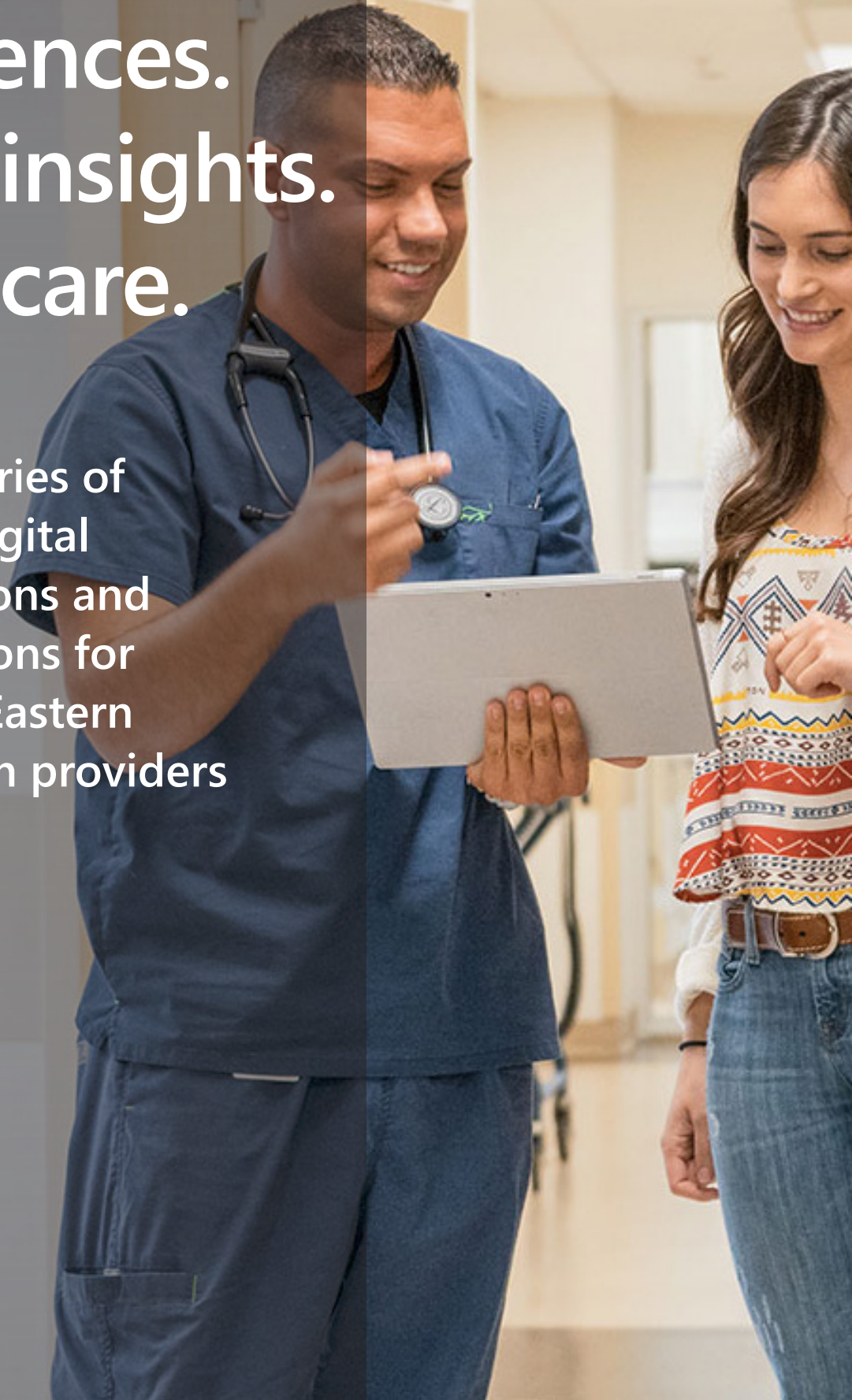Microsoft

Better experiences. Better insights. Better care.

8 success stories of healthcare digital transformations and digital solutions for Central and Eastern Europe health providers and payors

Introduction

Healthcare is rapidly transforming

The COVID-19 pandemic has overhauled every aspect of the healthcare industry and accelerated its digital transformation. Key emerging trends include an immediate need for virtual health and virtual consultations and a shift to a proactive patient paradigm focused on predictive care and personalized patient experiences. With caregivers increasingly adopting technology in their clinical and administrative tasks, healthcare providers have seen reductions in administrative burdens and clinician burnout. Facilities have also harnessed the power of the huge amounts of data generated in healthcare systems daily and generated operational and clinical insights.

To move forward, healthcare systems need to be resilient as well as agile. They need to be able to reach everyone everywhere, predict what's next, automate processes, leverage data for actionable insights and drive collaboration and coordination.

Microsoft is committed to empowering healthcare organizations through innovation and technology. With Microsoft solutions, facilities can make healthcare more personal and accessible, improve patient and clinician experience, and ultimately provide better care.

Ruthy Kaidar,
Director Healthcare Industry,
Central & Eastern Europe, Microsoft

In this eBook, you'll discover:

- Recent trends in healthcare and common challenges and opportunities in healthcare.

- Digital transformation success stories from leading healthcare providers and payors.

- Innovative solutions from Microsoft Certified Partners.

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01

Enhance patient engagement

Over the last several years, health systems have realized that creating a good patient-consumer experience not only helps their patients but makes it easier for their staff to provide consistent care across the patient journey.

Providing a holistic 360-degree patient view, digitizing and connecting the steps of a patient's journey in a clear and intuitive way, and introducing virtual health solutions for better connecting with more patients, helps organizations better understand and elevate patient experiences. Analytics from patient insights can potentially help organizations improve clinical processes and care management experiences.

76%

of patients are ready to use virtual health vs. 11% in 2019.[1]

47%

of healthcare organizations are already using patient data predictive analytics.[2]

![REGINA MARIA — REȚEAUA PRIVATĂ DE SĂNĂTATE]

Customer
REGINA MARIA

Products and Services
Microsoft Teams

Organization Size
Large (1,000 - 9,999 employees)

Country
Romania

REGINA MARIA supports doctors and patients with virtual clinic

Situation

- REGINA MARIA is one of the largest private healthcare networks in Romania.

- REGINA MARIA needed to make its leading medical services virtually accessible during the COVID-19 pandemic.

Solution

- Developed and launched a Virtual Clinic in ten days using Microsoft Teams.

- Integrated Microsoft Teams into the platform where all patient data and medical history are centralized.

Results

- 500 doctors enrolled within only weeks from the launch.

- Within seven months, 130,000 appointments were scheduled and 2,000 patients living abroad were using the Virtual Clinic.

"Now, any patient has the possibility to access the doctors with the required expertise, without having to travel to a central clinic, for example to Bucharest."

**Gabi Herbei,
Director of IT, REGINA MARIA**

(→) Read the full story

HUS

Customer	Organization Size
Helsinki University Hospital	**Corporate (10,000+ employees)**
Products and Services	Country
Azure, Azure Active Directory, Azure Bot Service (AI)	**Finland**

Helsinki University Hospital is stemming the spread of COVID-19 with data and cloud technology

Situation

- Helsinki University Hospital (HUS) is Finland's second largest employer and a healthcare provider with about 27,000 employees working across 23 hospitals, and treating about 680,000 patients every year.

- It set out to create an end-to-end test, track, and trace system that is helping to combat the spread of COVID-19.

Solution

- Created a guiding system for the call center professionals who are contacted by the public.

- Launched a health bot to facilitate citizen self-assessment, followed by booking tests in the vicinity and sending the results, while securing patient's privacy.

Results

- Saved countless lives.

- Overcame the strongest lockdown measures.

- Enabled the government to make critical policy decisions.

"Without the system we put in place, I believe COVID-19 would be much more widespread in Finland."

Aki Puustjärvi,
IT Development Manager,
Helsinki University Hospital

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Solutions to enhance patient engagement

Engage your customers to enhance health outcomes. These innovative solutions from Microsoft Partners will enable your team to automate where possible and offer better care to your patients with a 360-degree view of their needs.

EBO Intelligent Agent, by EBO →

- Powers customer engagement with Artifical Intelligence (AI) technology.
- Offers the platform and tools needed for exceptional customer engagement.
- Automates key processes to optimize specific services and increase patient satisfaction.

Holo4Med Telemedicine Platform, by SoftwareHut →

- Remotely supports patient care through a specialized mobile application integrated with the patient monitoring portal.
- Enables the use of the innovative Microsoft HoloLens2 Mixed-Reality glasses.

PocketECG, by Medicalgorithmics →

- A portable ECG monitoring device that makes more precise arrhythmia diagnosis.
- Offers full disclosure ECG signal, complete data, and comprehensive reporting.
- Enables remote heart monitoring.

telemedico, by Telemedi →

- Enables a safe, intuitive easy-to-use contact system between patients and doctors.
- Gives patients access to their medical records and collects their life measurements using medical devices integrated with the platform.
- Offers AI medical triage and symptom checker.

WhatsApp for Business on Azure, by Infobip →

- Allows quick, one-on-one conversational support to customers via Whatsapp.
- Delivers template messages and shares documents, educational videos, real-time transaction alerts.
- Connects your WhatsApp sender with MS Bot Framework.

→

Find more solutions for your business needs

02

Empower health team collaboration

Frontline healthcare worker and clinician burnout is one of the biggest challenges the healthcare industry is facing this decade. Empowering healthcare frontline workers with AI-powered technology and virtual visits allows them to assist patients remotely and effectively, saving the team's valuable time and ensuring patients still receive a consistent quality of care.

Centralizing communication, surfacing insights, facilitating file sharing, streamlining workforce management, and integrating third-party applications along with the right purpose-built devices can streamline engagement and boost productivity, while supporting wellbeing and keeping teams connected whether they're several feet or many miles apart.

Up to 70%

of the time providers spend analyzing data is wasted on ingestion and unification.[3]

By 2030

healthcare providers will suffer a shortage of 18 million healthcare workers.[4]

et:z

BUITENGEWOON

Customer
Elisabeth-TweeSteden Hospital

Products and Services
Microsoft Teams

Organization Size
Large (1,000 - 9,999 employees)

Country
Netherlands

Elisabeth-TweeSteden Hospital delivers vital virtual healthcare

Situation

- Elisabeth-TweeSteden Hospital (ETZ) is a leading clinical and educational hospital and trauma center in the Netherlands.

- The hospital was already in the initial stages of optimizing virtual appointments for patients in two care pathways—neurology and reproductive medicine—when the arrival of COVID-19 made the effort an even higher priority.

Solution

- Used Microsoft Teams to build an intuitive and durable platform for virtual appointments that could interoperate seamlessly with the hospital's electronic health record.

Results

- Dependable, intuitive, and easy-to-use communications platform for patients and clinicians.

- Access to a fully integrated solution for clinicians to document virtual patient consultations without having to start up other systems.

"The greatest benefit is how we've used Teams to lower the threshold to care and make it possible for any patient to consult a physician, no matter their location or circumstance."

Martin van den Oudenhoven,
ICT Project Leader,
Elisabeth-TweeSteden Hospital

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Customer
Tel Aviv Sourasky Medical Center – Ichilov Hospital

Products and Services
Microsoft Teams, Azure, Azure Machine Learning

Organization Size
Large (1,000 - 9,999 employees)

Country
Israel

Tel Aviv Sourasky hospital improves communications and enhances patient treatment

Situation

- Tel Aviv Sourasky Medical Center (Ichilov) is one of Israel's leading multidisciplinary healthcare institutions.

- It needed to improve collaboration among staff, treat patients remotely, and respond to the surge in patient calls.

Solution

- Deployed Microsoft Teams across the organization.

- Developed a healthcare bot to make preliminary triage of COVID-19 cases.

- Developed a machine learning-based model that predicts patients' no show.

Results

- Gained remote work support with the ability to share medical data, consultations, lectures, and clinical trials.

- Improved care and cut down cost.

"What happened is that Teams became the hospital's internal communication system. That internal communication boosted completely."

**Dr Ravit Geva,
Deputy Director and Head of Research and Innovation Unit,
Oncology Division,
Tel Aviv Sourasky Medical Center**

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Solutions to empower health team collaboration

Empower your healthcare team to optimize workflows. These solutions from Microsoft partners will equip your staff with the tools necessary for healthcare team collaboration, care monitoring and care coordination.

Grants Management, by Clouds On Mars →

- Helps Grantmakers along the entire life cycle (program creation, submission, evaluation, fund allocation, reporting, and monitoring).
- Power Automate decreases the number of manual tasks and integrates with legacy systems, saving time and effort.

Lifeflow diagnostic application, by LifeFlow →

- Offers a non-invasive diagnostic test of the FFR CT CNBP type, which enables precise anatomical and physiological assessment of coronary vessels.
- Enables medical staff to quickly, safely, and reliably determine the further therapeutic path of a patient with suspected coronary heart disease.

Medicai, by INNOVATOR ARTIFICIAL TECH SRL →

- Creates a healthcare ecosystem that enhances collaboration among clinics, doctors, and patients.
- Allows access to medical imaging and documents on any device and automates imaging workflows.
- Fosters remote services, enables virtual office visits, and improves response time.

VSI HoloMedicine, by apoQlar →

- Uses Microsoft HoloLens 2 to transform medical images clinical workflows, and medical education into an interactive 3D mixed reality environment.
- Improves care coordination and enhances the surgical planning process.
- Saves time planning and provides unique anatomical perspectives.

→ Find more solutions for your business needs

03

Improve clinical and operational insights

A main challenge facing the health industry is the sheer volume of data it produces, which is too often unstructured and inaccessible. This not only wastes valuable time on processing, but it also means that the data is unusable for analysis and AI and machine learning at scale.

Healthcare organizations aim to simplify data governance and compliance by unifying data on a single platform, securely access and share actionable insights to help improve patient care management, and improve operational efficiency by synchronizing management efforts across clinicians and administrators.

Nearly 80%

of the information that exists on a patient is in an unstructured format and largely inaccessible for physicians to make data-driven decisions.[5]

By 2025

healthcare data will experience a compound annual growth rate of 36%.[6]

Customer **NHS Digital**	Organization Size **Corporate (10,000+ employees)**
Products and Services **Azure, Azure Well-Architected Framework**	Country **United Kingdom**

NHS gets well-architected in response to the pandemic

Situation

- Since 1948, the National Health Service (NHS) provides health services for more than 63 million citizens in the United Kingdom.

- NHS needed a better, more responsive system architecture that could scale with the tsunami of demand during the global pandemic and maintain expected performance levels.

Solution

- Used the Microsoft Azure Well-Architected Framework and the AlwaysOn solution to diagnose systemic issues with the NHS architecture and make necessary improvements.

Results

- Completely re-engineered system with significantly improved performance, reliability, and security, as well as far superior operability.

- Can now accurately scale out resources where it's needed, and therefore provide a better national service.

"It gives you that warm feeling that this very important national service is designed well and will meet the needs and the demands that are asked of it."

Craig Bond,
**Azure Infrastructure Engineer,
NHS 111 online, NHS Digital**

→ Read the full story

Capio

Customer
Capio

Products and Services
Azure, Microsoft Healthcare Bot, Power Apps

Organization Size
Corporate (10,000+ employees)

Country
Sweden

Capio uses interoperability and conversational intelligence to transform healthcare

Situation

- Capio offers a wide range of quality medical, surgical and psychiatric care throughout Sweden, Norway and Denmark.

- Needed to find a digital-first solution that would enable staff to do their jobs in the best possible way, whilst relieving the pressure and keeping everyone safe.

Solution

- Leveraged key components of the Microsoft Cloud for Healthcare and built a platform that the organization could use to rapidly implement a number of tools in weeks rather than months.

- Implemented Microsoft Healthcare Bot to communicate with patients at home.

Results

- Access to data that will shape patient personalized dashboards and healthcare AI models for years to come.

- Can offer a secure and flexible service to help provide self-assessments at scale and speed.

"We can use this information to create personalized and AI-driven solutions, as well as improve our own clinical and operational data insights."

**Niklas Sundler,
Technology Innovation Director at
Ramsay Santé and Capio**

→ Read the full story

Solutions to improve clinical and operational insights

Prioritizing data-driven operations and care has become paramount for healthcare providers. With these solutions from Microsoft Partners, your organization can gain better visibility and optimize workflows for efficiency.

Better Digital Health Platform, by Better

- Enables you to build applications on top of a common architecture with maximum vendor independence, open for multi-vendor adoption and engagement.
- Easily implement innovative business models, care coordination protocols, and pathways.

SOPHiA GENETICS platform, by SOPHiA GENETICS

- Empowers clinical researchers to act with precision and confidence by unlocking new-generation health data for cancer and rare disease management.
- Offers an innovative approach and patented machine learning-based algorithms that call variants with 99.9% specificity and sensitivity.

Tieto Intelligent Wellbeing, by TietoEVRY CORPORATION

- AI-based data-driven product family for healthcare and welfare.
- Its end-to-end platform collects all the data from patient, customer and clinical information systems in one place structures open text data into a machine understandable format and runs advanced machine learning algorithms.

Vaccine Distribution System (VDS), by PwC

- Helps manage the COVID-19 vaccine delivery process throughout a country, including vaccine distribution planning, offers, orders, delivery tracking, and reporting.
- Integrates government agencies, pharmaceutical wholesalers, national grid users, and a data warehouse for efficient operations.

Solutions to improve clinical and operational insights

Infosys Information Grid by Infosys Limited →

- Provides scalability, security, and reliability for realizing boundaryless data foundation on Azure, resonating extremely well with healthcare providers.
- Provides comprehensive data lake management capabilities.
- Allows for 30-50% cost savings and speed increases by 100 times through self-service data onboarding.

→

Find more solutions for your business needs

04

Deliver trusted member experience

Patients have higher expectations than ever towards healthcare providers and insurers.
When payors deliver access to secure tools and understandable and actionable information for their members, they can provide personalized, intuitive experiences that help members become more engaged to proactively manage their health and well-being.

Health payors aim to keep members healthy while managing both administrative and direct care operations efficiently, use data insights to operationalize new models of care, predict future health trends, reduce risk and improve population health, ultimately leading to delivering better care.

>2 billion

people will be 60 years old or older by 2050.[7]

>4T Gb/year

of healthcare data is generated.[8]

dacadoo
It's all about you.

Customer **dacadoo**	Organization Size **Medium (50 - 999 employees)**
Products and Services **Azure**	Country **Switzerland**

dacadoo opens digital door to a healthier future and better world

Situation

- The Health Score platform developed by dacadoo allows global insurance giants to give clients accurate and meaningful insights into their health and well-being.

- dacadoo services 35 of the 100 largest life and health insurance operators and its products reach a potential 200 million people worldwide.

- Needed to scale quickly to accommodate vast numbers of new users.

Solution

- Moved data from localized datacenters to Microsoft Azure Cloud Platform.

Results

- Enhanced security.

- Achieved scalability that allows dacadoo's clients to grow.

- Supported governments around the world in trying to understand and predict populations that could be at risk.

"More than 530 years ago, Leonardo Da Vinci attempted to define the quality of human life. Fast forward half a millennium, and we are doing the same thing—just with different technology."

Peter Ohnemus,
CEO, dacadoo

→ Read the full story

Customer
AXA

Products and Services
Azure

Organization Size
Corporate (10,000+ employees)

Country
France

AXA launches a digital healthcare platform

Situation

- AXA is one of the world's only truly global health insurers, with a customer base of 15 million in the European markets.

- Wanted to provide comprehensive services, and swift and easy access to effective healthcare and wellbeing services through a seamless, integrated, and personalized experience.

Solution

- Joined forces with Microsoft to launch a digital healthcare platform: an all-in-one solution to empower users with a new and simplified e-health experience.

Results

- Users can self-assess symptoms, book online appointments with doctors or medical centers, receive a teleconsultation, arrange medicine delivery and more, all in one place.

- Helps improve patient outcomes by strengthening prevention and treatment of chronic diseases.

"This system is built on a standardized platform but is flexible enough to adapt services to countries' specificities, and it is open to all – not just to AXA customers."

**Antimo Perretta,
CEO, AXA Europe**

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Solutions to deliver trusted member experience

Today's health insurers need to offer a variety of channels for members, leverage data, as well as respond swiftly to claims and inquiries. With Microsoft Partner solutions, your organization can gain actionable insight while ensuring the privacy of members.

Mazik Cashier, by Mazik Global

- Supplies one solution for various billing needs and simplifies the payer experience.
- Enables fast and efficient actions on payments such as through cashier batch management, transaction management, payment transactions, and reporting.

Piwik PRO Analytics Suite, by Piwik

- Analyzes the customer journey across websites and apps.
- Creates advanced reports in seconds, even for websites and apps with more than two billion events.
- Provides full compliance with privacy and security laws worldwide.
- Offers responsive support and 24/7 incident handling.

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Conclusion

Embrace the future of healthcare

There is nothing more personal or important than our health. The last two years have shaken an already fragile healthcare ecosystem, strained essential services, and put unimaginable pressures on frontline workers. In response to these mounting pressures, the healthcare industry has embarked on a digital transformation that has laid the foundation for a new era of innovation and collaboration. The opportunity to reimagine care has never been greater, and the stakes have never been higher. Healthcare organizations seek to drive better decision-making, create more personalized experiences for both patients and providers, and tackle some of the toughest challenges in healthcare, where providers and payors need to:

- Elevate patient experiences with a 360-degree view of their patient data

- Digitize the patient journey and empower every patient touch point

- Empower care teams with solutions that foster communication and collaboration

- Support clinicians with AI and automated clinical documentation and greater flexibility

- Improve, safeguard, and leverage clinical and operational insights

At Microsoft, we aim to empower patients, practitioners and administrators to be adaptable and agile in this rapidly changing environment, as we continue to deliver technology that helps healthcare organizations deliver better experiences, insights, and care.

→ Learn more

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