

# TAUH Valkeakoski Hospital improved ENT (ear, nose and throat) surgery patients' communication, support and hospital operational efficiency

## About TAUH Valkeakoski Hospital

- Provides outpatient and inpatient treatment and performs day-case and short-stay surgeries.
- Total number of ENT procedures ~1000 per year.
- Most common ENT procedures: tonsillectomy, tympanostomy, and different sinus surgeries.
- The hospital is part of Tampere University Hospital (TAUH), which provides demanding specialized care services to nearly one million Finns.

## TAUH digitization objectives

- Pioneering in healthcare digitization in the hospital environment.
- Driving a superior patient experience.
- Creating cost-effective processes.
- Investing in developing digital service models.

## TAUH Valkeakoski Hospital's challenge

TAUH Valkeakoski Hospital identified that their outpatient surgery process had room for improvement ranging from inviting the patient to the procedure of admitting the patient home after the procedure. Majority of the tasks and phases around the procedure were inefficient, and current technological solutions and capability were not exploited. For example, reaching patients by phone was getting day by day more difficult as the surgery unit is only open during working hours, and patients cannot be easily reached during at this time of day.

Furthermore, it was discovered that patients struggle with understanding and remembering all the instructions they are given before the procedure and when they are sent home after the procedure. Delivering information by post took a long time, and instructions were also shared through different channels. On top of this all, TAUH had also formed a digitalization strategy, which supports the adaptation of digital health solutions.

## Solution

Buddy Healthcare and TAUH Valkeakoski Hospital's surgery and anesthesia unit joined forces and started co-creating patient engagement solution to improve surgery patients' care experience. Since September 2018 the patients coming to ENT surgery have received all information, such as procedure info packages, laboratory appointment reminders, combined pre-questionnaires, and anesthesia forms, pre-surgery checklists, post-operative instructions and feedback forms via a mobile app. All the information has been scheduled in the mobile app to arrive just at the right time to the patients to ensure better guidance and more compliant patients. The mobile app is TAUH branded white label solution called Tays toimenpide. Leaned patient care path led to a simplified process as previously separately filled anesthesia form is now almost entirely pre-filled with the information the patient fills in the pre-questionnaire. More efficient and comprehensive communication via the mobile app also enabled leaving out a large number of pre-surgery phone calls to the patients.

While the ENT patients use the mobile app, the care personnel use BuddyCare Dashboard. The Dashboard provides the care personnel real-time visibility over the patients' activities throughout the care path. The care personnel in TAUH Valkeakoski Hospital are now able to track patients who have not completed all the necessary information before the procedure. The Dashboard also enables two-way communication where patients may contact the hospital personnel and vice versa.

## Customer-reported efficiencies in ENT pre-operative care coordination

Method used: 350 digitally guided patients compared to 350 traditionally guided patients

**50%** Ability to manage more patients in one day

**80%** Reduced time per patient

**98%** Reduced phone calls

**> 1h** Pre-operative time saved per patient

**> 80%** Usage rate (all patients)

**30** Different carepaths templates

**4,6/5** Rating given by patients on how easily the app provides all the information



**4,6/5** Likelihood to recommend the app to other patients



## Benefits to ENT surgery patients

- Single-channel communication (Tays branded app) collects all information in one location, it's available 24/7, and the information can be read at their own pace.
- As the mobile app is now reminding and guiding patients from preparation to recovery, the patients are better informed and aware of the next steps.
- Patients have a possibility to interact with the care personnel through the app.

## Benefits to the TAUH Valkeakoski healthcare professionals

- Significant reduction of inefficiencies associated with phone calls, mailing, and paperwork.
- The more efficient process was resulting in time savings, cost reductions, and better-informed patients.
- ENT surgery patients' care communication and coordination process were leaned and modernized. The new process supports and follows the TAUH digitalization strategy.
- As technology enables patients to be more active in their care process, patients are more active and thus better prepared when they arrive in their operation. For instance, the pre-operative phone call was left out from the mobile app users.
- Patients' feedback and satisfaction survey collected via the mobile app, which has increased the received feedback, and Buddy Healthcare's reporting tool helps the hospital to follow up the customer experience and satisfaction rates.

Procedure Info Package

Laboratory Appointment Reminder

Pre-Questionnaire / Anesthesia Form

Pre-surgery Checklist

Surgery Day

Post-operative Instructions

Feedback Form



TAUH Valkeakoski overview of ENT surgery patients' process