Title: SYSTEMS AND METHODS FOR FIRST RESPONDER COMMUNICATION

Abstract: The present disclosure provides methods and systems of communication between a first responder and person in need thereof comprising providing to a person in need thereof a computer device capable of communicating with said person in their native language, inputting answers to prompts related to the nature of injury or emergency, providing a summary of said answers to said first responder in a language understandable by said first responder, wherein the languages understood by said person and said first responder are different.
SYSTEMS AND METHODS FOR FIRST RESPONDER COMMUNICATION

CROSS-REFERENCE
[001] This application claims the benefit of U.S. Provisional Application No. 62/100,455, filed January 6, 2015, which application is incorporated herein by reference.

BACKGROUND
[002] First responders are faced with countless challenges on a daily basis. One of these is communication with members of the public who are not fully fluent in the same language as the first responder. Even those who are bilingual may not be know medical terms in their second language which can prove to be just as detrimental to communication during an emergency medical situation. As a result, key information can be missed, such as medical history, allergies, and/or medications taken by the patient or member of the public in need. This can lead to medical errors and/or death. One option for dealing with this challenge is to have translators on site or through over-the-phone interpreters. However, neither of these is an optimal resource accessible or economically feasible solution.

SUMMARY
[003] The disclosure is directed to methods and systems that enable communication between a first responder and a patient, person in need, and/or member of the public who experiences a language barrier with a first responder. In particular, the disclosure is directed to a method and system of providing prompts to a patient, victim or anyone in need who does not speak the same language as the first responder. The prompts may be symbolic or represent an emergency situation, such as a fire, accident and the like. In one embodiment, the prompt represents a human body and allows the victim/patient to touch the injured area and/or answer questions in their native language. In some embodiments, the input by the victim/patient may prompt or inform the first responder of nature of the injury or problem and provide information about next actions to take. Notably, the information, in some instances in summary form, is conveyed to the first responder in
their native language. In some embodiments the information is translated from the language of the victim/patient to the language of the first responder. In some embodiments no network connection is required for such translation. That is, the communication from the victim/patient is conveyed to the first responder in the language of the first responder without the need or requirement for a network connection, although in some embodiments a network is desired. When no network is used, information is stored in the app in a variety of languages such that it can be conveyed to a first responder following the respective input from a patient/victim. Accordingly, the system allows for communication about emergency situations between people who do not speak the same language.

[004] The disclosure is also directed to an electronic device where a method for controlling and/or mediating the communication between a first responder and a patient/victim/ person in need, and/or member of the public who does not speak the same language as the first responder is performed.

[005] In one embodiment the method includes providing to the patient/victim/ person in need, and/or member of the public who does not speak the same language as the first responder, referred to herein collectively as patient, a computing device running the program or in communication with a server running the program. The patient views an image or images corresponding to the emergency in question and selects the appropriate emergency situation. Additional questions or prompts or questions may follow. The input information is relayed to the first responder and/or relevant emergency facility where it is displayed in the language of the first responder.

**BRIEF DESCRIPTION OF THE DRAWINGS**

[006] The above and other features of the present invention, its nature and various advantages will be more apparent upon consideration of the following detailed description, taken in conjunction with the accompanying drawings in which:
FIG. 1 is a flow diagram of an exemplary but not exclusive method for communication between a first responder and person in need thereof in accordance with some embodiments of the invention.

FIG. 2 A. Shows exemplary screen shots of workflow when emergency responder is selected in the application. B. Shows exemplary screen shots of workflow when traveler identifier is selected in the initial setup of the application.

FIG. 3A, 3B and 3C show exemplary screen shots of the workflow in the emergency responder mode.

FIG 4 shows exemplary workflow of the app.

FIG. 5 is a block diagram of an illustrative electronic device for previewing application in accordance with some embodiments of the invention.

DETAILED DESCRIPTION

With 300 million non-native English speakers visiting the US in the last few years and 60 million already in the US with very limited English speaking skills (LES), emergency incidents requiring immediate translation will continue to occur. When first responders are called to an emergency, the injured person(s) may not speak the same language as the first responder. If the injured person(s) are conscious and able to speak, comprehension is low, and even gestures can be misinterpreted. Key information may be missed like pain location & severity, medical history, allergies, or medications they are taking. Without proper and timely assessment, further action or nonaction can lead to medical errors and/or death. Help can arrive within 30 minutes from responders that might speak that language or from a nationwide language translation phone call service. Even with phone help, waiting for assistance and determining an obscure language could take up to 15 minutes, an unacceptably long time in an emergency. Thus, this is a timeframe that if very frustrating to first responders and leads to disinterest in waiting for interpretation assistance, guessing, and absence of accurate diagnosis. In some cases, translation programs (e.g. GoogleTranslate) can be used but may not be sufficient or accurate enough for all necessary information that is valuable to be gathered.
Clear communication at this time is a matter of life and death. Accordingly, there exists a need for a system, method or service that allows clear communication between first responders and victims, patients and/or injured individuals who do not speak the same language as the first responder.

[0013] The present disclosure provides a system and method that enable communication between a first responder and a patient, person in need, and/or member of the public who does not speak the same language as the first responder. FIG. 1 is a flow diagram of an exemplary but not exclusive method for communication between a first responder and person in need thereof in accordance with some embodiments of the invention.

[0014] By first responder is meant any individual or group that responds to emergencies. These may include, but are not limited to ambulance drivers, emergency medical technicians, nurses, physicians, fire fighters, police, armed forces, such as but not limited to army, navy, air force, marines, coast guard, and the like.

[0015] Patients in need thereof may be suffering from any emergency, which may include harm or injury to their person, home, or vehicle. The patient in need thereof may be sick or have been in an accident. In some embodiments the emergency may be that a dwelling is on fire or suffering from another emergency situation, such as a flood. In some embodiments, the first responder may be responding to victims of military action and therefore the systems and methods described herein may find use by deployed armed forces.

[0016] At step 100 in FIG. 1, the app or software is initiated or started. At step 110, the patient is prompted to select a language for communication with the app/software. This is exemplified in 210 of FIG 1. Exemplary languages include but are not limited to English, Spanish, French, Chinese, Japanese, Russian and the like. In some embodiments, the list of languages is customized to the particular geographical region in which the app is being used at is appreciated that different languages are used more frequently at different locations. At step 120 audio instructions may be given to the patient to inquire as to their literacy proficiency or to request the verbal details of their condition or emergency. At 130, the patient may speak words or phrases pertaining to
their condition in their native language and/or at 140, they may select symptoms of the condition by selecting a particular body part as exemplified at 220 of FIG 1. For instance, a victim or patient may tap the screen indicating that they are hurt in the head, arm, etc. Specific and pre-determined questions are assigned to the region of the body the patient chooses. Additional questions may be prompted at 160, for instance as shown at 230 and 240. In one embodiment, a summary of the patient's condition is prepared at 190 and as exemplified at 250. As necessary, additional instructions, for instance, pre-recorded instructions are provided, for instance listing next steps for patient treatment 200.

[0017] As shown in FIG 2A and B, in one embodiment, once the app is downloaded and launched, a welcome screen may be displayed. In some embodiments, the app asks that a user authorize or agree to terms and privacy settings. In some embodiments the app user is presented with a choice between operating on a first responder mode, e.g. EMS personnel or physician, or traveler/patient mode. Thus, in some embodiments there are at least two functionally discrete modes of operation. An exemplary screen shot of a first responder mode is shown in FIG 2A. An exemplary screen shot of a traveler or patient mode is shown in FIG 2B. Making this choice directs the app to advance in a particular workflow.

[0018] In some embodiments when the app workflow for travelers/patients is chosen, at the outset of downloading and/or launching the app, a screen will seek permission to access medical data already residing on the phone. For example, this may be from the Apple Health app or a Medical ID app on Android. A user, or patient, can approve or deny this access request. If denied, the user will be able to enter requisite health information or download the information from an authorized database into the app at a later time, for instance before an emergency occurs. Electronic medical records are increasingly common and stored under the control of hospitals and/or physicians, among other sources and this information can be downloaded and securely stored in the app as desired by the user. Once entered or downloaded, such data is stored and made ready for when the app is in use. In some embodiments, when the health information is available, either via automated upload or manual entry, it is translated to all available languages so
that the traveler/patient's information is available to an emergency responder, physician, hospital and the like, no matter the country to which the user may travel. In some embodiments the downloading and storage of medical records is protected via encryption and secured storage methods as are known in the art.

[0019] In some embodiments, if the mode for traveler or patient is chosen, the app allows symptoms to be chosen first and then the language selection occurs based on the language spoken by the health care provider, thus aligning with reality of how the app is designed to be used. That is, when a patient is in another country, for instance, and encounters an emergency, they may enter their symptoms in the app and then choose the language into which the information will be translated. In an alternative embodiment, this may also be accomplished by allowing the user to select the country to which the user is traveling and the summary screen will automatically be listed in the language chosen beforehand. This can also occur in a manner as prompted by a geolocation query by the smartphone and confirmed by the user as to which country they are currently in.

[0020] In some embodiment the app also provides methods to improve communication between on-scene first responders and 9-1-1 Public-Safety Answering Point (PSAP) systems. In this embodiment, the app is able to send an incident language translation Summary to 9-1-1 or other Public-Safety Answering Point (PSAP) systems as appropriate.

[0021] In some embodiments the app provides immediate language translation assistance to first responders, public safety operators, and the culturally diverse public who request medical aid in emergency 9-1-1 calls for service and random encounters. In some embodiments, the app is able to integrate with a Computer Aided Dispatch System. This improves interoperability and the communication of critical information between police, fire, and EMS personnel. It also ensures the efficient and effective response of the right personnel and equipment to the medical emergency, regardless of language barriers between the user, first responder or dispatch personnel. As such, the patient summary may then be sent to the Computer Aided Dispatch program to be documented and used when other first responders are sent to assist the patient.
In some embodiments, the information transmitted to or from or stored in the app or on the user's device is secured and/or encrypted by methods known in the art.

In one embodiment the entire process is completed within 5 minutes, or within 4 minutes or within 3 minutes or within 2 minutes or within 60 seconds.

In one embodiment, a screen of the exemplary App shows from 1-20, more preferably 6-10 easy-to-read language buttons with each one spelled in the native language. In some embodiments, each US city or each major US city has a varied collection of native speakers of all nationalities and the buttons may be statistically customized to the city of the App user based on public health and government census data. Additional languages can be seen by, for example, swiping to the right or the left. In one embodiment languages are clustered together based on geographic region. For instance, Indian languages are side by side and various dialects of Spanish are matched together as well Additionally, as a city's first responder force uses the app, data tracking takes place which can add real-time analytic updates to public health and census data. Location of incident, language used, and other valuable data are designed to be made available information management leaders of cities.

In one exemplary embodiment, when used in the first responder mode, the first responder shows the phone or tablet to the injured person or their family member, and either party can tap next to the language button. Then a prerecorded audible reading of the language emits from the audio speaker. The person may also be prompted to choose their language and then the screen toggles to a human body form or body map. This map, upon digital touch, highlights up to four regions, for example: 1- head & neck; 2- chest, arms, hands; 3- abdomen & groin; 4- hips, legs, feet. Then, for each region that is selected, a series of simple questions are listed. In some embodiments these may be yes / no and some may be multiple choice. In some embodiments, the individual may be asked about symptoms, such as, but not limited to fever, chills, rash, rapid heartbeat, rapid breathing. In addition, use of medications and allergies may be the subject of questions. Multiple choices and locations for ailments can be listed, for instance, someone may have a severe headache and groin pain.
In one embodiment, for instance, if the first responder observes the repetition of a certain word or phrase, the SPEAK icon can be pushed to help with an on-the-spot voice translation. Then they (either the first responder or the patient) can speak a word or phrase, get it translated, and add it to the information already collected. This functionality is capable in the presence of an active cellular network and app plug-in utility that is already on the market or can be programmatically linked, like Google Translate or other voice translation solution. But if not, then the capability of the app with its prerecorded triage questions and answers is designed to be abundantly sufficient in emergency situation language translation.

In one embodiment, as choices of the emergency situation are made and recorded, a summary button becomes highlighted and allows for the patient to validate all the information they have created. Upon pushing the button, the session information translates back to the default language of the first responder. After the summary is translated and read by the first responder, there are two options. 1- end the session and begin medical care based on the information gathered, or 2- go to the next screen for some prerecorded options to inform the injured of your next steps of care. For example, "we will take you to the hospital; give you a shot; check your vitals; who is your emergency contact or family member?"

In one embodiment, the system includes the capacity to record the audio and video for each encounter. This may be used as liability reduction for the first responder. The consideration of legal ramifications of such features will be necessary.

In one embodiment, upon download, a disclaimer for users of the App may be provided. The App is not intended to diagnose, cure disease, or determine the exact nature of medical problems. It is designed to be assistive in overcoming a language barrier and providing translation for personal information. It can prompt the recording of possible symptoms of a patient's health condition but not be liable for anything after that.

Letting an injured person touch the personal phone (device) of a first responder may be a concern, especially with transference of blood, bodily fluids, dangerous viruses, and communicable diseases. In some embodiments, the app is not intended for those
persons who are severely injured or are semiconscious. In some embodiments, the first responder that is helping a patient who is bleeding should not use this mobile app unless there is another person present (friend or family) that can convey essential medical information about the victim. To resolve this concern, the owner of the device can use hand sanitizer or alcohol swab to clean the device after the device is returned. It is also likely in the future that hardware devices including tablets will be provided to first responders from their employers and such devices can used instead of personal devices. But such concerns previously listed for sanitary conditions and safety are taken into account.

[0031] In alternative embodiments, used primarily in the traveler/patient workflow, translator functionality is included in the app. In this embodiment, the app activates live-person interpreters who may be professional or may be among the general population. These "bilingual first responders" will use a version of the app that notifies them of an app in use in their general location. In this embodiment, an interpreter that is present can provide assistance even beyond that provided by the app itself and is an assurance factor to those patients that are injured and who do not speak the same language as the first responder. In this embodiment, the app triangulates the location of an incident, or otherwise provides location of the incident using GPS or other systems on the app containing device, and then notifies the city-network/Cloud/API, which is managed and tracked through cloud-software that provides a communication relay between user/patient and interpreter. The system then sends or provides communication to a user of the app who also has the primary function of an interpreter. In some embodiments such an interpreter is not only bilingual but is certified in bilingual medical terminology translation. Upon notification, the exact location intersect is relayed and the interpreter calls, videoconferences or makes their way to the emergency situation to provide backup assistance and translation. This crowd-sourced solution takes the cost and difficulty away from needing to call an over the phone interpreter and activating the willing citizenry of a city seeking to help fellow language speakers during emergency scenarios.

[0032] Benefits of the system described herein include that in some embodiments no network is required for communication between user/patient and service provider. That
is, in contrast to many systems that require an internet connection to translate languages, the present application provides for translation or communication in the absence of an internet connection because the ailments/injuries are built into the program, which is pre-translated into a variety of languages. As such, the system allows for immediate triage support because the first responder knows the nature of the user's injury on the scene. This saves considerable time and removes guesswork from field diagnosis. In some embodiments, however, internet and/or communication is necessary, for instance when human translation is necessary and/or when calling for a first responder or 9-1-1 dispatch, and the like.

[0033] FIG. 5 is a block diagram of an illustrative but not limiting electronic device for performing an application operative for communication between a first responder and person in need thereof in accordance with some embodiments of the invention. Electronic device 1000 can include control circuitry 1002, storage 1004, memory 1006, input/output ("1/0") circuitry 208, and communications circuitry 1010. In some embodiments, one or more of the components of electronic device 1000 can be combined or omitted (e.g., storage 1004 and memory 1006 may be combined). In some embodiments, electronic device 1000 can include other components not combined or included in those shown in FIG. 5 (e.g., motion detection components, a power supply such as a battery or kinetics, a display, bus, a positioning system, a camera, an input mechanism, etc.), or several instances of the components shown in FIG. 5. For the sake of simplicity, only one of each of the components is shown in FIG. 5.

[0034] Electronic device 1000 can include any suitable type of electronic device. For example, electronic device 1000 can include a portable electronic device that the user may hold in his or her hand, such as a smartphone (e.g., an iPhone made available by Apple Inc. of Cupertino, Calif. or an Android device such as those produced and sold by Samsung). As another example, electronic device 1000 can include a larger portable electronic device, such as a phablet, tablet or laptop computer. As yet another example, electronic device 1000 can include a substantially fixed electronic device, such as a desktop computer.
Control circuitry 1002 can include any processing circuitry or processor operative to control the operations and performance of electronic device 1000. For example, control circuitry 1002 can be used to run operating system applications, firmware applications, media playback applications, media editing applications, or any other application. In some embodiments, control circuitry 1002 can drive a display and process inputs received from a user interface.

Storage 1004 can include, for example, one or more storage mediums including a hard-drive, solid state drive, flash memory, permanent memory such as ROM, any other suitable type of storage component, or any combination thereof. Storage 1004 can store, for example, media data (e.g., music and video files), application data (e.g., for implementing functions on electronic device 1000), firmware, user preference information data (e.g., media playback preferences), authentication information (e.g., libraries of data associated with authorized users), lifestyle information data (e.g., food preferences), exercise information data (e.g., information obtained by exercise monitoring equipment), transaction information data (e.g., information such as credit card information), wireless connection information data (e.g., information that can enable electronic device 1000 to establish a wireless connection), subscription information data (e.g., information that keeps track of podcasts or television shows or other media a user subscribes to), contact information data (e.g., telephone numbers and email addresses), calendar information data, and any other suitable data or any combination thereof.

Memory 1006 can include cache memory, semi-permanent memory such as RAM, and/or one or more different types of memory used for temporarily storing data. In some embodiments, memory 1006 can also be used for storing data used to operate electronic device applications, or any other type of data that can be stored in storage 1004. In some embodiments, memory 1006 and storage 1004 can be combined as a single storage medium.

I/O circuitry 1008 can be operative to convert (and encode/decode, if necessary) analog signals and other signals into digital data. In some embodiments, I/O circuitry 1008 can also convert digital data into any other type of signal, and vice-versa. For
example, I/O circuitry 1008 can receive and convert physical contact inputs (e.g., from a multi-touch screen), physical movements (e.g., from a mouse or sensor), analog audio signals (e.g., from a microphone), or any other input. The digital data can be provided to and received from control circuitry 1002, storage 1004, memory 1006, or any other component of electronic device 1000. Although I/O circuitry 1008 is illustrated in FIG. 5 as a single component of electronic device 1000, several instances of I/O circuitry 1008 can be included in electronic device 1000.

[0039] Electronic device 1000 can include any suitable interface or component for allowing a user to provide inputs to I/O circuitry 1008. For example, electronic device 1000 can include any suitable input mechanism, such as for example, a button, keypad, dial, a click wheel, or a touch screen. In some embodiments, electronic device 1000 can include a capacitive sensing mechanism, or a multi-touch capacitive sensing mechanism.

[0040] In some embodiments, electronic device 1000 can include specialized output circuitry associated with output devices such as, for example, one or more audio outputs. The audio output can include one or more speakers (e.g., mono or stereo speakers) built into electronic device 1000, or an audio component that is remotely coupled to electronic device 1000 (e.g., a headset, headphones or earbuds that can be coupled to communications device with a wire or wirelessly).

[0041] In some embodiments, I/O circuitry 1008 can include display circuitry (e.g., a screen or projection system) for providing a display visible to the user. For example, the display circuitry can include a screen (e.g., an LCD screen) that is incorporated in electronics device 1000. As another example, the display circuitry can include a movable display or a projecting system for providing a display of content on a surface remote from electronic device 1000 (e.g., a video projector). In some embodiments, the display circuitry can include a coder/decoder (CODEC) to convert digital media data into analog signals. For example, the display circuitry (or other appropriate circuitry within electronic device 1000) can include video CODECs, audio CODECs, or any other suitable type of CODEC.
The display circuitry also can include display driver circuitry, circuitry for driving display drivers, or both. The display circuitry can be operative to display content (e.g., media playback information, application screens for applications implemented on the electronic device, information regarding ongoing communications operations, information regarding incoming communications requests, or device operation screens) under the direction of control circuitry 1002. Alternatively, the display circuitry can be operative to provide instructions to a remote display.

Communications circuitry 1010 can include any suitable communications circuitry operative to connect to a communications network and to transmit communications (e.g., voice or data) from electronic device 1000 to other devices within the communications network. Communications circuitry 1010 can be operative to interface with the communications network using any suitable communications protocol such as, for example, Wi-Fi (e.g., a 802.11 protocol), Bluetooth, radio frequency systems (e.g., 900 MHz, 1.4 GHz, and 5.6 GHz communication systems), infrared, GSM, GSM plus EDGE, CDMA, LTE and other cellular protocols, VOIP, or any other suitable protocol.

In some embodiments, communications circuitry 1010 can be operative to create a communications network using any suitable communications protocol. For example, communications circuitry 1010 can create a short-range communications network using a short-range communications protocol to connect to other devices. For example, communications circuitry 1010 can be operative to create a local communications network using the Bluetooth protocol to couple electronic device 1000 with a Bluetooth headset.

Electronic device 1000 can include one more instances of communications circuitry 1010 for simultaneously performing several communications operations using different communications networks, although only one is shown in FIG. 5 to avoid overcomplicating the drawing. For example, electronic device 1000 can include a first instance of communications circuitry 1010 for communicating over a cellular network, and a second instance of communications circuitry 1010 for communicating over Wi-Fi
or using Bluetooth. In some embodiments, the same instance of communications circuitry 1010 can be operative to provide for communications over several communications networks.

[0046] In some embodiments, electronic device 1000 can be coupled a host device for data transfers, synching the communications device, software or firmware updates, providing performance information to a remote source (e.g., providing riding characteristics to a remote server) or performing any other suitable operation that can require electronic device 1000 to be coupled to a host device. Several electronic devices 1000 can be coupled to a single host device using the host device as a server. Alternatively or additionally, electronic device 1000 can be coupled to several host devices (e.g., for each of the plurality of the host devices to serve as a backup for data stored in electronic device 1000).

[0047] As described herein, in some embodiments an electronic device (e.g., electronic device 1000 of FIG. 5) may include an integrated application operative to communication between a first responder and person in need thereof in accordance with some embodiments of the invention.

[0048] The integrated application is operative to allow the patient or victim to select an image of the emergency situation, such as whether a house is on fire or a person is injured. More details, such as the nature of an injury also can be communicated.

[0049] In some embodiments, an electronic device (e.g., electronic device 1000 of FIG. 5) may include an integrated application operative to interface with a database or another device having stored thereon instructions for responding to a particular emergency.

[0050] The processes discussed above are intended to be illustrative and not limiting. Persons skilled in the art will appreciate that steps of the process discussed herein can be omitted, modified, combined, or rearranged, and any additional steps can be performed without departing from the scope of the invention.

[0051] The application can be implemented by software, but can also be implemented in hardware or a combination of hardware and software. The invention can also be
embodied as computer-readable code on a computer-readable medium. The computer-readable medium can include any data storage device that can store data which can thereafter be read by a computer system. Examples of the computer readable medium include read-only memory ("ROM"), random-access memory ("RAM"), CD-ROMs, DVDs, magnetic tape, optical data storage device, flash storage devices, or any other suitable storage devices. The computer-readable medium can also be distributed over network coupled computer systems.

[0052] Insubstantial changes from the claimed subject matter as viewed by a person with ordinary skill in the art, now known or later devised, are expressly contemplated as being equivalently within the scope of this disclosure. Therefore, obvious substitutions now or later known to one with ordinary skill in the art are defined to be within the scope of the defined elements.

[0053] The above-described embodiments of the present invention are presented for purposes of illustration and not of limitation.
CLAIMS

What is claimed is:

1. A method of communication between a first responder and person in need thereof comprising:
   - providing to a person in need thereof a computer device capable of communicating with said person in their native language;
   - inputting answers to prompts related to the nature of injury or emergency;
   - providing a summary of said answers to said first responder in a language understandable by said first responder, wherein the languages understood by said person and said first responder are different.

2. The method of claim 1, further comprising the step of providing instructions about next steps to said first responder.

3. The method of claim 1, further comprising communicating the nature of said injury or emergency to the relevant emergency facility.

4. The method of claim 3, wherein said emergency facility is selected from the group consisting of hospital, police station and fire station.

5. The method of claim 1 or 2, wherein the answers regarding the nature of injury or emergency are stored on a remote server or mobile device.

6. The method according to claim 1, wherein said inputting is performed by said user touching an image of a human body or portion thereof corresponding to their injured body part, on the screen of the computer device.

7. The method according to claim 1, wherein said inputting is performed by said user selecting an injury from a list provided by the app on the computer device.
8. On an electronic device, a method for communication between a first responder and person in need thereof comprising:

- providing to a person in need thereof a computer device capable of communicating with said person in their native language;
- inputting answers to prompts related to the nature of injury or emergency;
- providing a summary of said answers to said first responder in a language understandable by said first responder, wherein the languages understood by said person and said first responder are different.

9. An electronic device for providing communication between a first responder and a person in need comprising: a processor operable to run an integrated application providing functions to communicate with a user regarding an emergency or ailment in a first language, receive input regarding the emergency or ailment from said user, translate said input information into a second language, said second language being understandable by a first responder, wherein said first and second language are different, and provide output in said second language for said first responder.

10. The electronic device according to claim 9, wherein health information of said user is pre-loaded in said application.

11. An electronic device for providing communication between a first responder and a person in need comprising: a processor operable to run an integrated application providing functions to:

a) store user health information and translate said health information into at least two languages different from the native language of the user, wherein when accessed, said application provides requested health information in at least of of said different languages; and
b) communicate with a user regarding an emergency or ailment in a first language, receive input regarding the emergency or ailment from said
user, translate said input information into a second language, said second language being understandable by a first responder, wherein said first and second language are different, and provide output in said second language for said first responder.
FIGURE 1

Seleccione el área del problema
FIGURE 1

Select the area of problem

¿Has pasado esto antes?

¿Tiene medicamento con usted?

¿Tiene alergias?

Choose your problem

- dizzy mareado
- pain dolor
- headache Dolor de cabeza
- blurred vision visión borrosa

Summary
Problem area: Head
Has this happened before? No
Do you have medicine with you? Yes
Do you have allergies? No
Launch the mobile app

Select the patient's language

Triage: Touch the problem area
FIGURE 3B

Patient chooses symptoms in their own language

They provide health history information like allergies & medications

Review patient summary

FIGURE 3C

Language can be changed

And viewed in first responder’s language
FIGURE 4

1. Start
   - User mode
   - Traveler
   - Device type
   - Apple (iOS)
   - Ask for access to HealthKit data
   - Other OS
   - Preset contact, trip details

2. Select a patient language
   - Call to nearby qualified citizens with this language skill for interpretation aid
   - Interview: get health history, known conditions (in patient language)
   - Interview: get symptoms (patient language)
   - Interview: body map for visual indication of problem area

3. Display summary in patient's language
   - Provide summary in caregiver's language
   - Send summary with location to computer aided dispatch system
   - EMS (pro mode only)

4. End
   - Travel mode

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SUBSTITUTE SHEET (RULE 26)
FIGURE 5

1000

Electronic Device

1002
Control Circuitry

1004
Storage

1006
Memory

1008
Input/Output Circuitry

1010
Communications Circuitry
**INTERNATIONAL SEARCH REPORT**

<table>
<thead>
<tr>
<th>Category</th>
<th>Citation of document, with indication, where appropriate, of the relevant passages</th>
<th>Relevant to claim No.</th>
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<td>US 2014/0278345 A1 (Koski) 18 September 2014 (18.09.2014), entire document, especially abstract, para [0012],[0013],[0015],[0016],[0022],[0025],[0027],[0039],[0046],[0054],[0057],[0060].</td>
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**Further documents are listed in the continuation of Box C.**

**Date of the actual completion of the international search**
11 March 2016 (11.03.2016)

**Date of mailing of the international search report**
11 APR 2016

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