

ГТЛ-Р060-05-01-Ф-0311

**ADDITION  
to  
USER GUIDE**

**Tri-mode GSP-1600 Phone**

# ADDITION TO USER GUIDE

## to tri-mode GSP 1600 phone

### 1. Preparing for satellite calls

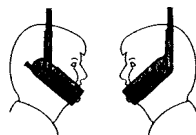
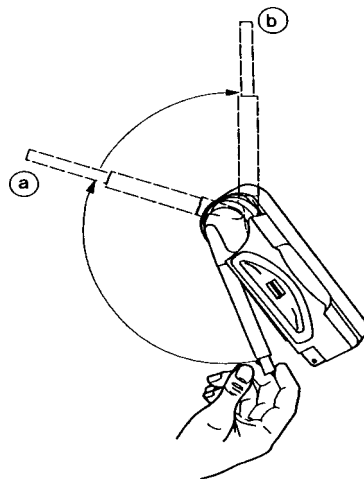
Charge and install the batteries.

#### Deploying the antenna.

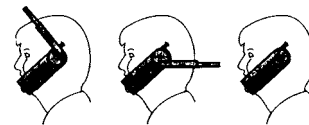
When establishing the communication it is desirable to hold the UT in vertical position and to put the satellite antenna in vertical position as well.

After the call is answered rotate the antenna to one of the two fixed positions. The position is selected so that when you put the phone to the ear the antenna remains vertical:

- the antenna must be in position a) in the event you put the phone to the left ear;
- the antenna must be in position b) in the event you put the phone to the right ear.



Correct



Wrong

The antenna will automatically extend as you rotate it and automatically retract when stored, so you don't have to extend the antenna out and to place it back.

It is impossible to make and to receive phone calls if the antenna is stored.



To make a satellite call it is necessary to go with the phone out-of-doors to have the clear view of the whole sky. Move away from high-rise buildings or trees, i.e. there should be direct clear view between the UT antenna and the satellite, which can be in any point of a firmament. Presence of obstacles for a radio beam, whose top point is below the line with elevation angle of 10 degrees is permissible.

In the Northern hemisphere to the North of  $52^\circ$  it is sufficient to ensure absence of obstacles for the radio beam and direct view with the satellite to the south from the UT with the elevation angle higher than 10 degrees.

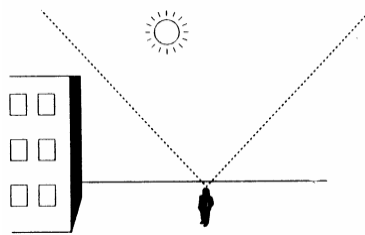


Fig. 1. The correct place of the subscriber with phone: a corner between horizontal line and the line directed to the top point of the building makes no more than 10 degrees.

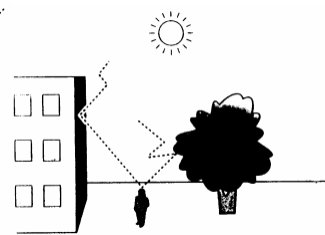
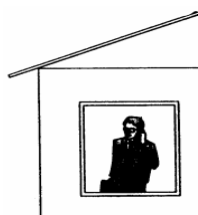
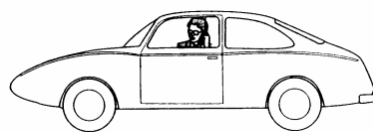


Fig. 2. The wrong position of the subscriber with phone.

The phone will not operate inside a building or a vehicle unless you are using the car kit.



Wrong




Wrong unless a car kit is used

In case the phone is used for data transmission fix it or put on a horizontal surface to make the volume adjustment button on the upper side, so that the antenna turns under the right angle to the UT body and thus is established vertically.



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## 2. Making Satellite Calls

1. Deploy the UT antenna in a point chosen according to recommendations of the previous chapter "Preparing satellite calls".

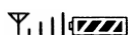
2. Switch on the power, for that press the  button and hold it until an indicator on the display appears, the phone begins searching the radio signal. Depending on the mode one of the following messages will be displayed:

[See display indicators on page 16 of the User Guide].

3. In case the UT is in the mode of cellular network search (in this case the indicator is displayed either second, or third at the left), to switch it into the satellite mode it is necessary to press and hold  key until the menu is displayed; in the menu with the help of  key select **Globalstar** mode.


4. Install the telephone in vertical position facing south, and wait for the termination of network search. At the first switching of phone or at moving to another GW zone the network search can last up to 3 minutes.

After the network connection is established the phone remains in the waiting mode and the following indicators are displayed:



GLOBALTEL  
27 feb thu  
22:43 MSK

book menu

5. Dial the number you want to call and press  key:

a) If you are making a call to a subscriber of local (city, community, cellular) network in Russia first dial 8, then city code (cellular code) and subscriber's number.

Eg.; If you want to call the town of Kimry, you first dial 808236xxxxx; to call Astrakhan: 83452xxxxxx, to call Moscow: 8095xxxxxxx (xxxxxxx - user's phone number in a city / rural network). When calling a BeeLine subscriber: 8903xxxxxxx (where xxxxxx is the user's cellular telephone number).


b) a phone call to a foreign subscriber is carried out in the international format, that is first dial 8, then international access code: 10, country code, city code and the phone number.

For example, to call a subscriber in France (country code is 33) you should dial (without pauses) 81033xxxxxxxxxx.

c) to call GlobalTel's network subscriber you should dial seven-digit user's number without a prefix or a code, prefix 8, a code of the Globalstar system: 954 and then the user's number:, that is either xxxxxx, or 8954xxxxxx should be dialed. (xxxxxxx - user's number of satellite phone GlobalTel).

d) To call the operator of the Globalstar\* Russian segment of CJSC GlobalTel. To call the Customer-Care Center of CJSC GlobalTel it is necessary to dial either 611, or 85017972727 ( calls to both numbers are toll-free).

6. After your call is answered you should place the antenna in one of the two fixed positions (see paragraph «Preparing for satellite calls») and start talking with your subscriber.

7. To end the call press .

8. The phone is switched off with extended antenna and in the standby mode. In case you follow this condition, the time of the phone's registration in the network will be minimal.

**Note.** To ensure the radio signal reception when making a satellite call (dialing number, etc.) the antenna should be in vertical position all the time.

9. After turning the phone off and on the network connection mode, temporarily established according to item 3 hereof, does not last, and the phone is connected to the network according to the network connection permanent mode.

To ensure the connection only to the satellite network, it is necessary:

- 1 With the help of item 8 9 1 of the main menu to select the option of module NAM compulsory choice (option: **n/a**);
- 2 With the help of item 8 9 2 of the main menu to select module NAM: **NAM GStar**;
- With the help of item 8 8 1 of the main menu to select the **Globalstar mode**

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### 3. Roaming calls

If GlobalTel's subscriber makes a call from abroad, while being in the service area of a foreign Globalstar service provider (SP) and on condition he has subscribed to international access and international roaming, the phone will be registered in this operator's network. After the phone is registered and is in a standby mode the operator's name, registration's indicator and roaming indicator will be displayed.

When dialing the number, you should first press and hold "0" until "+" is displayed, then dial country code, city code (cellular code) and subscriber's number.



Eg., - to call the Moscow city network you should dial: +7095xxxxxxx;

- to call a Beeline subscriber you should dial: +7903xxxxxxx .


- the international access code in **DACOM Korea** is +2, so if the subscriber is in this Company's service area and wants to place a call to Moscow, he should dial +27095xxxxxxx.

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### 4. What to do if your phone is not registered.

In standby mode the indicators of the received signal strength  and of the phone network registration  are displayed, which help to see if the phone is operable in this definite point.

If the phone is positioned in the Globalstar service area correctly, after the GW search and registration are completed there will be four strokes in the indicator, which testifies about normal radio signal. Less strokes indicate smaller radio signal level. It may be caused by lack of direct view to the satellite, by phone malfunction or by radio interference.

In standby mode the displayed  indicator means that your phone is registered in the Globalstar network. The absence of such indicator means that the phone is not prepared for operation and the communications cannot be established and it is pointless to attempt phone calls until the malfunction is removed and the indicator displays.

#### ***Phone registration troubleshooting***

##### **Situation 1**

The phone remains in radio signal search mode («service search» does not disappear from the display). That means:

- a) There is no direct view to the satellite. In this case it is necessary to choose a new place for the phone, which would meet the conditions stated in paragraph 1 « Preparing ...».

b) The phone is faulty, inform the Customer-Care Center (CCC) by phone specified on the last page hereof.

### **Situation 2**

On the display there is the image corresponding to the standby mode, but the **■** indicator is not displayed and the signal strength periodically falls, that means, that search of the radio signal from the GW in which service area the phone is located is going on, and you should wait for 2-3 minutes.

If in 3 minutes the situation is not changed, it is necessary to switch off the phone and switch it on again. In case the situation is not changed and the user is confident there is a direct view to the satellite, it is necessary to contact the CCC.

### **Situation 3**

On the display the standby mode is displayed, but the level of the received radio signal is constantly varying, and the registration indicator is sometimes disappearing. In case the user is confident, that there is a direct view to the satellite, it is necessary to address the CCC.

The instability of the received radio signal can be caused by a radio noise (especially, if the phone is used in urban quarters). Presence or absence of a radio noise in the given point can be determined with the help of a mobile phone preliminary checked in another place. In case you are confident that the direct view to the satellite is available, frequent and chaotic fluctuations of the received radio signal strength on the display of the preliminary checked mobile phone testify to presence of a radio noise in the given point.

**\*\*\***

## **5. What to do if your car kit phone is not registered**

In case the car kit phone is not registered or the received radio signal strength is unstable while the user is confident of the direct view to the satellite, the phone should be taken out from the car kit and its operability checked in an independent mode according to the present Addition.

**\*\*\***

## **6. Forced blocking of the phone**

If the subscriber fails to refill the balance on his personal account the satellite network operator may block the phone.

In case of partial blocking incoming calls and an outgoing call to the CCC's number 611 are possible. At the attempt to make an outgoing call the answerphone notifies «You cannot call from given mobile phone ».

In case of full blocking only outgoing calls to the CCC's number 611 are possible. At the attempt to call the blocked phone the answerphone notifies: «the Subscriber does not receive incoming calls ».

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## **7. Dialing GlobalTel satellite phone**

1. To call a GlobalTel satellite phone the procedure analogous to making an international call to a city / rural telephone system is used, only the "954" GlobalTel system code is dialed instead of the city code. For example, for the majority of city networks the following procedure is established: the prefix **8** is dialed, after a buzzing signal **954xxxxxxx** is dialed (xxxxxxx - user's satellite phone number).

2. To call a GlobalTel satellite phone from a cellular network the same procedure is used: **8** is dialed, and **954xxxxxxx** is dialed (xxxxxxx - user's satellite phone number).

**\*\*\***

## **8. Data service**

Data transmission is carried out with the help of the data transmission equipment (DTE) connected to RS-232 port by a special cable included in the data set delivered separately.

The type of the DTE is chosen by the user. For this purpose the personal computer with Windows 95, 98, 2000 operational systems with use of communication programs from the Windows complete set (dial-up and Hyper Terminal) can be used, for example. In this case the 19200 bps standard modem driver available in the complete set of Window programs is installed in the computer.

Maximum data rate values of the data port and those of the phone should be identical. The recommended value is 19200 bps.

In the phone the maximum data port rate is established in accordance with item 4 4 of the main menu.

To call the GlobalTel server through the dial-up programme and to subsequently access the Internet no prefix is required, you should dial only "123".

To call the subscriber to transfer files through the Hyper Terminal programme you should dial: 8, [city code] [subscriber's phone number].

To receive incoming calls from a data path the phone should have a special user's number, that is the phone is assigned two numbers: one - for voice communication and the second - for reception of incoming calls from a data path.

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## 9. Position location

The phone position location is carried out in the conversation mode in accordance with item 4 3 of the main menu. To perform this operation it is necessary to establish connection with any subscriber, to enter the given item of the menu and to press the button under **update** display key. In case this button is pressed several times the position location results can vary within the limits of the accuracy of measurement.

With the help of scrolling keys it is possible to scroll the displayed inscription and to determine the **accuracy of measurement, the exact time of measurement and the date**.

In case the above actions are made in standby mode, the display will show the earlier received information on the position location; and when the button under the **update** display key is pressed, the inscription about the need to connect any subscriber will appear on the display.


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## 10. Temporary change of the satellite or cellular connection mode

The phone mode (either satellite or cellular) which lasts out after the phone is turned on or off, is established with the help of item 8 8 of the main menu.

However, sometimes it is necessary to change the permanent mode without changing constant installations. For example, if the cellular mode is installed and the user has to temporarily leave the cellular service area, it is expedient for a certain period to switch over to the satellite mode.

In this case item 8 7 of the main menu **"Manually"** is used. Subitems 2, 3, 4 of this item allow (before turning off and on of the phone) to compulsorily switch over the phone for temporary operation in the required network: 2 - satellite, 3 - cellular digital, 4 - cellular analog. In case it is necessary to go back to constant installations subitem 1 **"Automatic"** is selected. Returning to constant installations also occurs when the phone is turned off and on.

The menu which opens with the help of item 8 7 of the main menu may be open from radio signal search mode with the help of the fast key : it is necessary to press and hold the key before the menu appears.

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## 11. Installation of satellite or cellular modes

The satellite or cellular mode, which lasts when the phone is switched off and on, is established with the help of item 8 8 of the main menu.

Installations of the given item of the menu can be temporarily changed with the help of subitems 2, 3, 4 of items 8 7 of the main menu (see the previous item). The repeated use of constant installations of item 8 8 is carried out either with the help of subitem 1 of item 8 7 of the main menu or after the phone is switched off and on.

The menu of item 8 8 of the main menu:

### 8 8 Automatic. (selection of the satellite or cellular connection mode)

#### 1 Voice (selection of the network connection mode *network*)

**Globalstar** (compulsory connection to the satellite network)

**Cellular** (compulsory connection to a cellular network)

**Analog** (*connection only to an analog cellular network*)

**Digital** (*connection only to a digital cellular network*)

**Digital preferred** (*compulsory connection to a cellular network, but with automatic selection of the cellular network type with a priority of the digital network*)

**Analog preferred** (*compulsory connection to a cellular network, but with automatic selection of cellular network with the priority of the analog network*)

**Cellular preferred** (automatic selection of the network with the priority of a cellular network)

**Analog** (*when cellular network is being searched only analog network is searched*)

**Digital** (*when cellular network is being searched only digital network is searched*)

**Digital pref.** (*an automatic choice with the priority of digital cellular network*)

**Analog pref.** (*an automatic choice with the priority of Analog cellular network*)

**Gstar pref.** (automatic choice with the priority of the satellite network)

## **2 Data** (selection of network for data transmission)

**Current** (data transmission through the connected network)

**No use** (data transmission is disconnected)

**Cellular** (data transmission on a cellular network)

**Globalstar** (data transmission on the satellite network)

### Item 1 Voice

Item 1 **Voice** (item 8 8 1 of the main menu) allows to switch on compulsory connection mode on a permanent basis (either satellite, or cellular digital, or cellular analog), or to establish the network automatic selection mode with installation of the priority for each network.

In case the automatic selection mode is installed the turned on phone begins to search the network in accordance with the established priority list, from higher level. In case there is no connection with the first priority network the search continues in lower level priorities.

For example, we shall consider the variant when the cellular network priority is established and from two cellular networks the priority of a cellular digital network (see example 2) is established. In this case the highest priority is with the cellular digital network, the following priority level is with cellular analog and the lowest priority is with the satellite network. When the phone is turned on the search begins with the cellular digital network, in case of its absence the search is switched to the cellular analog network and in case of its absence the search of the satellite network begins. In case the connection with any network is established the phone remains connected to this network until the communication is lost, then the search in the described above order begins again.

The permanent mode is established for definite NAM number module, therefore in case the given phone has some number modules it is necessary to activate each available module serially with the help of item 8 9 of the main menu and to install for this module the permanent mode.

The permanent network mode is established for a definite numbering module NAM. That is why in case the phone has got several numbering modules, with the help of item 8 9 of the main menu each module should be activated one by one and permanent network connection mode should be established.

### Example 1

The procedure of establishing the compulsory satellite network phone connection.

- Follow item 8 9 1 of the main menu to establish the compulsory NAM module selection mode (option: **n/a**);
- Follow item 8 9 2 of the main menu to establish the NAM module: **NAM GStar**;
- Follow item 8 8 1 of the main menu to select **Globalstar mode**.

### **Example 2**

The procedure of establishing the network automatic selection with the priority of the digital cellular network in **NAM 1 module**:

- Follow item 8 9 1 of the main menu to establish the compulsory selection on NAM module (option: n/a);
- Follow item 8 9 2 of the main menu to select **NAM 1 Cell. mode**;
- Follow item 8 8 1 of the main menu to select **Cellular Pref.** and **Digital Pref.** modes.

### **Item 2 Data**

Item 2 **the Data** (item 8 8 2 of the main menu) is used for switching on the data mode in any network. With the help of the subitem **Current** the data mode for the network, to which the phone is currently connected, is switched on. With the help of the subitem **Not used** the data transmission is disconnected.

With the help of subitems **Cellular** and **Globalstar** the data mode is switched on either for cellular or for the satellite network. In case these subitems are used the choice of the network for the data transmission should correspond to the network to which the phone is currently connected. Otherwise at the attempt to make a call for data transmission the message about the impossibility to make such a call and **To adjust** key will be displayed.

\* \* \*

## **12. Changes in the main menu.**

In such UTs as GSP 1600 with the software R5.3.1.1.0 release items 4 and 7 of the main menus have the following appearance:

### **4 Functions**

#### **1 Blocking**

#### **2 Notebook**

#### **3 Position location** (definition of coordinates)

#### **4 Data** (installation of the maximal port data rate)

### **7 Parameters**

#### **2 Display**

##### **1 Illumination**

##### **2 Order** (installation of the telephone book sorting procedure)

##### **3 Prompt**

**4 Autom. dash**

**5 Time** (display mode:-12 hours or - 24 hours)

**6 Hour zone**

**7 SMS duration**

**8 Language**

**\*\*\***

Operator of the Globalstar mobile satellite communications system, Globalstar service provider:

**CJSC GlobalTel**

Building 5, 3/25, Sytinsky pereulok, Moscow, Russia 123104

**Customer Care Center (CCC):**

Phone:

8(095) 797 27 27 (for calls from cellular or city/ rural network);

8(501) 797 27 27 или 611 (for calls from any Globalstar satellite phone from the Russian segment coverage zone);

+7(501) 797 27 27 (for calls from GlobalTel mobile satellite phone, roaming in other Globalstar's service provider's areas)

Fax: 8(095) 797 27 31

e-mail: [custcare@globaltel.ru](mailto:custcare@globaltel.ru)

site: [www.globaltel.ru](http://www.globaltel.ru)