



Smart Storage Monitoring & Notification System for Healthcare



Avaya Smart solutions enables Curaçao’s Medical Center to deliver on its promise to provide high quality care

Thanks to a successful implementation of an Avaya solution, Curaçao Medical Center reached a significant milestone by guaranteeing real-time temperature monitoring of medical fridges that store critical medicine, providing the facility with an improved confidence in process and quality assurance.

Curaçao Medical Center (CMC) state-of-the-art hospital with extensive specialized medical care.

The care of patients in the Curaçao Medical Center is centralized and coordinated. This means that all activities in the hospital are interconnected, which provides the patients with optimal and integral care. CMC works sustainably and complies with international standards of quality and security norms, in which the patients and security are the focal points. They offer different medical disciplines to deliver never-before-seen healthcare in Curaçao while also providing medical education and scientific research that will benefit current and future generations.

Cooperation and synchronization are vital for the Curaçao Medical Center as they work with other hospitals in the region and the Netherlands, general practitioners and midwives, and also home care and nursing homes and cooperate with Advent Hospital, to offer the Curaçaoan community a complete package of specialized medical care.



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—**Charlton de Windt**, Control Engineer

CMC also takes pride of their **“Embahador di Amor”** which enhance the care provided to their patients and their families, assisting the professional staff (nurses and doctors) in assuring that the comfort of patients, families and visitors are met throughout their visit.

Time-saving Integration

For Mr. Charlton de Windt, Control Engineer for the Curaçao Medical Center his job is all about delivering quality solutions to enable healthcare to be provided with the highest standards. This might mean through practical solutions, high-level and innovative technologies e.g. Internet of Things (IoT).

One of their recent projects for the team of more than 30 professionals De Windt leads, included the seamless integration of all the communication systems in the medical center significantly reducing time-to-connect, but more importantly being able to contact with all the staff, albeit their specific departments, with minimal effort and high effectiveness.

De Windt adds “our entire communication system, intercom, landlines, mobile and paging system are all fully integrated and available in CMC. At this point, we connected all of these systems together, so, wherever you are in the center, whatever department you want to reach, we're connected, which is a big accomplishment for us, if you're in a pharmacy and you don't have a phone, you can just push a button and call somebody at

the security office, or the emergency area”. For healthcare even more importantly, time saving actions and processes mean life-changing events.

“Being able to bring everything together with Avaya enabled us to rid ourselves of the cost and management of other multiple systems, which also makes our workday so much easier and lean” explained De Windt.

Real-time monitoring on critical resources

Another recent and key improvement area for CMC was the implementation of the use of technology real-time information from their medication cold storage units/ fridges, that can be used to deliver faster and smarter actions. De Windt explains “we have 20 medical fridges currently being 100% monitored for temperature conditions that could impact vital medicines stored within these units”

The way it works is via a sensor in the fridge that detects the condition, and the connected machine sends telemetry and diagnostic data to De Windt's team, if any abnormality is detected, a notification workflow is initiated and an immediate phone call is placed to alert the teams to act upon.

Essentially, this is a similar service request to what a human would make by calling a service hotline to report a fault. The difference is that the interaction is automatically initiated from

BUSINESS CHALLENGES

- Fragmented communications, which added costs, effort, and time
- Monitoring operational procedures of critical areas

VALUE CREATED

- New and relevant features to increase efficiency and reduce cost
- Rich, integrated communications adding new features for collaboration
- Confidence on quality controls
- Diminishment of failure points and risk
- Ease of use for stakeholders
- Lean and agile processes for control Engineers

a machine and the channel is digital, including rich, fact-based information that through an IoT platform generates a trigger in the workflow on the Avaya automation platform, which orchestrates multiple tasks, including real-time notifications, avoiding delays in responses and the resolution process by implementing corrective actions before medicine temperature is exposed outside the recommended ranges, and this is being done 24/7.

De Windt adds “this monitoring system is state of the art technology enabling the entire CMC organization to manage adequate responses to temperature changes on life-changing medicines, we had a messaging system before that couldn’t make a phone call to alarm the technicians after business hours, so we were glad Infotrans and Avaya stepped in, as this impacts the level of confidence we have in our processes and quality controls”. De Windt continues “solutions we have seen before from other hospitals only provided e-mail and SMS notifications and not real time smart notifications”, so this has been a game-changer.

Storage temperature errors can have a significant cost financially in wasted medicine but even more importantly, the impact on human lives is invaluable.

Transitioning into a new era

CMC with this new building has also impacted the lives of their medical and nursing team. De Windt adds “our new premises allow us to provide technology solutions to many areas, we have transitioned from having manual activities to automated ones, providing ease of use to our medical teams, even with the most practical solutions up to relevant contactless alternatives that are now more important than even”.

In terms of upcoming months, De Windt explains “we are working on doubling the number of cold storage units to have all of them connected to the monitoring system”. It is also vital for us the right maintenance level of our building, risk mitigation, technology that can allow us to implement actions ahead of time to keep our organization working successfully is always part of our goals”.

For Charlton de Windt, Control Engineer for CMC, the satisfaction of being part of a team that helps others through vital services is what makes him proud “My team and I are here to help”.



About CMC

Curaçao Medical Center (CMC) is Curaçao’s most important provider of both specialized medical care and high-level clinical care with a mission to provide high-quality hospital care to Curaçao and the region. Their motto is “Sirbi ku Amor,” which means “Serving with love” as they work with love and respect to restore, maintain, and strengthen the quality of life of their patients. For more information, please visit: www.cmc.cw



About Infotrans

Infotrans Curaçao combines all services offered by all companies to provide a quality full-service Infrastructure, safety & security ICT solutions tailored to each business. Their solution portfolio builds on industry -defining, innovative and proven technology platforms that benefit from continuous and significant investments in research and development. For more information, please visit: www.infotransgroup.com



About Avaya

Businesses are built on the experiences they provide and every day millions of those experiences are built by Avaya (NYSE:AVYA). For over one hundred years, we’ve enabled organizations around the globe to win—by creating intelligent communications experiences for customers and employees. Avaya builds open, converged and innovative solutions to enhance and simplify communications and collaboration—in the cloud, on premise, or a hybrid of both. To grow your business, we’re committed to innovation, partnership, and a relentless focus on what’s next. We’re the technology company you trust to help you deliver Experiences that Matter. Visit us at www.avaya.com



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