Integration with Topology

> 💡 This document outlines the integration between Bigscreen VR and Topology and serves as a public documentation

Topology Open API

> 👉 Topology's external API is called the *Topology Open API*. Detailed documentation can be found here.

Authentication is done through a pre-shared API key and a secret partner token, both to be shared separately. More information can be found in the detailed API documentation.

Users/customers are called "patients" in the Topology platform.

Technical flow

1. Call create patient endpoint

To register a user in Topology's system, the `POST /patient` endpoint needs to be called. This endpoint returns an ID in the field `patient` which is used for all other API calls pertaining to this patient.

The list of required attributes for the patient can be agreed upon. The available fields are: *email, name, surname, zip, DOB.*

> ⚠️ If we agree that Bigscreen doesn't share email addresses with us, the patient creation endpoint will generate a "dummy email". It's important to store this as well as it is going to be needed for the "Auth" call (step 2)

2. Call patient auth endpoint

With the ID & email from the first step, the `POST /patient/auth` endpoint is called. This returns an authorization **token** for the given user which can be used to launch de AppClip/register a scan.

> 💡 The token can be used multiple times for a single patient, but it has a limited previously agreed expiration time (default is 7 days), so it should be re-generated whenever necessary.

3. Construct handoff URL

The URL to launch AppClip has the following format `https://www.youdomain.com/your/path/prefix?token={ token_from_step_2 }`.
To set up you domain/path to work and launch an AppClip, detailed documentation can be found in 🌐 AppClip integration

> 💡 Note that because the handoff token expires, users should ideally have a way to regenerate it when on the handoff page.

4. Relay handoff URL to customer

The method of delivery is your choice, either delivery it through email, or an even better choice would be to send an email to a page where the token is generated when needed, to avoid expiration/security issues.

5. AppClip launch

AppClip is launched from the handoff URL which is the same as the AppClip invocation URL. The patient can take a scan.

> 💡 The AppClip is launched by tapping a smart banner that appears in the browser if mobile Safari is used. For this reason, the page hosting this should have fallbacks implemented for the customer to launch it on a compatible device/browser. More information about this and generally how to integrate AppClip to a website: 🌐 AppClip integration

6. Listen to new scan callback

When a patient completes a scan and refines the landmarks, this webhook is automatically called, notifying of the new scan.

> 👉 Detailed documentation on how to consume the webhook: ↩️ Scan notification callback

7. Retrieve scan based on callback payload

The callback contains the patient ID, for which a new scan was added. With that information the `GET /patient/scan` endpoint can be called to retrieve the scan. This returns a signed expiring URL from where the scan zip can be downloaded.