

OTA firmware update

For unprovisioned devices (not added to a Bluetooth mesh network)

Application note

1 March 2023	SF-120 rev. 12.1
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1. Introduction

Over-the-air update (OTAU) with the Silvair DFU mobile app allows you to update the Silvair firmware or external MCU firmware (products with Silvair UART firmware only) on your lighting devices. To get access to the Silvair DFU mobile app, contact your business representative at Silvair.

The main features of the OTAU in the Silvair DFU mobile app are:

- ability to update the firmware of devices that have not been added to the mesh network (unprovisioned),
- ability to update one device at a time.

 After the update, the firmware cannot be downgraded to the previous version.


 To update firmware of devices which have been added to the mesh network (provisioned), use the Silvair mobile app. For more information, see [SN-208 OTA firmware update for provisioned devices](#).

2. Requirements


To update firmware, the following are necessary:

- an iOS mobile device with Bluetooth enabled,
- the Silvair DFU app updated via TestFlight,
- unprovisioned devices to update.

3. Updating the firmware

 Before the update make sure that the device is powered on and keep it on during the update. If the device is powered off during the update, it may become unusable.

1. Open the Silvair DFU app.
2. If you see **Update of Silvair MCU**, tap it.
3. From the devices list, tap the device you want to update.

 After the update is complete, a confirmation message appears.

4. Updating the firmware for an external MCU

Silvair DFP app allows you to update devices with Silvair firmware by using a zip file prepared by the manufacturer.

4.1 Generating a signed firmware zip file by a manufacturer

1. Log in to <https://licence.silvair.com>. If you do not have the correct login and password, contact matesupport@silvair.com.
2. Open the **MCU OTAU** tab to display the **Generate MCU OTAU image** form.
3. Expand the **Product** list and select the correct product.
For the Silvair OTAU update, select "Silvair UART Prod".
4. In the **Firmware file** field, click **Browse** and select your company's Host MCU HEX file (required).
5. In the **Application data (optional)** field, click **Browse** and select the BIN file (optional).
This file contains additional configuration data for the MCU.
6. Click **Get image**. The signed firmware package zip file will be downloaded.
7. Send the zip file by email to the installers with the Silvair DFU application.

4.2 Updating the firmware by an installer

1. Upload the zip file with the firmware to your iOS mobile device.
2. On your mobile device, open **Files**, and tap and hold the firmware file.
3. From the context menu, tap **Share** and then tap the **Silvair DFU** mobile app icon.
4. Open the Silvair DFU app.
5. Tap the uploaded firmware file.



Before the update make sure that the device is powered on and keep it on during the update. If the device is powered off during the update, it may become unusable. Keep your mobile device close to the device (no more than 30 meters away).

6. From the devices list, tap the device you want to update.



During the update the device may flash and its light level may be different from the normal level. This is expected behavior and may continue until the end of the update.



After the update is complete, a confirmation message appears.

5. Document revisions

Revision	Date	Editor	Changes
12.1	1 March 2023	GM	Unnecessary step in the procedure from point 4.1 has been removed.
12.0	30 November 2022	GM	Redrafted the document. Added that one device can be updated at a time. Implemented Template v. 1.2.
11.1	7 October 2021	ZZ	Added the Document revisions section and made a general document refresh.

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