all defaults)

1. Enter the feature menu by pressing the left soft key under the word **Menu** on your display
2. Use the joystick to scroll to the **Security** feature
3. Select the **Security** feature by pressing the joystick straight down or pressing the number 7
4. You will be asked to enter the phone's 4-digit lock code before being allowed access to your **Security** feature menu, the **factory default for your 4-digit lock code is 0000**, once this code is entered your phone will automatically advance to the **Security** menu
5. Select the **Reset Phone** feature by scrolling with the joystick until that feature is highlighted and pressing straight down or by pressing the number 7
6. You will have the choice of **Resetting Settings** which resets all of your personal selections (keypad volume, automatic answer etc.) back to the factory defaults or **Resetting All** which resets all of your personal selections as well as clearing the memory in your **Phonebook, PIM and Call logs**
7. Make your selection by highlighting your Reset option with the joystick and pressing straight down, you will receive a warning message letting you know that your information is about to be erased and you will have the option of selecting **Yes** to proceed or **No** to exit the menu without losing any information
8. If you choose either of the reset options, a confirmation message will appear on the display of your phone, it will pause, then will power off and back on, once the phone powers on all information in the selected reset option will be set back to the factory default

▪ **Data Service:**

This feature sets up your preferences for all of the phone's data services, including: Data Rate, you can set up the speed of your data transmission and Incoming Mode, you can decide if you want to be able to receive incoming Voice, Modem or Fax information

□ **Data Rate:**

This feature sets the speed of connection between your phone and a Personal Computer if they were connected and exchanging information. The speed talked about here does not affect the phone's WAP services or Fax transmission rate

1. Enter the feature menu by pressing the left soft key under the word **Menu** on your display
2. Use the joystick to scroll to the **Data Service** feature
3. Select the **Data Service** feature by pressing the joystick straight down or pressing the number 8
4. Select the **Data Rate** feature by scrolling with the joystick until that feature is highlighted and pressing straight down or by pressing the number 1
5. You will be asked to choose between a rate of **19200, 115200, and 230400**. Make your selection by highlighting your choice with your joystick and pressing straight down
6. Once your selection has been made your phone will display a confirmation message stating "Data Rate is set to \_\_\_\_ bps"

□ **Incoming Mode:**

This feature determines what incoming information will be addressed by the phone and what information will be ignored, for example if you activate Fax Only Mode, you will not be able to answer voice calls with your phone

1. Enter the feature menu by pressing the left soft key under the word **Menu** on your display
2. Use the joystick to scroll to the **Data Service** feature
3. Select the **Data Service** feature by pressing the joystick straight down or pressing the number 8
4. Select the **Incoming Mode** feature by scrolling with the joystick until that feature is highlighted and pressing straight down or by pressing the number 2

5. You will be asked to choose from **Voice Only, Modem Only or Fax Only** mode
6. Make your selection by scrolling with your joystick until the desired option is highlighted then pressing the joystick straight down
7. If you choose **Modem Only** or **Fax Only** be aware that you will not be able to receive incoming voice calls
8. The phone will display a confirmation message letting you know what option you have selected

▪ **Location:**  
This feature allows you to set your phone to make network emergency calls only (911 with in the USA) or to be able to make all calls (not really sure what the point of this feature is since it is not locked at all and anyone could go in and change it at any time should it either be removed or at least password protected? Maybe I am not correct about what the feature is supposed to do? Maybe this should actually be under the roaming heading since there is no submenu to this feature?)

1. Enter the feature menu by pressing the left soft key under the word **Menu** on your display
2. Use the joystick to scroll to the **Location** feature
3. Select the **Location** feature by pressing the joystick straight down or pressing the number 9
4. You will see two choices, **Location On** or **911 only** if you choose **911 only** your phone will return a message saying "Location lock is on" which means that you can only dial 911 calls, if you chose **Location On** the phone will display the message "Location lock is off" and you will be able to make any outgoing call agreed upon in your carrier service contract

▪ **Roaming:**  
This feature should be setup by your cellular carrier and you should not change any of the settings without their prior instruction and approval. These settings will affect your monthly billing amounts and your phones Network performance (I think these setting should be hidden from the user)

□ **Roaming Setup:**  
This feature allows you to select which system your phone is setup to access when you make outgoing calls. You will have to enter your 4-digit lock code before being able to change your Roaming Settings

1. Enter the feature menu by pressing the left soft key under the word **Menu** on your display
2. Use the joystick to scroll to the **Roaming** feature
3. Select the **Roaming** feature by pressing the joystick straight down
4. A warning message will appear on the display stating "this can affect your phone's activation"
5. You will be asked to enter the phones 4-digit lock code before being allowed access to your **Roaming** feature menu, the **factory default for your 4-digit lock code is 0000**, once this code is entered your phone will automatically advance to the **Roaming** menu
6. Choose **Roaming Setup** by pressing straight down with the joystick or pushing the number 1
7. You will be given the choice of setting your phone to: **Standard, Home Only, A Only** or **B Only** these selections are best chosen by your cellular carrier and you should not change them with their knowledge and approval
8. If you do consult with your carrier and they instruct you to change your Roaming Settings highlight the option you wish to choose, and press straight down with your joystick or press the number on the keypad that corresponds with your choice
9. Your phone will ask do you want to set your phone to Yes or No (I notice that when I make a change to the roaming settings no confirmation message comes up letting me know that my selected change has been accepted, I would imagine that there is supposed to be one since there seems to be confirmation messages for every other feature)

□ **Select System:**

This feature allows your phone to automatically select from a digital or analog system preference depending on which system has a stronger signal or allows you to force the phone to search for either a digital or analog system

1. Enter the feature menu by pressing the left soft key under the word **Menu** on your display
2. Use the joystick to scroll to the **Roaming** feature
3. Select the **Roaming** feature by pressing the joystick straight down
4. A warning message will appear on the display stating "this can affect your phone's activation"
5. You will be asked to enter the phone's 4-digit lock code before being allowed access to your **Roaming** feature menu, **the factory default for your 4-digit lock code is 0000**, once this code is entered your phone will automatically advance to the **Roaming** menu
6. Choose **Select System** by scrolling until it is highlighted and pressing straight down with the joystick or pushing the number 2
10. You will be able to choose from System Select: **Automatic, Digital Only or Analog Only**, these selections are best chosen by your cellular carrier and you should not change them with our their knowledge and approval
7. Once you have contacted your carrier and they have instructed you which is the best choice to set your System Selection to scroll to your desired option and press straight down with your joystick, your phone will return a confirmation message letting you know that your choice has been activated

# Safety Information

## 1. 10 Driver Safety Tips

Your wireless telephone gives you the powerful ability to communicate by voice-almost anywhere, anytime. But an important responsibility accompanies the benefits of wireless phones, one that every user must uphold.

When driving a car, driving is your first responsibility. When using your wireless phone behind the wheel of a car, practice good common sense and remember the following tips:

**1. Get to know your wireless phone and its features such as speed dial and redial.** If available, these features help you to place your call without taking your attention off the road.

**2. When available, use a hands free device.** If possible, add an additional layer of convenience and safety to your wireless phone with one of the many hands free accessories available today.

**3. Position your wireless phone within easy reach.** Be able to access your wireless phone without removing your eyes from the road. If you get an incoming call at an inconvenient time, if possible, let your voice mail answer it for you.

**4. Let the person you are speaking with know you are driving; if necessary, suspend the call in heavy traffic or hazardous weather conditions.** Rain, sleet, snow, ice, and even heavy traffic can be hazardous.

**5. Do not take notes or look up phone numbers while driving.** Jotting down a “to do” list or flipping through your address book takes attention away from your primary responsibility, driving safely.

**6. Dial sensibly and assess the traffic; if possible, place calls when you are not moving or before pulling into traffic.** Try to plan calls when your car will be stationary. If you need to make a call while moving, dial only a few numbers, check the road and your mirrors, then continue.

**7. Do not engage in stressful or emotional conversations that may be distracting.** Make people you are talking with aware you are driving and suspend conversations that have the potential to divert your attention from the road.

**8. Use your wireless phone to call for help.** Dial 9-1-1 or other local emergency number in the case of fire, traffic accident or medical emergencies. *Remember, it is a free call on your wireless phone!*

**9. Use your wireless phone to help others in emergencies.** If you see an auto accident, crime in progress or other serious emergency where lives are in danger, call 9-1-1 or other local emergency number, as you would want others to do for you.

**10. Call roadside assistance or a special nonemergency wireless assistance number when necessary.** If you see a broken-down vehicle posing no serious hazard, a broken traffic signal, a minor traffic accident where no one appears injured, or a vehicle you know to be stolen, call roadside assistance or other special non-emergency wireless number.

*“The wireless industry reminds you to use your phone safely when driving.”*

For more information, please call 1-888-901 –  
SAFE, or visit our website [www.wowcom.com](http://www.wowcom.com)™

*Provided by the Cellular Telecommunications & Internet Association*

Safety – The most important call Logo ? ? ? ? ? !!!

## 2. Consumer Information on SAR

### THIS MODEL PHONE MEETS THE GOVERNMENT'S REQUIREMENTS FOR EXPOSURE TO RADIO WAVES.

Your wireless phone is a radio transmitter and receiver. It is designed and manufactured not to exceed the emission limits for exposure to radio frequency (RF) energy set by the Federal Communications Commission of the U.S. Government. These limits are part of comprehensive guidelines and establish permitted levels of RF energy for the general population. The guidelines are based on standards that were developed by independent scientific organizations through periodic and thorough evaluation of scientific studies. The standards include a substantial safety margin designed to assure the safety of all persons, regardless of age and health.

The exposure standard for wireless mobile phones employs a unit of measurement known as the Specific Absorption Rate, or SAR. The SAR limit set by the FCC is 1.6W/kg.\* Tests for SAR are conducted using standard operating positions specified by the FCC with the phone transmitting at its highest certified power level in all tested frequency bands. Although the SAR is determined at the highest certified power level, the actual SAR level of the phone while operating can be well below the maximum value. This is because the phone is designed to operate at multiple power levels so as to use only the power required to reach the network. In general, the closer you are to a wireless base station antenna, the lower the power output.

Before a phone model is available for sale to the public, it must be tested and certified to the FCC that it does not exceed the limit established by the government-adopted requirement for safe exposure. The tests are performed in positions and locations (e.g., at the ear and worn on the body) as required by the FCC for each model. The highest SAR value for this model phone when tested for use at the ear is 1.47W/kg and when worn on the body, as described in this user guide, is 1.14W/kg (Body-worn measurements differ among phone models, depending upon available accessories and FCC requirements). While there may be differences between the SAR levels of various phones and at various positions, they all meet the government requirement for safe exposure.

The FCC has granted an Equipment Authorization for this model phone with all reported SAR levels evaluated as in compliance with the FCC RF emission guidelines. SAR information on this model phone is on file with the FCC and can be found under the Display Grant section of <http://www.fcc.gov/oet/fccid> after searching on FCC ID POQWTE-300.

Additional information on Specific Absorption Rates (SAR) can be found on the Cellular Telecommunications & Internet Association (CTIA) web-site at <http://www.phonefacts.net>

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\* In the United States and Canada, the SAR limit for mobile phones used by the public is 1.6 watts/kg (W/kg) averaged over one gram of tissue. The standard incorporates a substantial margin of safety to give additional protection for the public and to account for any variations in measurements.

### FCC RF EXPOSURE INFORMATION

This device was tested for typical body-worn operations with the back of the phone kept 1.5 cm. from the body. To maintain compliance with FCC RF exposure requirements, use only belt-clips, holsters or similar accessories that maintain a 1.5 cm. separation distance between the user's body and the back of the phone, including the antenna, whether extended or retracted. The use of belt-clips, holsters and similar accessories should not contain metallic components in its assembly. The use of accessories that do not satisfy these requirements may not comply with FCC RF exposure requirements, and should be avoided.

### 3. **TIA Safety Information**

#### **EXPOSURE TO RADIO FREQUENCY SIGNALS**

Your wireless handheld portable telephone is a low power radio transmitter and receiver. When it is ON, it receives and also sends out radio frequency (RF) signals.

In August, 1996, the Federal Communications Commissions (FCC) adopted RF exposure guidelines with safety levels for hand-held wireless phones. Those guidelines are consistent with the safety standards previously set by both U.S. and international standards bodies:

ANSI C95.1 (1992)\*

NCRP Report 86 (1986)

ICNIRP (1996)

Those standards were based on comprehensive and periodic evaluations of the relevant scientific literature. For example, over 120 scientists, engineers, and physicians from universities, government health agencies, and industry reviewed the available body of research to develop the ANSI Standard (C95.1).

The design of your phone complies with the FCC guidelines (and those standards).

\* American National Standards Institute; National Council on Radiation Protection and Measurements; International Commission on Non-Ionizing Radiation Protection

#### **ANTENNA CARE**

Use only the supplied or an approved replacement antenna. Unauthorized antennas, modifications, or attachments could damage the phone and may violate FCC regulations.

#### **PHONE OPERATION**

**NORMAL POSITION:** Hold the phone as you would any other telephone with the antenna pointed up and over your shoulder.

#### **TIPS ON EFFICIENT OPERATION:**

- For your phone to operate most efficiently:
- Extend your antenna fully.

Do not touch the antenna unnecessarily when the phone is in use. Contact with the antenna affects call quality and may cause the phone to operate at a higher power level than otherwise needed.

#### **DRIVING**

Check the laws and regulations on the use of wireless telephones in the areas where you drive. Always obey them. Also, if using your phone while driving, please:

- Give full attention to driving -- driving safely is your first responsibility;
- Use hands-free operation, if available;
- Pull off the road and park before making or answering a call if driving conditions so

require.

## **ELECTRONIC DEVICES**

Most modern electronic equipment is shielded from RF signals. However, certain electronic equipment may not be shielded against the RF signals from your wireless phone.

### **Pacemakers**

The Health Industry Manufacturers Association recommends that a minimum separation of six (6") inches be maintained between a handheld wireless phone and a pacemaker to avoid potential interference with the pacemaker. These recommendations are consistent with the independent research by and recommendations of Wireless Technology Research.

Persons with pacemakers:

- Should ALWAYS keep the phone more than six inches from their pacemaker when the phone is turned ON;
- Should not carry the phone in a breast pocket;
- Should use the ear opposite the pacemaker to minimize the potential for interference .
- If you have any reason to suspect that interference is taking place, turn your phone OFF immediately

### **Hearing Aids**

Some digital wireless phones may interfere with some hearing aids. In the event of such interference, you may want to consult your service provider [or call the customer service line to discuss alternatives.] Optional for each phone manufacturer.

### **Other Medical Devices**

If you use any other personal medical device, consult the manufacturer of your device to determine if they are adequately shielded from external RF energy. Your physician may be able to assist you in obtaining this information.

Turn your phone OFF in health care facilities when any regulations posted in these areas instruct you to do so. Hospitals or health care facilities may be using equipment that could be sensitive to external RF energy.

### **Vehicles**

RF signals may affect improperly installed or inadequately shielded electronic systems in motor vehicles. Check with the manufacturer or its representative regarding your vehicle. You should also consult the manufacturer of any equipment that has been added to your vehicle.

### **Posted Facilities**

Turn your phone OFF in any facility where posted notices so require.

## **AIRCRAFT**

FCC regulations prohibit using your phone while in the air. Switch OFF your phone before boarding an aircraft.

## **BLASTING AREAS**

To avoid interfering with blasting operations, turn your phone OFF when in a “blasting area” or in areas posted: “Turn off two-way radio”. Obey all signs and instructions.

## **POTENTIALLY EXPLOSIVE ATMOSPHERES**

Turn your phone OFF when in any area with a potentially explosive atmosphere and obey all signs and instructions. Sparks in such areas could cause an explosion or fire resulting in bodily injury or even death.

Areas with a potentially explosive atmosphere are often, but not always marked clearly. Potential areas may include: fueling areas (such as gasoline stations); below deck on boats; fuel or chemical transfer or storage facilities; vehicles using liquefied petroleum gas (such as propane or butane); areas where the air contains chemicals or particles (such as grain, dust, or metal powders); and any other area where you would normally be advised to turn off your vehicle engine.

## **For Vehicles Equipped with an Air Bag**

An air bag inflates with great force. DO NOT place objects, including either installed or portable wireless equipment, in the area over the air bag or in the air bag deployment area. If in-vehicle wireless equipment is improperly installed and the air bag inflates, serious injury could result.

## 4. FDA Consumer Update

### The U.S. Food and Drug Administration's Center for Devices and Radiological Health Consumer Update on **Wireless Phones**

#### 1. Do wireless phones pose a health hazard?

The available scientific evidence does not show that any health problems are associated with using wireless phones. There is no proof, however, that wireless phones are absolutely safe. Wireless phones emit low levels of radio frequency energy (RF) in the microwave range while being used. They also emit very low levels of RF when in the stand-by mode. Whereas high levels of RF can produce health effects (by heating tissue), exposure to low level RF that does not produce heating effects causes no known adverse health effects. Many studies of low level RF exposures have not found any biological effects. Some studies have suggested that some biological effects may occur, but such findings have not been confirmed by additional research. In some cases, other researchers have had difficulty in reproducing those studies, or in determining the reasons for inconsistent results.

#### 2. What is FDA's role concerning the safety of wireless phones?

Under the law, FDA does not review the safety of radiation-emitting consumer products such as wireless phones before they can be sold, as it does with new drugs or medical devices. However, the agency has authority to take action if wireless phones are shown to emit radio frequency energy (RF) at a level that is hazardous to the user. In such a case, FDA could require the manufacturers of wireless phones to notify users of the health hazard and to repair, replace or recall the phones so that the hazard no longer exists.

Although the existing scientific data do not justify FDA regulatory actions, FDA has urged the wireless phone industry to take a number of steps, including the following:

- Support needed research into possible biological effects of RF of the type emitted by wireless phones;
- Design wireless phones in a way that minimizes any RF exposure to the user that is not necessary for device function; and
- Cooperate in providing users of wireless phones with the best possible information on possible effects of wireless phone use on human health.

FDA belongs to an interagency working group of the federal agencies that have responsibility for different aspects of RF safety to ensure coordinated efforts at the federal level. The following agencies belong to this working

group:

- National Institute for Occupational Safety and Health
- Environmental Protection Agency
- Federal Communications Commission
- Occupational Safety and Health Administration
- National Telecommunications and Information Administration

The National Institutes of Health participates in some interagency working group activities, as well.

FDA shares regulatory responsibilities for wireless phones with the Federal Communications Commission (FCC). All phones that are sold in the United States must comply with FCC safety guidelines that limit RF exposure. FCC relies on FDA and other health agencies for safety questions about wireless phones.

FCC also regulates the base stations that the wireless phone networks rely upon. While these base stations operate at higher power than do the wireless phones themselves, the RF exposures that people get from these base stations are typically thousands of times lower than those they can get from wireless phones. Base stations are thus not the subject of the safety questions discussed in this document.

### **3. What kinds of phones are the subject of this update?**

The term "wireless phone" refers here to hand-held wireless phones with built-in antennas, often called "cell," "mobile," or "PCS" phones. These types of wireless phones can expose the user to measurable radio frequency energy (RF) because of the short distance between the phone and the user's head. These RF exposures are limited by Federal Communications Commission safety guidelines that were developed with the advice of FDA and other federal health and safety agencies. When the phone is located at greater distances from the user, the exposure to RF is drastically lower because a person's RF exposure decreases rapidly with increasing distance from the source. The so-called "cordless phones," which have a base unit connected to the telephone wiring in a house, typically operate at far lower power levels, and thus produce RF exposures far below the FCC safety limits.

### **4. What are the results of the research done already?**

The research done thus far has produced conflicting results, and many studies have suffered from flaws in their research methods. Animal experiments investigating the effects of radio frequency energy (RF) exposures characteristic of wireless phones have yielded conflicting results that often cannot be repeated in other laboratories. A few animal studies, however, have

suggested that low levels of RF could accelerate the development of cancer in laboratory animals. However, many of the studies that showed increased tumor development used animals that had been genetically engineered or treated with cancer-causing chemicals so as to be pre-disposed to develop cancer in the absence of RF exposure. Other studies exposed the animals to RF for up to 22 hours per day. These conditions are not similar to the conditions under which people use wireless phones, so we don't know with certainty what the results of such studies mean for human health.

Three large epidemiology studies have been published since December 2000. Between them, the studies investigated any possible association between the use of wireless phones and primary brain cancer, glioma, meningioma, or acoustic neuroma, tumors of the brain or salivary gland, leukemia, or other cancers. None of the studies demonstrated the existence of any harmful health effects from wireless phone RF exposures. However, none of the studies can answer questions about long-term exposures, since the average period of phone use in these studies was around three years.

## **5. What research is needed to decide whether RF exposure from wireless phones poses a health risk?**

A combination of laboratory studies and epidemiological studies of people actually using wireless phones would provide some of the data that are needed. Lifetime animal exposure studies could be completed in a few years. However, very large numbers of animals would be needed to provide reliable proof of a cancer promoting effect if one exists. Epidemiological studies can provide data that is directly applicable to human populations, but 10 or more years' follow-up may be needed to provide answers about some health effects, such as cancer. This is because the interval between the time of exposure to a cancer-causing agent and the time tumors develop - if they do - may be many, many years. The interpretation of epidemiological studies is hampered by difficulties in measuring actual RF exposure during day-to-day use of wireless phones. Many factors affect this measurement, such as the angle at which the phone is held, or which model of phone is used.

## **6. What is FDA doing to find out more about the possible health effects of wireless phone RF?**

FDA is working with the U.S. National Toxicology Program and with groups of investigators around the world to ensure that high priority animal studies are conducted to address important questions about the effects of exposure to radio frequency energy (RF).

FDA has been a leading participant in the World Health Organization International Electromagnetic Fields (EMF) Project since its inception in 1996. An influential result of this work has been the development of a detailed

agenda of research needs that has driven the establishment of new research programs around the world. The Project has also helped develop a series of public information documents on EMF issues.

FDA and the Cellular Telecommunications & Internet Association (CTIA) have a formal Cooperative Research and Development Agreement (CRADA) to do research on wireless phone safety. FDA provides the scientific oversight, obtaining input from experts in government, industry, and academic organizations. CTIA-funded research is conducted through contracts to independent investigators. The initial research will include both laboratory studies and studies of wireless phone users. The CRADA will also include a broad assessment of additional research needs in the context of the latest research developments around the world.

## **7. How can I find out how much radio frequency energy exposure I can get by using my wireless phone?**

All phones sold in the United States must comply with Federal Communications Commission (FCC) guidelines that limit radio frequency energy (RF) exposures. FCC established these guidelines in consultation with FDA and the other federal health and safety agencies. The FCC limit for RF exposure from wireless telephones is set at a Specific Absorption Rate (SAR) of 1.6 watts per kilogram (1.6 W/kg). The FCC limit is consistent with the safety standards developed by the Institute of Electrical and Electronic Engineering (IEEE) and the National Council on Radiation Protection and Measurement. The exposure limit takes into consideration the body's ability to remove heat from the tissues that absorb energy from the wireless phone and is set well below levels known to have effects.

Manufacturers of wireless phones must report the RF exposure level for each model of phone to the FCC. The FCC website (<http://www.fcc.gov/oet/rfsafety>) gives directions for locating the FCC identification number on your phone so you can find your phone's RF exposure level in the online listing.

## **8. What has FDA done to measure the radio frequency energy coming from wireless phones ?**

The Institute of Electrical and Electronic Engineers (IEEE) is developing a technical standard for measuring the radio frequency energy (RF) exposure from wireless phones and other wireless handsets with the participation and leadership of FDA scientists and engineers. The standard, "Recommended Practice for Determining the Spatial-Peak Specific Absorption Rate (SAR) in the Human Body Due to Wireless Communications Devices: Experimental Techniques," sets forth the first consistent test methodology for measuring the rate at which RF is deposited in the heads of wireless phone users. The test method uses a tissue-simulating model of the human head. Standardized SAR

test methodology is expected to greatly improve the consistency of measurements made at different laboratories on the same phone. SAR is the measurement of the amount of energy absorbed in tissue, either by the whole body or a small part of the body. It is measured in watts/kg (or milliwatts/g) of matter. This measurement is used to determine whether a wireless phone complies with safety guidelines.

## **9. What steps can I take to reduce my exposure to radio frequency energy from my wireless phone?**

If there is a risk from these products--and at this point we do not know that there is--it is probably very small. But if you are concerned about avoiding even potential risks, you can take a few simple steps to minimize your exposure to radio frequency energy (RF). Since time is a key factor in how much exposure a person receives, reducing the amount of time spent using a wireless phone will reduce RF exposure.

- If you must conduct extended conversations by wireless phone every day, you could place more distance between your body and the source of the RF, since the exposure level drops off dramatically with distance. For example, you could use a headset and carry the wireless phone away from your body or use a wireless phone connected to a remote antenna

Again, the scientific data do not demonstrate that wireless phones are harmful. But if you are concerned about the RF exposure from these products, you can use measures like those described above to reduce your RF exposure from wireless phone use.

## **10. What about children using wireless phones?**

The scientific evidence does not show a danger to users of wireless phones, including children and teenagers. If you want to take steps to lower exposure to radio frequency energy (RF), the measures described above would apply to children and teenagers using wireless phones. Reducing the time of wireless phone use and increasing the distance between the user and the RF source will reduce RF exposure.

Some groups sponsored by other national governments have advised that children be discouraged from using wireless phones at all. For example, the government in the United Kingdom distributed leaflets containing such a recommendation in December 2000. They noted that no evidence exists that using a wireless phone causes brain tumors or other ill effects. Their recommendation to limit wireless phone use by children was strictly precautionary; it was not based on scientific evidence that any health hazard exists.

## **11. What about wireless phone interference with medical equipment?**

Radio frequency energy (RF) from wireless phones can interact with some electronic devices. For this reason, FDA helped develop a detailed test method to measure electromagnetic interference (EMI) of implanted cardiac pacemakers and defibrillators from wireless telephones. This test method is now part of a standard sponsored by the Association for the Advancement of Medical instrumentation (AAMI). The final draft, a joint effort by FDA, medical device manufacturers, and many other groups, was completed in late 2000. This standard will allow manufacturers to ensure that cardiac pacemakers and defibrillators are safe from wireless phone EMI.

FDA has tested hearing aids for interference from handheld wireless phones and helped develop a voluntary standard sponsored by the Institute of Electrical and Electronic Engineers (IEEE). This standard specifies test methods and performance requirements for hearing aids and wireless phones so that no interference occurs when a person uses a “compatible” phone and a “compatible” hearing aid at the same time. This standard was approved by the IEEE in 2000.

FDA continues to monitor the use of wireless phones for possible interactions with other medical devices. Should harmful interference be found to occur, FDA will conduct testing to assess the interference and work to resolve the problem.

## **12. Where can I find additional information?**

For additional information, please refer to the following resources:

- FDA web page on wireless phones  
(<http://www.fda.gov/cdrh/phones/index.html>)
- Federal Communications Commission (FCC) RF Safety Program  
(<http://www.fcc.gov/oet/rfsafety>)
- International Commission on Non-Ionizing Radiation Protection  
(<http://www.icnirp.de>)
- World Health Organization (WHO) International EMF Project  
(<http://www.who.int/emf>)
- National Radiological Protection Board (UK)  
(<http://www.nrpb.org.uk/>)