



Release Notes

Navigil 580 firmware release 10

06/06/2023

1 Release summary

This release introduces several new features and significant enhancements.

If you have any questions about changes in this release, please feel free to contact Navigil Support [support@navigil.com].

Release 10 software component versions

MCU	Bootloader	BLE	GNSS	Wellness library	Language file	Audio prompts	DSP binary
v5.15.0	v5.1.0	v2.2.0	v19913	v4.1.0	v1.11	v2.2	v6.1.15

2 Changes to existing features

2.1 Fall detector algorithm updated

The fall detector algorithm has been replaced by a drop detector, meaning a free fall followed by a hard impact. The symbols and the watch communication are as earlier.

2.2 Display layout changed

The display layout of the watch has been changed. The UP and DOWN arrows have been moved to the right side of the display, above and below the RIGHT arrow. Thus the full display height is available for contact names.

2.3 Prompt for the 'SOS message delivered' removed

The prompt for the 'SOS message delivered' has been removed due to possible inaccuracy in delivery time, e.g. when the network coverage is poor. Anyway, the SOS message will be delivered as soon as possible.

3 New features

3.1 Several protection features added

The following protection features have been added as optional to the firmware

- Encrypted communication
- Encrypted message buffer, event log, and black box
- Digital signatures of firmware and configuration files
- Password protection of the local command console
- Local communication ports disabled

3.2 Support for displaying contact names

The watch supports a bigger display area for showing e.g. Japanese contact names.

4 Enhancements and bug fixes

- The volume adjustment during a call affects only the ongoing call.
- A configuration option for disabling the SOS call button has been added.
- In general, the success of calls and call tracking has been improved.

Additionally, other small fixes and improvements are done.

5 Known issues

5.1 Positioning may stop without reporting any position if emergency tracking is activated at the same time

Description

When SOS call positioning or requested positioning (LOCATE button on the watch dashboard) is waiting for a GPS location and emergency tracking is activated at the same time, the emergency tracking will override the earlier positioning request. If the emergency tracking is then stopped without getting a valid position, the GPS acquisition is stopped without an SOS call position ever finalizing its wait procedure. The SOS call positioning ends up in a state where it does not accept new positioning requests, although the watch is not actively searching for a GPS position.

Emergency tracking and other positioning triggers (breadcrumb trail, safe zone, etc.) work normally although the SOS call positioning is stuck.

The error condition is cleared by getting a valid GPS location or with a system reboot.

Workarounds

In field use, if automatic positioning does not provide the required position information, the caretaker should activate emergency tracking.

When a reboot option is available, the watch can be rebooted to clear the lockup state of the SOS call positioning.