

VoiceSafer VS-U2013

Comprehensive anti-wiretapping system for Smartphone

VoiceSafer VS-U2013 converts human voices into non-interpretable analog noises and transmits the scrambled noises over the unsecured mobile telephone network or Internet and then converts back to human voices on the other end of the line by MDP² ASIC chip embedded within the wired telephone recorder, mobile phone, Bluetooth headset, hands-free set, or attached to the various types of voice communication devices.



With VoiceSafer™, you can protect your privacy on the phone over any mobile network. Your confidential information and valuable intellectual properties should not be exposed to ever-present dangers of wiretapping or eavesdropping attacks that are always around us and must be protected safely by the advanced Tele-Security technology of VoiceSafer™.

VoiceSafer™ is developed by new technology innovation and can be applied to fixed, wireless, VoIP phones, and all different types of voice communication devices because it processes input/output signals from the devices which are all analog voice signals regardless of the networking details.

Comparison: VoiceSafer vs. existing analog scramblers

	Security Key	Scrambling Period	Voice Delay	Echo Prevention	Synchronization	Usage
VoiceSafer (Advanced Voice Scrambler)	Automatically updated as one-time key newly created each time when you make calls	Dynamic Scrambling 1~10 times per second	Real-time voice processing No delay due to the voice processing	Include functionality of protecting side tones occurred by Echo effect	Auto Re-synch method: auto synchronized with the pre-defined cycle period	•Developed as ASIC chips, it is applicable to all different types of voice devices and can be embedded within handsets, Bluetooth devices, Hands-free, etc.
Company A (Analog Scrambler for wired phones)	Fixed key (should be registered into the devices in advance)	Exchange voice signals between time blocks in the time domain	≈ 0.7 sec (would be able to feel time delay of one sentence)	Fade-in /Fade-out of voice occurred (No Echo Protection)	Asynchronous method with mute states occurred in every 4 seconds	•Separate terminals are connected to the wired & mobile phones (cannot be embedded within the handset & other devices)
Company B (Analog Scrambler for two-way radios)	Fixed key (should be registered into the devices in advance)	Dynamic Scrambling 1~2 times per second	No delay time occurred	No Echo Protection	Not synchronized	Embedded within the radio (Push to Talk)

VoiceSafer™ creates the new paradigm of Tele-Security Technology

- VoiceSafer™ is always applicable to all different models of Smartphone by connecting with the standard ear-microphone terminal (ø3.5 of 4 poles).
- VoiceSafer™ is designed to be easily carried or moved because it was made from the dedicated ASIC chip of compact size.
- VoiceSafer™ is easy to switch between Privacy mode and Normal mode. Also, without any complex setup procedures of other existing Tele-Security products, you can setup this product easily just by connecting to ear-microphone terminal.
- VoiceSafer™ has adopted the world's first commercial implementation of "Multiple dynamic phase processing Technology or MDP²ⁿ" which is an innovation of analog voice scrambling and digital key encryption combined technology to enhance the degree of security.
- In general, Tele-Security results in rapid deterioration of voice quality in proportionate to the degree of security. But, you cannot recognize any deterioration of voice quality during the conversation on the VoiceKeeper™ enabled phone devices even though its indecipherable degree of security.
- VoiceSafer™ has a reasonable pricing police for public distribution

Product Specifications

- Dimensions: 29.0 mm (W) * 7.2 mm (D) * 69.0 mm (H) (excluding plug part)
- Weight: 20g
- Battery: Lithium-Polymer 3.7V 300mA
- Battery life: about 2.5 hours (talking continuously in Secured Communication mode)
- Method of connection: ear-microphone terminal ø3.5 4 poles
- Main Chipset: VK-2011
- Method of communication: using VoiceKeeper built-in speaker and microphone
- Method of securing signal exchange: One-time code generation and auto-connection method
- Method of charging: micro-USB 5-pin
(the same specifications with Android phone charging adapter)

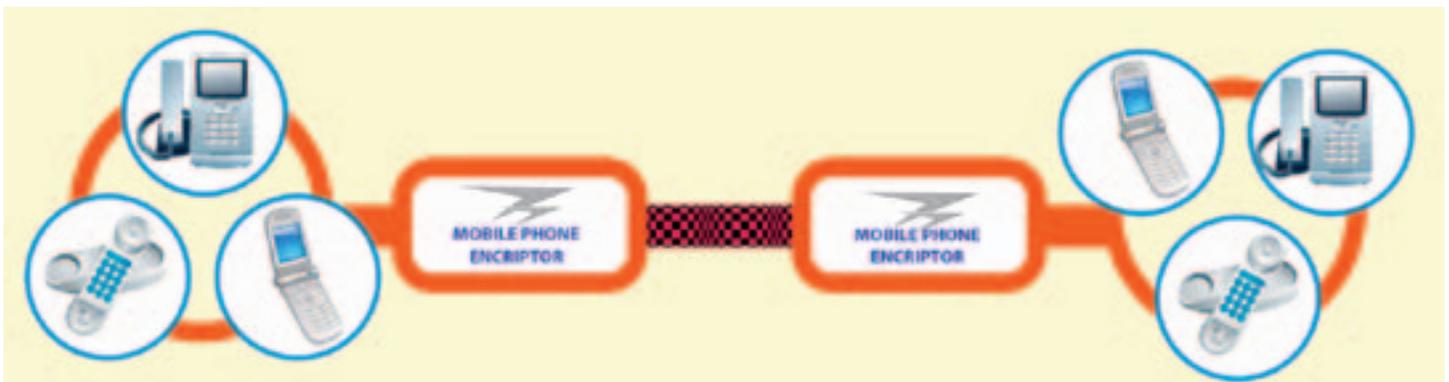


Area Where Mobile Encryptor is Necessary



- Government agencies where major governmental policies are discussed and determined.
- Judicial organizations such as prosecutors office, police agency where communicational security is required for its nature of investigatory function.
- Election camp where election campaign against counterpart is on the way such like presidential election, general election, local government election, election of labour union etc.
- Office of attorney or suitors where a lawsuit is on the way.
- Business area where security of business informations or materials is required in higher level while industrial espionage is very much likely such as an office of CEO or major directors, office of development or business & planning department of a company.
- For those who are dealing with confidential informations such like government officials, attorney, lobbyist, politicians, diplomats, army officers and executive police officers etc.
- Personnels or organizations of local government relevant to CEO, auditing, city development plan, various supervision & control, communication etc.
- Members of national assembly or local assembly under legislative activities.
- Election management committee where security of informations under control is required.
- Government agencies or enterprises having calls from/to overseas frequently.

The Stealth VoiceSafer, CDMA/GSM Mobile Encryptor, has excellent compatibility in various types of mobile phones



The Stealth VoiceSafer



What is VoiceSafer?

VoiceSafer converts human voices into non-interpretable analog noises and transmits the scrambled noises over the unsecured telephone network or Internet and then converts back to human voices on the other end of the line by MDP2 ASIC chip embedded within the wired telephone recorder, mobile phone, Bluetooth headset, hands-free set, or attached to the various types of voice communication devices.

With VoiceSafer, you can protect your privacy on the phone over the unsecured public telephone lines or internet. Your confidential information and valuable intellectual properties should not be exposed to ever-present dangers of wiretapping or eavesdropping attacks that are always around us and must be protected safely by the advanced Tele-Security technology of VoiceSafer.

Why is VoiceSafer safe?

* The Stealth VoiceSafer uses Dynamic Interval Division technology

The Number can be diverted per 1 second

$$\begin{aligned} & (180^{2900C2} + 180^{2900C3} + 180^{2900C4} + 180^{2900C5})^{10} \\ & > (180^{2900C5})^{10} \\ & \approx (180^{1.7 \times 10^{15}})^{10} \\ & \approx 180^{1.7 \times 10^{16}} \end{aligned}$$

$$> 100^{1.7 \times 10^{16}} = (10^2)^{1.7 \times 10^{16}} = 10^{3.4 \times 10^{16}}$$

It takes $10^{3.4 \times 10^{16} - 15 - 8} = 10^{3.4 \times 10^{16} - 23} \approx 10^{3.4 \times 10^{16}}$ years to break this code by the Supercomputer "LoadRunner".

VoiceSafer *converts human voices into non-interpretable analog noises and transmits the scrambled noises over the unsecured telephone network or Internet to protect your privacy on the phone.*

