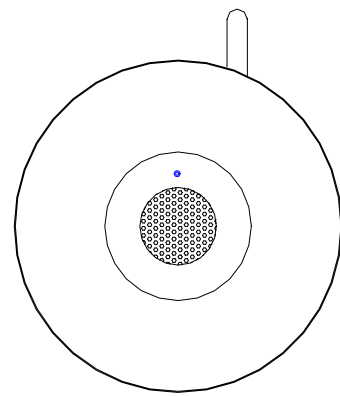


Norcon TTU-7
**Installation & Operating
 Instructions**
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 Tel. 516 239 0300
 Fax. 516 239 8915
www.norcon.org



TTU-7 Outside Unit

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TTU-7 Wireless Series
2-Way Wireless Talk-Thru Electronic Communication System
 A wireless voice communications system for High-Security and Isolation Booth Situations
 Today's security and isolation booths are often the best step you can take to protect your employees. But do they protect or help maintain your very important good will? Not if clerks and customers have to shout and growl and repeat themselves to be heard or understood.
 Norcon's TTU-7 wirelessTalk-Thru Communicator is a 2-way, hands-free audio system that provides high-quality personal communication between people separated by security or isolation barriers.

- FEATURES**
- Clear 2-way hands-free voice communication. Avoids shouting, repetition, and misunderstanding.
 - 900 MHz digital intercom system provides highly security CD quality sound.
 - Simple installation with no wiring between desktop unit and window unit.
 - Special designed for the windows with sliding down gates.
 - Quality electronic design and engineering.
 - Rugged, tamper-resistant materials. Anodized aluminum
 - Units available for ADA applications.
 - Headset jack equipped for using the optional headset.

HOW IT WORKS ...
 The Norcon TTU system permits hands-free, 2-way communication between the booth attendant and the customer. Unique circuitry facilitates ongoing, clear, 2-way conversation at all times – as if the two parties were together in the same room. The TTU-7 wireless Talk-Thru Communicator includes window unit and desk-top unit, they both powered by high capacity rechargeable batteries. The desktop unit communicates with the window unit wirelessly.
 Both units are working at full-duplex mode, but the speaker is muted while the near –end is talking. The desktop unit is always priority for talking; it interrupts the window unit and forces it to listen. The paired unit works on the same ID. The working channel is dynamically chosen according to the environment. If the present working channel is jammed, both units will jump to another channel. The system has 32 system IDs. 32 pairs of units can be installed closely without interference.
 In synchronous. The desktop unit automatically attenuates the outside channel. If the desktop unit is not used for a period of 30 seconds, the listening volume will be reduced approximately 70%. Normal operation is restored as soon as the attendant speaks into the desktop's gooseneck microphone. The automatic volume attenuation circuit prevents outside noise from bothering the attendant. The TTU-7W provides clear communication even in environments with high ambient noise by shaping the sound for maximum intelligibility. The maximum distance between could be around 10 feet.

- HOW TO INSTALL ...**
1. Mount the TTU window unit using the method shown in Figure (1).
 2. The desktop is mounted on a marble base for stabilizing.

4. The outside unit needs a 3" to 4" diameter cutout in the barrier. The rubber gaskets prevent slippage and protect the barrier surface. Refer to Fig 2:
 Remove the four (4) 6-32 assembly screws. ①
 Remove the four (4) 8-32 mounting nuts from the mounting rods.②
 Separate the faceplate and housing. Hold the faceplate over the partition opening. Take care to center the faceplate and align the lettering horizontally. Masking tape can be used temporarily to secure the faceplate to the outside of the partition.
 On the inside of the partition mount the housing over the four (4) 8-32 mounting rods. Be certain to position the housing so that the battery charger jack faced down and the antenna is straight up.

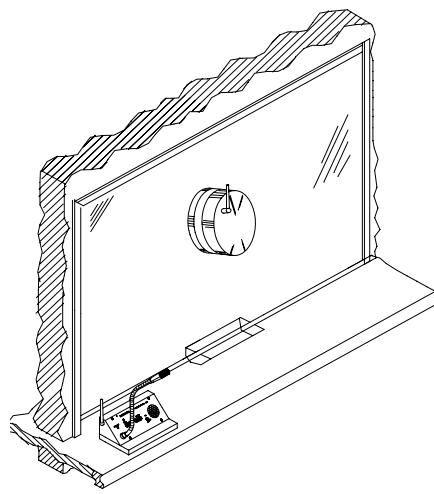


Fig. 1

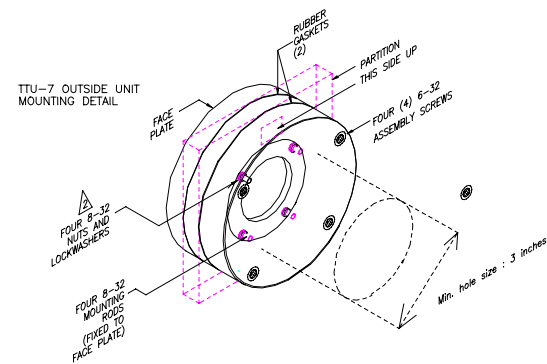
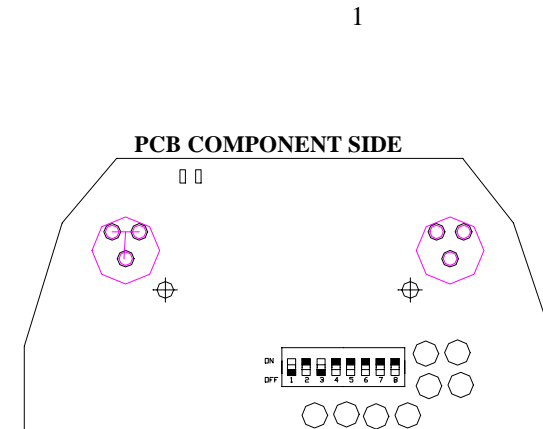


Fig. 2

HOW TO USE THE TALK-THRU COMMUNICATOR

1. There is a DIP switch on the Printed Circuit Board (Fig.3). SW 4 to SW 8 is used for matching desktop unit and window unit. 32 system ID can be set to match the desktop and window units. TTU-7W is shipped with preset paired in the factory and ready to use. In case of the user has multiple units installed in the same room and found interference with each other, change the DIP switch setting to a different combination. Both the desktop unit and the window unit DIP switch must be set to the same position for matching purpose.
2. Example of DIP switch setting

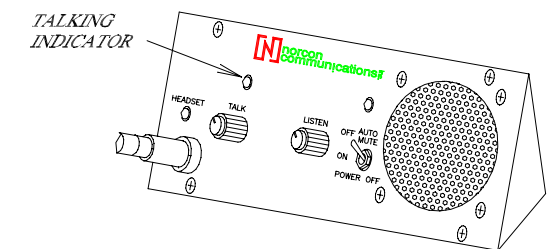
DIP	SW4	SW5	SW6	SW7	SW8
Desktop	ON	ON	OFF	OFF	ON
Window	ON	ON	OFF	OFF	ON



- DIP Switch Setting
- 1) Desktop unit (OFF) / Window unit (ON)
 - 2) Wired Mode (OFF) / Wireless Mode (ON)
 - 3) Mute Function enable (OFF) / Disable (ON)
 - 4) System ID Selection bit4
 - 5) System ID Selection bit3
 - 6) System ID Selection bit2
 - 7) System ID Selection bit1
 - 8) System ID Selection bit0

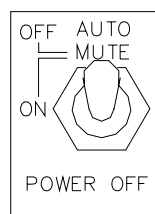
Fig. 3

3. Use the battery charger to charge the desktop unit and the window unit before used. The built-in battery charging control circuitry will monitor the charging automatically.
4. Turn the TALK and LISTEN volume controls completely counter clockwise.



Operation Hints

1. When the battery is being charged, the dual color battery charge indicator is lit in RED; it turns green when the battery is fully charged.
2. Increasing the talk volume control allows the attendant to speak further from the gooseneck microphone as well as increasing the talk channel volume. The optimum distance from the gooseneck microphone should be maintained at approximately 3" or conversations not directed to customers may be heard outside the booth.
3. Install a headset into the headset jack will allow communications from the headset and disconnect the gooseneck microphone
4. The unit will decrease the incoming volume level by approximately 70% in about 30 seconds after the attendant speaking into the gooseneck microphone. The purpose of this feature is to decrease the amount of extraneous noise entering the booth when no one is at the booth. Normal volume level is restored when the attendant speaks into the gooseneck microphone. **The muting function can be defeated by switching the AUTO MUTE switch to UTO MUTE OFF position.**



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TTU-7 wireless P.1

TTU-7 SPECIFICATIONS

MECHANICAL

1. Outside assembly: machined aluminum, anodized finish, Tamper-resistant.
2. Inside assembly: Machined aluminum, anodized finish, Tamper-resistant.
3. Size : Main unit 6" W x 2 3/8" H x 2 3/8" D
Outsize unit: 5" Diameter x 1/2" Depth
4. Weight: 7 lbs
5. Mounting: Main unit mount on County-top, Outside unit mount on window
6. Panel control: Listen volume, Talk volume, power on/off, and LED power indicator. Talk on indicator.

ELECTRONIC

1. Audio frequency response: Selectively shaped for maximum voice intelligibility.
2. Audio power: 2 watts per channel.
3. Distortion: Less than 2%.
4. Listen mode: 20dB compression
5. Talk mode: VOX
6. Microphones: Electret
7. Power supply: Input 120V / 60Hz AC
Output 6V DC

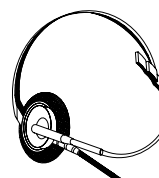
Talk-Thru systems are shipped complete with cables,

* Specifications are subject to change without notice

Accessories and Options for TTU

H251 Headset (Option)

- Superior sound quality
- Long wearing comfort
- Quick Disconnect cable.



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TROUBLESHOOTING

You may occasionally encounter a problem with your TTU system. If this happens, refer to the following list. If additional help is needed, please contact us.

1. No sound at all

• Is the batteries being charged?

A fully charged unit can be operated around 10 hours, if the unit wasn't charged after used, the battery may run out of power. Plug the charger onto the unit and charge it.

• Is the power supply properly plugged into a working outlet ?

If the power supply has been plugged into a working outlet the battery charger indicator LED should be on, if it is not; the charger or the battery may be defective.

2. Howling (Feed back)

• Is the TALK or LISTEN volume turned too high?

Set the volume control to a proper level. In most cases, both TALK and LISTEN should be set to the position of around 11 to 12 o'clock.

3. Conversation cutting-off and breaking-up

• Is the TALK volume setting too high?

Turn down TALK volume to a proper level.

• Is the attendant speak too far to the gooseneck microphone?

The idea distance is 3" to 4" from the gooseneck microphone and the TALK indicator LED should come on while talking and come off while not talking.

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Service Policy

TALK-THRU SYSTEM WARRANTY REPAIRS

Norcon Communications Inc. warrants the products Manufactured by Norcon to be free from defects in material and workmanship for a period of one year from the date of shipment from the factory provided:

1)The product has not been abused, misused or improperly maintained, repaired and /or modified during such period, and

2)Such defect is not a result of voltage surges/ burnouts, lightning, water damage / flooding, fire, explosion, earthquakes, tornadoes, acts of aggressions / war or similar phenomenon; and

3)The product has been properly installed according to the appropriate Norcon Installation Guide.

Both incoming and outgoing freight charges are at customer's expenses. Domestic repair will be returned to customer by UPS Ground. International repair will be returned to customer using normal shipping arrangements. Any other shipping instructions must be made in writing and will be at the customer's expense

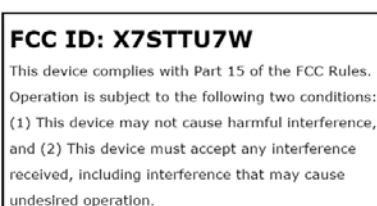
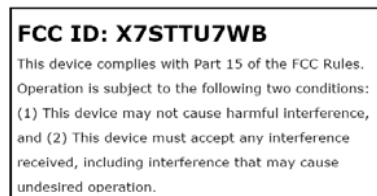
* **Two years extended warranty available.**

Please call 1-866-239-0300 for detail.

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FCC STATEMENT

1. This device complies with Part 15 of the FCC Rules. Operation is subject to the following two conditions:
 - (1) This device may not cause harmful interference, and
 - (2) This device must accept any interference received, including interference that may cause undesired operation.
2. Changes or modifications not expressly approved by the party responsible for compliance could void the user's authority to operate the equipment.



NOTE: This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to Part 15 of the FCC Rules. These limits are designed to provide reasonable

protection against harmful interference in a residential installation. This equipment generates, uses and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

- Reorient or relocate the receiving antenna.
- Increase the separation between the equipment and receiver.
- Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
- Consult the dealer or an experienced radio/TV technician for help.