Speech Assistant AAC for iOS

User Manual
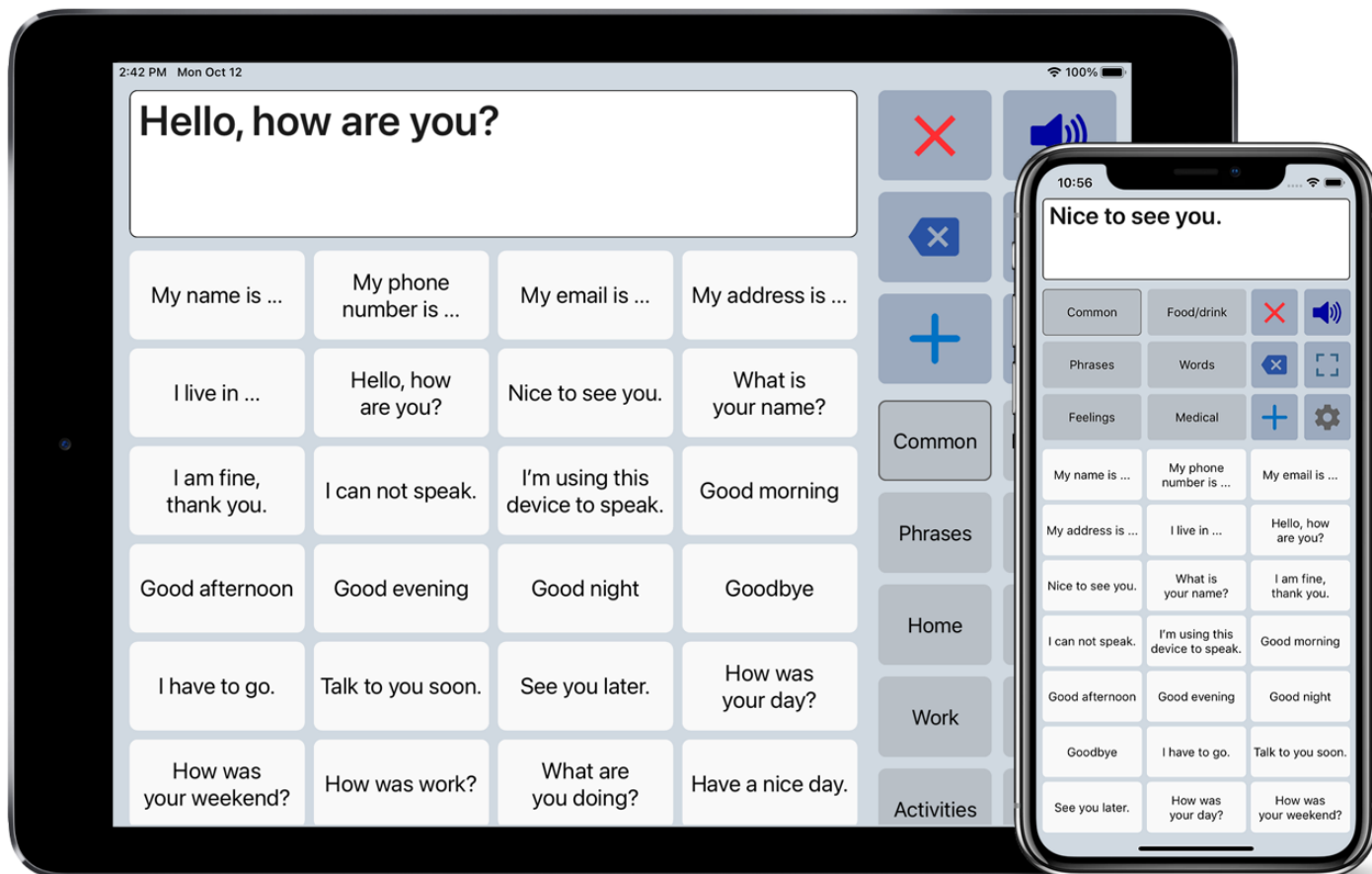## Version 4.6.2

Contents

1. Introduction

Speech Assistant AAC is a text-to-speech iOS app designed for people who are speech impaired.


With the app you can create categories and phrases, which are placed on buttons. With these buttons you can create messages that can be shown or spoken (text-to-speech). It is also possible to type any text using the keyboard.

The app is easy to use, has many features and the app can be completely customized to your personal needs and preferences.

2. Interface on iPad and iPhone
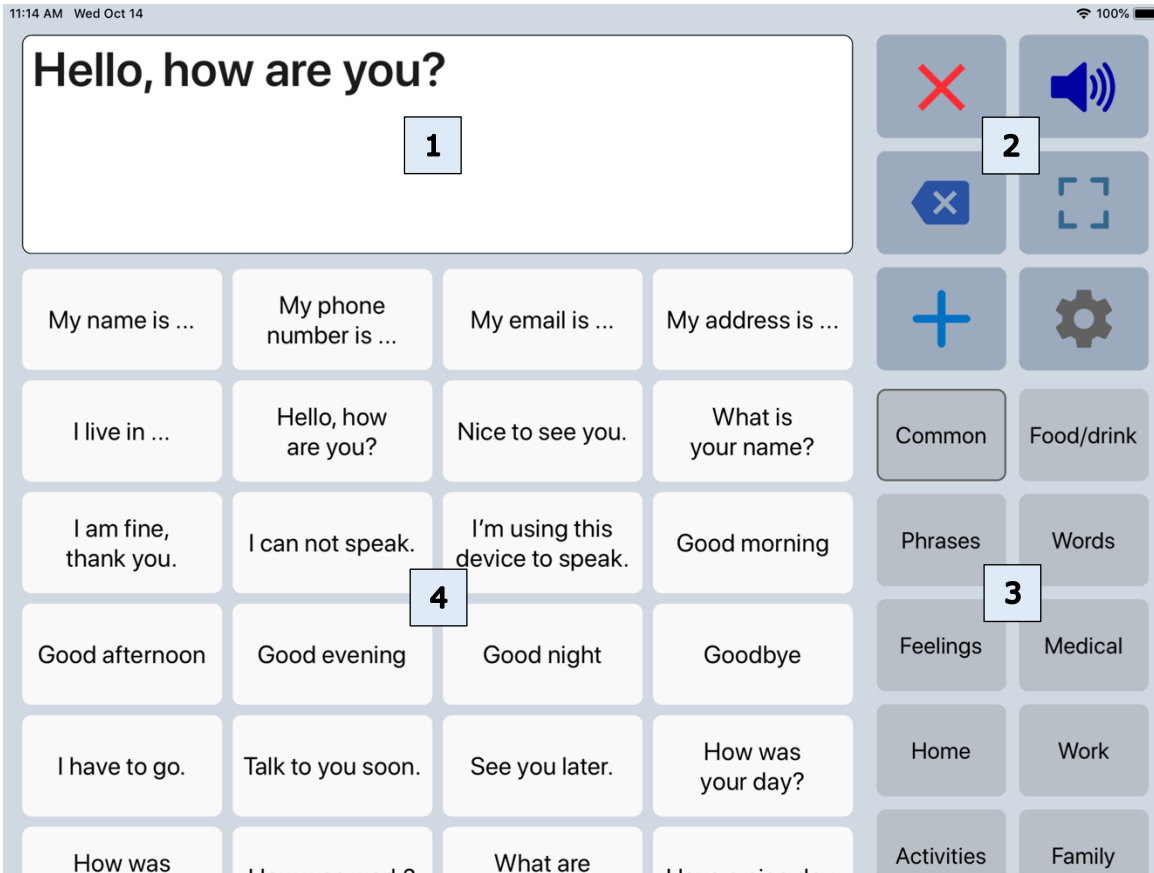
The interface of the main screen has 4 components:
The textbox and 3 scrollable areas with buttons.

1	Textbox	The text of your message appears in the textbox. When you tap in the textbox the onscreen keyboard will appear.
2	Action buttons	There are 12 action buttons. The first 6 buttons are always visible, the other buttons can be made visible by scrolling down over the action buttons. The action buttons can also be placed on the left side of the screen in the settings of the app.
3	Categories	Scrollable area with the categories.
4	Phrases	Scrollable area with the phrases that belong to the selected category.

The app is designed for iPhone and iPad.
Both support portrait and landscape layout.

3. Action buttons
Overview
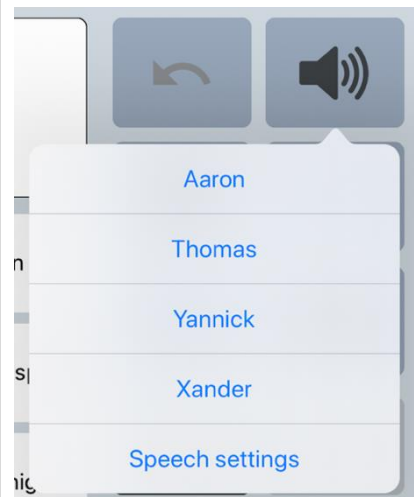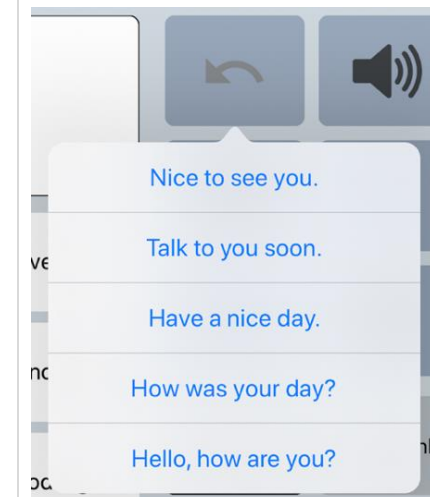
	Speak	Speaks the text in the textbox. In the 'Speech and sound' settings the actions of this button can be adjusted (with option to pause the speech).
	Clear All	Clears the textbox.
	Clear Word	Clears the last word in the textbox.
	Show full screen	Shows the message in the textbox full screen.
	Add	Opens the add menu: New phrase, Save current phrase, New category.
	Settings	Opens the settings menu.
	Edit phrases	Edit the last clicked phrase.
	Attention sound	Make an attention sound. The sound can be selected in the 'Speech and sound' settings.
	Share phrase	Share the phrase to mail, text or social media.
	Flip text	Flip the text in the textbox to show your message to the person opposite of you.
	Keyboard	Opens the onscreen keyboard.
	Users	Switch between user profiles.
	Reorder phrases	Reorder the buttons with phrases (with drag and drop).

3. Action buttons
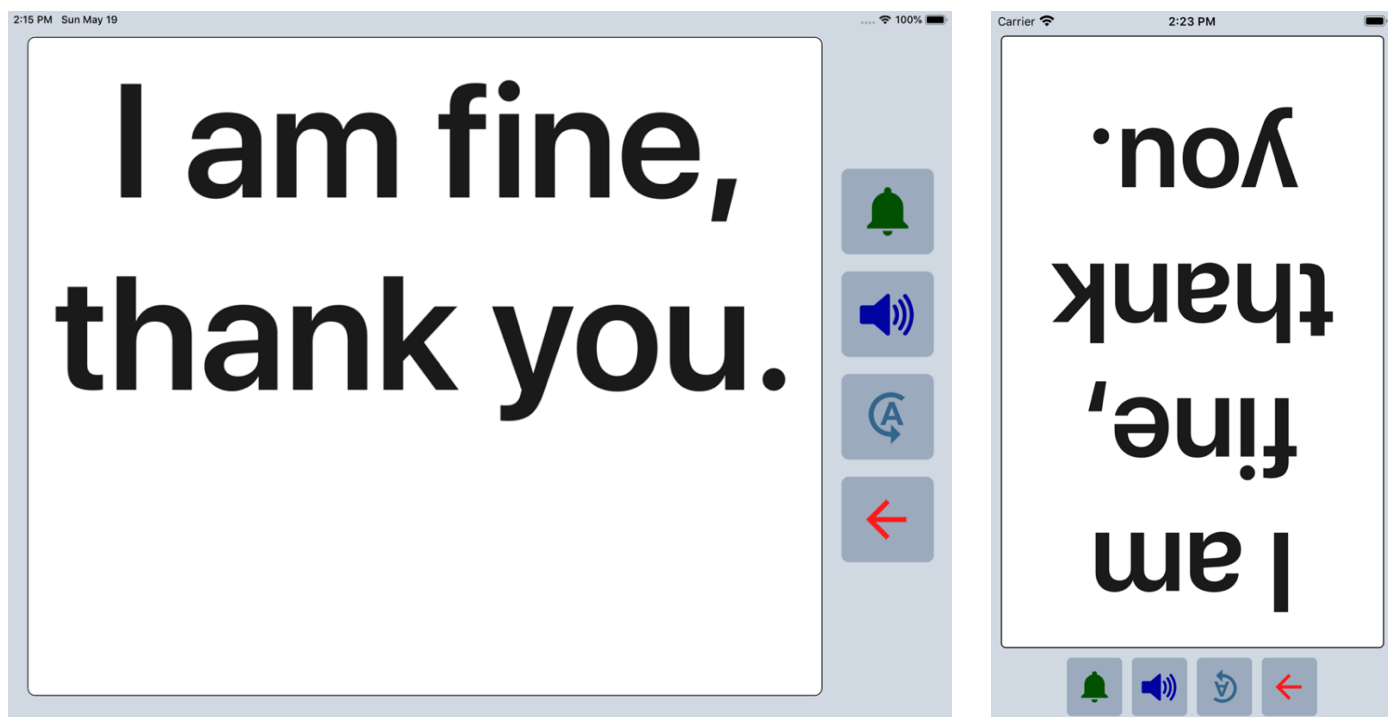
Long press special features

The speak and Clear buttons have special features which can be activated by long pressing the button. The long press actions must first be enabled in the settings.

Speak button: Long press to switch between the 4 most recent selected voices.	Clear button: Long press to retrieve the last 5 cleared phrases.
Aaron Thomas Yannick Xander Speech settings	Nice to see you. Talk to you soon. Have a nice day. How was your day? Hello, how are you?

4. Full Screen

With full screen you can show your message with a very large font.
Useful for communicating in a noisy environment.
You can also show your message to the person opposite of you with the button to flip the text.

I am fine, thank you.

5. Creating messages

With the app you can define categories and phrases, which are placed on buttons. With these buttons you can create messages that can be spoken or shown on full screen.

When you tap in the textbox, the onscreen iOS keyboard will appear and with the keyboard you can type anything into the textbox you want to be spoken or shown.
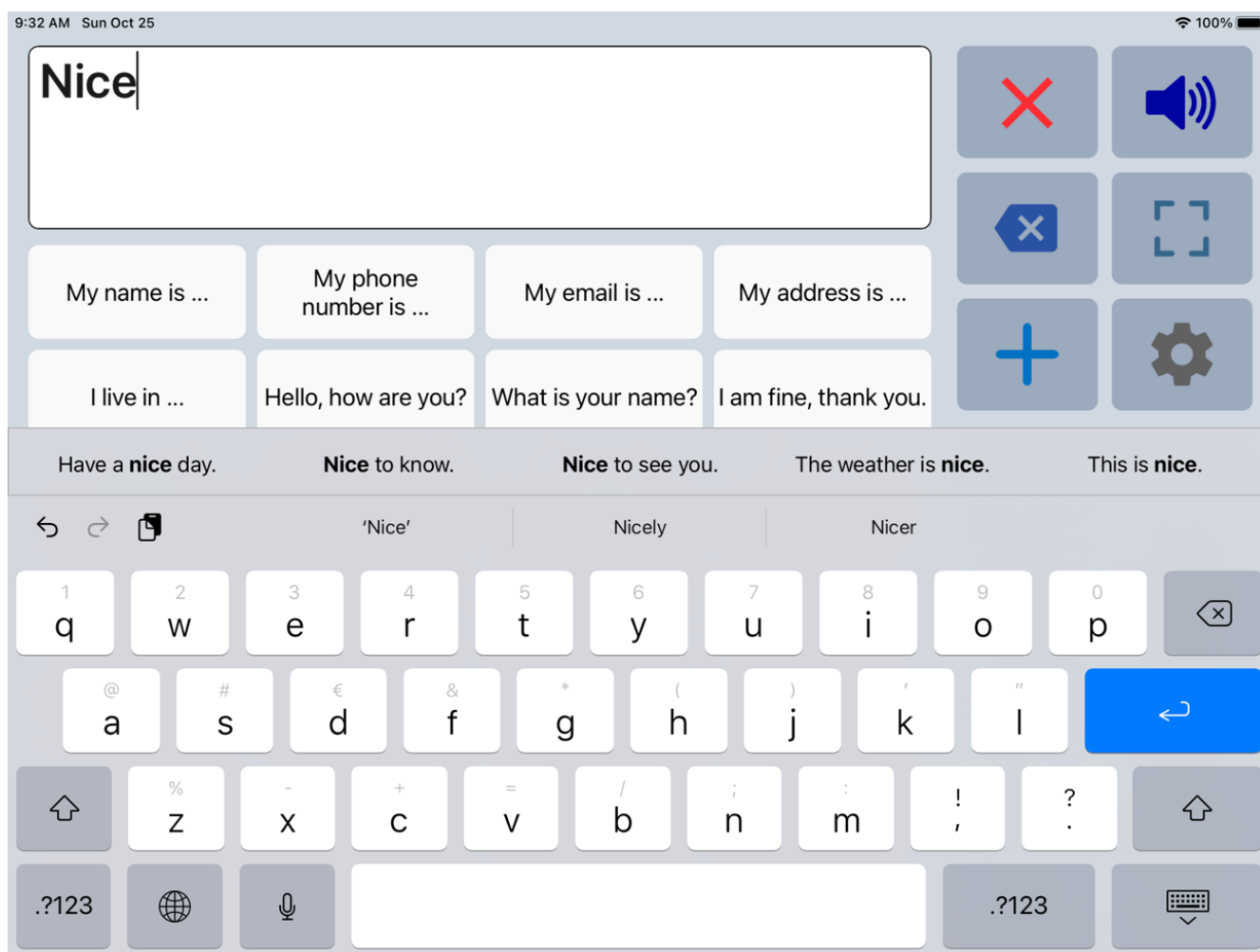
When you want to use the message you have typed more often, then you can save this message by tapping the Add button and choosing 'Save current phrase'.

Other options

When autosearch is enabled in the general settings the app searches, based on your typing, through all your phrases and puts the found phrases on an extra bar on the keyboard.

The characters or words can be spoken while you type. You can enable these options in the 'Speech and Sound' settings of the app.

When History is enabled in the settings, the messages that are spoken are saved in a special category called History, so that you can use them later again.

6. Multiple conversations

In the general settings you can enable the option 'Tabs for multiple conversations'.
With the tabs you can easily switch between two or three conversations.
For example, in the second tab you can answer a question to someone else and then continue typing your message in the first tab.
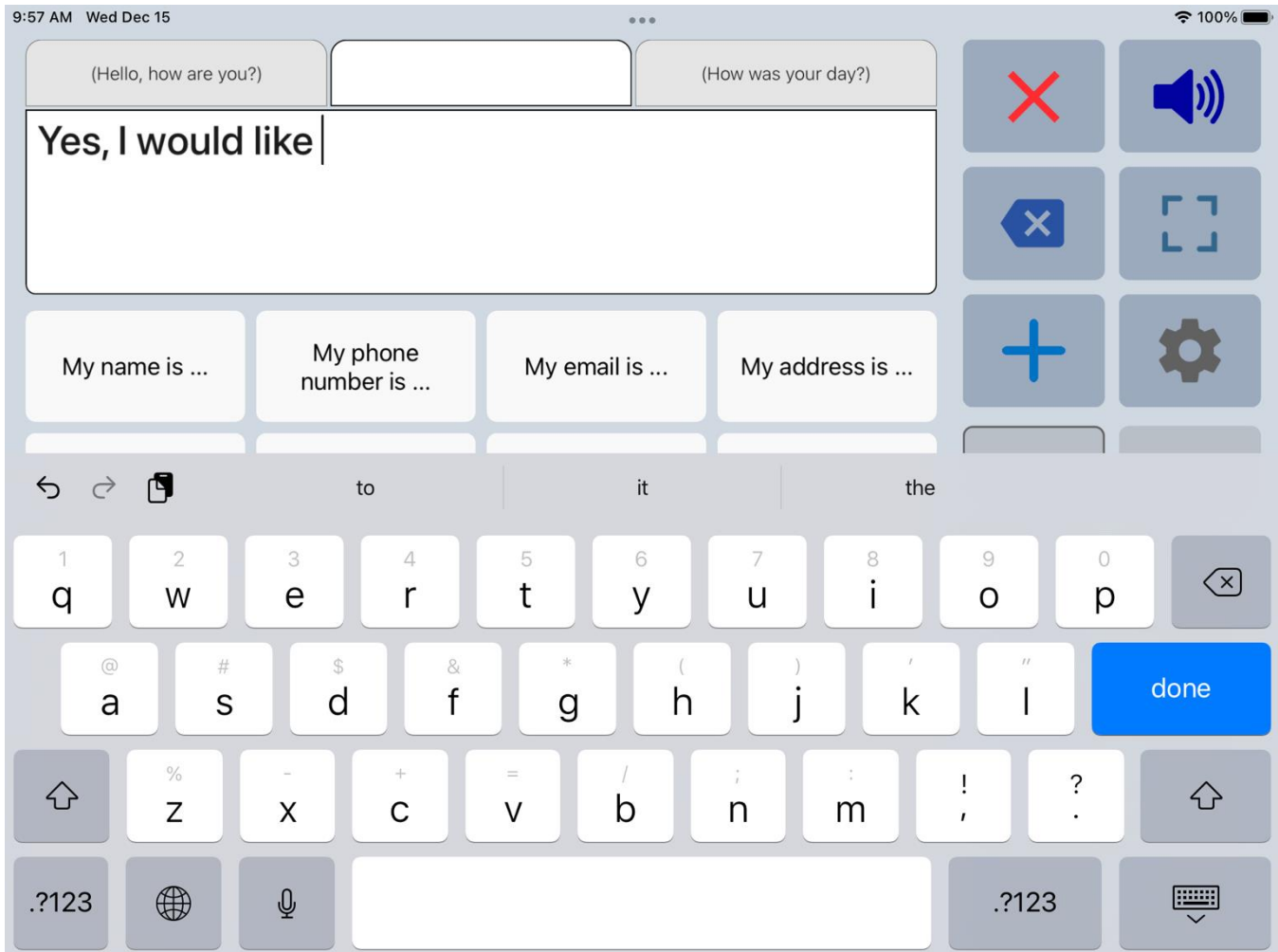
7. Add categories or phrases
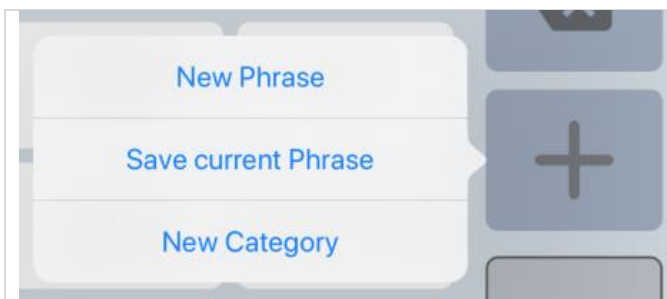
On the main screen, you can add a new category or new phrase with the action button Add.

It is also possible to add categories or phrases in the settings of the app.

8. Edit phrases

The first time the app is started, it creates a set of default categories and phrases in the language of your iPhone or iPad (English, French, German or Dutch).

You can modify or delete phrases by long pressing a phrase button or in the settings.

Edit by long press

Button color: To change the color of the button.

Button image: Gives the options to select a Photo (from your photo library) or Symbol. You can also take a Photo. The image will be placed on the button next to the text.

Button recorder: Shows the recorder screen where you can make a voice recording that will be played when you press the phrase button on the main screen.
It is also possible to select a previously made voice recording. Or recordings that are imported with the function 'Import recordings' in the Backup/Restore menu.

Phrase: The phrase that is spoken and/or is placed in the textbox.

Label: The text that is placed on the button, if the label is empty, the phrase will be placed on the button.

Category/position: With the 'spinning-wheels' you can change the category and position.

8. Edit phrases
Edit in the settings

If you go to the 'Categories and phrases' settings, then to Categories and then select a category, the list of all the phrases that belong to the selected category will be shown.

Button Edit : change to the edit mode where you can change all the phrases in the list in one go.

Button ++ : shows the screen where you can add up to 10 phrases in one go.

Button + : shows the screen where you can add a phrase.

List mode:

Back	Edit	++	+
My name is ...			
My phone number is ...			
My email is ...			
My address is ...			
I live in ...			
Hello, how are you?			
Nice to see you.			
What is your name?			
I am fine, thank you.			
I can not speak.			
I'm using this device to speak.			
Good morning			

Edit mode:

Back	Delete (4)	Color (4)	Save
○ My name is ...		✏	≡
✓ My phone number is ...		✏	≡
✓ My email is ...		✏	≡
✓ My address is ...		✏	≡
✓ I live in ...		✏	≡
○ Hello, how are you?		✏	≡
○ Nice to see you.		✏	≡
○ What is your name?		✏	≡
○ I am fine, thank you.		✏	≡
○ I can not speak.		✏	≡
○ I'm using this device to spe...		✏	≡
○ Good morning		✏	≡

- In Edit mode you can change the text of all the phrases in the list in one go.
- You can also select multiple phrases and change the color of the selected phrases or delete the selected phrases.
- By drag and drop on the 3 horizontal lines, the order of the phrases can be changed.

8. Edit phrases

Photos and Symbols

When you edit a phrase and tap on the image button, you can for example select a Photo (from your photo library) or select a Symbol from the set of 3400 Mulberry Symbols to place on the buttons with phrases.
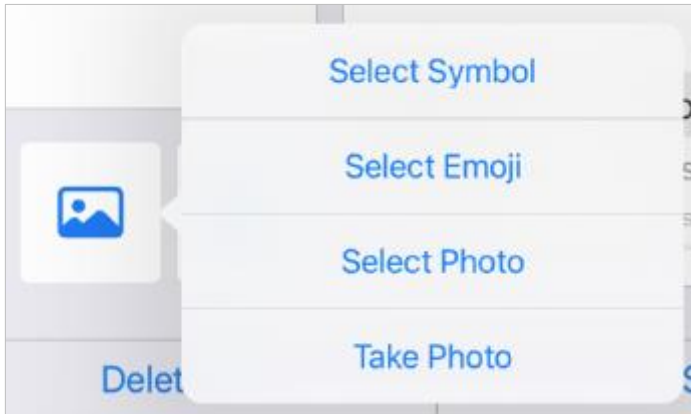
The photos or symbols are placed next to the phrase and are also shown in the textbox.

9. Edit categories

Edit by long press

Edit Category

Food/drink

Pos: 1   Common
Pos: 2   Food/drink
Pos: 3   Phrases
Pos: 4   Words

Cancel   Delete   Save
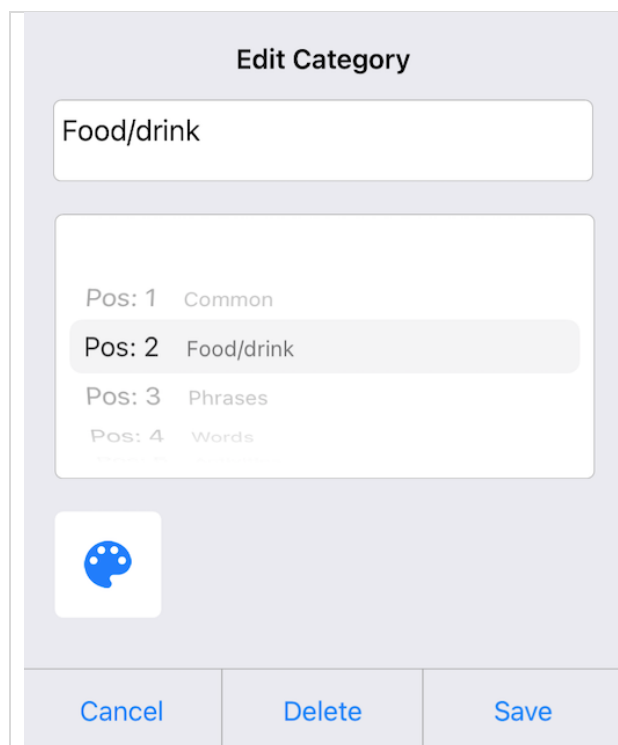
By long pressing on a category button on the main screen, the category can be modified or deleted.

The name of the category, the position and the color of the button can be modified.

When you delete a category, the phrases that belong to that category will also be deleted.

Edit in the settings

Back   Categories   Save

- Common
- Food/drink
- Phrases
- Words
- Feelings
- Medical
- Home
- Work
- Activities
- Family
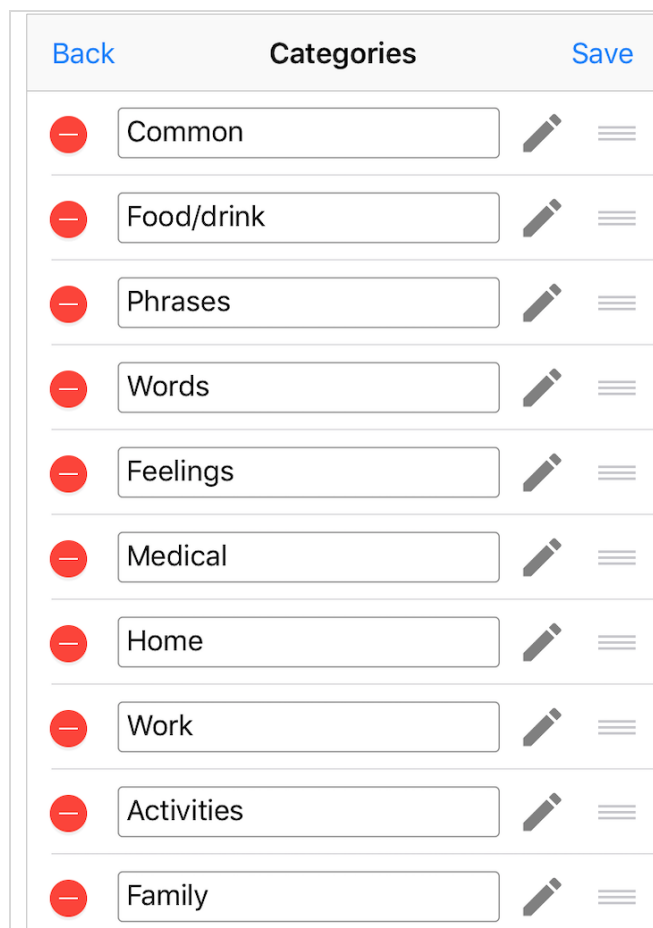
In the settings you can change the name of all the categories in the list in one go.

By drag and drop on the 3 horizontal lines, the order of the categories can be changed.

10. Settings menu

With the settings button you can open the settings menu.

Settings

General Settings

Layout and Colors

Categories/Phrases and Users

Speech and sound

Backup/Restore and AirDrop

Custom Keyboard

Direct Speak

Direct Speak/Clear

Done

Goodbye   I have to go.   Talk to you soon.
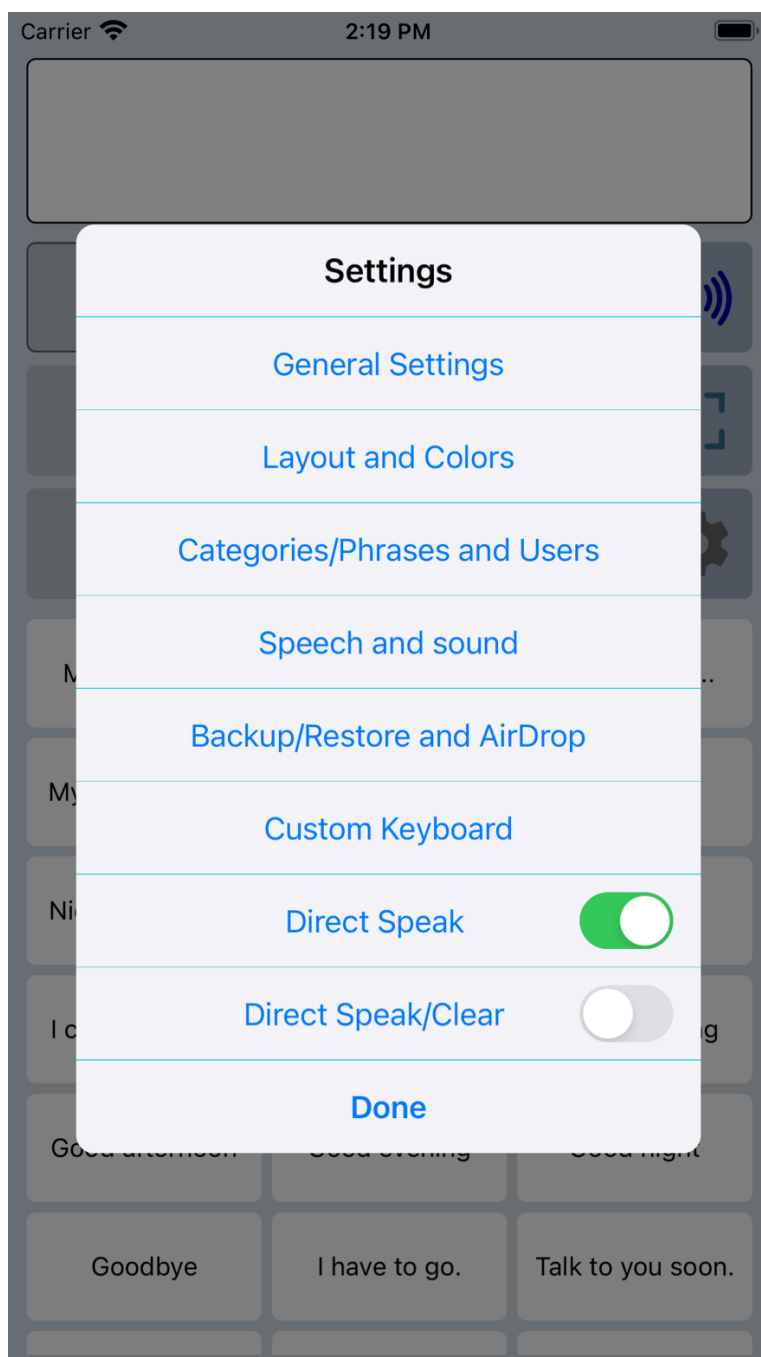
The settings menu contains also two quick settings.

Direct Speak:
After tapping on a button with a phrase, the phrase is immediately spoken.

Direct Speak/Clear:
After tapping on a button with a phrase, the phrase is immediately spoken and then cleared.

11. General settings

Overview

Back	General Settings

Undo clear
With this option enabled, clearing the textbox can be undone. *(enabled)*

Retrieve cleared phrases
Option to retrieve the last 5 cleared phrases by long pressing the Clear button. *(enabled)*

Clear after speak button
With this option the textbox will be cleared automatically after touching the speak button. *(disabled)*

Clear after full screen
With this option the textbox will be cleared automatically after returning from full screen. *(disabled)*

Direct Speak/Clear
After tapping on a button with a phrase, the phrase is immediately spoken and then cleared. *(disabled)*

Automatic Search
Select the option which searches, based on your typing, through all your phrases and puts the found phrases on buttons.

Tabs for multiple conversations
Enable tabs to have multiple text boxes making it easier to have multiple conversations. *(enabled)*

Prevent screen auto-lock
Prevent the screen from going automatically into auto-lock sleep mode. *(disabled)*

Long press duration
The duration of time required to activate the long press action.

Prevent double touching (buttons)
Set the disable time after touching of the buttons to prevent double touching.

Prevent double touching (keyboard)
Set the disable time of the default iOS onscreen keyboard or a bluetooth keyboard to prevent double touching.

Keyboard shortcuts
Tap to define the shortcuts for a Bluetooth keyboard.

Keyboard navigation
Tap to set up navigation with a bluetooth keyboard.

Keyboard return key
Set the function of the return key of the default iOS onscreen keyboard: Done, Return or Speak.

Pictures in Textbox
When a button with a phrase is tapped, the picture on the button is also shown in the textbox. *(enabled)*

Set password
Set a password protection on the access to the settings.

Feedback
Email Feedback or Questions.

User Manual
User Manual with basic instructions about the working of the app.

Prevent double touching

For people with motor skill impairments or shaky hands, it can help to use the 'Prevent double touching' feature.

This setting also works for the iOS onscreen keyboard, a bluetooth keyboard or a smart keyboard cover.

In the settings of your iPhone/iPad (Accessibility > Touch > Accommodations) it is also possible to enable 'Ignore Repeat'.
It is not recommended to enable that setting at the same time with 'Prevent double touching'.

11. General settings

Automatic Search options

The autosearch feature searches, based on your typing, through all your phrases and puts the found phrases on the buttons.
You can choose to put the found phrases on the buttons with phrases or to put the found phrases on an extra bar on the on-screen keyboard.
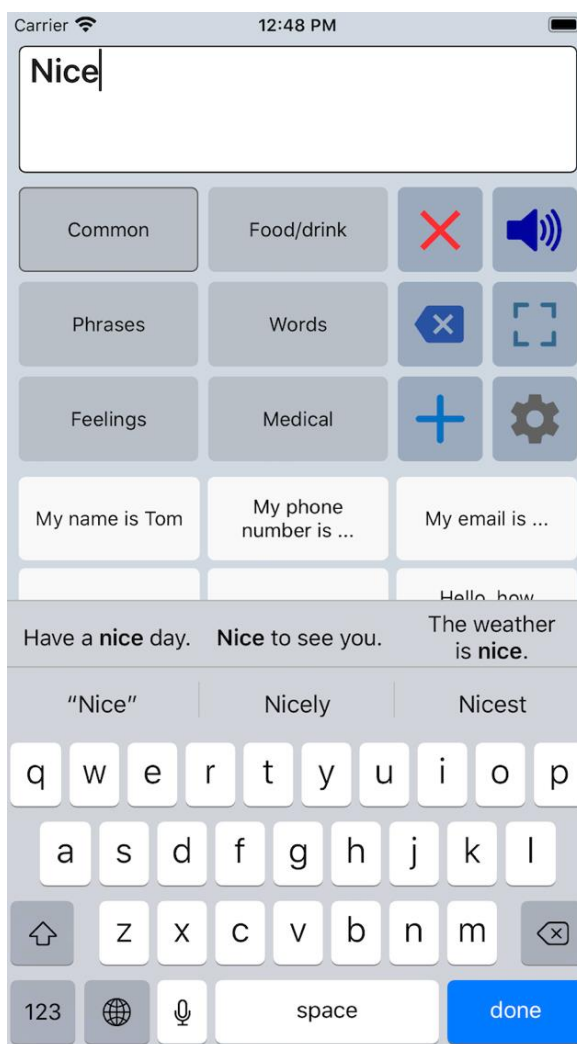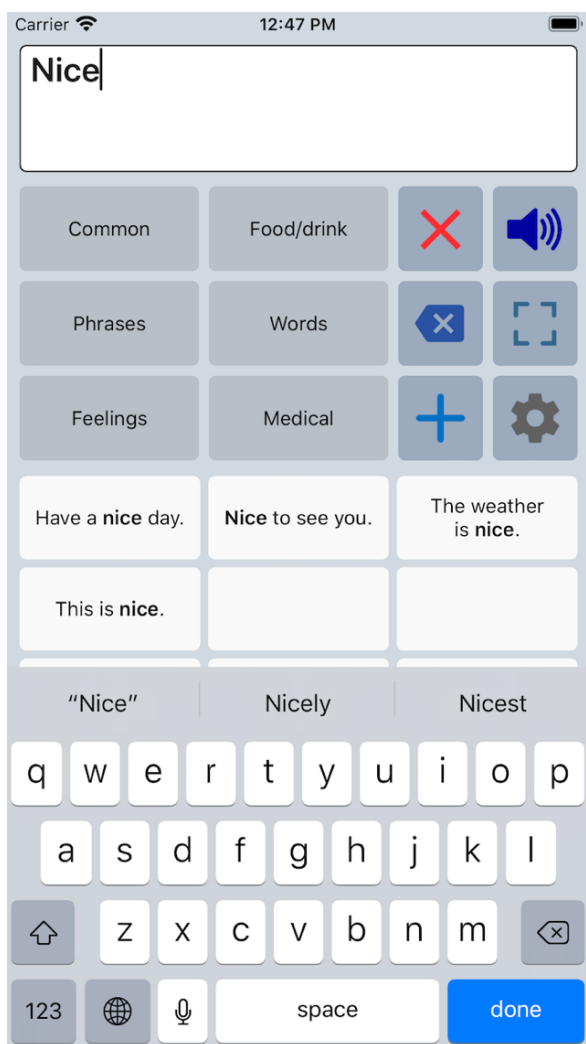
Keyboard shortcuts

Back	Shortcuts	
Speak: Enter		>
Clear All: Ctrl		>
Attention Sound: Alt s		>
Full screen: Cmd		>
Close full screen: Escape		>

With this feature you can define the shortcuts for a Bluetooth keyboard.

For each function you can choose one of the following keys:

Alt Key, Cmd, Ctrl, Enter, Escape, Alt a, Alt c, Alt s.

12. Layout and Colors settings
Overview

Back   **Layout and Colors**

Phrase button width
Set the width of the buttons with phrases based on the number of buttons per row.

Phrase button height
Set the height of the buttons with phrases. ›

Phrase button fontstyle
Tap to change the fontstyle of the phrase buttons. ›

Category button size
Tap to change the size of the category buttons. ›

Category button fontstyle
Tap to change the fontstyle of the category buttons. ›

Textbox size
Tap to change the size of the textbox

Textbox font
Tap to change the font of the textbox

Action buttons space
Set the space for the buttons to make more buttons visible.

Phrase button textsize: 15.00

Category textsize: 15.01

Textbox textsize: 26.00

Fullscreen textsize automatic
When enabled the textsize on the full screen will be made as large as possible automatically.

Fullscreen textsize: 60.00

Color scheme
Tap to select the color scheme.

Personal color scheme
Tap to create a personal color scheme.

Dark keyboard
On the Main screen the keyboard gets a dark appearance (works only for the default Apple keyboard).

Main screen action buttons
Customize the action buttons on the main screen (like speak, clear etc).

Full screen action buttons
Customize the action buttons on the full screen (like attention sound, speak etc).

Action buttons placement
Place the action buttons on the left side of the screen.

Extra rotated textbox
If you tap on the rotate button, an extra textbox with the text rotated will become visible, to show your message to the person opposite of you.

Textbox at bottom
This option places the textbox at the bottom of the screen. This can be convenient when writing with an Apple Pencil on an iPad.

12. Layout and Colors settings

Size options

The size of the buttons, the textsize and the size of the textbox can be adjusted.
For instance, on an iPad you can have up to 8 phrase buttons per row.
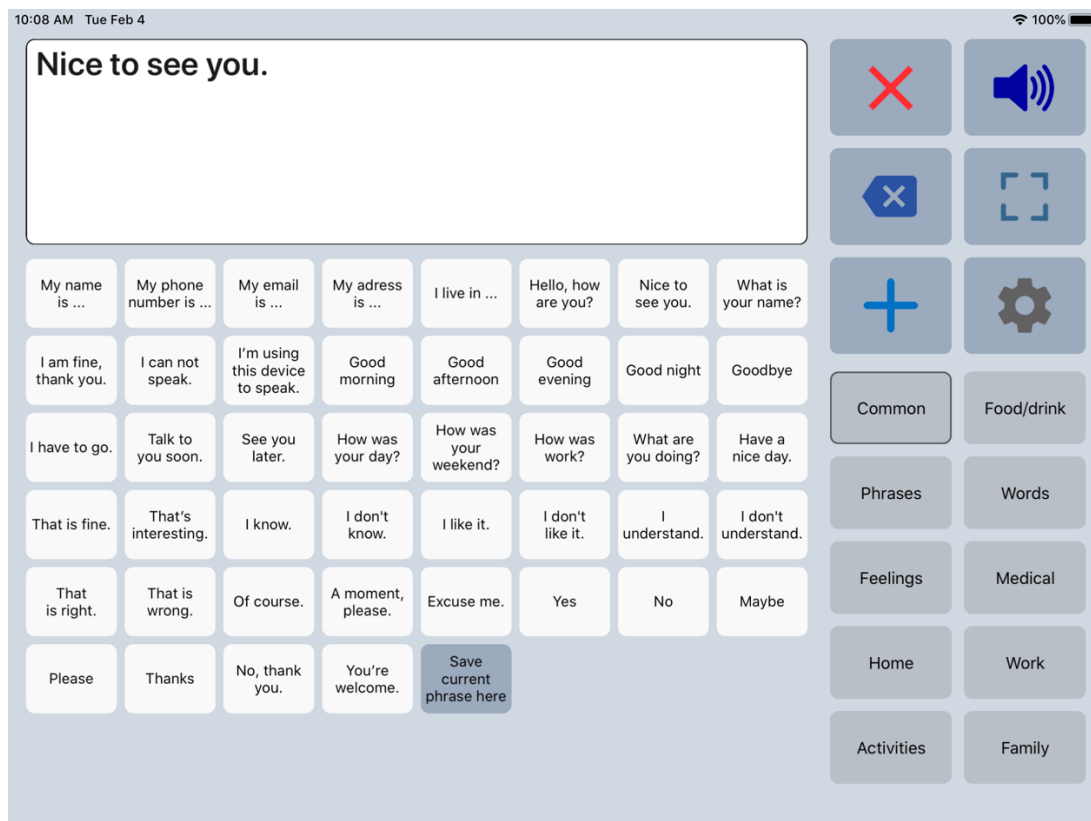
Extra rotated textbox

With the action button to flip the text in the textbox, you can show your message to the person opposite of you. It is possible to enable an extra rotated textbox, so both can easily read the text.
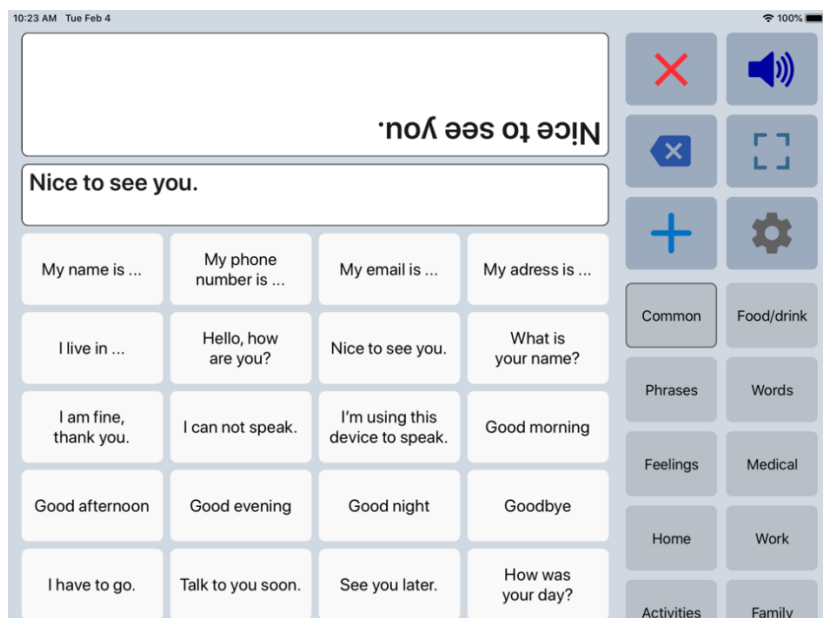
12. Layout and Colors settings
Colors

The colors of the buttons, texts, textbox and background can be adjusted to your personal preferences. You can choose a color scheme or create a personal color scheme.

With the color scheme you can for instance change the color of the phrase buttons. All the phrase buttons will get the selected color. But with the 'Edit phrase' screen you can also give individual buttons different colors. For instance, in the screenshot below the Yes/No buttons and the five yellow buttons.
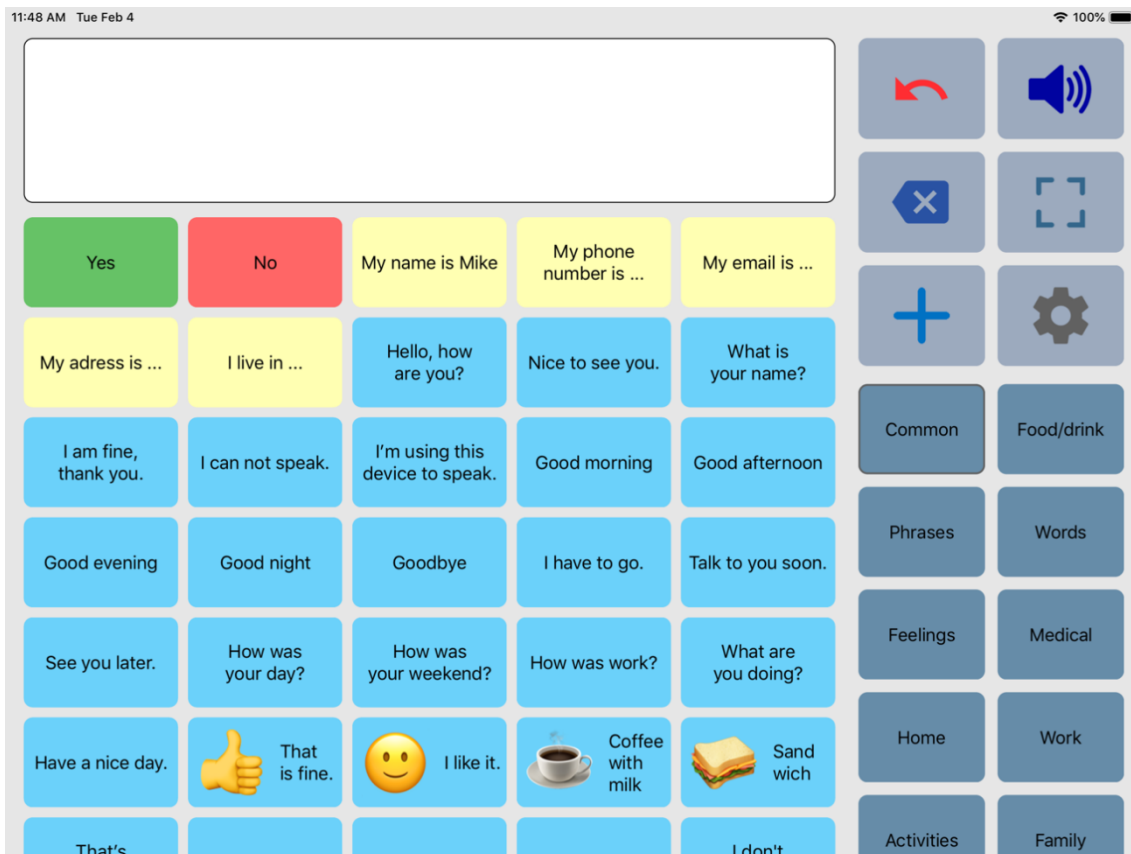
12. Layout and Colors settings
Main screen action buttons

The action buttons can be modified:
- The color of the icons on the buttons can be changed by tapping on the button.
- With the switch you can show or hide the button.
- By drag and drop on the 3 horizontal lines, the order of the buttons can be changed.
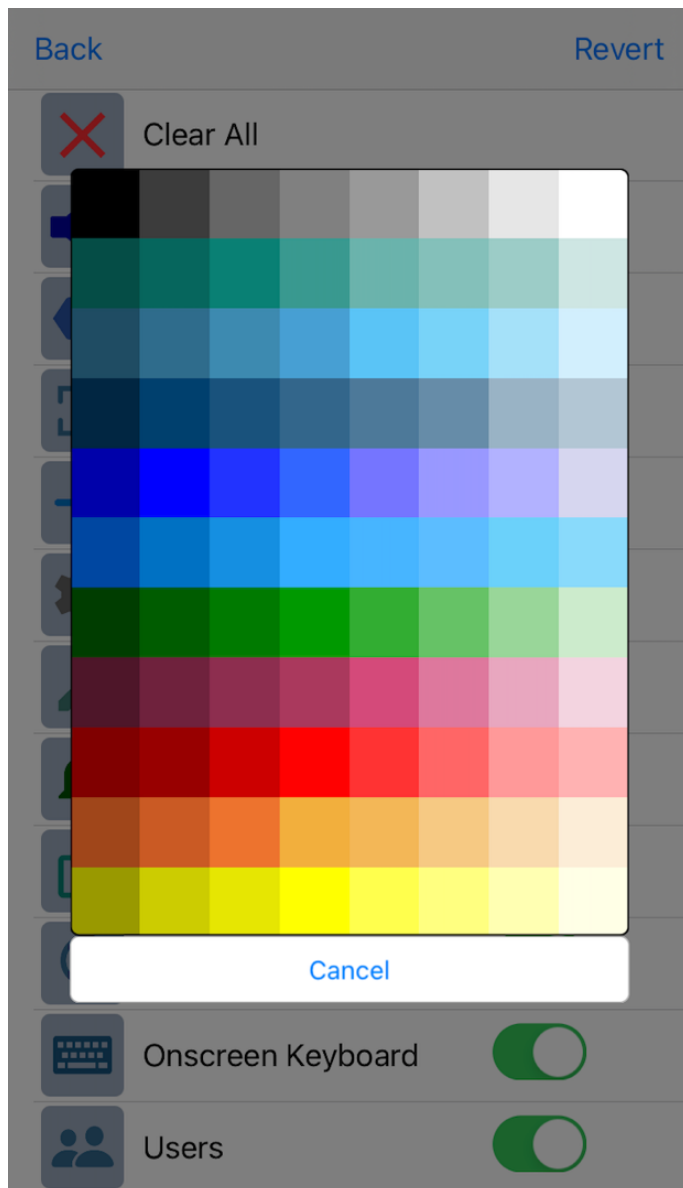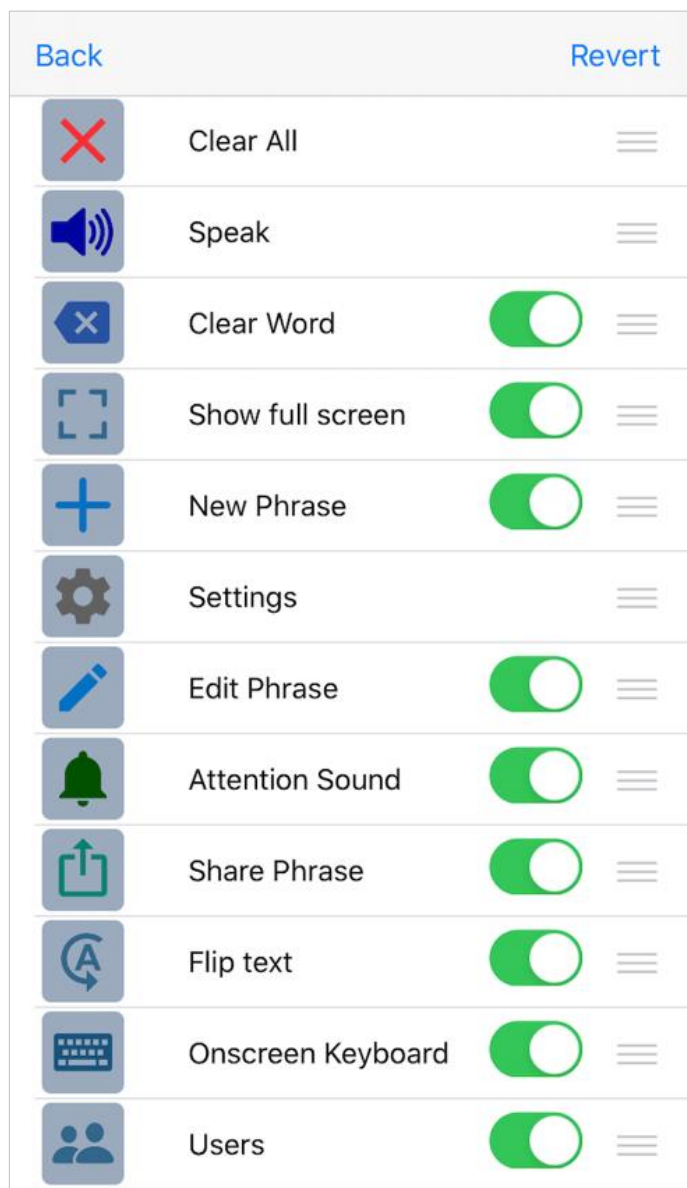
12. Layout and Colors settings

Examples

This is an example of the app with another color scheme, with the highlight feature enabled and with the dark keyboard enabled.
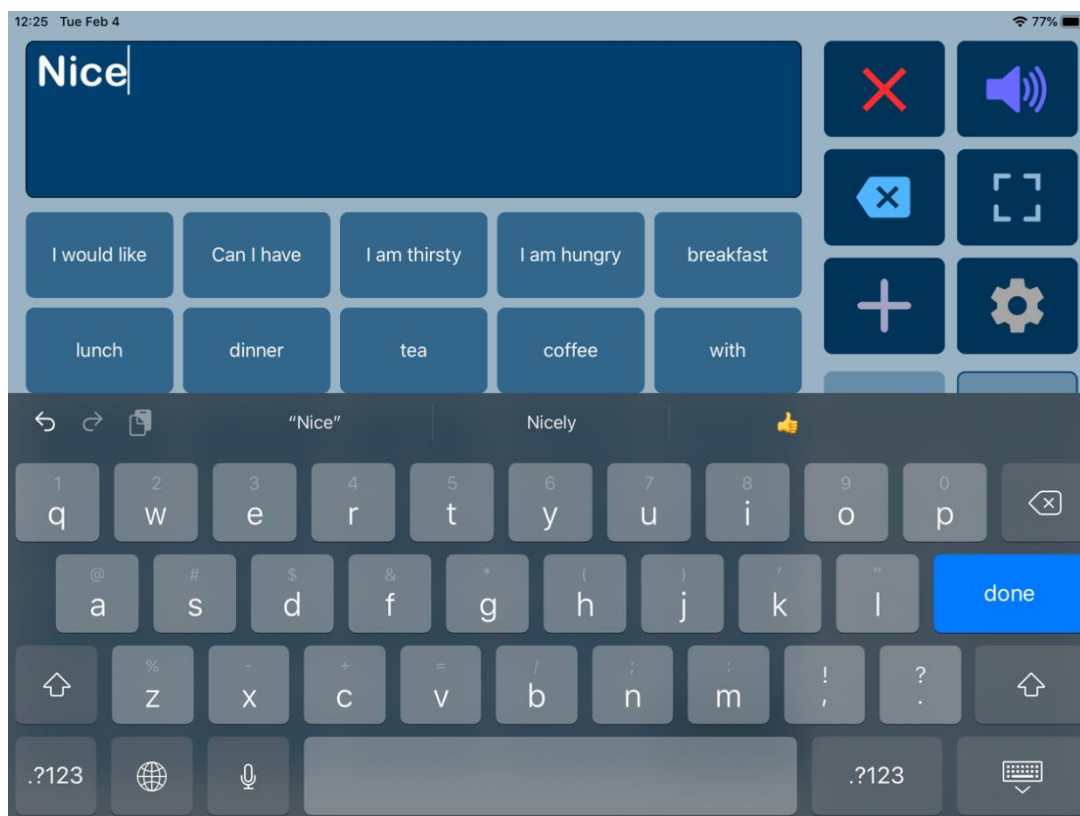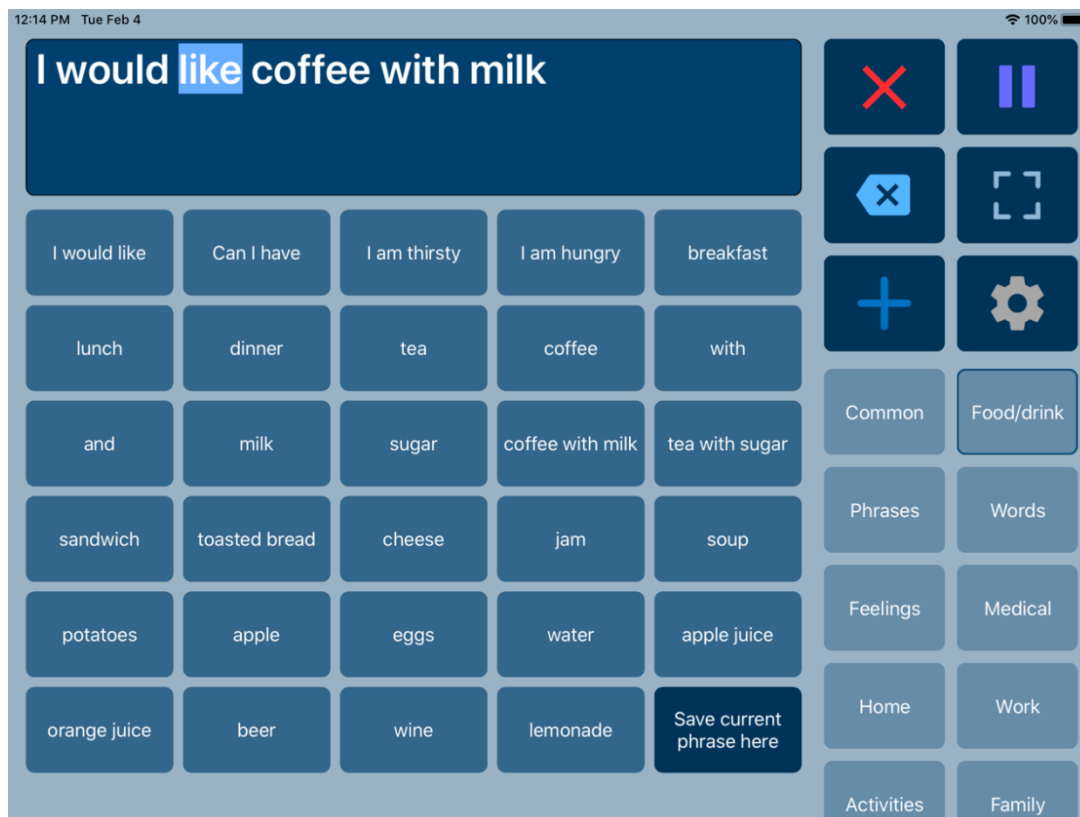
13. Categories/Phrases and Users

Overview

In this section of the settings you can edit the categories, phrases and user profiles. More detailed information about editing can be found in the chapters about editing.

Back	Categories and Phrases

Categories
Tap to edit the categories or to edit the phrases of a category. ＞

User profiles
Create users with their own categories, phrases and voice. And select another user for another language, person or situation. ＞

Sort alphabetically
With this option the phrases will be shown alphabetically.

Long press categories
With this option you can long press the buttons with categories to edit. ✓

Long press phrases
Select the action for long pressing the buttons with phrases. ＞

Save current phrase
Enable the button to save the current phrase. ✓

History Speak
The phrases will be automatically saved in the history category after tapping the Speak button.

History Full screen
The phrases will be automatically saved in the history category after tapping the full screen button.

Clear history
Clear the phrases in the history category.

Abbreviation expansion
Create abbreviations and the expansions that will replace the abbreviations during typing. ＞

Enable Abbreviations
The abbreviations will be replaced after typing a space or after pressing the speak button.

History

History for quick access to previously typed phrases.
When you enable history, the phrases will be automatically saved in the history category after tapping the Speak button (or after tapping the full screen button).
After enabling history, a new category named History will be created automatically.

13. Categories/Phrases and Users

User profiles

Back	**User profiles**	Edit	+
Dutch user			
English user		✓	
French user			
German user			
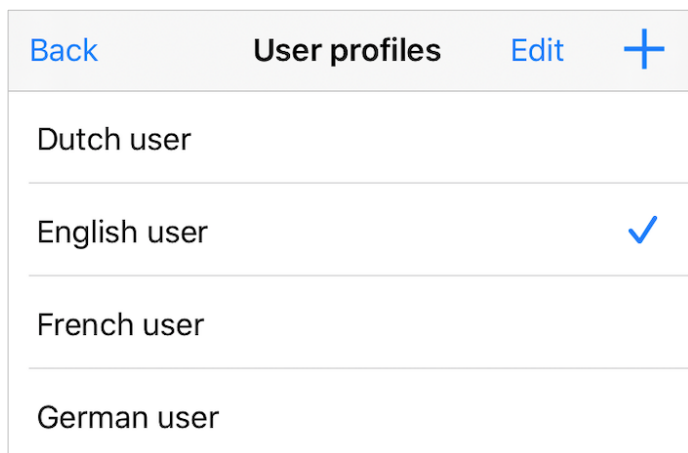
You can create user profiles with their own set of categories and phrases.

The settings (like layout, color scheme, selected voice and general settings) are also saved in the user profile.

The user profiles can be used for multilingual support and for different persons or situations.

Dutch user
English user ✓
French user
German user
Food/drink
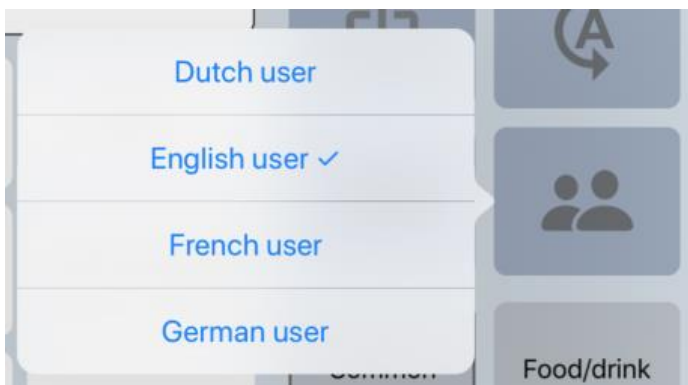
On the main screen, you can switch quickly between users with the action button Users.

Long press options

With long press it is possible to edit the categories and phrases directly from the main screen. For the phrases you can choose between several options.

None	
Edit phrase	✓
Speak phrase	
Add phrase to textbox	
Speak and Add phrase	
Show menu with all the options	
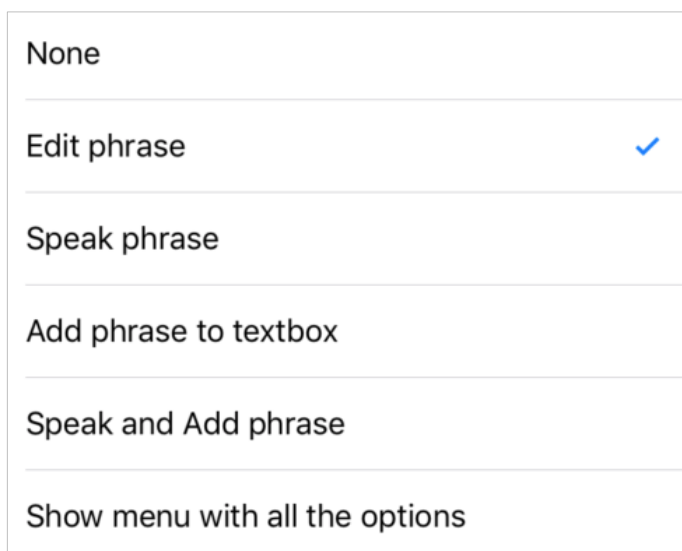
14. Speech and sound settings

Overview

Back	Speech and sound

Select voice
Tap to select a speech voice and a speech language.

Listen to an example
Play a short example of the selected voice.

Pronunciations
Tap to define pronunciation corrections.

Pause between words
With this option there will be a longer pause between the spoken words.

Speak button long press
Option to long press on the speak button to switch between the 4 most recent selected voices.

Speak button options
Select the working of the Speak button (Speak only or also Stop/Pause).

Speech Rate: 0.50

Speech Pitch: 1.00

Mix speech into phone calls
The synthesized speech will be mixed into your phone calls and will be audible for the receiver (not on your device).

Always use built-in speakers
The app will always use the built-in speakers of the iPhone/iPad, also when headphones are connected.

Attention sound
Tap to select an attention sound.

Manage recordings
Shows the list of the recordings with the options to delete recordings or connect recordings to phrases through their name.

Recording indication
Set the border color of the buttons with recordings as an indication that a button contains a recording.

Speak characters
The characters are spoken while typing.

Speak word
The word is spoken after typing a space or after a swiped word or written word with an Apple Pencil.

Speak sentence
The sentence is spoken after typing a punctuation.

Highlight words Main screen
The spoken words will be highlighted on Main screen.

Highlight words Full screen
The spoken words will be highlighted on Full screen.

Start position
With this option enabled, speaking will start from the cursor position in the text box.

Tap to speak Full screen
On Full Screen tap on a word to start speaking from that word.

14. Speech and sound settings

Voices

The app uses the high-quality iOS voices, there are 90 voices for 27 languages available.
The voice can be selected in the app, the rate and pitch of the selected voice can be adjusted.

The voices can be selected after they have been downloaded in the settings of your device:
• iOS 12 or older: Settings > General > Accessibility > Speech > Voices.
• iOS 13 or newer: Settings > Accessibility > Spoken Content > Voices.

In the speech settings of the app, the list shows the voices in the language of your device.
To show the voices in other languages you can tap on 'More voices'.

Back	Voices	More voices
Oliver (Enhanced)	🔊	
Serena	🔊	
Serena (Enhanced)	🔊	
English (United States)		
Aaron	🔊	✓
Alex	🔊	
Allison	🔊	
Allison (Enhanced)	🔊	
Ava	🔊	
Ava (Enhanced)	🔊	
Fred	🔊	
Nicky	🔊	
Nicky (Enhanced)	🔊	

Phone calls and FaceTime

The app can also be used while making Phone, FaceTime and Skype calls (with iOS 13 on your iPhone or iPad). This means you don't need a second device anymore for the speech output.

You can type text (or use the buttons with phrases) and the other person on the phone can hear the synthesized speech.
During the call the speech output is not audible on your device, but the app highlights the spoken words so you can follow the progress of the speech.

It works with the iOS voices and not with recordings. When a recording is played during a phone call, the selected iOS voice is used.

FaceTime

The app can be used during a FaceTime call with both apps in 'Splitview'.
This links shows how Splitview can be enabled: https://support.apple.com/en-us/HT207582.
The disadvantage is that in Splitview the FaceTime video is paused.

A better option is using 'Picture in Picture'. Start the FaceTime call in full screen and then press the home button, then the FaceTime video screen scales down to a corner of your display.
You can then start Speech Assistant.

Move video window:	Drag it to a different corner of the screen.
Resize the video window:	To make the small video window larger, pinch open. To shrink it again, pinch closed.
More information:	https://support.apple.com/guide/ipad/multitask-with-picture-in-picture-ipad7858c392/ipados

This 'Picture in Picture' feature has to be enabled in the general settings of your iPad.
You can use 'Picture in Picture' with iPad Pro, iPad (5th generation and later), iPad Air 2 and later, or iPad mini 4 and later.

15. Backup/Restore and AirDrop

It is a good idea to make a backup to iCloud regularly.
Backup and Restore can also be a convenient method (next to AirDrop) to transfer your categories and phrases to another device.

Back   **Backup/Restore and AirDrop**

Categories and Phrases

Backup
Tap to backup the Categories and Phrases to iCloud, Mail or Airdrop.

Restore
Tap to restore a backup of Categories and Phrases from iCloud or another folder.

Recordings

Backup recordings
Tap to backup the voice recordings to iCloud.

Restore recordings
Tap to restore the voice recordings from iCloud.

Import recordings
Tap to select the folder for importing voice recordings (m4a, aac, mp3 or wav files).

Export recordings
Tap to select the folder for exporting the voice recordings into a zip file.

AirDrop options

AirDrop complete backup
Send a complete backup (categories and phrases, recordings and photos) to another device with AirDrop.

AirDrop categories and phrases
Send the categories and phrases to another device with AirDrop.

AirDrop recordings
Send the recordings to another device with AirDrop.

AirDrop settings
Send the settings (like layout settings, color scheme, action buttons and general settings) to another device with AirDrop.

Backup Categories and Phrases

Name: Backup_20201117_1519

☁ Backup your categories and phrases to iCloud. You can then also restore them on another device.

✉ Mail the backup if you want to send your categories and phrases to another person.

📶 With AirDrop you can send your categories and phrases to another device nearby.

⬆ Share the backup to 'Google Drive' or 'Save to Dropbox' (if installed on your device).

Cancel

Name backup
If you tap on the name of the backup, you can change the name.

Backup to iCloud
Backup to iCloud to save your categories and phrases to your iCloud. The backup is saved in the folder SpeechAssistantBackup. In the settings of your device iCloud drive has to be enabled.

Backup to Mail
Backup to Mail can be useful if you want to send a backup to another person. The mail also contains instructions how to restore the backup.

AirDrop
With AirDrop you can send a complete backup (categories, phrases, recordings and images) to another device or person. If the receiving device is not visible on the AirDrop screen, you can go to the settings of the receiving device (General > AirDrop) to check if AirDrop receiving is allowed.

Share the backup

You can share the backup to 'Google Drive' or 'Save to Dropbox', when these apps are installed on your device. This can be useful if you want to send your categories and phrases to an Android device.
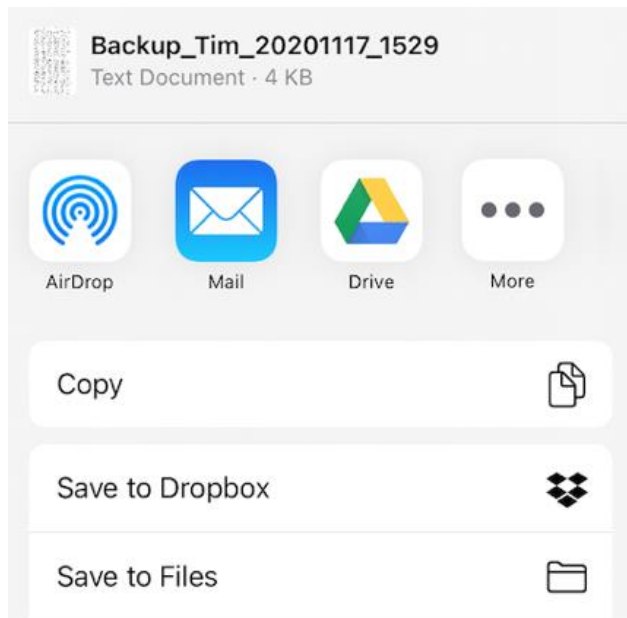
Import Recordings

With 'Import recordings' it is possible to import previously made voice recordings.
You can select a local directory on your iPhone/iPad or an iCloud directory that contains voice recordings. The app supports the following audio-formats: m4a, aac, mp3, wav.
This function is available on devices with iOS 13 or newer.

After the import, the recordings can be connected to the phrases (when they have the same name) with the 'Manage recordings' function in the 'Speech and sound' settings.
Otherwise it is also possible to edit the buttons with phrase by longpressing the button and select the corresponding recording.

Export Recordings

With this function, you can selected a folder on your device or on iCloud where the zip file with the voice recordings will be created.

16. Custom Keyboard

The Custom Keyboard can replace the default iOS keyboard on the Main screen of the app.

With the custom keyboard you can define which characters are placed on the keys or choose a default layout, like for example QWERTY or ABC layout. The colors of the different groups of keys can be customized and the size of keyboard can be changed.

The Custom Keyboard also has features to prevent double touching of the keys and the repeat time of the backspace key can be set.

Back   Custom Keyboard

Custom Keyboard
This options enables the custom keyboard which will replace the default keyboard on the main screen.

Characters on keys
Define the characters on the keys or choose between QWERTY, AZERTY and ABC layout.

Special characters on keys
Define the special characters on the keys.

Number of rows and keys
The number of rows and keys of the keyboard. Selecting more rows increases the height of the keyboard.

Return key
Enable the return key on the keyboard.

Color scheme
Tap to select the color scheme.

Personal color scheme
Tap to create a personal color scheme.

Larger font size
Select this option for a larger font size on the keys.

Font style
Tap to change the font style on the keys.

Auto Capitalisation
With this option each sentence will start automatically with a capital letter.

Word completions
With this option a bar with completions will be shown above the keyboard.

Auto Correction
With this option a misspelled word will be automatically corrected.

Language
Select the language for Auto Correction and Word completions.

Words not autocorrected
The list of words that will not be autocorrected. An autocorrect can be undone with backspace and then selecting the word. The word is then saved in this list.

Prevent double touching
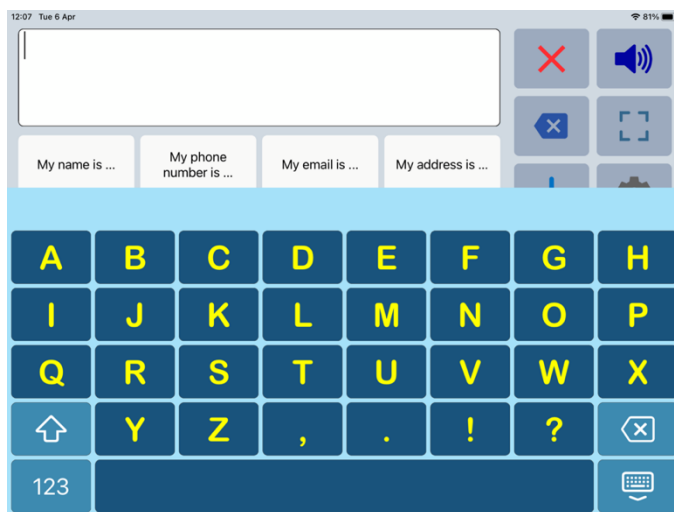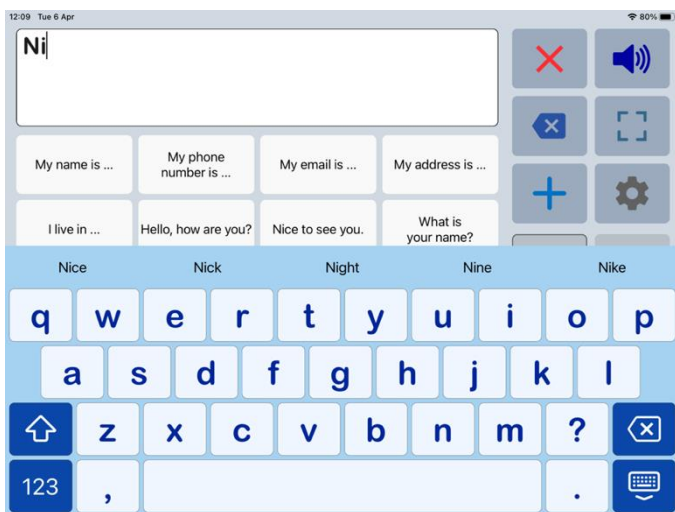Set the disable time for the keys to prevent double touching.
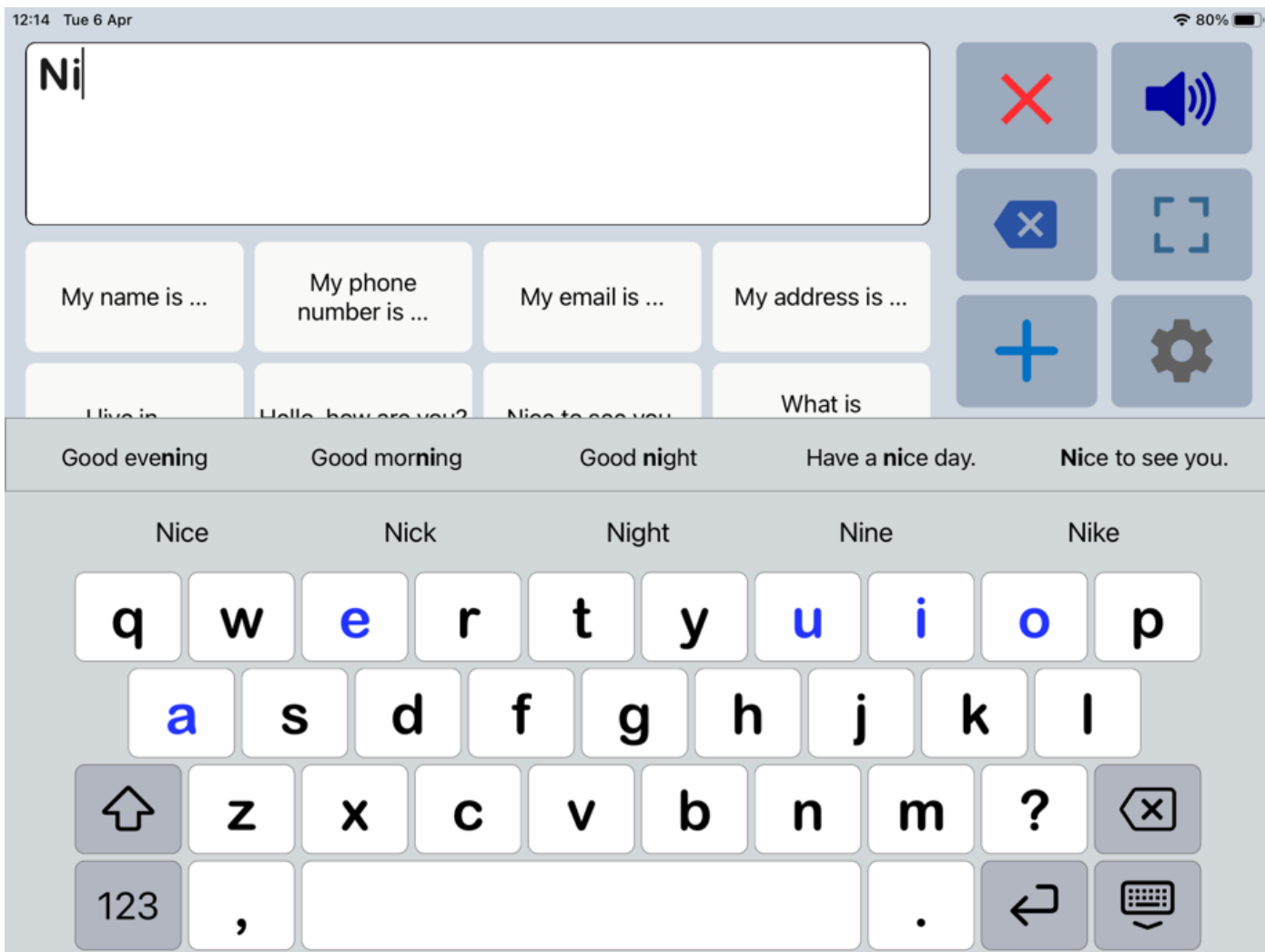
Backspace repeat
Set the repeat time for the backspace when you long press the this key.

Keyboard width
With this option the keyboard can be made less wide in landscape mode.

Keyboard height
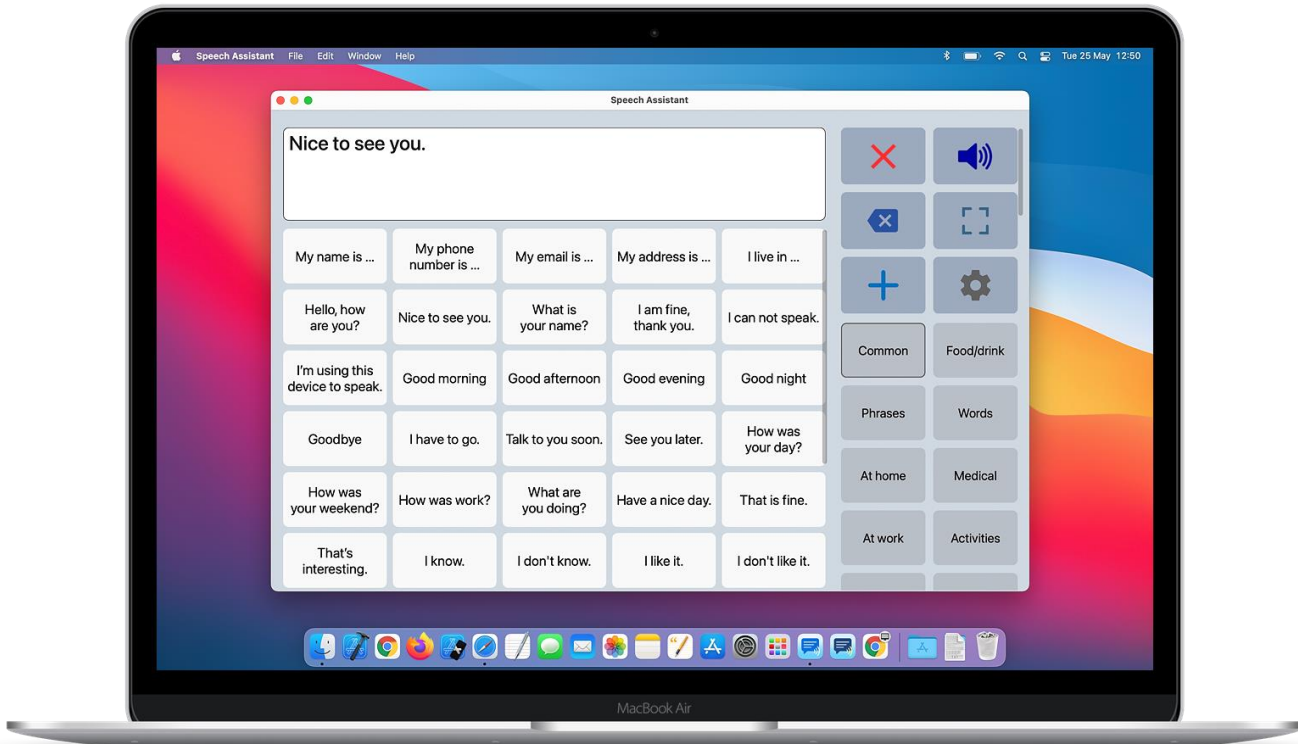With this option the keyboard can be made less high in landscape mode.

Custom Keyboard examples

17. Install on a Mac

The app can also be installed on the Macs with Apple Silicon such as the new MacBooks and iMac with the M1 chip. You can search for the app in the Mac App Store (tab iPhone & iPad Apps).

The app works the same way as on an iPhone or iPad, but can be resized to any size, from fullscreen to very small.

Voices on a Mac

The voices can be downloaded in the settings of your Mac: System Preferences > Accessibility > Spoken Content > System voice (tap on the selection icon) > Customize.
After downloading voices, the app has to be restarted before they can be selected in the app.
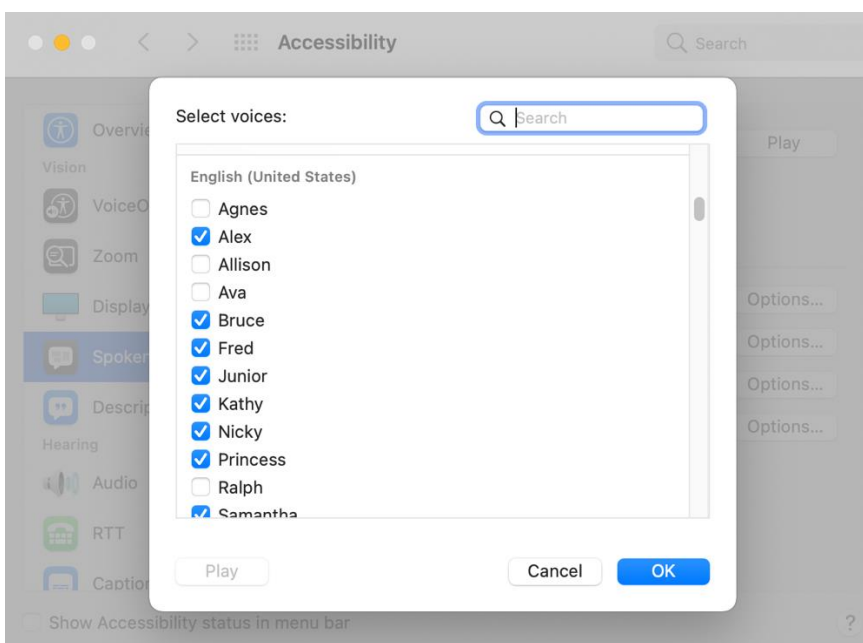
Onscreen keyboard

If you prefer to type with an onscreen keyboard on your Mac, you can enable the Apple Accessibility Keyboard:
https://support.apple.com/guide/mac-help/use-the-accessibility-keyboard-mchlc74c1c9f/mac

AirDrop to a Mac

On a Mac it is also possible to backup and restore from iCloud like on an iPhone or iPad, but if the devices are nearby then AirDrop is also a convenient way to transfer your categories and phrases to another device.
When you send a complete backup with AirDrop from (for example) an iPad to iPhone, the app will automatically open on the receiving device to restore the backup.
But when you send it to a Mac, the backup will be placed in the download folder on your Mac. You can restore this backup by selecting the file (backupcomplete.zip) with the restore function of the app.

18. Tips and About

Apple Pencil

With an Apple Pencil you can write in the textbox and your handwriting will be automatically converted into typed text.

There are two settings of the app that can make using the Apple Pencil more convenient.
• In the speech settings you can enable the option 'Speak word'. With this option, the app detects when a word is written with the pencil and speaks the word.
• In the layout settings you can enable the option to to place the textbox at the bottom of the screen. This prevents touching the buttons that are normally placed below the textbox.

The Apple Pencil is only supported on an iPad. There are two different versions of the Apple Pencil that only work with specific iPads. The handwriting convertion is called Scribble and must be enabled in the Apple Pencil settings of your iPad.

App download

App Store: apps.apple.com/app/speech-assistant-aac/id1139762358

Privacy

The app does not collect any data and does not require an internet connection to function.
Only during the backup, restore and import functions an internet connection is needed.

User Manual

Version: 4.6.2 (app version)
Date: 18-12-2021

ASoft

Website: www.asoft.nl
E-mail: info@asoft.nl